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THE UNIVERSITY OF NEW MEXICO



2007-2008 ANNUAL REPORTS

Volume I

ANNUAL REPORTS 2007-2008

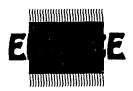
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THE UNIVERSITY OF NEW MEXICO DIVISION OF ENROLLMENT MANAGEMENT



ENLACE NEW MEXICO ANNUAL REPORT JULY 1, 2007 TO JUNE 30, 2008

DR. TERRY BABBITT, PRINCIPAL INVESTIGATOR LAWRENCE ROYBAL, INTERIM EXECUTIVE DIRECTOR NOVEMBER 25, 2008

Project Summary and Goals

Historically, affirmative action policies have evolved from initial programs aimed at providing equal educational opportunities to all students, to the legitimacy of programs that are aimed at achieving diversity in higher education. In June 2003, a U.S. Supreme Court ruling on affirmative action pushed higher education across the threshold toward creating a new paradigm for diversity in the 21st century. The court clearly state that affirmative action is still viable but that our institutions must reconsider our traditional concepts for building diversity in the next few decades. This shift in historical context of diversity in our society has led to an important objective: If a diverse student body is an essential factor in a quality higher education, then it is imperative that elementary, secondary and undergraduate schools fulfill their missions to successfully educate a diverse population. In NM, the success of graduate programs depends on the state's P-12 schools, the community and institutions of higher education, and their shared task of educating all students. Further, when the lens in broadened to view the entire P-20educational pipeline, it becomes apparent that the loss of students from elementary school to high school is enormous, constricting the number of students who go on to college. Not only are these of concern to what is happening in terms of their academic education but as well in terms of the communities that are affected to make critical decision and become and stay involved in the political and policy world that affects them.

Guiding Principles

ENgaging LAtino Communities for Education New Mexico (ENLACE NM) is a statewide collaboration of *gente* who represent the voices of underrepresented children and families – people who have historically not had a say in policy initiatives that directly impact them and their communities. Therefore, they, and others from our community, are at the forefront of this initiative. We have developed this collaboration based on a process that empowers these communities to find their voice in the pursuit of social justice and educational access, equity and success.

Core Values

- Inclusivity: We believe that a Latino-focused educational initiative will create a world-class
 educational system for all students. Every student must experience the opportunity and support
 necessary to achieve academic success.
- Transparency: We believe that remaining responsive and responsible to students, parents, educators and communities is imperative to educational success for students in New Mexico.
- Cultural Humility: We believe that our work recognizes, validates and embraces the core cultural
 values of our stakeholders the strength of familia, the bonds of comunidad, and the mutuality of
 respeto.
- Bottom-Up Change: We believe students, parents, educators, and communities themselves must
 define the programmatic and policy issues necessary to affect systematic change. Policy
 recommendations will reflect best practices and lead to institutionalized programmatic innovations
 that will be assessed through qualitative and quantitative research.

As a collaborative, we realize that to truly transform New Mexico's educational system, all corners of the state must be represented. Statewide coordination and a common agenda will bring a deeper recognition of the necessity of a seamless P-20 system and the basis for social improvement and the advancement of New Mexico's human capital. A broader collaborative will generate strategies for addressing concerns in a strategic and focused way through a well-informed process. This process will lead to closer ties with more communities and will provide a way for our communities' voices to speak as one. New Mexico is

regularly listed at the bottom of national ranking for child poverty, low graduation rates, and lack of economic opportunity. New Mexico is depicted as a state that does not recognize the assets that Latinos, who represent 42% of the population, provide. With our statewide work, we as a collaborative team will bring about educational reform that in turn puts New Mexico on the map in a way that truly represents the strengths that this state and our citizens possess. ENLACE rejects the language of educational deficits and focuses on the strengths and potential of the students. Our work has profound implications for the future of New Mexico and its youth and will serve as a national model for other state and communities.

Framework

Our work is based on a framework for success that addresses the following interdependent components in the public education system:

- Families and Community: Generate a new culture within participating educational institutions, and accompanying procedures, that value and respect community and family involvement as a key factor in contributing to the academic success of Latino youth.
- Educators: Enhance the professional development of current and potential educators in a manner that encourages respect for Latino culture, history, and language; instills high academic expectations for Latino youth; results in the production and use of culturally relevant curricula; and increases role models and mentors for Latino youth.
- Standards and Assessment: Create strong accountability systems that focus on improving
 Latino academic performance, retention, and graduation, and that facilitate a seamless pathway to
 college. Institute fair and ongoing assessment that is culturally and linguistically appropriate.
- Funding: Mandate equitable funding across all districts and within districts; fund outcome-based
 programs that incorporate genuine community involvement; and provide appropriate financial
 and other support services that ensure that postsecondary education is accessible to Latino youth.
- Policies: Indentify the best-methods and lessons-learned and convert them into legislation, regulations, policy, programs and practices that institutionalize and systematize the innovations that have been developed by ENLACE.

With regard to these target areas, ENLACE New Mexico has worked to raise awareness about the inequities in the current system, provided information on the types of alternative models and approaches that can utilized, explored how to institutionalize effective models and ideas, and used research to contribute to the continuous improvement of changes that are made.

Significant Developments

As a collaborative, ENLACE has required that we set aside our individual interests for the good of the whole; something that has challenged our teamwork and stretched our creativity. Through commitments, collaboration, and sharing of resources, we have accomplished much in the last several years:

- The ENLACE Family center model has been funded for statewide dissemination by the state legislature in recognition of the fundamental importance of parents and families in their children's education.
- ENLACE worked with state legislators to mandate changes in the way school districts track
 graduation rates as a means for improving accountability, and to require the inclusion of
 multicultural content in 10% of all instructional materials on the approved state textbook lists. In
 2007, we partnered with other organizations to successfully lobby for lottery scholarship
 reforms. In 2008, we were successful in acquiring funding to create a task force to address the
 high student to counselor ratio.

- ENLACE representatives have provided testimony and briefings to key state and national legislators and policy groups, hosted national conferences, and have served on the Governor's Education Transition Team and Education Task Force. ENLACE has earned a reputation as the voice for educational reform in New Mexico
- As a result of our activities, ENLACE students' attendance rates, grade point averages, and
 persistence's and graduation rates have shown measurable increases. Most importantly, students
 and families have begun to understand that college, for them, is a reality.

Successful Project Activities and Partnership Efforts

ENLACE New Mexico has evolved and changed with the goal of meeting the needs of students and families to improve academic achievement and graduation rates as well as education on health, well being which has large effects on these communities. Among all the New Mexico collaborative, the ENLACE collaborative "bottom up" work have far exceeded program expectations in terms effectively meeting this policy goal. Consider that, many Latino and other underserved parents and family members do not know how to navigate urban and rural school systems. School personnel, including classroom teachers, are often inaccessible: they neither speak Spanish nor share the cultural backgrounds of the majority of the students. Consequently, parents and students feel alienated from the school. The ENLACE New Mexico Collaborative was specifically designed to address the problem through policy development. The Collaborative creates a sense of value, purpose and ownership among parents of students in the targeted schools and surrounding neighborhoods. In fact, bilingual English-Spanish communication is one of the most prominent quality indicators offered by parents volunteers in the ENLACE movement. Moreover, ENLACE New Mexico is an oasis for many Latino and other minority and underprivileged students. Equally important, we address the need for many policies and services that are bilingual and geared towards immigrants, the parents import into the schools a set of competencies and skills that help students feel more at ease. In addition, evaluation findings revealed 1) increases in frequency of communication between families and schools; 2) increases in the quality of the relationship established between families and schools; and 3) increases in the involvement of parents in supporting students' learning and policy work.

Public Policy and Legislative Initiatives

ENLACE had great success during the 2008 legislative session. The New Mexico Higher Education Department (HED) allotted ENLACE \$1,147,300 for the fiscal year 2008 – 2009. The funds were distributed equally to all five regions per a decision by the State Executive Team. In previous years, the ENLACE State Office was funded solely by the W.K. Kellogg Foundation. Therefore, the current fiscal year is the first that the Collaborative will be reliant on state funding solely. This is a shift that ENLACE is learning from.

Additionally, ENLACE has developed and maintained relationships with policy makers across the state. For example, Representative Janice E. Arnold-Jones and Senator Cisco McSorley were instrumental in securing resources for mentoring initiatives administered through the University of New Mexico.

ENLACE's 2008 Legislative Policy Agenda identified two priorities and six ongoing focus areas. The two priorities include:

ENLACE at Certain Schools: mirror bills were introduced in both the House of Representatives
and Senate. Representative Rick Miera sponsored the bill on the House side, while Senator
Bernadette Sanchez carried the bill through the Senate. Both legislators have been ENLACE

- champions for the past several years. These bills translated to the \$1,147,300 appropriated from the New Mexico State budget.
- Develop Improved Student Advisement Plan: Students from ENLACE's Southern Region worked
 with Senator Cynthia Nava to develop legislation that will create a task force charged with
 studying issues affecting counselors and advisors. Specifically, the proposed task force would
 examine the factors contributing to the high student to counselor ratio. Recent data show that
 New Mexico's student to counselor ratio is 401:1. The American School Counselor Association
 recommends a ratio of 250:1.

ENLACE's Ongoing Legislative Focus Areas:

- Bilingual Education
- Curriculum
- Family and Youth Resource Act
- Financial Literacy
- Lottery Scholarship
- Parental Involvement

ENLACE leaders and participants have actively worked to inform, influence and change education policies to better serve New Mexico's students, with special emphasis on underrepresented students. This has required identifying effective strategies for supporting Latino and other minority students' education and then engaging in policy discussions to advocate for replication of these strategies to impact an increasing number of students and to sustain the work begun at the local community levels.

Because of the diverse representation characterizing ENLACE partnerships, the Collaborative views of statewide issues are well-rounded. While some of the partners are more experienced in developing policy, the ENLACE New Mexico Collaborative takes pride in integrating community voices to develop its policy recommendations. ENLACE creates an opportunity for Latino parents, many without strong English language skills or educational achievement themselves, to gain confidence in their capabilities to serve as advocates for their own children, as well to assume leadership roles promoting the betterment off children in their communities. As students sense their opinions are listened to with respect and help shape the final recommendations for changes in state policy, their commitment to support those efforts intensifies. When ENLACE organizes its annual legislative day, ENLACE Day at the New Mexico Legislature, community members, families and students convene at the New Mexico Legislature to advocate on behalf of ENLACE, to learn about the legislative process and to share their personal experiences and successes with ENLACE programs.

Important, specific examples of ENLACE's impact on New Mexico's educational policy are accomplishments from the past two legislative sessions. In 2007, ENLACE partnered with Think New Mexico, a results-oriented think tank serving the citizens of New Mexico, to increase the percentage of every lottery ticket dollar that is dedicate to the Lottery Scholarship Fund. This increase was from twenty-four to thirty percent, and will effectively increase the number of students who will receive the Lottery Scholarship for their undergraduate careers.

ENLACE has played a critical role in placing the issue of Latino and other minority students' academic success on local, state and national policy agendas. We are committed to continuing to work toward systemic change by improving the capacity of our partners to serve as informed advocates, enhancing our ability to produce and disseminate concrete evidence and information about best practices and outcome – based results, and to build broad bases of support that will ensure that policies are adopted and implemented based on communities to become a statewide movement for transformational change.

Project Benefits from Collective Efforts

A major benefit that ENLACE New Mexico has gained from collective efforts is the sustainability of the project. That is, the relations and networks which were formed via ENLACE New Mexico programs and activities will remain and continue to operate regardless of ENLACE's presence or absence. Funds of knowledge, i.e., insights gained, have accrued to individuals, neighborhoods and communities, and may still be activated when interacting with mainstream policy makers and institutions. In terms of ENLACE New Mexico partnerships, the ENLACE New Mexico collaborative increased its membership during the last year. Although a handful of partners have had to address other priorities and reduced their activities within the collaborative, new partners have joined as partners of ENLACE New Mexico and have ultimately strengthened the initiative in a variety of ways. First, current partners have access to new and updated evaluations and other materials as part of an effort to improve outreach to new stakeholders and other allies. In addition, the institutional resources of the University of New Mexico, New Mexico State University, Santa Fe Community College, Clovis Municipal schools, San Juan College, Northern College and Highlands University as well as all regions continued to support project management activities and the Statewide Leadership Team, which advises project leaders and focuses on marshaling additional resources. The Collaborative is committed to continually seeking new partners who will contribute to the ongoing vitality of current programs and can bring a range of new assets to the partnership.

To accurately measure student achievement it is imperative to measure factors not simply relating to academic success, but also to familial support, and emotional, mental and physical wellness. While academic achievement is necessary for a student to succeed in seeking a higher degree, it is not sufficient. Students need a more balanced measure of achievement. Therefore, ENLACE makes certain to track non-academic measures – contact hours and participant levels in ENLACE programs – along with academic measures – students' GPA, attendance rates and graduation rates.

In terms of academic achievement in selected ENLACE programs there have been significant gains. ENLACE has a 97 percent retention rate of students in the educational pipeline. Average GPAs of ENLACE scholarship recipients at CNM, over three terms, increased from 3.26 to 3.50 (on a 4.0 scale). Students in the ACE (Academic Curriculum for Excellence) program have improved academically with an overall 0.5 to 1.0 increase in their GPAs. The first cohort of students tracked in Los Compañeros program graduated from high school in May of 2008. ENLACE tracked these students from the time they were in sixth grade. Thirty out of thirty-two of the original cohort group graduated. Over 83 percent of ENLACE participants went on to college.

Another significant aspect of student achievement is parental involvement. The program with the greatest numbers of family participants is ENLACE's Family Centers. In 2007-2008, more than 5,200 students and 9,400 family members were served by Family Centers. This represents approximately 60 percent of the total number of student participants in all ENLACE New Mexico programs. Family Centers established in three high schools in the Albuquerque Public School system proved so popular that the client base increased from 300 in their first year to 1,000 students and parents by the midpoint of the second year. The New Mexico Legislature recognized the Family Center model in its Family and Youth Resource Act, and the model is proving suitable for replication elsewhere in New Mexico.

One of the greatest strengths of ENLACE is seen in the number of students and families served particularly with respect to contact hours. The 5,292 students served accounted for 115,546.5 contact hours. Family contact hours were roughly 61,853. Research has demonstrated that time on task, or student engagement has a positive effect on academic achievement. The greater the time that the students spend with school related activities, the greater the opportunity for success. Teachers are also positively

influenced by students' demonstrating interest in classroom activities. As a result, the contact hours that students spend with ENLACE programs increases their chances of succeeding in the classroom.

Collaboration & Partnerships

The partnerships ENLACE has established have fostered the belief that broader systems impact is created through leveraging all resources, not simply funding, while holding all stakeholders accountable. These partnerships serve as a vehicle for change. ENLACE forges partnerships between educational institutions and students, families, educators and community leaders. These partnerships include preschools through high schools, community colleges and universities. Because of their high enrollments of Hispanic and low-income students, efforts are centered on public institutions of higher education that are designated Hispanic-Serving Institutions.

The nature in which ENLACE partners with particular organizations says much about the strength and integrity of community partnerships. Partnerships are formed with various organizations that have similar missions and values because there is a common understanding that the challenges are greater than our programs alone and united advocacy is necessary for bottom up change. Although ENLACE prides itself on its positive student outcomes we believe the broader systems impact comes into play when we not only develop our students but also our communities. This is accomplished through civic engagement, parental involvement, leadership development and pipeline programs at a grassroots level.

Examples of ENLACE leveraging its resources to impact a greater community are the relationships established with the College Enrichment Program (CEP), Title V, Mentoring Institute, El Centro de la Raza, Latin American Network in Government and Public Policy, Southwest Hispanic Research Institute (SHR1), Parent Relations, the Health Sciences Center and the School of Law at the University of New Mexico. A specific example of ENLACE leveraging its resources to impact a greater community is the Los Compañeros mentors collaborating with the College Enrichment Program (CEP) at the University of New Mexico to orient and develop incoming University freshman. These mentors have the leadership skills and passion for education to influence anyone from middle and high school students to legislators. In return, the mentors are exposed to professionals who, in many cases, become mentors and role models to undergraduate and professional students, creating a web of opportunities. ENLACE's involvement with think tanks and committees have had favorable outcomes in regard to educational reform and policy development.

National Networks and Partnerships

Sharing ENLACE models and best practices at a national level has been an important focus. ENLACE leadership and staff have partnered with many national organizations to share ENLACE information and brought national partners to visit ENLACE sites. The efficacy of these efforts is best measured through the program audit done by *Excelencia* in Education. *Excelencia* in Education is a 501(e)(3) organization, based in Washington, D.C., which aims to accelerate higher education success for Latino students by providing data-driven analysis of the educational status of Latino students, and by promoting education policies and institutional practices that support their academic achievement. *Excelencia* is building a network of results-oriented educators and policymakers, to address the U.S. economy's need for a highly educated workforce.

ENLACE leadership, staff and volunteers have traveled to San Francisco, Las Vegas, Reno, Washington DC, San Antonio and New York to take part in presentations of ENLACE models and best practices. With each connection, it became more apparent that national partnerships are necessary for ENLACE to have the impact it wishes. These national partnerships accomplish the following:

- Demonstrate ENLACE New Mexico's dedication to educational reform, at the state and national levels:
- Provide information on local policies and practices;
- Establish and strengthen working relationships with
- Network with political leadership from across the country

Proposed Strategic Goals for 2008 - 2009

Through a series of statewide meetings, ENLACE has developed a comprehensive strategic plan focusing on the upcoming five years. Three broad action items were developed along with several more core action strategies, determined by focus groups consisting of students, family members and the leadership team, each of which align with the broader items. The overarching action items include: sustainability, policy development and student success; each of the focus group strategies fall into one of the three overarching action items.

The student group listed the following six items as their core actions:

- 1. Work on the legislative priority to improve the student-counselor ratio
- 2. Hold legislative forums at colleges and universities
- 3. Provide opportunities for students of all regions to participate in internships
- 4. Host statewide ENLACE meetings for post-secondary students
- 5. Improve college retention
- 6. Incorporate arts and music into ENLACE.

The core action strategies developed by the family member group are as follows:

- 1. Organize and facilitate a multi-cultural community event
- 2. Expand the training and workshop events throughout the state
- 3. Grow ENLACE by using bilingual promotional materials.

The final group, the leadership team recorded four core action strategies:

- 1. Provide annual paid training retreats for state ENLACE leadership
- 2. Improve ENLACE communication processes and capacities
- 3. Produce with continual updates the ENLACE state directory and organizational chart
- 4. Maintain and grow a unified and grassroots statewide ENLACE structure.

Through ENLACE, we have the opportunity to change that picture. In the future, we see New Mexico as a state with:

- An excellent public education system, which is vital to the quality of life of all New Mexico citizens and communities and fundamental to preserving a strong democratic society now and in the future.
- Public schools that are held to high standards of accountability at both the state and
 federal levels. Education policies are formulated to assure that all New Mexico children
 learn to their fullest potential; and continually strive for improvement and progress with
 an understanding of the need for commitment to the highest standards of student
 achievement.
- Students who are engaged in the educational process and take responsibility for their own
 education; helping to improve systems for others; and mentoring, tutoring, and/or
 otherwise supporting higher educational achievement among their peers, parents and
 community members. Students are supported in their efforts to enter and complete

- college through sustainable partnerships among higher education institutions, P-12 schools and local communities.
- Hispanic-serving institutions and other institutions acting in partnership with Latino
 communities to articulate and implement comprehensive plans aimed at strengthening the
 educational pipeline, decreasing high school dropout rates and increasing college
 completion rates. Latino faculty and students' leadership roles and capacity are expanded
 in the process of developing and implementing plans in sustaining partnerships.
- Latino organizations, communities and students represented substantively in decisionmaking, in the formation of plans, in the implementation of creative educational models and in the governance process.
- Innovative plans, based on the objectives of ENLACE, promoting a sense of communal responsibility for greater academic access and success for Latino/a youth.
- Models and information about university/P-12/community/business partnerships reaching a variety of local, state and national audiences, including policy and other decision makers, colleges, universities, school districts.

If current demographic changes continue, in twenty years the great majority of student in the public schools will be Latino. We must create schools that reflect the variety of Latino histories, narratives and aspirations. We must produce educators who will respect and develop this ethnic variety as part of New Mexico's cultural capital. If New Mexico can rise to this challenge, we will serve as a model for the region, the nation, and the globe.

Publications

- Excelencia in Education Program Audit (January 2008)
- Policy Agenda (January 2008)
- Strategic Plan (June 2008)
- Annual Report (June 2008)
- W.K. Kellogg Foundation Phase III Report (June 2008)

Staff Development

Lawrence Roybal, Interim Executive Director
Diana Montoya-Boyer, Community Relations Manager
Benigno Chavez, Student Success Manager
Christina Tapia, Education Support Coordinator
Brenda Chavez, Education Support Coordinator
Eleanor Estrada, Education Support Coordinator
Maria Acosta, Education Associate
Yolanda Dominguez, Education Specialist
Josh Corbin, Education Specialist
Cynthia Sanchez, Education Support Coordinator

G. Antonio Gonzales, Education Site Coordinator

The above staff members were active in the following community organizations:

Hispanic Statement of Cooperation (HSOC)

Hispano Round Table of New Mexico (HRT)

Albuquerque Partnership

Centro de Igualdad y Derechos

Parents Reaching Out (PRO)

Children Youth and Families Department (CYFD)

Appleseed Foundation

SPARX/Lorenzo Antonio Foundation

De Colores, Inc.

National Council for Community and Education Partnerships (NCCEP)

Mathematics, Engineering, Science & Achievement (MESA)

Gear-Up

American Bar Association

New Mexico Hispanic Bar Association

National Hispanic Caucus

Association of Community Colleges

Excelenia in Education

Center for the Education and Study of Diverse Populations (CESDP)

NM Work

Nation Association of Latino Elected and Appointed Officials (NALEO)

Family Parent Advocacy Council

Hispanic Association of Colleges and Universities (HACU)

League of United Latin American Citizens (LULAC)

LULAC National Education Service Centers (LNESC)

National Hispanic Institute (NHI)

Youth Development Incorporated (YDI)

Self Reliance Foundation

W.K. Kellogg Foundation

Rural Education of New Mexico

Family Leadership Institute (FLI)

Juvenile Detention Centers

Daniels Fund

Upward Bound

Celebra la Ciencia

Parent Teacher Association (PTA)

Parent Teacher Organization (PTO)

Somos Un Pueblo Unido

New Mexico Economic Development

Citizen Schools

Southwest Creations

AmeriCorps

Parent Advisory

New Mexico Educators Federal Credit Union (NMEFCU)

Think New Mexico

MANA

Bank of America Foundation

2007-2008 Personnel Changes

HIRED:

07/01/07	Benigno Chavez	Student Success Manager
08/02/07	Joshua Corbin	Educational Site Coordinator
09/20/07	Diana Montoya-Boyer	Community Relations Manager
05/27/08	Cynthia Sanchez	Education Support Coordinator

RETIRED:

03/01/08 Eleanor Estrada Coordinator Education Support

RECLASSIFIED:

04/01/08 Joshua Corbin Education Specialist 01/11/08 Lawrence Roybal Interim Executive Director

THE UNIVERSITY OF NEW MEXICO DIVISION OF ENROLLMENT MANAGEMENT

ADMISSIONS & RECRUITMENT SERVICES

ANNUAL REPORT

For the Period From July 1, 2007 to June 30, 2008

Terry H. Babbitt
Associate Vice President, Enrollment Management
November 2008

ADMISSIONS & RECRUITMENT SERVICES

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Departmental Mission

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DEPARTMENTAL MISSION.

- To recruit, evaluate, and admit qualified students to UNM, including beginning freshman, transfer, returning, non-degree, international, and graduate applicants;
- To provide information about UNM admission requirements, policies, and academic
 preparation to our internal and external constituents;
- To provide guidance for academic success and, as necessary, advise students about appropriate alternative options to help them meet their academic goals.

We do this through teamwork by providing individualized quality service to our constituents. We are committed to creativity and flexibility in working in an ever-changing environment. We strive to provide service in a way that exceeds our constituents' expectations.

Main Functions:

- Foster relationships with New Mexico high school counselors and collaborate with twoand four-year institutions and UNM Branch Campuses to facilitate enrollment of qualified students.
- Facilitate the articulation of students between New Mexico high schools and the
 university through the on-site admission program, shared data on student success, and
 improved service through technology.
- 3. Represent the university and its academic programs in the development of statewide and out-of-state freshman, transfer and articulation initiatives.
- 4. Execute the university's admission and enrollment regulations, as well as INS regulations, governing international students.
- 5. Establish relationships with business and industry to facilitate admission, enrollment, and continuing educational opportunities for working adult students.
- Review and evaluate applications and credentials for approximately 20,000 applicants per year.

I.

II. ASSESSMENT OF 2007-08 STRATEGIC PLAN DEPARTMENT, GOALS

create transmitter and himdelt for being occur-

- I. Support university enrollment management goals.
 - A. Implement proactive communication plan with prospective and transfer students through school visits, on-site admission programs and integrated communication systems

These activities were implemented but much work remains in communication planning.

- B. Focus on targeted recruitment programs and out-of-state receptions.

 These programs contributed to a 16% increase in non-resident freshman for fall 2008.
- C. Implement middle school initiative program This was started but is at risk due to budgetary constraints.
- D. Develop new articulation agreements

 New agreements were completed with CNM in Arts and Sciences and

 Anderson Schools of Management.
- E. Evaluate admission curriculum standards

 This review resulted in a recommendation to increase the curricular requirements from 13 units to 16.
- F. Coordinate communication to new students (student success)

 This has substantially improved with the introduction of Hobson's EMT but the most substantial results will be in the next academic year.
- II. Develop new Dual Credit agreements with area high schools
 - A. Continue to work with APS to sign an agreement This agreement is complete.
 - B. Develop new agreement with AIMS at UNM Charter School

 AIMS is chartered under APS therefore new state legislation for dual

 credit places AIMS under that agreement.
- III. Improve efficiency of service to students
 - A. Implement proactive auditing checklists for admission application processes Not complete this fiscal year.
 - B. Develop service network with other student offices, including Financial Aid, Bursar, Registrar, and all other university admission units

 One-stop training was conducted and implemented in a virtual environment.
 - C. Continue to work with Graduate Studies and academic departments to evaluate and improve graduate student admission function

This process is continually evaluated, Workflow to departments was initiated to streamline efficiency and eliminate loss of documents.

IV. Implement teambuilding initiatives

Transitions of leadership and retiring staff prohibited progress in this area.

- A. Management solves problems together
- B. Integrated training and meetings
- C. Entire office participation in occasional meetings or other activities
- Continue to implement Banner student information system, including updates as scheduled

This is an ongoing requirement and will escalate substantially in the future with version 8.

ENROLLMENT GOALS AND RESULTS

- Headcount and credit hours are up slightly but short of enrollment goals that were designed to meet "3% above base" formula funding levels.
- Recruited and enrolled the largest freshman class in UNM history including nearly a 180% increase in National Merit and National Hispanic Scholars.
- New graduates had a healthy increase (9%) but lower returning students resulted in an
 overall decrease.
- Transfer students represent the single largest concern for the Office of Admissions enrollment goals. The decrease is mostly a result of out-of-state transfers at both the 2 year and 4 year level but there was a decline in New Mexico numbers was also.
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	Fall 2007	Fall 2008	Change	%Change	2008 GOALS
					#Exceeding 2008 % 2008 # or Short of
Headcount					GOAL Goal Goal
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Albuquerque Campus Total	25,749	25,825	76	0.30%	26,238 (413)
Undergrad Headcount	18,259	18,396	137	0.75%	2%
Beginning Freshmen	2,910	3.228	318	10.93%	4% 3,026 202
Undergrad Transfers	1,086	994	(92)	-8.47%	- 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
Graduate Programs	4,289	4,231	(58)	-1.35%	2.30% 4.388 (157)
Anderson Grad	466	474	8	1.72%	7,000
Law	344	344	- "	0.00%	
Medicine (M.D. Program)	304	307	3	0.99%	
Pharm.D.	360	359	(1)	-0.28%	g • g • er e b b ∰ t • e
					Barrier and the state of the st
Gallup Branch	2,688	2,837	149	5.54%	e filore con legione de la companie
Los Alamos Branch	648	671	23	3.55%	
Taos Branch	1,194	1,416	222	18.59%	· 野鄉是有代表 (1985年)
Valencia Branch	1,807	1,988	181	10.02%	
Student Credit Hours					
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Gallup Branch	24,028	25,310	1,282	5.34%	
Los Alamos Branch	4,419	4,362	(57)	-1.29%	grange holikopererelog pegarenal
Taos Branch	8,281	10,194	1,913	23.10%	
Valencia Branch	16,185	17,016	831	5.13%	at the fitting and Allendaria

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 enrollment management and the partnership areas. The environment also provides
 avenues for cross-training the staff in the various administrative functions.
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 coordination among Albuquerque Campus, Branch Campuses, School Districts, and the
 Higher Education Department. The program allows students to earn high school and
 college credit for college level courses taken during high school, without having to pay
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- Website Redesign Our departmental website has been completely redesigned for ease of
 use and information finding. The new design also includes many more exciting features

such as a student map illustrating the volume and home location of our students, recruiter introduction pages, student profiles, blogs and other items. Student focus groups participated in this redesign.

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of transfer articulation system at the Branch offices by visiting and offering training sessions
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the new student system.

- Held on-site Admissions and Advisement sessions twice a year at each Branch campus with admission personnel and advisors from various colleges available to students.
- Continued efforts to encourage articulation of coursework and application of technical credit where appropriate.

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CUSTOMER SERVICE & DATA PROCESSING

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In addition to these daily duties, the Admissions Associates also assist with the evaluation of high school transcripts to determine admissibility of beginning freshman applicants, and admitting students, including determination of residency. This has enabled the staff to broaden their ability to answer questions regarding admissions requirements and has streamlined the admission process so an Admissions Associate can assist an applicant from the initial point of contact to the time of actual admission to the University.

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- 1. Support university new student enrollment goals
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- 2. Cross-Training for all staff
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THE UNIVERSITY OF NEW MEXICO

DIVISION OF ENROLLMENT MANAGEMENT

ADMISSIONS & RECRUITMENT SERVICES

ANNUAL REPORT

For the Period From July 1, 2007 to June 30, 2008

Terry H. Babbitt
Associate Vice President, Enrollment Management
November 2008

ADMISSIONS & RECRUITMENT SERVICES

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Departmental Mission

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Enrollment Goals and Results

Significant Developments 2007-2008

Customer Service and Data Processing

Proposed Strategic Department Goals for 2008-09

DEPARTMENTAL MISSION

- To recruit, evaluate, and admit qualified students to UNM, including beginning freshman, transfer, returning, non-degree, international, and graduate applicants;
- To provide information about UNM admission requirements, policies, and academic
 preparation to our internal and external constituents;
- To provide guidance for academic success and, as necessary, advise students about appropriate alternative options to help them meet their academic goals.

We do this through teamwork by providing individualized quality service to our constituents. We are committed to creativity and flexibility in working in an ever-changing environment. We strive to provide service in a way that exceeds our constituents' expectations.

Main Functions:

- Foster relationships with New Mexico high school counselors and collaborate with twoand four-year institutions and UNM Branch Campuses to facilitate enrollment of qualified students.
- Facilitate the articulation of students between New Mexico high schools and the
 university through the on-site admission program, shared data on student success, and
 improved service through technology.
- 3. Represent the university and its academic programs in the development of statewide and out-of-state freshman, transfer and articulation initiatives.
- 4. Execute the university's admission and enrollment regulations, as well as INS regulations, governing international students.
- 5. Establish relationships with business and industry to facilitate admission, enrollment, and continuing educational opportunities for working adult students.
- 6. Review and evaluate applications and credentials for approximately 20,000 applicants per year.

I.

II. ASSESSMENT OF 2007-08 STRATEGIC PLAN DEPARTMENT, GOALS

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- I. Support university enrollment management goals.
 - A. Implement proactive communication plan with prospective and transfer students through school visits, on-site admission programs and integrated communication systems

These activities were implemented but much work remains in communication planning.

- B. Focus on targeted recruitment programs and out-of-state receptions.

 These programs contributed to a 16% increase in non-resident freshman for fall 2008.
- C. Implement middle school initiative program

 This was started but is at risk due to budgetary constraints.
- D. Develop new articulation agreements

 New agreements were completed with CNM in Arts and Sciences and
 Anderson Schools of Management.
- E. Evaluate admission curriculum standards

 This review resulted in a recommendation to increase the curricular requirements from 13 units to 16.
- F. Coordinate communication to new students (student success)

 This has substantially improved with the introduction of Hobson's EMT but the most substantial results will be in the next academic year.
- II. Develop new Dual Credit agreements with area high schools
 - A. Continue to work with APS to sign an agreement This agreement is complete.
 - B. Develop new agreement with AIMS at UNM Charter School

 AIMS is chartered under APS therefore new state legislation for dual

 credit places AIMS under that agreement.
- III. Improve efficiency of service to students
 - A. Implement proactive auditing checklists for admission application processes Not complete this fiscal year.
 - B. Develop service network with other student offices, including Financial Aid, Bursar, Registrar, and all other university admission units

 One-stop training was conducted and implemented in a virtual environment.
 - C. Continue to work with Graduate Studies and academic departments to evaluate and improve graduate student admission function

This process is continually evaluated. Workflow to departments was initiated to streamline efficiency and eliminate loss of documents.

IV. Implement teambuilding initiatives

Transitions of leadership and retiring staff prohibited progress in this area.

- A. Management solves problems together
- B. Integrated training and meetings
- C. Entire office participation in occasional meetings or other activities
- V. Continue to implement Banner student information system, including updates as scheduled

This is an ongoing requirement and will escalate substantially in the future with version 8.

ENROLLMENT GOALS AND RESULTS

- Headcount and credit hours are up slightly but short of enrollment goals that were designed to meet "3% above base" formula funding levels.
- Recruited and enrolled the largest freshman class in UNM history including nearly a 180% increase in National Merit and National Hispanic Scholars.
- New graduates had a healthy increase (9%) but lower returning students resulted in an
 overall decrease.
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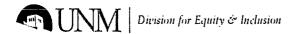
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Submitted By: Jozi De Leon Vice President for Equity & Inclusion July 1, 2007- June 30, 2008

2007-08 Annual Report

One of the University of New Mexico's guiding principals, as outlined in the President's Strategic Framework, is that "Diversity enlivens and strengthens our university, our community, and our society." The Division for Equity & Inclusion was formed in 2007 to strengthen the organizational capacity to serve UNM's diverse student body.

Vision Statement

The UNM Division for Equity & Inclusion will advance and sustain a university environment that values difference and promotes inclusion for all members of the UNM community and will support diversity as an essential element in fulfilling the university's mission of student success, teaching, scholarship, public service and community engagement.

Mission Statement

The UNM Division for Equity & Inclusion supports system-wide diversity initiatives to enhance student recruitment and retention, academic excellence, employee diversity and a campus climate that embraces its diversity as an asset.

Establishment of The UNM Institutional Diversity Office

The Office of Institutional Diversity was created in the fall of 2007. The executive-level office is under the leadership of the Provost & EVP for Academic Affairs. Interim Vice President, Rita Martinez-Purson, was appointed in August of 2007. An Administrative Coordinator, Felisha Herrera, was hired in September of 2007. The nation-wide search for the permanent VP was launch in November of 2007. The primary charge of the Office of Institutional Diversity was to establish a campus-wide **Diversity Plan** and **Diversity Report Card**.

Development of the Diversity Plan

Diversity Steering Committee

Dr. Rita Martinez-Purson, Interim Vice President for Institutional Diversity, established the Diversity Steering Committee to provide guidance in creating goals driven by both issues raised and data collected. Fourteen faculty and staff from across colleges, offices and branch campuses constituted the Diversity Steering Committee.

Focus Groups

In the fall of 2007, focus groups and dialogue sessions were conducted to solicit input from over twenty on-campus student associations, services organizations, and other groups. In addition, the Interim Vice President for Institutional Diversity also held one-on-one meetings with several UNM community members.

Publication

The Three Year Plan for Diversity, Equity and Inclusion (2008-2011) was reviewed by the Board of Regents' Academic/Student Affairs & Research Committee in December of 2007 and by the full Board of Regents in January of 2008. The final version was approved by the president and published in May of 2008. It constitutes the culmination of the office's broad-reaching ideas and needs recruited from across the colleges and campuses. The Diversity Plan unites a system-wide strategy for accountability and achievement of progress in institution-wide diversity.

The Diversity Plan reviewed the past recommendations, organized the Diversity Steering Committee, synthesized the issues and goals from focus groups and dialogue, and strategized eight goals. The Plan includes a timeline and budget recommendations.

The eight goals are as follows:

- Goal 1: Minority Student Success, Undergraduate and Graduate
- Goal 2: Recruitment and Retention of Minority and Women Faculty
- Goal 3: Faculty Development to Support Diversity, Equity and Inclusion
- Goal 4: Diversity and Inclusion Development for Staff and Students
- Goal 5: Leadership and Management Development
- Goal 6: Promote a Healthy Campus Climate
- Goal 7: Develop Marketing, Communications and Outreach to Support Diversity Initiatives
- Goal 8: Develop a Structure for Implementation and Continuous Quality Improvement

Development of the Diversity Report Card

In furtherance of the above goals, progress shall be assessed through the annual Diversity Report Card for the years 2007-2012 as prescribed in the preliminary Diversity Report Card. The preliminary Diversity Report Card was designed in collaboration with the Office of Institutional Research and the Office of Equal Opportunity, with input from the Executive Cabinet, the Provost Cabinet, and the Deans Council. The Diversity Report Card was reviewed in March of 2008 by the Board of Regents' Academic/Student Affairs & Research Committee. Published in May of 2008, it reflects the snapshot data available and outlines the benchmarks for each subsequent annual Diversity Report Card. Each annual Report Card assesses the progress towards each indicator in furtherance of the Regents' Goal for the President of the University of New Mexico regarding the diversity in faculty and staff.

2007-2008 Annual Report

Permanent Vice President Appointment

Vice President for the Division for Equity & Inclusion, Dr. Josephine De Leon, was named and officially appointed on July 1, 2008. The permanent VP is responsible for the overall establishment of the division and the organizational structure to implement and further expand the goals and initiatives enumerated in the Diversity Plan.

Division for Equity & Inclusion Organizational Structure

The Office of Institutional Diversity was officially renamed the Division for Equity & Inclusion and a new reporting structure was proposed. The new reporting structure was approved by the President and reviewed by the Board of Regents in January of 2008. In addition to reflecting the close working relationship that the division would share with Student Affairs, the Academic Deans, and HSC; this organizational structure outlines new direct reporting units and several collaborating units.

Reporting Units

The Division of Equity & Inclusion provides direct oversight to the following units of the University: African American Student Services, El Centro de la Raza, American Indian Student Services and the Office of Equal Opportunity. Because of compliance oversight, the Office of Equal Opportunity has reported directly to the President of the university in the past, and continues to have an indirect reporting line to the President's Office in compliance matters.

Collaborative Partners

The organizational structure for the division reflects the following collaborative units—Africana Studies, Accessibility Services, Chicano Studies, Feminist Research Institute, Institute for American Indian Research, Native American Studies, Southwest Hispanic Research Institute, Title V, Women's Resource Center, and Women's Studies

Special Projects

Spring 2008 Special Projects included \$18,900 to seven diversity initiatives: The Ibereo-American and Black Cultural Conferences, the African American Male Summit, Black History Month, the Raza Graduation, International women's day and the MLK commencement event.

Professional/Community Organizations

National Association of Diversity Officers in Higher Education (NADOHE). In January of 2008 the Office of Equity & Inclusion became a member of The National Association of Diversity Officers in Higher Education. NADOHE "is the principal organization of chief and senior diversity officers at institutions of higher education."

Diversity Leadership Council (DLC). The Office of Equity & Inclusion co-sponsored and coordinated the 2008 Diversity Leadership Council 19th Annual Forum on Diversity: Beyond Tolerance to Inclusion on April 24, 2008 at the Albuquerque Convention Center. The division collaborated with several community organizations to hold the event. Felisha Herrera, Administrative Coordinator for the division, facilitated a workshop on intercultural communication in leadership. The division also provided ten conference scholarships for UNM students to attend the event.

Path Forward: 2008-09

2008-09 Projects and Accomplishments

Division Organizational Structure. The division's organization structure was implemented in July of 2008. The reporting units—African American Student Services, American Indian Student Services, El Centro de la Raza, and the Office of Equal Opportunity—were restructured to report directly to the Vice President for Equity & Inclusion. The Vice President for Equity & Inclusion is working closely with these reporting units to strengthen the division and unite diversity initiatives.

Diversity Advisory Committee. The division is currently in the process of establishing a Diversity Advisory Committee that would be representative of students, faculty, and staff to provide recommendations to the division as diversity initiatives are planned and implemented.

Fundraising & Development Plan. The division has contracted with a consultant to create a fundraising and development plan for the division and the division units. The plan includes grant writing and other development initiatives in collaboration with the UNM Foundation. Expansion of resources specific to the division and the division units will be important to expanding the current programs. The plan also includes public relations and marketing strategies.

Minority Faculty Recruitment & Retention Plan. The Vice President for Equity & Inclusion is in the process of developing a Minority Faculty Recruitment & Retention Proposal. The VP is currently reviewing past institutional reports and meeting with various groups on campus such as the Southwest Hispanic Research Institute to identify recruitment and retention support mechanisms across the university. The proposal will be submitted to the UNM President and Provost for review. The proposal will include the development of a Faculty Search Tool Kit to be used by all faculty search committees; a plan for developing and disseminating information on best practices for faculty retention; and recommendations for long-term strategies for resource development for minority faculty hiring and retention.

Diversity Report Card.

The Division is currently compiling 2007 student, faculty, and staff data to create a snapshot of the current institutional diversity in compliance with the preliminary Diversity Report Card published in May, 2008. This year's Diversity Report Card will serve as the baseline for subsequent reports, and it will provide valuable demographics information for individual

colleges. In addition to assessing current progress toward the approved goals for institutional diversity, the tool is designed for accessibility and clarity.

Hate Acts Work Group. The Hate Act Work Group was created in September of 2008 to develop, adopt and communicate clear policies, protocols and strategies pertaining to hate crimes and hate incidents. The Hate Acts Work Group is working on timeline to establish procedures by the Spring of 2009.

CLASS Project. The Project CLASS proposal was developed in collaboration with Student Affairs, Title V, OSET, and the Mentoring Institute. The project seeks to increase the academic success of students from under-represented groups through two related initiatives that require faculty engagement: 1) Faculty Work Toward Student Success which will improve undergraduate retention and graduation rates with a focus on reducing inequities in these rates among ethnic groups. This initiative of CLASS will be supported by faculty development programs in teaching and learning, and may include the review of practices to support faculty. 2) Faculty Work Toward Faculty Diversity will improve the match between UNM's tenured faculty to the ethnic and gender demographics of New Mexico. This initiative of CLASS will be supported by proactive hiring practices and faculty development in mentoring and inclusiveness to enhance successful faculty retention from under-represented groups.

Campus Climate Surveys. During the 2008-09 academic year the division plans to strategically launch campus-wide surveys to assess the campus climate. The information will be used to assess current initiatives and address the issues that are identified through these surveys.

Training & Development Opportunities. The division will collaborate with existing units to develop curriculum and implement selected trainings across university-wide. The division will also continue to support current programming, like the Immigration Symposium and the Civil Rights Symposium, that promote diversity awareness through special project funding.

2008-09 Special Projects. Fall 2008 Special Projects to date included \$13,250 to four projects: The Immigration Symposium, the Civil Rights Symposium, the Latina/o Law Student Assn. Conference, and the Raza Junta Latina/o family Reunion.

Community Outreach. The division values outreach to community through programs and interactions that engage the community. The Vice President meets with organizations in the African American, Hispanic, and Native American communities to build partnerships and identify areas for collaboration.

Diversity Website. The Division for Equity & Inclusion website was launched in conjunction with the new VP and new organizational structure in July 2008. The website includes information on the division, the diversity plan and report card, and promotes current diversity initiatives taking place across campus.

Diversity Resource Library. The division is currently gathering materials for a diversity resource library that would be accessible to students, faculty, and staff. In addition to gathering the materials, the division is identifying the space needs that such a library would require.

Summary

The role of the Division for Equity & Inclusion is to implement and communicate the Three Year Plan for Diversity, Equity and Inclusion (2008-2011). The key to the success of this plan is ongoing leadership commitment starting at the highest level and permeating to leadership at all levels. The organizing, coordinating, and facilitating role of the Division for Equity & Inclusion will be crucial to developing institution-wide efforts. The reassessment and refinement of the plan with input from the university community will allow the Diversity Plan to be a fluid and successful initiative to meet the needs of our constituents.



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UNIVERSITY OF NEW MEXICO Annual Report for Academic Year 2007-2008 July 1, 2007 – June 30, 2008

Submitted by:
Amy Wohlert
Interim Dean
The Anderson School of Management

The Anderson School of Management

The Anderson School of Management is committed to: (1) shaping the character and intellect of the next generation of business leaders, (2) advancing the knowledge and practice of management, (3) promoting economic development in New Mexico and (4) building a vibrant intellectual environment that serves the best interests of all our stakeholders. The Anderson School received initial AACSB International accreditation in 1975 and is currently accredited in both business and accounting.

The Anderson School's programs and faculty members continued to achieve international recognition in key areas of knowledge advancement and quality education: business ethics and social and environmental stewardship education (#18 ranking in the Aspen Institute's Beyond Grey Pinstripes 2007-2008 biennial survey). In addition, Anderson continued to be recognized for its contributions to education for Native American and Hispanic students (Diverse Issues in Higher Education). Faculty continued to be involved in numerous internal and external research projects. For example, Anderson faculty published articles in leading business and management journals this year. Professor Ann Cunliffe hosted the Qualitative Research in Management and Organization Conference in which more than 50 international academic faculty and researchers participated. Numerous faculty members presented their research at a diverse set of international conferences.

In AY 2007-2008, Anderson formalized a 2 + 2 agreement with Central New Mexico Community College (CNM) which allows students completing the Associate of Arts Degree in Pre-Management at CNM to apply those credits and courses directly towards a BBA degree at UNM.

For the third year, Anderson managed the annual UNM Technology Business Plan competition, which supports the creation of high technology businesses. The competition awarded \$40,000 to three student teams to form high-tech start-up companies. Over \$100,000 in seed money was potentially available to competitors for collaborative ventures between businesses and students. Ten teams participated in this year's competition, many of whom worked directly with faculty mentors to develop professional business plans.

Anderson's commitment to economic development in New Mexico continued through a variety of outreach efforts. For example, Anderson held the 2nd Annual Native American Career Fair and the Albuquerque Hispano Chamber of Commerce Day. Anderson is continuing to support indigenous nation and community business development through the 2007 FIBEA (Fostering Indigenous Business and Entrepreneurial Alliances) conference which was held at Acoma Pueblo.

In Spring 2008, Anderson's Center for Information Assurance Research and Education was part of a group that was awarded the nation's 15th Regional Computer Forensics Laboratory (RCFL). This laboratory will be not only valuable for faculty but also for students. The press release that was issued stated: "The NM RCFL will be a full-service digital forensics laboratory

and training center devoted entirely to the examination of digital evidence in support of local, state, and federal criminal investigations."

Anderson students continued to be involved in activities preparing them to be business leaders For example, Anderson students, under the direction of Professors John Benavidez and Catherine Roster competed in a project to develop, plan, and execute a marketing campaign sponsored by Subaru's Impreza Collegiate Challenge. Eight universities entered the competition, and Anderson was one of two programs selected as finalists to present their campaign at Subaru headquarters. The Anderson program "Project Acceleration" took 1st place in the competition and received \$2500 in prize money that will be used to sponsor similar student projects; Anderson students won 1st and 2nd place in the previous two years in a similar competition for Cadillac.

Anderson also maintained strong ties with the business community through a variety of lectures, meetings and other interactions. For example, in conjunction with the Association for Commerce and Industry, Anderson held two Business-to-Business Breakfasts. The Center for Information Assurance Research and Education (CIARE) and the Anderson Accounting Department held two seminars addressing fraud. Outstanding The Michael Gallegos, entrepreneur and UNM graduate delivered an address for Anderson's Distinguished CEO Lecture Series. Anderson faculty presented an evening series of seven public lectures based on their research; they addressed issues that were of interest to a broad range of individuals from the business community.

Statement of Vision, Mission, and Goals

Vision

We envision a nationally recognized management school that will build on the University of New Mexico's strategic advantages to provide high quality education, research, and service to enhance the quality of life of our constituents.

Mission

We seek to develop and inform business and management leaders through a balance of teaching and scholarship, and to contribute to economic development and the quality of life of our constituents.

Goals

- Quality Education: Provide high-quality, value added management education programs at the undergraduate and graduate levels for students who come primarily from the diverse population of New Mexico.
- Knowledge Advancement: Advance the knowledge and practice of management through scholarly activities.
- Economic and Professional Development: Promote economic development in New Mexico and continue to provide professional development opportunities for our constituents.

- Vibrant Intellectual Atmosphere: Foster a vibrant climate of academic excellence that actively engages all elements of the Anderson community.
- Careers for Graduates: Enhance the career preparedness of students by expanding quality employment opportunities for Anderson graduates through strong ties with organizational recruiters.
- Stakeholder Relationships: Strengthen relationships with and support to internal and external constituents to enhance Anderson's visibility and reputation.

The Anderson School comprises four departments: Accounting; Department of Organizational Studies (DOS); Finance, International, Management of Technology, and Entrepreneurship (FITE); and Marketing, Information and Decision Sciences (MIDS). The individual departments' annual reports follow.

DEPARTMENT OF ACCOUNTING (JULY 1, 2007-JUNE 30, 2008)

Chair: Joni J Young Professor

Full-time faculty: Philip D. Bougen Associate Professor

Rich Brody Professor
Ann K. Brooks Lecturer

Michele Chwastiak Associate Professor

Norman Colter Lecturer

Sharon Cox Assistant Professor
Reed McKnight Visiting Professor
Leslie S. Oakes Associate Professor

Alistair M. Preston Professor Robert J. Tepper Lecturer Dennis F. Togo Professor

Craig G. White Associate Professor

Part-time faculty: Angela Ekofo Jack Emmons

Brandon Haines Tom Mouck
Carol Stephens Dennis Sterosky

Tony Strati

SIGNIFICANT DEVELOPMENTS, SPONSORED ACTIVITIES

DEPARTMENT OF ACCOUNTING

In addition to the service activities listed under the names of the faculty members within the Department of Accounting, each faculty member participates in the recruitment process by attending a minimum of two on-campus lunches and two off-campus open houses sponsored by the Accounting Firms and other businesses in the community who hire Anderson School accounting students. The focus of this recruitment takes place during the month of September.

September 18, 2007 the Department of Accounting held its Annual Accounting Career Fair at the Student Union Building Ballroom on the UNM campus. We had 26 accounting firms, companies and/or government entities interested in recruiting Anderson accounting students. We hosted a table for Beta Alpha Psi, Institute of Management Accountants, New Mexico Society of CPAs and the Association for Latino Professionals in Finance and Accounting.

Students from the introductory financial accounting class were encouraged to attend so they could be introduced to the opportunities available for accounting majors. Comments from students, faculty and recruiters verified that the evening was a success.

PROMOTIONS, SABBATICALS, SEPARATIONS, AWARDS DEPARTMENT OF ACCOUNTING

Joni J Young, Chair

Appointed Chair of the Department of Accounting, July 1, 2007

Rich Brody

Promoted to Professor

Michele Chwastiak

Recipient UNM Libraries' Acknowledgment Lecture Series Monthly Award Best Paper Award: Critical Management Studies Conference, Manchester, England (2007): "War, Inc.: Private, Unaccountable and Profitable"

James Hamill

Leave Without Pay Status Fall 2007 and Spring 2008

Reed McKnight

Hired as a Visiting Professor

Alistair Preston

Appointed as Special Assistant to the Dean, Special Projects

Dennis Togo

Sabbatical Leave in Fall 2007

Craig White

Elected Faculty Chair for the Anderson School Featured speaker at Mayor's Town Hall, Discussion of Autism

PUBLICATIONS

DEPARTMENT OF ACCOUNTING

Philip Bougen

Publications

"Bureaucracy, Imagination and US Domestic Security Policy, (with P O'Malley), Security Journal, (2008)

"Imaginable Insecurities: Imagination, routinisation and the government of uncertainty post 9/11," in P. Carlen (ed.) Imaginary Penalties, Devon: Willan, (2008)

Presentations

"The Process of Catastrophic Disorganization," (with Violina Rindova), Fourteenth Annual Organization Extreme Event, Preconference Program, (Feb 2008)

Rich Brody

Publications

"Counterfeit Education Credentials: Diploma Mills Cost Companies Millions" (with A. Ezell) Fraud Magazine, 2007, 21(6), pp. 20-23.

"Phishing, Pharming and Identity Theft" (with E. Mulig & V. Kimball) Academy of Accounting and Financial Studies Journal, 2007, 11(3), pp. 43-56.

"Counterfeit Drugs: A Potential Epidemic" (with R. B. Smith) *Insights to a Changing World*, 2007, 1, pp. 1–11.

Presentations at Professional Meetings (Refereed)

"The influence of role on accountants' perceptions of issues and valuation." American Society of Business and Behavioral Sciences (ASBBS) Annual Meeting. Las Vegas, NV. February 23, 2008.

"Fraud prevention on the pre-employment screening process." ASBBS Annual Meeting. Las Vegas, NV. February 23, 2008.

"IT Audit Approaches for Enterprise Resource Planning Systems." ASBBS Annual Meeting. Las Vegas, NV. February 22, 2008.

"To Give or Not to Give: Charity and Nonprofit Fraud." American Accounting Association (AAA) Annual Meeting. Chicago, IL. August 7, 2007.

Invited Presentations

"Fraud: Focus on the Future." Albuquerque Chapter of the Institute of Internal Auditors. Albuquerque, NM. March 19, 2008.

"Fraud Happens: Understanding the Past and Preparing for the Future." Fostering Indigenous Business & Entrepreneurship in the Americas (FIBEA) 2007. Acoma, New Mexico. November 8, 2007.

"Forensic and Fraud Accounting Update." 55th Annual Texas Tech University Tax Institute. Sponsored by the Center For Professional Development (CPD) in the Rawls College of Business at Texas Tech University. Lubbock, TX. October 19, 2007.

"An Introduction to Fraud and Forensic Accounting." UNM Security Days. Albuquerque, NM. October 10, 2007.

Media Activity

SmartMoney Magazine, Interviewed by Janet Paskin for her article "10 Things Your Tax preparer Won't Tell You." 2/19/08.

KRQE Television Channel 13. Appeared as a live guest with news anchor Deanna Sauceda to discuss cyber crime as part of Cyber Monday. The segment was called "Cyber Crooks Stalk Shoppers." 11/26/07.

UNM Today. Interviewed by Steve Carr for his article, "Students investigate mock tax fraud." 11/19/07.

New Mexico Daily LOBO, Interviewed by Ashleigh Sanchez for her article, "Students get taste of the IRS." 11/5/07.

Jim Villanucci radio show, 770 KKOB. Appeared for approximately 90 minutes as a white collar crime expert. 10/25/07.

Michele Chwastiak

Presentations

Critical Management Studies Conference, Manchester, England (2007): "War, Inc.: Private, Unaccountable and Profitable"

Critical Perspectives in Accounting Conference (April 2008) Research paper

Invited Presentations

2008: University of New Mexico Libraries' Faculty Acknowledgment Award presentation

Reed McKnight

Presentations

"A Question of Independence" (with Cook, Roy), Society for Case Research 2008 Annual Meeting, April, 2008.

"Trust Me" (with Wilhelm, Suzanne and Cook, Roy) SCR Writers Workshop, July, 2008.

Leslie Oakes

Presentations

The Fifth Accounting History International Conference, Banff, Canada, present paper on topic: Accounting in other places, accounting by other peoples (August 2007)

Critical Perspectives in Accounting Conference (April 2008) Research paper

Alistair M. Preston

Publications

"The Legal Construction of Utility Accounting: 1882-1944," (with Andrew Vesey) Accounting, Organizations and Society, Elsevier, Vol. 33, pages 415-435

Robert J. Tepper

Publications

"Your Intellectual Property—Who Owns It?" (with Craig White), Accounting Horizons ,Vol. 22, No. 1, pp 49-62, March 2008

New Mexico's Accountant-Client Privilege, New Mexico Law Review, vol. 37, no. 2. pp 387-429 (Spring 2007)

Dennis F. Togo

Publications

"Sunset Company: Risk Analysis for Capital Budgeting Using Simulation and Binary Linear Programming," *Journal of Business Case Studies*, Vol 4, No. 3, Mar 2008, pp. 43-51.

"Stochastic Risk Analysis of Budgeted Financial Statements," *Journal of Business Case Studies*, Vol. 3, 2007, pp.75-81.

Proceedings

"Curvilinear Analysis of Learning for Cost Estimation," Decision Sciences Institute Southwest Region Annual Conference Proceedings, March 2008.

"Risk Analysis of Probabilistic Cash Flow Statements," Southwest American Accounting Association Conference Proceedings, March 2008.

Craig G. White

<u>Publications</u>

"Significant Pitfalls Remain for Post-2006 QSub Interest Transfers", (with J Hamill and P Neidhardt), Taxes – The Tax magazine (July) 45-54.

"Your Intellectual Property—Who Owns It?" (with Robert Tepper), Accounting Horizons, Vol 22(1):49-67, March 2008

"Entrepreneurship, Innovation, and Wealth Distribution: The Essence of Creative Destruction," (with A. Spenser and B. Korchoff), *International Small Business Journal*, 26(1): 23-37, 2008

Presentations

"Current Status of the Alternative Minimum Tax: Will Congress Repeal or Expand?" Annual New Mexico Tax Conference, December 2007

"The Budget Process," United Way's Center for Nonprofit Excellence, April 2008.

"Accounting and Tax Concepts for Engineers," National Institute for Nano-Engineering training conference, July 2008.

Joni J. Young

Publications

The construction of "the user" in financial accounting standard-setting, EAA Newsletter (2007), issue 1 pp. 5-6.

Presentations

Accountability Re-examined: Evidence from Hull House (with Leslie Oakes), 2007 AAA Conference, Chicago, IL.

Towards an Ethical Standard-setting Process (with Paul Williams) 2007 APIRA conference, Auckland, New Zealand.

Risk and accountability presented at Organizing risk regulation: current dilemmas, future directions; ESRC Centre for Analysis of Risk and Regulation, London School of Economics, March 2007.

Success in Accounting Academia, panel participant at Emerging Scholars Colloquium associated with APIRA 2007 in Auckland, New Zealand.

Risk and accountability presented at Centre for Analysis of Risk and Regulation, London School of Economics, March 2007.

SERVICE ACTIVITIES DEPARTMENT OF ACCOUNTING

Philip Bougen

Ad hoc Reviewer:

Accounting, Auditing and Accountability Journal
Accounting, Organizations and Society
Critical Perspectives in Accounting
European Accounting Review
Issues in Accounting Education Organization
Research in Accounting in Emerging Economies
Curriculum and Programs Committee, Anderson Schools of Management
Entrance and Credits Committee, Anderson Schools of Management
Faculty Advisor for Beta Gamma Sigma Honorary Society

Rich Brody

Ad Hoc Reviewer:

Advances in Accounting Advances in Accounting Behavioral Research Behavioral Research in Accounting Journal of Business Disciplines Managerial Auditing

Advisory Board of Directors, Franklin Publishing Company Editorial Advisory Committee, Association of Certified Fraud Examiners Manuscript Reviewer:

Mid-Year AAA Auditing meeting Mid-Year AAA ABO meeting AAA Annual meeting

University/Departmental Service

UNM Center for Information Assurance Research and Education, Associate Director White Collar Crime Internship Coordinator
Member Anderson Policy and Procedure Manual Task Force

Member of Anderson MIDS Search Committee for a faculty position in Information Assurance

Community Service

Volunteer at the Watermelon Ranch, animal rescue center in Rio Rancho, NM Coach of T-Ball team, Road Runner Little League, Albuquerque, NM

Ann Brooks

Presentations

"Effective Collaboration," 10th Annual New Mexico Student Affairs Symposium, University of New Mexico, Albuquerque, New Mexico, November 2007

UNM Success in the Classroom Seminar, February 2008

Anderson Technology Showcase on WebCT

"Effective Ways to Create a Learning Community," NMEL Brown Bag Luncheon

Professional Accounting Workshop, with Robert Tepper

Professional Experience

Board/Supervisory Committee Member of NM Educators Federal Credit Union (2002-present) Board Member and Treasurer of Southwest Women's Law Center (2007-present)

E-Learning Consulting

Member Title V Grant Committee

Collaborate with UNM New Media Extended Learning Department Member Anderson School Information Technology Task Team

Professional Affiliations

Member Institute of Management Accountants, Albuquerque Chapter Vice-President of Education (2007-2008)

Vice-President of Administration and Finance (2008-present)

Community Service

Fuller Center – feasibility study

Disciples of the Lord Jesus Christ - financial advisor

Anderson School Service

Beta Alpha Psi Board Member

Extended Programs Committee

Statewide Business Articulation Group

Entrance and Credits Committee

Scholarship Committee

AACSB Accreditation Information/Reports Assistance for Accounting Department

University of New Mexico Service

Faculty Senate Representative

Faculty Senate Budget Chair

Faculty Senate Rep to Regent's Finance & Facilities Comm.

Advisor to President Schmidly's Faculty Resolution Task Force

NMEL Online Best Practice Task Force NMEL Online Standards Committee

Michele Chwastiak

Provost's Task Force for Sustainability

Policy Subcommittee of the Provost's Task Force for Sustainability

Accounting Faculty Search Committee

Search Committee for Law lecturer

Department Representative on C&P committee

Student Club Advisor: SGI Buddhist Club

Senate Graduate Committee

Curriculum Subcommittee of Senate Graduate Committee

Co-editor, Special Issue of Accounting History, Accounting & The Military

Editorial Board

Accounting Forum

Accounting and the Public Interest

Reviewer

Accounting Forum

Critical Perspectives on Accounting

Accounting and the Public Interest

Accounting History

American Accounting Association Annual Meeting

Secretary/Treasurer, American Accounting Association, Public Interest Section

Member of the Board of Directors for New Mexico Teen Pregnancy Coalition

Attend The Aspen Institute's Center for Business Education breakfast-2007 Beyond Grey Pinstripes

Sharon Cox

Parish Library Committee (Fall 2007- present)

Attended Fostering Indigenous Business & Entrepreneurship in the Americas Conference (Nov 2007)

Norman Colter

Financial Consultant for APS, Christine Duncan, charter school (2007-2008)

Member of the American Institute of CPAs

Member of the NM Society of CPAs

Serve on the Executive Board of the Assoc. of Latino Professionals in Finance and Accounting

New Mexico Association of School Business Officials

Faculty Advisor for Association of Latino Professionals in Finance and Accounting

Leslie S. Oakes

Chairperson of Healthcare for the Homeless Finance Committee

Member of the RW Johnson Public Health Center Advisory Board

Academic Freedom and Tenure Committee

Anderson School Department of Accounting Advisory Board

The United Way: Facilitation of Nonprofit Managers' Meetings

Member NGO New Mexico: Working to expand health of nonprofit sector in New Mexico

Ad hoc reviewer for:

Accounting Historians Journal

Management Inquiry

Administrative Science Quarterly Critical Perspectives on Accounting Contemporary Accounting Review Accounting, Organizations and Society Organizational Studies Advances in Public Interest Accounting European Accounting Review Accounting, Auditing and Accountability Journal Volunteer at Harm Reduction Services

Alistair M. Preston

Ad hoc reviewer for:

Critical Perspectives on Accounting Advances in Public Interest Accounting Accounting, Auditing & Accountability Journal Abacus

European Accounting Review

Faculty Advisor for the student chapter of the American Indian Business Association Faculty Advisor for Professional Masters of Accounting Faculty representative of Provost's Advisement Committee (PAC) Native American Freshman Bridge Program Team Teacher Extended Programs and MDC Assistant to the Dean Elected to chair one committee on the University Accreditation Task Force

Robert Tepper

Member-Colorado Society of CPAs and AICPA.

Coordinator and instructor for annual law clerk orientation program sponsored by the US District Court in Albuquerque, New Mexico.

Member State Bar of New Mexico.

Member, UNM Online Course Standards Task Force.

Accounting Department representative: Explore UNM, October 2007

Accounting Department representative: Open House for ASM Graduate Programs, Nov 2007

Member: NMEL's Online Course Standards Task Force and Benefits of Best Practices Subgroup (April 2006-present).

Lead Instructor for CPA Professional Review

Dennis F. Togo

Member Anderson Accounting Department Recruiting Committee

Ad Hoc Reviewer for American Accounting. Assoc., SW Region, 2008 Conference

Member Federated Schools of Accountancy C&P Committee (2000-present)

Member Teaching and Curriculum Nominating Committee, AAA (2002-present)

IMA Campus Director for the University of New Mexico (1993 - present)

Anderson Curriculum & Programs Committee Chair (2008-present)

Anderson Entrance and Credits Committee Chair (2008-present)

Member Policy & Planning Committee (2007-2008)

Member Sandia Audit Intern Program Committee (1993-present)

Stake Fin. Auditor, Alb West NM Stake, Church of Jesus Christ Latter-Day Saints (2003-present)

Craig G. White

Chair of the University of New Mexico Intellectual Property Policy Committee (2007- present)

Anderson School representative to the Faculty Senate Research Policy Committee (2007- present)

Faculty Chair, Anderson School (2007 - present)

Faculty Advisor Beta Alpha Psi (2000 - present)

Faculty Advisor University of New Mexico Volunteer Income Tax Assistance Program (1999- present)

Member Board of New Mexico State Society of CPAs (2007 - current)

Planning with UNM's Center for Development and Disability for Autism Treatment Center

Mentor, student business plan projects through McCune Foundation

Mentor, student business plan projects through Anderson Business Plan Competition

Chair, Search Committee for new faculty hire

Joni J. Young

Member of editorial boards

Accounting, Organizations and Society, (2005-present)

Accounting History (1999-present)

Accounting Historian's Journal (1995-present)

Accounting and the Public Interest (2002-present)

Accounting, Auditing and Accountability Journal (2002-)

Member of Advisory Boards

SSRN History of Accounting eJournal (2008-)

Beta Alpha Psi Advisory Board member, (2000-)

Member of Notable Contributions to Accounting Literature Selection Committee for the AAA

Faculty Member at Emerging Scholars Colloquium at APIRA 2007 in New Zealand

Member of Awards Committee, NMSCPA's

SPONSORED RESEARCH DEPARTMENT OF ACCOUNTING

Alistair Preston and Ann Brooks

Awarded a contract by the New Mexico Motor Vehicle Division for \$190,000 from 7/1/2006-5/31/2008 for the purpose of developing an audit Instrument for MVD offices, agencies and dealers.

DEPARTMENT OF ORGANIZATIONAL STUDIES (July 1, 2007 – June 30, 2008)

Chair: Jacqueline N. Hood Professor **Full-time Faculty:** John Ackerman Lecturer Michelle Arthur Associate Professor Shawn Berman Associate Professor Joseph Champoux Professor Jan Corzine Professor Emeritus Ann Cunliffe Associate Professor Robert DelCampo Assistant Professor Kathryn Jacobson Assistant Professor Jeanne Logsdon Professor Karen Patterson Assistant Professor Harry Van Buren Assistant Professor Part-time Faculty: David Albright Amelia Nelson Mark Barela James Pendergast Brian Beck Glen Petersen Albert Cherino Robert Poyourow Mary Cooley Rebecca Rigney Jens Deichman Karen Ross LaVerne Ellerbe Michael Salazar Daniel Faber Paul Sandoval Nikki Mann Larry Waldman

SIGNIFICANT DEVELOPMENTS, SPONSORED ACTIVITIES DEPARTMENT OF ORGANIZATIONAL STUDIES

The Department of Organizational Studies prepares people to lead socially responsible organizations in diverse contexts through education, scholarship, and service, by focusing on:

- •Personal, professional, and organizational development
- •Ethical decision-making and behavior
- •Business growth and economic development

The Department and the Anderson School are planning on sponsoring the Organizational Behavior Teaching Conference in June 2010. This conference is the annual conference of the Organizational Behavior Teaching Society. OBTS is dedicated to innovative teaching and learning in the organizational and management sciences. Its members include faculty at universities and colleges throughout the world, as well as business educators and consultants in the profit and non-profit sectors.

The Department and the Anderson School will also be sponsoring the second bi-annual Qualitative Research in Management Conference in March 2010. The conference goal is to create a space where qualitative scholars doing research in on and around organizations using a multiplicity of methods, voices, and ways of writing qualitative work, can exchange ideas and engage in critical discussion.

The Department intends to continue to encourage activities related to achieving recognition for the Beyond Grey Pinstripes Award. Beyond Grey Pinstripes is a biennial survey and alternative ranking of business schools. Its mission is to spotlight innovative full-time MBA programs that are integrating issues of social and environmental stewardship into curricula and research. In 2007-2008, the Anderson School of Management was ranked 18th of 112 schools surveyed and 6th for small schools.

Finally, the Department intends to hire an additional tenure-track faculty member in strategic management to ensure that Anderson students are able to think strategically and critically and become responsible top level decision makers.

SIGNIFICANT DEVELOPMENTS, SPONSORED ACTIVITIES

DEPARTMENT OF ORGANIZATIONAL STUDIES

The Department of Organizational Studies and the Anderson School sponsored the first bi-annual Qualitative Research in Management Conference in March 2008. Over 70 people attended the conference held at the University. The keynote speakers for the conference included John Van Maanen and H.L. Goodall Jr.

Ms. Jaye Francis, Department Administrator, organized the 2nd Annual Native American Career Fair in April 2008 which was held with a sold-out number of recruiter booths (24) in the Jackson Event Center where approximately 200 students attended. Proceeds from this event go to fund the activities of the American Indian Business Association, a student organization at the Anderson School of Management. She also assisted in the coordination of the Fostering Indigenous Business and Entrepreneurship in the Americas conference which was held in Manaus, Brazil. There were over 200 participants in attendance which showcased the economic development strategies and entities of the Indigenous peoples of Brazil and South America.

This past year Dr. Shelly Arthur served as Assistant Dean at the Anderson School and Faculty Advisor to the Student Human Resource Management Association and served on the Executive Board of Women's Studies at the University.

Dr. Shawn Berman served on the Editorial Boards of the *Journal of Management, Strategic Management Journal*, and *International Journal of Organizational Analysis*, served on the Executive Committee of the International Association for Business and Society (IABS), was a member of several committees of IABS, and a member of several committees for the Social Issues Division of the Academy of Management.

Dr. Rob Del Campo continued his position as associate editor of the *Business Journal of Hispanic Research* and of the *International Journal of Diversity in Organizations, Communities, and Nations*. He also served on the University Special Admissions Committee and the Greek Life Feasibility Task Force.

Dr. Jeanne Logsdon is a member of the editorial board of International *Journal of Organizational Analysis* and the *Journal of Public Affairs*. She also edited the Proceedings for the International Association of Business and Society conference. She served the University as a member of the planning committee for the "Educating for Innovation Symposium," organized in conjunction with President Schmidly's installation, served on the UNM Faculty Senate and UNM Faculty Senate Operations Committee. She was also active locally as the Ward Chair for a major political party, Board member of her neighborhood association, and gave a presentation on ethics to Leadership New Mexico.

Dr. Harry Van Buren continued his service as a volunteer teacher for Junior Achievement, Vice-President of Community of Joy Congregational Council, Board member of CANNICOR, and Chair of the Environmental Justice Working Group for the Interfaith Center on Corporate Social Responsibility.

PROMOTIONS, SABBATICALS, SEPARATIONS, AND AWARDS

DEPARTMENT OF ORGANIZATIONAL STUDIES

Three faculty members were hired this year. Dr. Shawn Berman was hired as an Associate Professor without tenure in Business and Society. Dr. Berman earned his degree from the University of Washington. Dr. Berman applied for and was granted tenure in this academic year. Dr. Karen Patterson was hired as an Assistant Professor in Strategic Management. Dr. Patterson earned her degree at Texas Tech University. Ms. Kathryn Jacobson was hired as an Instructor in Organizational Behavior. She is currently ABD at Arizona State University.

Dr. Joseph Champoux and Mr. John Ackerman both retired this year. Dr. Champoux was a professor of organizational behavior at the Anderson School for the last 35 years, and Mr. Ackerman was a lecturer in business and society for the past 11 years. Dr. Ann Cunliffe continued her leave of absence as a Visiting Faculty Member at the University of Hull.

Dr. Ann Cunliffe continued her leave without pay at the University of Hull in England.

Ann Cunliffe

April 2006 – August 2008: consistently 4-5 articles on the '50 Most Frequently Read/Cited Articles List'. For example: Journal of Management Education (13/50); Journal of Management Inquiry (18/50); Management Learning (27/50); Organization Studies (40/50); Administration and Society (10/50) Management Communication Quarterly (8/50).

Robert DelCampo

"Fifteen People who Will Change Albuquerque in 2008". Albuquerque: The Magazine, December, 2007/January 2008

Nominee, University of New Mexico Outstanding Teacher of the Year Award. 2007-2008 New Mexico Business Weekly: "40 under 40". 2007

Jacqueline Hood

New Mexico Business Weekly 2007 Power Broker (100 influential people selected because of their business and community accomplishments).

Jeanne Logsdon

Faculty Leadership Award, Anderson School Management Hall of Fame, March 2008.

Sumner Marcus Award for Outstanding Service, Social Issues in Management Division, Academy of Management, 2007.

Karen Patterson

Best Paper based on a Dissertation Nomination: Health Care Management Division, Academy of Management, 2007. 'The evolution of actors in contested industries: Chiropractic and alternative medicine within healthcare' Karen D.W. Patterson

PUBLICATIONS

DEPARTMENT OF ORGANIZATIONAL STUDIES

Shawn Berman

Publications

"Stakeholder Theory And Managerial Discretion," (with Robert A. Phillips, Michael E. Johnson-Cramer, and Heather Elm) *The Academy of Management Best Paper Proceedings*, 2007: 1-6.

Presentations

"Stakeholder Theory and Managerial Discretion," (with Robert A. Phillips, Michael E. Johnson-Cramer, and Heather Elm), Academy of Management national conference, Philadelphia, Pennsylvania, (2007).

Invited Presentations

"Stakeholder Theory and Managerial Discretion," (with Robert A. Phillips, Michael E. Johnson-Cramer, and Heather Elm), presentation at the Institute for Corporate Responsibility at George Washington University conference on "Global Stakeholder Strategies," Washington, D.C. (2007).

Joseph Champoux

Film Reviews

"Film Reviews: Organizations and management at the movies," *International Journal of Organizational Analysis*, 2007 15(1): 78–82.

"Film Reviews: Organizations and management at the movies," *International Journal of Organizational Analysis*, 2007 15(2): 166–172.

"Film Reviews: Organizations and management at the movies," *International Journal of Organizational Analysis*, 2007 15(3).

"Film Reviews: Organizations and management at the movies," *International Journal of Organizational Analysis*, 2007 15(4).

Invited Presentations

"Seeing and Valuing Diversity Issues through Film," 18th Annual Diversity Leadership Forum, Albuquerque, New Mexico, April 18, 2007.

Poster Session: "Interactive Textbook Content: Some Prototypes and a Modest Proposal," BbWorld '07 Conference, Boston, Massachusetts, July 10–12, 2007.

"Teaching Well With Technology: Helping Students Do Good As Managers" Academy of Management Meeting, Philadelphia, Pennsylvania, August 4, 2007.

Ann Cunliffe

Book

Organization Theory: A Sage Course Companion, London: Sage Publications, 2008.

Book Chapters

Social Constructionism, Conversation analysis, Discourse analysis, and Social poetics. 4 chapters in R. Thorpe & R. Holt, (Eds.) Sage Dictionary of Qualitative Management Research. London: Sage, 2007.

Publications

"Orientations to social constructionism: Relationally-responsive social constructionism and its implications for knowledge and learning", *Management Learning*, 39: 123-139, 2008.

"Meaning in organizational communication: Why metaphor is the cake not the icing" (with Hogler, R., Gross, M., and Hartman, J.) Management Communication Quarterly, 21: 393-412, 2008.

Presentations

International Communication Association: University of Montreal, CA. May 2008
Cunliffe, A. L. Organization, Materiality and Agency: Beside the Point?

Fifth International Conference on Critical Management Studies. University of Manchester, UK. July 2007. Cunliffe A. L. & Ericksen, M. Leadership Abstraction, Distraction and Practice.

European Group of Organization Studies (EGOS), Austria, July 2007 Cunliffe, A. L. Dialectics and The Dance of Reason: Finding Rhythm in Understanding Lived Experience

Academy of Management Participation

Philadelphia, PA, August 2007

- Cunliffe, A. L. & Eriksen, M. Presenter, PDW: Changing places: How place shapes our understanding of leadership and culture.
- Cunliffe, A. L. & Locke, K. Identity, Selfhood, and Ethics. Paper presentation and organizer of Symposium: The goodness of identity: How we do well and how well we do.
- Cunliffe, A. L. Social constructionist approaches to research. Paper presentation., CMS PDW Chair and organizer of Doctoral Consortium.

Invited Presentations

Keynote Speaker, 8th International Conference on Organizational Discourse, London, UK. July 2008. Translation, Alterity and Transgression: The Poetics and Politics of Self and Scholarship.

ESRC, Northern Advanced Research Training Initiative Network, University of Hull, UK. June 2008, Workshop for faculty and PhD students

Open University, UK. June 2008.

Seminar for faculty and students: Reflexivity and Research

Lancaster University, UK. April 2008.

Seminar for faculty: Selves, Ethics and 'Just' Organizations.

Ashridge Management Centre, UK. April 2008.

PhD Workshop, and a seminar for faculty: Dialogue on Phenomenology and Social Constructionism

University of St Andrews, UK. November 2007.

Seminar for faculty and PhD students: Ethical Selves

Strathclyde University, UK. October 2007.

Sole Workshop presenter: Reflexive Approaches to Research

Robert DelCampo

Books

DelCampo, R.G., Boudwin, K.M. & Hines, S.L. (2008). "THAT'S WHAT SHE SAID! A Guide to using "The Office" to Demonstrate Management Parables, Organizational Behavior and Human Resource Management Topics in the Management Classroom. Dubuque, IA: Kendall/Hunt.

Publications

Arthur, M. M., Van Buren, H.V & DelCampo, R.G. (2008). "Distance to the flag: The impact of American Politics on perceptions of women's golfing abilities." <u>American Journal of Economics and Sociology.</u>

DelCampo, R.G. & Blancero, D.M. (2008). "Perceptions of Psychological Contract Fairness of Hispanic Professionals". Cross Cultural Management. Vol. 15 No. 3. p.300-315.

DelCampo, R.G., Blancero, D.M. & Boudwin, K.M. (2008). "Hispanic professionals after September 11th: A move toward 'American' identification". <u>Cross-Cultural Management</u>. Vol. 15 No. 1. p.20-29.

Blancero, D.M., DelCampo, R.G. & Marron, G.F. (2008). "Ready or Not: *Hispanic Millennials Are Here*". The Business Leaders of the Future." <u>The Business Journal of Hispanic Research</u>. In press.

Hom, P.W. & DelCampo, R.G. (2008). "Developing Multimedia Cases for Undergraduate Education in Organizational Behaviour". <u>Journal of the Academy of Business Education</u>. In press.

Blancero, D.M. & DelCampo, R.G. (2007), "Retaining Hispanic Talent:Fairness, Flexibility, Family and Organizational Support." The Business Journal of Hispanic Research." Vol. 1 No. 2. p.10-18.

DelCampo, R.G. (2007). "Cross-cultural Evaluation of the Psychological Contract: Insight on Racioethnicity and Equity Sensitivity". <u>Review of Business Research</u>. Vol. 7 No. 4. p.109-113

Presentations

DelCampo, D.S., DelCampo, R.G. & DelCampo, R.L. (2008). "Work, Family, and Personal Fulfillment Issues of Professional and Working Class Hispanic Women." Accepted for Presentation at: National Society of Hispanic MBAs Conference & Career Expo, Inaugural Research Forum, Atlanta, GA.

DelCampo, R.G. & Boudwin, K.M. (2007). "Work-family conflict and racioethnic identification: An analysis of Hispanic Business Professionals." Presented at: Academy of Management Meetings, Philadelphia, PA.

DelCampo, R.G. (2007). "Awareness and evaluation of Hispanic Professional Workplace experience: discrimination, status and fairness issues". Presented (Virtually) at: The Seventh International Conference on Diversity in Organizations, Communities and Nations, Amsterdam, The Netherlands July, 2007.

DelCampo, R.G., DelCampo, R.L.& DelCampo, D.S. (2007). "Latina Women: Understanding Work, Family, and Personal Issues." Presented at: National Council on Family Relations, Pittsburgh, PA November, 2007.

Proceedings

DelCampo, R.G., DelCampo, R.L. & DelCampo, D.S. (2007). "Understanding Work, Family, and Personal Issues for Latina Women." *Proceedings of the International Association of Business & Economics; Las Vegas, NV*. October, 2007.

DelCampo, R.G. (2007). "Cross-cultural Evaluation of the Psychological Contract: Insight on Racioethnicity and Equity Sensitivity". *Proceedings of the International Association of Business & Economics; Las Vegas, NV*. October, 2007.

Textbook Supplements

DelCampo, R.G. & Haney, M.J. (2008). "Companion Website" to accompany DuBrin, A. <u>Human Relations</u>, 10th Edition. Upper Saddle River, NJ: Prentice Hall.

Invited Presentations

DelCampo, R.G. (2008). (Keynote Speaker) "A Research Perspective on Hispanic Mentoring and Networking". Albuquerque Hispano Chamber of Commerce Board of Directors Retreat; Albuquerque, NM, June, 2008.

DelCampo, R.G. (2008). (Featured Speaker) "They're Coming Fast!: The Millennial Workforce-Retention Through Understanding". Presented at Meeting of the Albuquerque Chapter of Credit Unions; Albuquerque, NM, May, 2008.

DelCampo, R.G. (2007). (Executive Forum, Featured Speaker) "Research that makes a difference: Meet the editors of *The Business Journal of Hispanic Research*". Presented at 18th Annual NSHMBA Conference: Houston, TX, October, 2007.

DelCampo, R.G. (2007). (Featured Speaker, sponsored by BMW) "Effective Mentoring Relationships". Hispanic Executive Summit; Orlando, FL, April, 2007.

DelCampo, R.G. (2007). (Featured Speaker) "A Research Perspective on Hispanic Leadership". NSHMBA-NM Kickoff Event; Hispanic Leadership Series; Albuquerque, NM, March, 2007.

Jacqueline Hood

Proceedings

Hood, J.N. & Logsdon, J.M. (2008). Organizational Culture Impacts on Presented Forms of Unethical Bullying Behavior. <u>Proceedings of the International Association of Business and Society</u>, Tampere, Finland.

Academic Presentations

Hood, J.N. & Van Buren, H.J. Social Capital as a Gendered Construct. Presented to the Gender and Diversity in Organizations Division of the Academy of Management meeting, Philadelphia, PA, August 2007.

Invited Presentations

"Bullies and Beyond: The Impact on You and Your Organization," presentation for the 2008 SHRM of NM State Conference, presented April 14, 2008.

"Bullying in the Workplace: Challenges to Maintaining an Ethical Organizational Culture," invited presentation for the Anderson Faculty Lecture Series, presented in April 2008.

"Bullies Need Not Apply," invited presentation for the Society for Human Resources Management, September 2007.

Kathryn Jacobson

Publications

Jacobson, K. J. L. (2008). The surprising impact of diversity and isolation on turnover: An executive summary. *The Business Journal of Hispanic Research*, 2, (1), 88-89.

Presentations

Jacobson, K. J. L. "Mirror, Mirror...": Predicting Deviance, Session (Chair) presented at the Annual Academy of Management Meeting, Philadelphia, PA.

Jeanne Logsdon

Book Chapters

Wood, Donna J. & Logsdon, Jeanne M. 2008. "Educating Managers for Global Business Citizenship." In D. Swanson & D. Fisher (Eds.), *Advancing Business Ethics Education*, pp. 265-283. Charlotte, NC: Information Age.

Logsdon, Jeanne M. & Wood, Donna J. 2008. "Global Business Citizenship: A Model of Social Responsibility and Ethical Behavior for the 21st Century." In C. Wankel (Ed.), *Handbook of 21st Century Management*, pp. 138-147. Thousand Oaks, CA: Sage.

Logsdon, Jeanne M. & Van Buren III, Harry J. 2007. "National Styles of Corporate Social Responsibility: Exploring Macro Influences on Responsible Business Behavior." In J. Hooker, J. Hulpke, & P. Madsen (Eds.), Controversies in International Corporate Responsibility, pp. 253-268. Charlottesville, VA: Philosophy Documentation Center for Carnegie Mellon University.

Publications

Logsdon, Jeanne M. & Murrell, Audrey J. 2008. "Beyond 'I Have a Dream': Dr. Martin Luther King, Jr.'s Contributions to Management Scholarship and Practice." *Business & Society*, 47(4), in press.

Logsdon, Jeanne M. & Van Buren III, Harry J. 2008. "Justice and Large Corporations: What Do Activist Shareholders Want?" *Business & Society*, 47(4), in press.

Wood, Donna J. & Logsdon, Jeanne M. 2008. "Business Citizenship as Metaphor and Reality." *Business Ethics Quarterly*, 18(1): 51-59. (Invited paper.)

Logsdon, Jeanne M. 2008. Entries in *The Encyclopedia of Business Ethics and Society*, edited by Robert W. Kolb. Thousand Oaks, CA: Sage.

- "Global Reporting Initiative," with Patsy G. Lewellyn, pp. 1020-1022.
- "Greenhouse Effect," pp. 1032-1034.
- "Kyoto Protocol," with Phoenix Forsythe, pp. 1245-1248.
- "Maguiladoras," with Phoenix Forsythe, pp. 1324-1325.
- "Montreal Protocol," pp. 1408-1409.
- "United Nations Global Compact," pp. 2144-2145.

Presentations

Van Buren III, Harry J., Rehbein, Kathleen, & Logsdon, Jeanne M. 2008. "Understanding the Role of Dialogue: The Case of Activist Shareholders. Paper presented at the Third International Colloquium on Corporate Political Activity, Paris, France, May.

Logsdon, Jeanne M. & Van Buren III, Harry J. 2007. "Beyond the Proxy Vote: Dialogues between Shareholder Activists and Corporations." Paper presented at the International Center for Corporate Accountability Conference, Baruch College, CUNY, June.

Logsdon, Jeanne M. & Wood, Donna J. 2007. "Global Business Citizenship and Aarhus in Burkina Faso." Paper presented at an invited symposium on Ethical and Responsible Business Processes at Global, Community, and Organizational Levels of Analysis at the Decision Sciences Institute annual meeting, Phoenix, AZ, November 2007.

Logsdon, Jeanne M. 2007. "Building Bridges: Linking Academic Learning And Experience in the Trenches." Invited presentation at the annual meeting of the Ethics and Compliance Officer Association, Los Angeles, September.

Proceedings

Hood, Jacqueline N. & Logsdon, Jeanne M. 2008. "The Influence of Organizational Culture Type on Bullying Behavior." Proceedings of the Nineteenth Annual Meeting of the International Association for Business and Society, Tampere, Finland, in press.

Van Buren III, Harry J., Rehbein, Kathleen, & Logsdon, Jeanne M. 2008. "Social Responsibility Ratings and Corporate Responses to Shareholder Resolutions: Is There a Relationship?" Proceedings of the Nineteenth Annual Meeting of the International Association for Business and Society, Tampere, Finland, in press.

Logsdon, Jeanne M., Rehbein, Kathleen, & Van Buren III, Harry J. 2007. "Seeking Social Change through Shareholder Activism: When Do Corporations Respond Positively to Shareholder Resolutions?" Academy of Management Best Paper Proceedings, Philadelphia. [electronic format] Logsdon, Jeanne M., Hood, Jacqueline N., & Detry, Michelle. 2007. "Bullying in the Workplace: Challenges to Preserving an Ethical Organization." In B. Wempe & J. Logsdon (Eds.), Proceedings of the Eighteenth Annual Meeting of the International Association for Business and Society, Florence, Italy, pp. 67-71.

Logsdon, Jeanne M. & Van Buren III, Harry J. 2007. "Using GLOBE Data in Business-and-Society Research: A Workshop." In B. Wempe & J. Logsdon (Eds.), Proceedings of the Eighteenth Annual Meeting of the International Association for Business and Society, Florence, Italy, pp. 530-533.

Wempe, Ben & Logsdon, Jeanne M. (Eds.) 2007. Proceedings of the Eighteenth Annual Conference of the International Association for Business and Society, Florence, Italy.

Karen Patterson

Presentations

Patterson, Karen D.W. 'The evolution of actors in contested industries: Chiropractic and alternative medicine within healthcare.' Presented at the Academy of Management, August 3-8, 2007, Philadelphia, PA.

Patterson, Karen D.W. and Marvin Washington. 'The struggle within: The evolution of institutional entrepreneurs and entrepreneurship.' European Group for Organizational Studies Annual Meeting, July 5-7, 2007, Vienna, Austria.

Harry Van Buren

Book Chapters

Logsdon, J. M. & Van Buren III, H. J. 2007. National styles of corporate social responsibility: Exploring macro influences on responsible business behavior. In J. Hooker, P. Madsen, & J. Hulpke (Eds.)

Perspectives on International Corporate Responsibility. Charlottesville, VA: Philosophy Documentation Center.

Van Buren III, H. J. 2007. "Transparency," "Deregulation," "Confidentiality agreements," "Shareholder activism," "Behavioral Economics," "Slavery" (six separate entries). In R. W. Kolb (Ed.) Encyclopedia of Business Ethics and Society: 307-400, 566-568, 650-652, 1902-1907, 1932-1935, 2101-2104, Thousand Oaks, CA: Sage Publications.

Van Buren III, H. J. 2007. Boundaryless careers. In S. Clegg and J. R. Bailey (Eds.) International Encyclopedia of Organizational Studies. Thousand Oaks, CA: Sage Publications.

Publications

Van Buren III, H. J. & Greenwood, M. 2008. Enhancing employee voice: Are voluntary employeremployee relationships enough? Journal of Business Ethics, 81(1): 209-221.

Van Buren III, H. J. 2007. Care for people and creation: The role of U.S. Christian institutional shareholder activists in extractive-industry CSR. Greener Management International, 52: 77-90.

Proceedings

Van Buren III, H. J., Rehbein, K., & Logsdon, J. M. 2008. Social responsibility ratings and corporate responses to shareholder resolutions: Is there a relationship? Paper to be presented at the annual meeting of the International Association for Business & Society, Tampere, Finland.

Van Buren III, H. J. 2008. Business education within the context of business schools in the United States: A critical analysis. Paper to be presented at the annual meeting of the International Association for Business & Society, Tampere, Finland.

Rehbein, K., & Van Buren III, H. J. 2008. Shareholder activism as an example of NGO involvement in business ethics debates. Paper to be presented at the Role of Nongovernmental Organizations (NGOs) in the Business - Government - Society Interface Colloquium, Paris, France.

SERVICE ACTIVITIES DEPARTMENT OF ORGANIZATIONAL STUDIES

Shawn Berman

Editorial Review Board - The Strategic Management Journal, 2007-2008 Editorial Review Board - International Journal of Organizational Analysis, 2007-2008 Editorial Review Board - Journal of Management, 2005-2008 Member, proceeding co-editor search committee, International Association for Business and Society,

2007

Member, nominating committee, Social Issues in Management Division, Academy of Management, 2007 Chair, best paper committee, Social Issues in Management Division, Academy of Management, 2007 Chair, best paper committee, International Association for Business and Society, 2007 Symposium Organizer, "Bringing discussions of corporate responsibility into non-CSR management classes", 2007 International Association for Business and Society, Florence, Italy.

Ann Cunliffe

International Critical Management Studies Conferences, 2007

Program Chair, Critical Management Studies Interest Group, Academy of Management, 2007-2008 Executive Committee, Critical Management Studies Interest Group, Academy of Management, 2007-2008

Stream co-convener: *Identity, Methodology, and the Researcher's Craft,* Fifth International Conference on Critical Management Studies. University of Manchester, UK. July 2007

Breaking the Frame Award Committee. Journal of Management Inquiry, 2007

Robert DelCampo

Associate Editor, The Business Journal of Hispanic Research. 2006-present.

Associate Editor, <u>International Journal of Diversity in Organizations</u>, <u>Communities and Nations</u>. 2007. Vice-President for Education and Research, New Mexico Chapter, National Society of Hispanic MBAs (2006-present)

Member, Steering committee for the formation of New Mexico Chapter of the National Society of Hispanic MBAs (2005-present)

Chair, Paper Session, Academy of Management Organizational Behavior Division, "Venus and Mars: Gender Dynamics in Organizations", Philadelphia, PA; August, 2007

Discussant, Paper Session, Academy of Management Gender and Diversity in Organizations Division, Community and Organizational Climate Diversity: Enhancing Performance and Interpersonal Reactions", Philadelphia, PA; August, 2007

Jacqueline Hood

Editorial Review Board for Equal Opportunities International, 2006-present.

Transportation Research Board, Member, Management and Productivity Committee, 2002-present. Reviewer for <u>Psychology of Women Quarterly</u> (2008), <u>Business and Society</u> (2007-8), <u>Journal of Business Research</u> (2007).

Reviewer for International Association for Business and Society, Gender and Diversity in Organizations Division of the Academy of Management, Social Issues in Management Division of the Academy of Management (2007-2008)

Faculty Senate President (2007-2008)

Faculty Senate Operations Committee (2005-2009)

Steering Committee, Higher Learning Commission Accreditation (2007-present)

New Mexico Business Weekly Women of Influence 2007 Selection Committee.

Harry Van Buren

Board member, CANNICOR

Program staff to the Social Responsibility in Investments and the Economic Justice Loan Committees, Episcopal Church, New York, NY

Chair of the Environmental Justice Working Group, Interfaith Center of Corporate Responsibility, New York, NY

DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND ENTREPRENEURSHIP (FITE)

July 1, 2007 - June 30, 2008

Chair:

Raul de Gouvea Net

Professor

Full-time Faculty:

Hsuan-Chi Chen Jim Cormier Assistant Professor

Charles T. Crespy

Lecturer Professor

Na Dai

Assistant Professor

Dante DiGregorio Howard Hickey Assistant Professor Visiting Professor

Sul Kassicieh Emmanuel Morales-Camargo

Assistant Professor

John Schatzberg

Professor

Doug Thomas Gautam Vora Associate Professor Professor

Professor

Steve Walsh

Professor

Part-time Faculty:

Antonio Flores Douglas Hellie Len Malczynski Richard Oliva George Sanzero Linda Shul

Kevin Stevenson

SIGNIFICANT DEVELOPMENTS, SPONSORED ACTIVITIES

DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND ENTREPRENEURSHIP

- 2nd annual Native American Career Fair, April 7, 2008 at the Anderson School of Management
- November 2007 Second Annual FIBEA Fostering Indigenous Business & Entrepreneurship in the Americas Conference at Acoma, New Mexico, November. FIBEA hosted close to 250 participants from the Americas.
- July 2007 Doug Thomas took UNM students (20+) to Mexico
- June 2008 12 students from ITESM Chihuahua completed two courses on campus together with UNM students.

The Anderson School of Management – FITE Department and the Albuquerque Hispano Chamber of Commerce hosted the first annual Albuquerque Hispano Chamber of Commerce

Day at the Anderson School on April 30th from in the Paul R. Jackson Student Center. This first annual event allowed Anderson students and the UNM community to learn first-hand from some of New Mexico's most prominent Hispanic business leaders as they shared their individual stories of business successes and failures.

The annual Business Plan Competition was held in the Spring semester of 2008 with an even greater level of participation and funding from the business community. The competition was open to UNM students (any program) enrolled in at least six (6) hours in Fall 2007 or Spring 2008. Teams constructed a business plan for a technological product developed in New Mexico, assess key feasibility issues and market potential, and presented plans to judges, including entrepreneurs, venture capitalists, and other business leaders. The winners of the competition were: Advanced Pulmonary Solutions (APS), winner of the 2008 Michael Gallegos Prize for Entrepreneurship ~ 1st Place, \$25,000 Surya Suncare, winner of the 2008TVC Lockheed Martin Prize ~ 2nd Place, \$10,000

In Spring of 2008, the FITE Department hired a new tenure track Professor of Entrepreneurship, Raj Mahto.

SIGNIFICANT PLANS AND RECOMMENDATIONS FOR THE NEAR FUTURE DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND ENTREPRENEURSHIP

The Business Plan Competition will be in the Spring of 2009 with an even greater level of participation and funding from the business community. The competition is open to UNM students (any program) enrolled in at least six (6) hours in Fall 2008 or Spring 2009. Teams will construct a business plan for a technological product developed in New Mexico, assess key feasibility issues and market potential, and present plan to judges, including entrepreneurs, venture capitalists, and other business leaders

The FIBEA Conference sponsored by the Anderson School of Management (FITE Department) will be held in Manaus, July 22-25, 2008. The FIBEA Manaus 2008 theme, Fostering Indigenous Business and Entrepreneurship in the Americas Conference, is timely given the importance and variety of business issues that need to be addressed for the development and fostering of business alliances, trade, and investment amongst Indigenous business in North, Central, and South American countries.

To this end, the conference will give participants the chance to network, share ideas, and explore business opportunities. In addition, the conference will also discuss Indigenous issues, trends, and directions. The conference will explore the diverse environment of Indigenous business and entrepreneurship, covering a variety of topics which affect and permeate Indigenous business of all sizes and structures.

Through this conference, we hope to enable Indigenous business people in the private, public, and tribal/community sectors to present Indigenous business opportunities, solutions, and

problems to an Indigenous audience. We also want to promote networking among Indigenous business people and communities toward problem-solving and business opportunities.

In addition, the following activities are planned for the future: Greater Albuquerque Chamber of Commerce Day at Anderson – Fall 09 Native American Career Fair – Spring 2009

FIBEA Conference – Fall 09

Native American Business Student Day - Fall 09

PROMOTIONS, SABBATICALS, SEPARATIONS, AND AWARDS DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND

ENTREPRENEURSHIP

Hsuan-Chi Chen

2008 Sandia Federal Lectureship

Na Dai

Anderson School of
Management Department Most Distinguished Teacher Award, 2007

Emmanuel Morales-Camargo

Outstanding Service Award, FITE Department

Doug Thomas

Outstanding Researcher Award, FITE Department

PUBLICATIONS

DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND ENTREPRENEURSHIP

Hsuan-Chi Chen

Publications

Dai, N. and Chen, H. (2008). "Seasoned Equity Selling Mechanisms: Costs and Innovations," *Journal of Private Equity*, Vol. 11, No. 3, p. 16-29.

Chen, H., Jhou, C., and Yeh, H. (2007). "Signaling by Underwriter Retention Rate in the IPO Market," *Applied Economics*, Vol. 39, No.15, p.1973-1983.

Charles T. Crespy

Publications

"Blood Diamonds and Dead Ivory," Annual Advances in Business Cases, 2008. Society for Case Research: 117-203. Co-author with Miller, V.V and Hoover R.

<u>Na Dai</u>

Publications

Dai, N., and H. C. Chen, 2008. "Seasoned Equity Selling Mechanisms: Costs and Innovations," *Journal of Private Equity*, Vol. 11 No. 3

Presentations

2008 China International Conference in Finance (sponsored by MIT Sloan School of Management and Tsinghua University), Presenting "Local Bias in Venture Capital Investments"

Dante Di Gregorio

Publications

Di Gregorio, D., Musteen, M., and Thomas, D. 2008. International new ventures: the cross-border nexus of individuals and opportunities. *Journal of World Business*, 43:186-196.

Di Gregorio, D., Thomas, D., and Moroni, C. 2007. Comparing the cost of title insurance for consumers in New Mexico with neighboring states. Report commissioned by the New Mexico Public Regulation Commission

Presentations

Di Gregorio, D. Musteen, M., and Thomas, D. Offshoring as a Source of International Competitiveness for SMEs. Competitive paper presented at the Academy of Management Meetings, August 2007, Philadelphia.

Livengood, R. S., Di Gregorio, D., Smith, K. G., and Clark, K. Dyadic and reciprocal flows of knowledge within top management teams: A dual networks approach. Competitive paper presented at the Academy of Management Meetings, August 2007, Philadelphia.

Raul Gouvea

Publications

DBS Gouvea, R. (2007). "The Transnationalization of Brazil's Software Industry." *Transnational Corporations Journal (TNCJ), Unctad, Vol.16, No.1, April, p.145-164*

Sul Kassicieh

Publications

S. K. Kassicieh and Nabeel Rahal, "A Model for Disruptive Technology Forecasting in Strategic Regional Economic Development," *Technological Forecasting and Social Change*, 74(9), 1718:1732, 2007

Proceedings

Sul Kassicieh and Na Dai, "Trends in Funding, Markets and Entrepreneurship: Effect on Micro and Nano Technologies," Proceedings of the American Society of Mechanical Engineers 2nd Integration& Commercialization of Micro and Nanosystems International Conference, Kowloon, Hong Kong, June 3-5, 2008

Presentation

Economic Development and New Mexico, presentation at the FIBEA (Fostering Indigenous Business and Entrepreneurship in the Americas) conference at Acoma, NM, November 2007

Commercialization and Funding for Micro/Nanotechnology Companies, presentation at the Commercialization of Microsystems COMS 2007 conference, September 2007.

High Tech Spin-offs, Barriers and Catalysts to Public Sector Technology Transfer and Commercialization, presentation at the 5th International Conference on Small and Medium Enterprises, Athens, Greece, August 2007.

Emmanuel Morales-Camargo

Presentations

"Restrictions on Allocation Discretion: Evidence from Clawbacks in Hong Kong IPOs", Mid-west Financial Management Association, Annual Meeting (2008)

"Underpricing and Aftermarket Liquidity: An Empirical Exploration of Hong Kong IPOs."

- Mid-west Financial Management Association, Annual Meeting (2008)
 - Financial Management Association, Annual Meeting (2007)

Doug Thomas

Book Chapters

Grosse, Robert E. & Thomas, Douglas E. 2007. Sources of competitiveness of Large Mexican Groups. In Robert E. Grosse & Luiz F Mesquita (eds). *Can Latin American Firms Compete?*: 250-265 Oxford, UK: Oxford University Press.

Publications

Di Gregorio, Dante, Musteen, Martina & Thomas, Douglas E. 2008. International New Ventures: The Cross-Border Nexus of Individuals and Opportunities. *Journal of World Business*. 43(2): 186-196.

Di Gregorio, Dante, Thomas, Douglas E. & Gonzalez de Castilla, Fernan. 2008. Competition between emerging and multinational firms: Wal-Mart and Mexican retailers. *International Journal of Management*.

Thomas, Douglas E., Eden, Lorraine, Hitt, Michael A, & Miller, Stewart R. 2007. Experience of emerging market firms: The role of cognitive bias in developed market entry and survival. *Management International Review*. 47(6): 845-867.

Presentations

Miller, Stewart R., Eden, Lorraine, Thomas, Douglas E., Fields, Paige & Zhu, Hong. Liability of Foreignness and Imitation Strategies of Host Country Multinationals. Presented at 2007 Academy of Management Conference, Philadelphia, Pennsylvania.

Di Gregorio, Dante, Musteen, Martina & Thomas, Douglas E. Offshoring as a source of international competitive advantage for SMEs. Presented at 2007 Academy of Management Conference, Philadelphia, Pennsylvania.

Miller, Stewart R., Eden, Lorraine, Thomas, Douglas E., Fields, Paige & Zhu, Hong. When You Leave, Should I Go Too? Trait-Based And Location-Based Imitation By Host-Country Multinationals. Presented at 2007 Academy of International Business Conference, Indianapolis, Indiana.

Steve Walsh

Book Chapters

Kirchhoff, B and Walsh, S., (2008) "Entrepreneurship's role in commercializing micro and nano technology products" in Commercialization of Micro and Nanotechnology Products, editors, Tolfree and Jackson, Taylor Francis Group pp. 29-50

Walsh, S., Kirchhoff, B., and Tolfree, D. (2008) "Road mapping Nanotechnology an enabling oftendisruptive technology base", in Commercialization of Micro and Nanotechnology Products, editors, Tolfree and Jackson, Taylor Francis Group pp. 51-70

Publications

Linton, J. and Walsh, S. (2008) A theory of innovation for process-based innovations such as nanotechnology, Technological Forecasting and Social Change

Romig, A., Baker, A., Johannes J., Zipperian, T., Eijkel, K., Kirchhoff, B. Mani, H.S., Rao, C.N.R., and Walsh, S., (2007), "An introduction to nanotechnology policy: Opportunities and constraints for emerging and established economies" Technological Forecasting and Social Change 74 (2007) pp. 1634-1642

Kautt, M. Walsh, S. Bittner, K., (2007), "Global distribution of micro-nano technology and fabrication centers: A portfolio analysis approach," Technology Forecasting and Social Change 74 (2007), pp.1697-1717

Thukral, I., Von Ehr, J., Walsh S., Greon, A., Van de Sijde, P., and Khairul Akmaliah Adham, (2008), Entrepreneurship, Emerging Technologies, Emerging Markets, International Small Business Journal (see editors letter of acceptance)

Kirchhoff, B., Newbert, S., and Walsh, S. (2007), "Defining the relationship among founding resources, strategies, and performance in technology intensive new ventures: Evidence from the semiconductor silicon industry," Journal of Small Business Management, (October 2007 - Vol. 45 Issue 4 pp 438-466)

Eijkel, K., Groen, A. Walsh, S. (2007), Introduction to the section "Nanotechnology Policy" Technological Forecasting and Social Change, 74 pp. 1631-1633

Presentations

Walsh, S. (2007) "How to really start a High Tech Enterprise", NINE student development program, SNL, Albuquerque, New Mexico

Walsh, S. (2007) Commercialization of Micro and Nano System" AIRDS, Albuquerque, New Mexico

Walsh, S. (2007) "Commercialization and BioNano based enterprise" NCGR, Santa Fe, New Mexico

Walsh, S, (2007) "Small Tech, Education and solving Real problems" August 2007, Melbourne, Australia

SERVICE ACTIVITIES

DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND ENTREPRENEURSHIP

Hsuan-Chi Chen

Reviewer - Financial Management Association (FMA), Annual Meeting (2008)

Session organizer - Financial Management Association (FMA), Annual Meeting (2008)

Reviewer - Journal of Financial Markets (2008)

Reviewer - One chapter in The Handbook of Technology Management (2008), edited by Hossein Bidgoli

Paper discussant - Financial Management Association, Annual Meeting (2007)

"Underpricing of equity offering in Brazil" By Richard Saito and Luiz Maciel

Charles T. Crespy

Board member, New Mexico Coalition for Financial Education

Leadership New Mexico (Class of 2007)

Board of Directors, The Next Generation Economy

Board of Directors, Albuquerque Economic Development

Led Regionalism Initiative for four county area of Central New Mexico

Member, New Mexico Economic Forum

Na Dai

2008 Financial Management Association (FMA) Annual meeting, reviewer, session chair 2007 Financial Management Association (FMA) Annual Meeting, serve on the Competitive Paper Award Committee in Institutions

Dante DiGregorio

Member, Search Committee for Provost/Executive VP for Academic Affairs, UNM, 2007-2008

Member, Search Committee for General Manager, KNME-TV, 2008

Member, Steering Committee, UNM Rome Campus Initiative, 2008 to present

Secretary, Executive Committee, Latin American and Iberian Institute, UNM, 2007-2009

Member, Interdisciplinary Committee on Latin American Studies, UNM, 2006 to present

Director of ASM International Student Exchange Programs, 2001 to present

Reviewer, Academy of Management Journal, Research Policy, Academy of Management Review, Journal of Management Studies, Journal of International Business Studies, Journal of Technology Transfer,

Strategic Entrepreneurship Journal

Assisted UNM-Gallup in developing entrepreneurship programs and in the development of a proposal for external funding, 2008

Various presentations to regional organizations (e.g., NM Mainstreet conference for mayors and city managers) and appearances in local media (e.g., KNME-TV New Mexico InFocus)

Board of Directors, KNME-TV, 2007 to present

Session Chair, Academy of Management meetings, 2007

Sul Kassicieh

Board Member - PatchWorks: 2006-present

Board Member - Verge Venture Fund: 2005-presesnt

Board Member - Women Self Sufficiency Economic Team (WESST): 2006-present

Board Member - New Mexico Information Technology and Software Association: 2005-present

Reviewer for the Oklahoma Center for Applied Science and Technology, 2007

Emmanuel Morales-Camargo

Paper discussant - Mid-west Financial Management Association, Annual Meeting (2008)

"Golden parachutes as managerial incentives"

Paper discussant - Financial Management Association, Annual Meeting (2007)

"How banking relationships affect certification: The role of private information in underwriting" By Tiago Duarte-Silva

Discussion session chair - Financial Management Association, Annual Meeting (2007)

Session No. 240: Seasoned Equity Offerings

Doug Thomas

Board Member, Brigham Young University Management Society

Gautam Vora

Director, CFA Society of New Mexico Program committee of Financial Management Association, 2007

Steve Walsh

Faculty advisor to Technology Commercialization Association Member of the Organization Committee for the Ibero American Research Conference

SPONSORED RESEARCH

DEPARTMENT OF FINANCE, INTERNATIONAL, TECHNOLOGY MANAGEMENT, AND ENTREPRENEURSHIP

Dante Di Gregorio

Principal Investigator, FIPSE North American Mobility in Higher Education grant, US Department of Education, 2007-2011, \$101,385

Co-Project Director, Business and International Education grant, Title VI-B, US Department of Education, 2006-2008, \$195,500

Principal Investigator, Comparing Title Insurance Costs for Consumers in New Mexico with Neighboring States, for the New Mexico Public Regulatory Commission, 2007, \$19,800

Sul Kassicieh

- S. Kassicieh, Steve Walsh and Craig White, ""Small High-Tech Business Assistance: Technology Assessments and Business Planning", grant awarded for \$127,500 from Sandia National Laboratories, 2008.
- S. Kassicieh, "Technology Commercialization Analysis," grant awarded for \$ 35,000 by Los Alamos National Laboratory, 2007-2008.

S. Kassicieh, Steve Walsh and Craig White, ""Small High-Tech Business Assistance: Technology Assessments and Business Planning", grant awarded for \$68,000 from Sandia National Laboratories, 2007

Doug Thomas

Co-Project Director, Business and International Education grant, Title VI-B, US Department of Education, 2006-2008, \$195,500

Steve Walsh

McCune Grant
Stave Walsh (Co. Ph. with Craig White (Co. Ph.)

\$25,000

Steve Walsh (Co-PI) with Craig White (Co-PI).

Sandia New Mexico Small Business Assistance Programs Steve Walsh (PI) and Sul Kassicieh (Co-PI) approximately \$65,000

Sandia New Mexico Small Business Assistance Programs

approximately \$42,500

Steve Walsh (co-PI) Kassicieh (PI) summer 2007

DEPARTMENT OF MARKETING, INFORMATION SYSTEMS, AND DECISION SCIENCES (MIDS) July 1, 2007 – June 30, 2008

Chair: Steven A. Yourstone Associate Professor

Full-time Faculty: Gerald Albaum Research Professor

John D. Benavidez Lecturer Raniit Bose Professor

Kenneth G. Baker Associate Professor
Stephen D. Burd Associate Professor
Dwane Dean Assistant Professor
Linda Ferrell Associate Professor

O.C. Ferrell Professor

Nick Flor Associate Professor

David O. Harris Lecturer S. Howard Krave Lecturer

Mary Margaret Rogers Associate Professor
Catherine A. Roster Associate Professor
Laurie Schatzberg Associate Professor

Alessandro F. Seazzu Lecturer

Douglas M. Stewart Associate Professor

Part-time Faculty: William Epler

Susan Hershberger Peter Jurkat Elaine McGivern Linda Shul

SIGNIFICANT DEVELOPMENTS, SPONSORED ACTIVITIES

DEPARTMENT OF MARKETING, INFORMATION SYSTEMS, AND DECISION SCIENCES

- NSA Center of Academic Excellence in Information Assurance certification
- MBA teams, led by John Benavidez, participated in the 2007 Cadillac National Case
 Study Competition. A team of MBA students advanced to the final round of the Cadillac
 competition for the third consecutive year, placing second. And undergraduate students
 participated in Project Acceleration: Subaru Impreza Collegiate Challenge. Anderson
 placed first, beating a team from Drexel University.
- Catherine Roster: 2008 Best Article Award
 "Management of Marketing Research Projects: Does Delivery Method Matter Anymore
 in Survey Research?" 2007. Editorial Review Board for the *Journal of Marketing Theory* and Practice

- Catherine Roster: 2007 Emerald Literati Network Outstanding Paper Award
 "Making the Transition to Retirement: Appraisals, Post-Transition Lifestyle, and
 Changes in Consumption Patterns," 2006. Editorial Review Board for the Journal of
 Consumer Marketing
- Linda Ferrell president Marketing Management Association
- O.C. Ferrell Vice-president of Publications, Academy of Marketing Science, 2007-2010
- Nick Flor: 2007 to Present: University of New Mexico Teaching & Technology Faculty Coordinator
- Nick Flor: 2007 to Present: Director of Research, Datacasting University of New Mexico / KNME-TV
- Howard Kraye: a video game tournament raised \$1,184.35 for Carrie Tingley Children's Hospital
- Howard Kraye: a card tournament raised \$3,382 for the Animal Humane Association of New Mexico.

SIGNIFICANT PLANS AND RECOMMENDATIONS FOR THE NEAR FUTURE

DEPARTMENT OF MARKETING, INFORMATION SYSTEMS, AND DECISION SCIENCES

- Faculty peer evaluations of teaching have been launched during the fall semester 2008.
- Expansion of the Information Assurance area through student recruiting.
- Expansion of the Management Information Systems area through innovations in curriculum and pedagogy as well as marketing efforts to attract new students.

PROMOTIONS, SABBATICALS, SEPARATIONS, AND AWARDS

DEPARTMENT OF MARKETING, INFORMATION SYSTEMS, AND DECISION SCIENCES

Roster, Catherine

Catherine Roster, tenure and promotion to associate professor.

2008 Best Article Award for 2007 from the Editorial Review Board for the *Journal of Marketing Theory and Practice*

PUBLICATIONS

DEPARTMENT OF MARKETING, INFORMATION SYSTEMS, AND DECISION SCIENCES

Gerald Albaum

Books

International Marketing and Export Management. Pearson Education Limited (UK), Sixth Edition, 2008 (with E. Duerr)

Publications

"On the Ethicality of Internal Consumption in Multilevel Marketing," Journal of Personal Selling and Sales Management, Fall, 2007, (with R.A. Peterson)

"Survey Participation and Response Rates: A Cross-Cultural Comparison," 16th World Business Congress of International Management Development Association, Maastricht, The Netherlands, July, 2007 (with P. Poon and F. Evangelista).

"Differences in Marketing Managers' Decision Making Styles within the Asia-Pacific Region: Implications for Strategic Alliances," Journal of Global Marketing, Vol. 21, No. 1, 2007 (with J. Herche, J. Yu, F. Evangelista, B. Murphy, and P. Poon)

"Ethicality and Attitudes Toward Capitalism of Future Business Leaders: Effects of Nationality, Gender, and Religiosity in 23 Countries," 12th Cross-Cultural Research Conference, Honolulu, Hawaii, December. 2007

Classroom Questioning with Immediate Electronic Response: Do 'Clickers' Improve Learning?' Decision Sciences Journal of Innovative Education, January 2008, Vol. 6, No. 1 (with S.Yourstone and H. Kraye)

"Consumer Perceptions of Extended Warranties and Service Providers," Proceedings, ANZMAC Conference, Sydney, Australia, December, 2008 (with J. Wiley).

Ranjit Bose

Publications

"Competitive Intelligence Process and Tools for Intelligence Analysis," Industrial Management & Data Systems, Vol. 108, No. 4, 2008, 510-528.

"Applying Semantic Web Services to Web-based IS and Applications," Proceedings 2008 IEEE International Conference on Information Technology: New Generations (ITNG), April 7-9, Las Vegas, NV, pp. 1150-1155.

Book Chapters

"Challenges for Deploying Web Services-Based E-Business Systems in SMEs," (with V. Sugumaran), In S. A. Becker (ed.) Electronic Commerce: Concepts, Methodologies, Tools, and Applications, IGI Global, Hershey, New York, ISBN 978-1-59904-943-4, 2007, pp. 2029-2046.

"Incorporating Web Services into E-Business Systems: An SME Perspective," (with V. Sugumaran), In I. Lee (ed.) E-Business Models, Services, and Communications, IGI Global, Hershey, New York, ISBN 978-1-59904-831-4, 2008, pp. 183-208.

"Determining CRM Measures of Success from Knowledge Created by CRM Processes," In B.S. Sahay, J.N.D. Gupta, S. Batra, S. Kumar, and S. Kumar (eds.) Decision Sciences and Technology for Globalization (based on the papers presented at the inaugural international conference of the Indian Sub-Continent Region of Decision Sciences Institute at the Institute of Management Technology, Ghaziabad, India, January 2-4, 2008), Allied Publishers Pvt. Ltd., ISBN 81-8424-290-5, 2008, pp. 521-536. Presentations

"Applying Semantic Web Services to Web-based IS and Applications," 2008 IEEE International Conference on Information Technology: New Generations (ITNG), April 7-9, Las Vegas, NV.

"Determining CRM Measures of Success from Knowledge Created by CRM Processes," International Conference on Decision Sciences, Technology and Globalization, Indian Subcontinent region of Decision Sciences Institute (ISDSI), January 2-4, 2008, Ghaziabad, India.

Stephen D. Burd

Books

Satzinger, John W., Jackson, Robert, and Stephen D. Burd, Systems Analysis and Design in a Changing World, fifth edition, 2008, Course Technology.

Dean, Dwane

Publications

Dean, Dwane H., and Jane M. Lang (2008), "Comparing Three Signals of Service Quality," Journal of Services Marketing, 22(1), 48-58.

Dean, Dwane H. (2008), "Shopper Age and the Use of Self-Service Technologies," Managing Service Quality, 18(3), 225-238.

Ferrell, Linda

Books

Business and Society, (2008), 3nd edition, Houghton Mifflin: Boston, MA (Co-Authors: Debbie Thorne McAlister and O.C. Ferrell).

Business Ethics: Ethical Decision Making and Cases, (2008), 7th edition, Houghton Mifflin: Boston, MA (Co-Authors: O.C. Ferrell and John Fraedrich).

Business in a Changing World, (2008) 6th edition., Irwin/McGraw-Hill, Burr Ridge, IL (Co-Authors: O.C. Ferrell and Geoff Hirt).

Publications

"A Decision Making Framework for Business Ethics Education," (2008) Advancing Business Ethics Education, Series: Ethics in Practice. Editors: Diane Swanson and Dann Fisher, Information Age Pub. Inc. (co-author: O.C. Ferrell).

"A Macromarketing Ethics Framework: Stakeholder Orientation and Distributive Justice," (2008) Journal of Macromarketing, March, Vol. 28, #1, pp. 24-32. (co-author: O.C. Ferrell).

"A Framework for Personal Selling and Sales Management Ethical Decision Making," (2007) Journal of Personal Selling and Sales Management, Fall, Volume 27, #4, pp. 291-299. (co-authors: O.C. Ferrell and Mark Johnston).

Ferrell, OC

Books

Business Ethics, 7th ed. (Boston: Houghton Mifflin Company, 2008). Co-authors: John Fraedrich and Linda Ferrell.

Business and Society, 3rd ed. (Boston: Houghton-Mifflin Company, 2008), Co-authors, Debbie Thorne McAlister and Linda Ferrell.

Marketing: Concepts and Strategies, 14th ed. (Boston: Houghton Mifflin Company, 2008). Co-author: William Pride.

Business: A Changing World, 6th ed. (Burr Ridge, IL: Irwin/McGraw-Hill, 2008). Co-author: Geoffrey Hirt.

Business: A Changing World, 3rd Canadian ed. (Montréal: McGraw-Hill Ryerson, 2008). Co-authors: Geoffrey Hurt, Linda Ferrell, Elliot Currie, and Suzanne Iskander.

Marketing Strategy, 4th ed. (Thomson Publishing 2008). Co-author: Michael Hartline.

Publications

"Developing a Framework for a College of Business: Business Ethics Initiative," (2008) Advancing Business Ethics Education, Series: Ethics in Practice. Editors: Diane Swanson and Dann Fisher, Information Age Pub. Inc. (co-author: Linda Ferrell).

"A Macromarketing Ethics Framework: Stakeholder Orientation and Distributive Justice," (2008) Journal of Macromarketing, March, Vol. 28, #1, pp. 24-32. (co-author: Linda Ferrell).

"A Framework for Personal Selling and Sales Management Ethical Decision Making," (2007) Journal of Personal Selling and Sales Management, Fall, Volume 27, #4, pp. 291-299. (co-authors: Linda Ferrell and Mark Johnston).

Flor, Nick

Book Chapters

Flor, N. (2008). Actionable Process Theories: A Unique Selling Proposition for a Science of Services. Hefley, B., and Murphy, W. (Eds.), Service Science, Management, and Engineering. New York, NY: Springer.

Publications

Flor, N., Campbell, S., Gale, J., & Sullo, L. (2007). Integrating Datacasting Systems with the Web: A Software Middle-Layer for Web Applications Developers. 57th Annual IEEE Broadcast Symposium.

Flor, N. (2007). Integrating Datacasting Systems with the Web: A Software Middle-Layer for Web Applications Developers. Society of Motion Picture and Television Engineers.

Kraye, Howard

Publications

"Classroom Questioning with Immediate Electronic Response: Do "Clickers" Improve Learning?"

"Decision Sciences Journal for Innovative Education" Volume Number 1, January 2008

Mary Margaret Rogers

Proceedings

Rogers, Mary Margaret and Jack Su, "The Impact of Transportation on Supply Chain Efficiency: How Changes in Assumptions can Alter Conclusions." International Association of Business and Public Administration Conference, April. 2008.

Roster, Catherine

Proceedings

Roster, Catherine A. (2008), "Use of the NVivo Software Program to Analyze Qualitative Data," in Proceedings of the Qualitative Research in Management and Organization Conference, Albuquerque, New Mexico [abstract only].

Yourstone, Steven

Publications

"Classroom Questioning with Immediate Electronic Response: Do "Clickers" Improve Learning?" 2008 with H.S. Kraye & G. Albaum. Decision Sciences Journal of Innovative Education. Volume 6. Number 1. January 2008

SERVICE ACTIVITIES

DEPARTMENT OF MARKETING, INFORMATION SYSTEMS, AND DECISION SCIENCES

Gerald Albaum

Member, Editorial Review Board, Journal of Managerial Issues
Member, Editorial Review Board, The International Trade Journal
Member, Editorial Review Board, Journal of Marketing Research
Member, Senior Advisory Board, Journal of Marketing Theory and Practice
Member, Editorial Review Board, Management International Review

Ranjit Bose

Member, Editorial Review Board, Journal of International Technology and Information Management Member, Editorial Review Board, Journal of Computer Information Systems

Burd, Stephen

Secretary, New Mexico Telehealth Alliance
Board Member, New Mexico Regional Health Information Organization Planning Group

Dwane Dean

Member, New Mexico Advertising Federation

Ferrell, Linda

Member and committee chair, American Marketing Association Member, Society for Marketing Advances Annual Conference Member, Academy of Marketing Science Member, Academy of Management

Member, Marketing Management Association

Ferrell, O.C.

Vice-president of Publications, Academy of Marketing

Track chair, Society for Marketing Advances, Annual Conference

Track chair, Marketing Management Associate, Annual Conference

Section Editor, Marketing Ethics & Social Issues, Journal of Macromarketing

Editorial Board, Journal of Business Ethics

Editorial Board, Journal of Marketing Education

Editorial Board, Journal of Strategic Marketing

Editorial Board, Journal of Marketing Management

Editorial Board, Marketing Education Review

Flor, Nick

Member, Association of Computing Machinery

Member, IEEE Society

Member, Society of Motion Picture and Television Engineers

Member, Fellowship of Catholic Scholars

Rogers Mary Margaret

Review Board Member, Industrial Marketing Management

Review Board Member, Journal of Applied Case

Roster, Catherine

Member, Association for Consumer Research

Member, American Marketing Association

Member, Society for Consumer Psychology

Member, The National Study Group on Chronic Disorganization

Executive Board Member and Research Director, The National Study Group on Chronic Disorganization

Board Member, The ARC of New Mexico

Editorial Board - Buyer Behavior, the Journal of Business Research

Reviewer for The Handbook of Technology Management, Wiley & Sons, 2008

Reviewer for book proposal, Internet Data Collection for Research in the Behavioral and Social Sciences,

Wiley & Sons, 2007

Session Chair, Society for Consumer Psychology Conference, 2007

Yourstone, Steven

Track chair for Service Operations Management papers at the Decision Sciences Institute national meeting 2007.

Track chair for Innovative Education papers at the Decision Sciences Institute national meeting 2008.



ANNUAL REPORT

July 1, 2007 - June 30, 2008

Dr. Uday Desai Director

THE ANNUAL REPORT OF THE SCHOOL OF PUBLIC ADMINISTRATION

July 1, 2007 - June 30, 2008

Submitted by Angela Kamman - Administrative Officer

Director

Uday Desai

Full-time Faculty

Santa Falcone

Constantine Hadiilambrinos

Mario Rivera Roli Varma

Leave of Absence

Bruce Perlman

1. Significant Developments During the 2007-08 Academic Year

- Uday Desai became the Director of SPA in October of 2007
- Gene Henley became Academic Advisor for SPA in February of 2008
- ❖ Angela Kamman became the Administrative Officer in April of 2008
- . Bruce Perlman is currently on Leave of Absence.
- Two Faculty Searches took place during the Fall of 2007. Dr. Kun Huang will begin working with SPA in August 2008 and Stephanie Smith will begin working with SPA in January 2009.

2. Significant Plans and Recommendations for the Near Future

- Development of Masters in Health Policy and Administration and Masters in Public Policy degrees.
- Curriculum changes within the Core Curriculum and Concentrations
- Continued growth in student enrollment.
- Continued examination of SPA goals and direction.

3. Appointments, Promotions, Seperations

- Linda Barril, Department Administrator left SPA in early 2008.
- Megan Marsee, Administrative Assistant II left SPA in April of 2008.

4. Publications, Outside Professional Activities, Outside Sponsored Research, Student Info

PUBLICATIONS

Dr. Constantine Hadjilambrinos:

Translation (with Diane Thiel) of American Fugue by Alexis Stamatis. Wilkes-Barre, PA: Etruscan Press, 2008.

Dr. Mario Rivera:

- With Abdullah Karaman, Sebahat Bayrak Kök, and Selcuk Burak Hasiloglu, coauthors, "Vision, Creativity, Strategic Innovation, and Transformational Leadership," Problems and Perspectives in Management 2, 2008.
- With James D. Ward, coauthor, "Employment Equity and Institutional Commitments to Diversity: Disciplinary Perspectives from Public Administration and Public Affairs Education," Journal of Public Affairs Education 14 (1), Spring 2008.
- With Una Medina, coauthor, and Sharon Rogers and Christina Shapiro, contributing authors, "Meaning-Making and Client Empowerment: The Basic Needs Incentive Model," The Innovation Journal: The Public Sector Innovation Journal 13 (1), 2008.
- With Max M. Valdez, coauthor, "Cross-functional Teams and Informal Social Networks: A Case Study of Project Development and Performance in a Multidisciplinary Science and Technology National Laboratory," *Journal of Business and Public Affairs* 1 (2), 2007.
- With Richard G. Johnson III, coauthor, "Refocusing Graduate Public Affairs Education: A Need for Diversity Competencies in Human Resource Management," *Journal of Public Affairs Education* 13 (1), Winter 2007.
- With Richard G. Johnson III, coauthor, "Promoting Diversity Competencies in Public Administration Education," presented October 12, 2007 in a Panel entitled "Cultural Competency, Diversity and the Changing Face of Public Affairs," Annual Conference of the National Association of Schools of Public Affairs and Administration, Seattle, Washington, October 10-13, 2007.

Dr. Roli Varma:

- Roli Varma and Heiko Hahn (2008), "Gender and the Pipeline Metaphor in Computing" <u>European Journal of Engineering Education</u>, 33(1), 3-11.
- ❖ Roli Varma (2007), "Women in Computing: The Role of Geek Culture" Science as Culture, 16(4), 359–376.
- Roli Varma (2007), "Changing Borders and Realities: Emigration of Indian Scientists and Engineers to the United States" <u>Perspectives on Global Development and Technology</u>, 6(4), 1-18.

OUTSIDE PROFESSIONAL ACTIVITIES

Dr. Mario Rivera:

- <u>Editor-in-Chief</u>, Journal of Public Affairs Education (since 2005)—Journal of the National Association of Schools of Public Affairs and Administration, Washington, D.C.
- Appointee to the Executive Council (2005-2008) of the National Association of Schools of Public Affairs and Administration. Council Liaison to the Standards Committee (since 2007), working in particular on international accreditation and curricular and diversity standards, in a major standards revision effort concluding in 2009.
- Program Evaluation Lead, Albuquerque Area Indian Health Board: Lead analyst in a Native American Research Centers for Health Project of the University of New Mexico (UNM) Health Sciences Center, funded by the National Institutes of Health and Indian Health Service (current). Produced, with coauthor Frank Reinow, the following report: An Evaluation of Five Research and Demonstration Projects to Develop Native Health Researchers and Reduce Health Disparities in Tribal Communities, Year 2, November 2007.
- Conference Presentation, "Cultural Competency, Diversity, and Equity in Public Affairs Education: Curricular and Programmatic Implications," paper presented March 10, 2008 at the Annual Conference of the American Society for Public Administration, Dallas, Texas, March 7-11, 2008.
- Conference Presentation, with Una E. Medina, coauthor, "Salient Variables in the Creation, Diffusion, and Dissolution of Innovation Networks," paper presented at the Annual Meeting of the Society for Chaos Theory in Psychology and Life Sciences, Chapman College, Orange, California, July 27-29, 2007.

Dr. Roli Varma:

- "Indian Women in Information Technology" <u>East China Normal University</u>, Shanghai, China, July 17, 2008. *Invited by Dr. Xhenbing Xeng*.
- "Cross-National Differences in Women's Participation in Computer Science Education in India and the United States" (final report) <u>National Science Foundation's HRD Joint Annual Meeting</u>, Washington DC, June 16–18, 2008. *Invited by Dr. Jolene Jesse*, National Science Foundation.
- "Cross-National Differences in Women's Participation in Computer Science Education between India and the United States" <u>Annual Meeting of Western Social Science</u> <u>Association</u> (WSSA), Denver, Colorado, April 23–26, 2008.
- "Aspirations of New Immigrants in the U.S. Workforce" <u>National Conference of the Commission on Professionals in Science and Technology</u>, Washington DC, November 1–2, 2007. *Invited by Associate Director Nathan E. Bell, Commission on Professionals in Science and Technology*.
- "Women in Computing: The Power of Geek?" <u>Annual Meeting of Society for Social</u> Studies of Science (4S), Montreal, Canada, October 11-13, 2007.

"Cross-National Differences in Women's Participation in Computer Science Education in India and the United States" (annual report) National Science Foundation's HRD Joint Annual Meeting, Washington DC, August 13–15, 2007. Invited by Dr. Jolene Jesse, National Science Foundation.

OTHER PROFESSIONAL ACTIVITIES

Dr. Mario Rivera:

- <u>Editorial Board Member</u>, Policy and Management Review, Problems and Perspectives in Management, Scientific Journals International, Journal of Business and Public Affairs, and The Innovation Journal: The Public Sector Innovation Journal.
- Member, Workforce Development Committee, the New Mexico Information Technology and Software Association (since 2001): Assessment of the State's needs in science and technology education and training, particularly insofar as these affect readiness for postsecondary education and employment among New Mexico youth.

Dr. Roli Varma:

- Chair, Ludwik Fleck Prize for the Best Book in Science and Technology Studies, Society for Social Studies of Science (4S), 2008.
- NSF Panel Reviewer: 10 proposals.
- External Reviewers: (1) 2 research proposals for Research Grants Council of Hong Kong; (2) 1 research proposal for National Science Foundation; (3) 1 paper for Science as Culture (4) I paper for the Handbook of Technology Management (5) 1 paper for the Information Society.
- Panel Organizer: "Author Meets Critics: Sick Building Syndrome and the Problem of Uncertainty, by Michelle Murphy" Joint Annual Conference of Society for Social Studies of Science and European Association for the Study of Science and Technology, Rotterdam, The Netherlands, August 20–23, 2008.
- Moderator: "Gender and Technology" Annual Meeting of Society for Social Studies of Science, Montreal, Canada, October 11–13, 2007.

OUTSIDE SPONSORED RESEARCH

The School of Public Administration received the following grants to fund faculty and graduate research during this academic year. Total of \$81,766.00

National Science Foundation

"Cross-National Differences in Women's Participation in Computer Science Education in India and the United States" Research on Gender in Science and Engineering Program Varma, R..

\$55,766.00

January 1, 2008 - December 31, 2008

Grant # 0650410

National Science Foundation

"Cross-National Differences in Women's Participation in Computer Science Education in India and the United States" Research Experiences for Undergraduates Program

Varma, R.

\$6,000.00

January 1, 2008 - December 31, 2008

Grant # 0650410

National Endowment for the Arts (NEA)

For the translation from the Greek and publication of the book *American Fugue* by Alexis Stamatis Hadjilambrinos, C.

\$20,000.00

With Diane Thiel (English Department, UNM), and Etruscan Press

Book Publication, Spring/Summer 2008.

February 2007 - January 2008

STUDENT INFORMATION

Master of Public Administration Degree Conferred

2007-2008 Academic Year:

SUUC SINICADS

DI 10110 2000		
Angela Carrejo	Misty Salaz	
Cristin Chavez	Catherine Scott	
Anne Debuyserie	Trey Smith	
Commente Bassian	Plaine Traille	

Georgette Reeves Elaine Trujillo
April Rodriguez Rachel Warshawsky

FALL 2007

Chris Bakas Andrea Martinez
Susan Clair Sarah Martinez
Lee Gentry Beth Mohr
Brad Geenberg Anne Oandassan
Virginia Grosjean Bryon Piatt
Gene Henley Jerrod Sanchez

SUMMER 2007

Noel Angel Sarah Majdiak
Juliette Aragon Stephon Scott
Jacqueline Chavannes Henry (Geno) Trujillo
Aprell Emerson Rosalina Trujillo

Bernadine Goldman

PI ALPHA ALPHA Inductees

2007-2008 Academic Year

Jennifer L. Belyeu Brad H. Greenberg
Lora M. Church Noel Knille
Erin N. Engelbrect Lawrence M. Lujan
Erin N. Farley Rachel L. Warshawsky

Ferrel Heady Award for Outstanding Professional Paper

2007 - 2008 Academic Year

Stephon Scott - "Whites Only" Real Estate Restrictive Covenants: Albuquerque, NM

RECEIVED

NOV 2 1 2008

School of Architecture & Planning Landscape Architecture Program Annual Report: July 1, 2007 – June 30, 2008 Submitted by: Prof. Alf Simon, Director OFFICE OF SECRETARY

Major Activities, Initiatives, International Programs, and Curriculum Changes

The LA program will co-host the annual Council of Educators in Landscape Architecture (CELA) conference to be held in Tucson Arizona in January 2009 and has been involved in the planning and organization of this event. The conference is attended by representatives of every LA program in the US and Canada, as well as from some programs in New Zealand, Australia and Europe.

The program started to plan for an accreditation visit, combined with a UNM academic program review, scheduled for Spring 2009.

The LA foreign studies program, started in 2007, made its second foreign trip in June 2008. Students and faculty were centered at Schloss Dyck in the western edge of Germany where they studied the post industrial landscape of the Ruhr Valley. The group then traveled to France where they were centered in Paris and studied contemporary and traditional landscapes in the Paris region.

The Southwest Summer Institute for Historic Preservation & Regionalism, under the direction of Prof. Chris Wilson, held another successful suite of courses during summer 08. Special Programs, UNM Academic Affairs, contributed \$15,000 in funding.

Faculty Changes

The program director, Alf Simon, was on sabbatical leave during the fall 07 semester. Prof. Mark Childs, a faculty member in the Architecture program, was the acting head during this period. Prof. Childs did an outstanding job in this role.

Tenure track Assistant Professor Anne Godfrey submitted her resignation in spring 2008.

Staff Changes

None

List of Visiting and Part-Time Faculty, Critics, and Guest Lecturers

John Barney Steve Borbas Catherine Harris
Greg Miller
Bill Perkins
Judith Phillips
Alex Rattray
Pat Westbrook
Dennis Wilkinson
Judith Wong
Jonathan Seigel

Several local landscape architects served as guest lecturers and critics during the year

Number of Degrees Awarded: Summer, Fall, and Spring

Fall 07 1
Spring 08 7
Summer 08 1

Enrollment & Admission Statistics

Number of Applicants Admitted

Fall 23 Spring 3

Number of applications

Fall 32 Spring 1

Number of new Students enrolled by degree

Fall 19 Spring 1

Fall, Spring and Summer Student Credit Hours Generated

$\begin{array}{c|cccc} \hline \textbf{Fall and Spring } & \underline{\textbf{Enrollment Headcount Count}} \\ \hline \textbf{1}^{\text{st}} & \text{year} & \textbf{Fall 07} & 15 & \textbf{Spring 08} & 15 \\ \hline \textbf{2}^{\text{nd}} & \text{year} & \textbf{Fall 07} & 8 & \textbf{Spring 08} & 11 \\ \hline \textbf{3}^{\text{rd}} & \text{year} & \textbf{Fall 07} & 15 & \textbf{Spring 08} & 15 \\ \hline \textbf{Thesis} & \textbf{Fall 07} & 12 & \textbf{Spring 08} & 7 \\ \hline \end{array}$

Sponsored Projects; initiated and/or completed

- o Town of Taos Green Infrastructure Plan 7/31/07 2/28/08 John Barney \$7,000
- New Mexico Department of Transportation: Context Sensitive Design for Scenic Byways in New Mexico. 1/22/08 - estimated completion 11/7/08 Alf Simon \$35,000

Major and/or Refereed Faculty Publications

Sorvig, Kim, Sustainable Landscape Construction: A Guide to Green Building Outdoors, Second Edition, Island Press (Wash DC) released late 2007 (has already sold out first printing).

Honors and Awards

Faculty Honors (University, National, or Regional)

None

Major Student Honors/Recognition

Tori Johnson's Design for the International Chaumont sur Loire experimental garden design competition was accepted. The design was one of 26 accepted internationally.

Scholarship Recipients

Frontier Scholarship Susan Corban

New Mexico Graduate Scholars

Hammon Buck

Jessica Dunn

Christine Hice

Dominique Hinds

Maggie Ryan

Katya Yushmanova

Sam Burnett Ragineau

Teresa Harner

Joshua Johnson

Jennifer Oram

Allison Wait

Lisa Hodges

Fall 07:

Tom Pederson

Bernadette Miera

Spring 08:

Sharon Hausam

Jacobo Martinez Manjeet Tangri Ken Hughes Anita Miller John Slown

Summer 08: Ted Hodoba

Jacobo Martinez

Number of Degrees Awarded: Summer, Fall, and Spring

 Summer 07
 7

 Fall 07
 4

 Spring 08
 3

 Summer 08
 4

Enrollment & Admission Statistics

Number of Applicants Admitted (by degree, Fall, Spring)

MCRP (Fall '07) - 25

MCRP (Fall '08) - 24 (6 of these deferred)

BAEPD (Fall '07) – 9 BAEPD (Spring '08) - 8

Number of applications (by degree, Fall, Spring)

MCRP (Fall '07) - 42

MCRP (Fall '08) - 42

Number of Students enrolled by degree (Fall, Spring)

MCRP (Fall '07) - 61

MCRP (Spring '08) - 68

MCRP (Fall '08) - 62

BAEPD (Spring '08) - 45

Fall and Spring and Summer Student Credit Hours Generated

Summer 2007 - 127

Fall 2007 – 856

Spring 2008 – 958

Summer 2008 - 118

Fall and Spring Enrollment Headcount Count (by degree and year level)

MCRP

1. Fall 2007: 1st year <u>18</u> 2nd year <u>21</u> 3nd year + 29

BAEPD

2. Fall 2007: 1st 6 2nd 13 3rd 14 4th 12

Sponsored Projects

- o Ted Jojola (3, USAID; St. of NM)
- o Bill Fleming
 - Green roof, Pearl Hall, PI, McCune Foundation, 2007-2008, \$15,000
 - Mora forest thinning impacts, collaborator with Jose Rivera, Jicarita Enterprises and US Forest Service, 2006-2009.
- o José Rivera/Bill Fleming (USDA-Mora)
- o José Rivera
 - Proposal Submitted Pending Award Letter
 - Title: Socioeconomics and Acequia Systems Component/New Mexico EPSCoR RII3, Climate Change Impacts on New Mexico's Mountain Sources of Water
 - PI: Alexandar Fernald (NMSU), Component Team Leader; Jose Rivera (UNM), William Fleming (UNM), and Steve Guldan (NMSU), coprincipal investigators
 - Funding Source: National Science Foundation submitted by EPSCoR Director, William K. Michener (UNM)
 - Start and End Date: June 2008 requested for five year project ending May 2013 to support three total CRP graduate students in years 3, 4, and 5 at \$6,000 each under supervision of Professors Fleming and Rivera.
- o Claudia Isaac
 - "Workforce Housing Public Education Plan and Implementation" Claudia Isaac, City of Albuquerque, May – December 2007, \$75,000
 - USAID/TIES (co-PI's David Henkel & Claudia Isaac). August 2003 October 2007 (final year, no cost extension), total grant \$188,000.
- o Ric Richardson:
 - Our Communities Our Future; New Mexico Toolkit for Community Growth and Sustainability, Co-PI with Mark Childs. Funding from the New Mexico Department of Finance and Administration. Began Sept 2006 End July 2008

Faculty Publications

- o Claudia Isaac
 - Claudia Isaac. "Review of <u>Jobs and Economic Development in Minority</u> Communities", Economic Development Quarterly, Nov 2007; 21 (4).

- Claudia Isaac. "Perceptions of Workforce Housing in Albuquerque: Implications for Housing Policy", with Micaela Cadena, Jerusha Daniels, Kate Hildebrand, Steve Lucero, Kileen Mitchell, and Nicole Sanchez-Howell for the City of Albuquerque, Workforce Housing Public Education Plan and Implementation, December 2007.
- Claudia Isaac (with Micaela Cadena, Tim Castillo, Jerusha Daniels, Edwina Dubois, Jennifer Jackson, Steven Lucero, Mayra Madriz, Kileen Mitchell, Michael Montoya, Chris Nolan, Ruji Rajbhandari, Andres Ranieri, Christopher Ramirez, Nicole Sanchez-Howell, and Aaron Sussman). "Albuquerque's Workforce Housing Opportunity Act", DVD for the City of Albuquerque, Workforce Housing Public Education Plan and Implementation, September 2007. Viewable at www.youtube.com (search Workforce Housing Albuquerque).
- Claudia Isaac (with Nichole Sanchez-Howell and Aaron Sussman),
 Worlforce Housing Public Education Project Factsheets. Workforce
 Housing Public Education Plan and Implementation, the City of
 Albuquerque, September, 2007:
 - "The Workforce Housing Opportunity Act";
 - "Community Impacts of Affordable Housing"
 - "Housing Conditions in Albuquerque"
 - "Who Qualifies?"
 - "Community Concerns"

o José Rivera

- Book manuscript: La Cultura de la Acequia, book translation of 1998 edition, Acequia Culture, forthcoming by the University of Valencia Press, Valencia, Spain.
- Chapter in progress: "The Historical Role of Acequias and Agriculture in New Mexico," Chapter IX of New Mexico Water Policy and Management Issues: Science, Modeling, Institutions and the Future, David S. Brookshire, Hoshin Gupta, and Olen Paul Matthews, eds., book proposal for publication in the Resources for the Future Book Series, Issues in Water Resources Policy.
- Book in progress: SPMDTU: Guardians of Hispanic Culture in the Upper Rio Grande, for submission to the University of New Mexico Press.
- Bill Fleming
 - Community forestry and watershed conservation in Nepal, Waterlines
- o Ric Richardson
 - Housing Opportunities for all New Mexicans with Lisa Roach and Kathryn Hildebrand, April 2008.
 - Our Communities Our Future; New Mexico Toolkit for Community Growth and Sustainability, Co-editor with Mark Childs of the five booklet series.

Honors and Awards

- o Faculty Honors (University, National, or Regional)
 - Claudia Isaac: Regent's Lecturer (final year)
 - Bill Fleming: UNM University Libraries Faculty Acknowledgment Award
 - Ric Richardson: University of New Mexico Libraries Faculty Acknowledgement Award, October 2008.
- o Major Student Honors/Recognition (National/Regional)
 - Mary Deschene awarded USDA Rural Business Opportunity Grant for project work in Doña Ana
 - Victoria Hirschberg wrote successful grant application for the NM chapter of APA
- Scholarship Recipients (Program and School)
 - NM Graduate Scholars
 - Gepetta Billie
 - Micaela Cadena
 - Nubia Collaros
 - Adela Flores Ogden
 - · Gretel Follingstad
 - Simental Francisco
 - Anne Oandasan
 - Jennifer Silverman
 - Izaac Tajan
 - Beatice Watchman
 - Sarah Wentzel-Fisher
 - Center for Regional Studies Fellowship Ramoncita Martinez
 - UNM Library SW Studies Fellowship Sarah Wentzel-Fisher
 - NM Graduate Studies/HED Moanna Wright
 - Frontier/Golden Pride Scholarship Ramoncita Martinez
 - Charna E. Staten CRP Scholarship Yolynda Begay & Moneka Stevens

School of Architecture and Planning Architecture Program Annual Report: July 1, 2007 – June 30, 2008 Submitted by: Geraldine Forbes Isais, Director

Major Activities, Initiatives, International Programs, and Curriculum Changes

- In conjunction with Albuquerque Public Schools (APS), the Architecture Program, held its first two-week "Career Discovery In Design" workshop for 25 junior and senior high school students interested in architecture and design. This course was funded by APS (\$12,500), developed by Prof. Anne Taylor and taught by Dr. Taylor and two other architecture faculty. The APS coordinator for the project was, Cardinal Reiger.
- A collaboration between the Landscape Architecture and Architecture Programs resulted
 in the first ever "Studio Zero" a two-week summer preparation course for newly admitted
 graduate students. This studio was developed and taught by both an architecture and
 landscape architecture faculty.
- The Architecture Program supported numerous national faculty-directed student study tours. Students traveled to Chicago, San Francisco, Los Angeles, Phoenix, and Marfa Texas as well as locally within New Mexico.
- The Architecture Program admitted its second cohort of 12 freshman to its Early Admissions Program. The Architecture Program is currently supporting a "Learning Community" course entitled "FAME", Freshman Architecture Major Entrants.

Faculty Changes

- Assistant Professor Tim Castillo was granted and promoted to the rank of Associate Professor.
- Visiting Assistant Professor Kima Wakefield received a second-year appointment to her position, thus filling the gap left by Prof. Andrew Pressman's retirement.
- Both Assoc. Prof. Kuppuswamy Iyengar and Stephen Dent were granted and took a onesemester sabbatical leave.

Staff Change

There were no staff changes in 2007-08.

Critics and Guest Lecturers

Christopher Kilbridge, University of Oregon
Rick Joy, Rick Joy Architects
Krystine Graziano-Hample, Antoine Predock Architects
Devendra Contractor, Architect
Wendell Burnette, Wendell Burnette Architects
Garrett Smith, Garrett Smith Architects
Jonathan Seigel, Architect
Bill Sabatini, Dekker, Perich, Sabatini Architects
Richard Jenson, Will Bruder + Partners
Will Bruder, Will Bruder + Partners
Bart Prince, Architect
Mike Krupnick, Krupnick Studios
Chris Callott, Infill Solutions
Karen Alarid, Architecte, APS Facilities Director

Number of Degrees Awarded

Bachelor of Arts	<u>ın Architecture</u>
Summer 2007	02
Fall 2007	06
Spring 2008	21

Master of Architecture

Summer 2007	06
Fall 2007	14
Spring 2008	08

Enrollment & Admission Statistics

Bachelor of Arts in Architecture - 2007-08

Number of applicants admitted	48
Number of applications	86
Number of students enrolled	48
Enrollment headcount	142
Total BAA	142

Master of Architecture - 2007-08	
Number of applicants admitted	32
Number of applications, fall	94
Number of students enrolled	30
Enrollment headcount (total)	104
Total MARCH	104

Sponsored Projects

Prof. Geraldine Forbes Isais & Assoc. Prof. Tim Castillo (Co-PI's)
 -Virtual Embudo Project Phase III,
 Funding source: Center for Regional Studies, Development
 Funding amount: \$68,000

Assoc. Prof. Tim Castillo
 Waterworks Master Plan Study
 Funding Source: Town of Silver City
 Funding Amount: \$7,100

Assoc. Prof. Tim Castillo & Jacobo Martinez (Co-PI's)
 Atrisco Sector Plan Study
 Funding Source: Bernalillo County

Funding Amount: \$40,000

Associate Professor Stephen Dent
Bridging the Gap – Educating the Intern
Funding Source: National Council of Architectural Registration Boards

Funding Amount: \$5,000

Assoc. Prof. Geoffrey Adams & Gabriella Gutierrez (Co-PI's)
 School-based Healthcare Centers in Rural New Mexico – Phase II
 Funding Source: Center for Regional Studies
 Funding Amount: \$7,337

Prof. Eleni Bastea

"Venice: Images of the City, Images of the Mind: An illustrated literary exhibit" Funding Source: UNM Research Allocation Committee Funding Amount: \$4,000

Prof. Eleni Bastea

Native American Architectural History: A photographic record Funding Source: UNM Teaching Allocation Committee Funding Amount: \$4.348.89

Faculty Publications

- Karen J. King with Rebecca Ingram "Inclusive Design," chapter 13, Architectural Graphic Standards, 11th Edition, The American Institute of Architecture, Bruce Bassler, editor, John Wiley & sons, Inc., March 2008.
- Stephen Dent with Torkil Olsen, "Solbakken: Follow-up on System Performance", New Mexico Solar Energy Society's Solar Fiesta, Albuquerque, September, 2007.
- Stephen Dent, "Innovative Household Solar System Produces a net Positive Enery Cost" in proceedings of the American Solar Energy Society, Conference, San Diego, May 2007.
- Tim Castillo with Troy Lovato, Border Fluidity: Emergence on the New Frontier, chapter in Fluctuating Borders: Speculations about memory and Emergence, Royal Melbourne Institute of Technology, 2007.
- Tim Castillo, "Exploring Methodologies Digital Mutation in Fabrication, Form Z Joint Study Program Report, Cleveland OH, 2008.
- Geoffrey Adams, graphic consultant and contributor of content "Inclusive Design", chapter 13, Architectural Graphic Standards, 11th Edition, The American Institute of Architects, Andrew pressman, editor, Wiley and Sons, 2007.
- Mark Childs, "Parking Lots" in Architectural Graphic Standards, Eleventh Edition, A. Pressman, editor, Wiley and Sons, 2007.
- Mark Childs, "Storytelling and Urban Design, V1, N2, 2008.
- Mark Childs, The Shapes of Transportation, New Mexico Department of Finance and Administration, 2007.
- Eleni Bastea, "Athens. 1834-1896: Neoclassical City Planning and Greek National Consciousness", in Greek translated by Eleni Bastea. (Libro publishers, Athens Greece, 2008); 446 pp. ISBN 978-960-490-084-6
- Eleni Bastea, "Looking at Frank Gehry Upside-Down". Cent Magazine, UK, Spring/Summer 2008, pp 66-69. Photography E. Bastea and M. Forte.

Faculty Creative Work

 Stephen Dent with Richard Nordhaus, Stephens Residence, 3,000 SF, passive solar design, water harvesting, elevator accessibility, 2007.

Exhibits

 Geoff Adams and Karen King, "the HOME House Project" exhibited as follows: New York School of Interior Design, New York, Feb. 1 – April 21, 2007. Yellowstone Art Museum, Billings, Montana, March 22 – June 14, 2007.

Honors and Awards

- Tim Castillo, Promoted to associate professor with tenure, UNM, SA+P, 2008.
- Mark Childs, Member, CIES (Fulbright) Architecture and City planning Peer Review Committee, 2007.
- Stephen Dent, New Mexico Board of Examiners for Architects, appointed by Gov. Richardson.
- Stephen Dent, Member, Albuquerque Energy Council, appointed by Mayor Martin Chavez.
- Geraldine Forbes Isais, AIA Albuquerque Awards Design Chair, 2007-08.
- Geraldine Forbes Isais, National Endowment for the Arts, Design Review Committee, 2008.

Student Scholarships and Recipients

Stadent Scholarships and Recipients	
Award	Recipient
AIA National Scholarships Gold Medal (Design Excellence) Silver Certificate (Design Excellence) Alpha Rho Chi (Service)	Noreen Richards Ana Petkovic Kristen Schulte
AIA Santa Fe	William Powell
AIA Santa Fe/Bradley Kidder	Ken Marold
AIA Albuquerque - Undergrad	John White
AIA Albuquerque Grad	Cesar Cruz
Kevin Ryan Scholarship	Miles Cook
Westwork Architects	Louvenia McGee
M. Smilovits Memorial Scholarship	Keri Stevenson
Charles and Katherine Brown	Sandra Clough
New Mexico Graduate Scholars	Steve Kramer Emily Stout Holly Strachen
Antoine Predock Scholarship	Xinyao Qin
Maureen Walter Scholarship	Caroline Itoi

Kosanovich Scholarship

Laura Sorenson Xinyao Qin

New Mexico Graduate Scholars

John Dillander Krysten gardner

Oswaldo Olvera Jeremy Sanchez

Susan Spencer Francisco Uvina School of Architecture & Planning Historic Preservation and Regionalism Program Annual Report: July 1, 2007 – June 30, 2008 Submitted by: Prof. Chris Wilson, Director

Major Activities, Initiatives, International Programs, and Curriculum Changes

Under Director Chris Wilson, the HPR Graduate Certificate program continued with an average contingent of twenty-two students during the year. Five students received the Graduate Certificate during the year, and ten new students were admitted to the program. At the end of this fiscal year, a total of twenty-three students were on the books in the program, although five have actually left the state, or completed their degrees and have taken full time jobs. (We are working to try to formally identify students who have left the program.) While the individual half-time Administrative Assistants for the program have worked diligently, the fact that the position was held by one permanent, and two temporary employees, and was vacant part of the year interfered with program administrative continuity.

The program's two required courses, and set of electives coordinated with the School's three degree-granting program, were augmented again this year by the three courses of the 2008 Southwest Summer Institute for Preservation and Regionalism. Chris Wilson prepared the successful funding proposal, and coordinated this program with Program specialist, Meghan Bayer, a recent graduate of the HPR program.

The HPR program continues as a member in the National Council of Preservation Educators, the closest to an accreting body for preservation programs. A contingent of students and faculty again attended the annual New Mexico Heritage Preservation Alliance conference, this year in Taos.

In February, Pearl Fellow Douglas Kelbaugh directed a one day design workshop. The 23 UNM students, 5 faculty and one urban designer from the community who participated, produced a study: UNM Edge -- An Urban Design Workshop. Students in the fall Historic Research core course taught by Chris Wilson produced a 160-page study: Pedestrians, Streetcars and Courtyard Housing: Past and Future Albuquerquers. Preparation of the manuscript Center Places: the Plazas of New Mexico, a research project of the HPR program, entered its final stages during the year (and was submitted August 3, 2008 to Trinity University Press, San Antonio).

Faculty Changes

No changes.

Staff Changes

Admin Assistant III Nina Simbaña left UNM early in 2008, followed by temporary employees, Elizabeth Lovato, and, Geneva Becenti.

Visiting and Part-Time Faculty, Critics, and Guest Lecturers

Part Time Faculty:

Arnold Valdez (3 courses), Daniel Carey, Jean Fulton, Jan Biella,

Guest Lecturers:

Katherine Slick, Director, NM Historic Preservation Division, Pearl Fellow Douglas Kelbaugh, University of Michigan, Pearl Fellow Chris Calott, Infill Solutions, Albuquerque Eric Delony, former Chief, Historic American Engineering Record Christopher Marston, Historic American Building Survey, Washington D.C. Pat Taylor, Cornerstones Community Partnerships, Mesilla Michael Taylor, Route 66 Heritage Coordinator, NPS John Fowler, Director, President's Advisory Council on Historic Preservation

Number of Graduate Certificates Awarded

Fall 2007 0 Spring 2008 5

Enrollment & Admission Statistics

- o Number of Applicants Admitted: (GCert, Fall 6, Spring 4)
- o Number of applications: (GCert, Fall 6, Spring 4),
- o Number of Students enrolled by degree: (GCert: Fall 21, Spring 25)
- Fall, Spring and Summer Student Credit Hours Generated: (Courses listed with the school's 3 degree-granting programs: Fall 120 hours, Spring 108 hours, Summer, 117 hours.)
- o Fall and Spring Enrollment Headcount Count: (Fall 21, Spring 25)

Sponsored Projects

Summer Preservation & Regionalism Institute, Chris Wilson, Special Programs, UNM Academic Affairs, 1/1/08 – 08/30/08, \$15,000.

Faculty Publications

None.

Honors and Awards

- o Faculty Honorsz: None
- o Major Student Honors/Recognition: None
- Scholarship Recipients:
 New Mexico Heritage Scholarships: Berenika Byszewski, Tiffany Berger, Sharon Karpinski,
 - 2) Albuquerque DAR Scholarship: Holly Strachan

School of Architecture and Planning Town Design Graduate Certificate Program Annual Report: July 1, 2007 – June 30, 2008 Submitted by: Prof. Mark Childs, Director

Major Activities, Initiatives, International Programs, and Curriculum Changes

Revisions to curriculum to clarify learning objectives.

Faculty Changes

None.

Staff Changes

None.

Visiting and Part-Time Faculty, Critics, and Guest Lecturers

Fall 07 Guests:

Levi Romero, Poet

Attila Bality, National Parks Service
Matt Schmader, Albuquerque Open Space Director
Yasmeen Najmi, MRGCD
Laurie Moye, PNM
Tony Sylvester, MR COG
Tom Menicucci, Abq. Council Staff
Diane Scena, MRCOG
Phyllis Taylor, Principle Sites Southwest
Basim Hakim, Scholar
Spring 08:
Miguel Gandert, UNM Faculty
Lisa Lenard-Cook, Author

Ed Fitzgerald, Architect Sheri Brueggemann, Abq. Public Art Program Director

Number of Degrees Awarded Summer, Fall, and Spring

Spring 2

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Appendix 1. By-Laws of the College

I. OVERVIEW

The College of Arts and Sciences is the oldest College at the University of New Mexico. Its mission is to provide a broad-based education in the natural sciences, the social sciences, and humanities that transforms lives and shapes futures. Faculty in the College create and disseminate new knowledge, foster and support scholars and researchers, educate the next generation of professionals and public servants, and develop engaged, cross-culturally literate citizens. Given its breadth, the College fulfills a unique mission in the University in that its departments and programs not only provide the knowledge that is fundamental to the intellectual and educational activities across the entire campus, they also integrate and contextualize that knowledge in ways that connect students to the past and prepare them for the future.

The College of Arts and Sciences is not only the oldest College but it is also the largest College at the University of New Mexico. In 2007-08 it had 390 tenure-stream faculty, 47 lecturers, 89 research professors, about 300 part-time instructors, 13 visiting faculty members, 618 graduate students who teach, and 408 graduate assistants (units and research). The College is composed of 20 academic departments, 11 research centers and institutes and 4 museums. In addition, 8 interdisciplinary programs provide courses and degree programs to a wide variety of students. Faculty members and instructors served not only students who majored in a degree program within the College but they also taught approximately 75% of the core curriculum courses offered at UNM.

During the 2007-2008 academic year, the College of Arts and Sciences continued its tradition of excellence in scholarship, teaching, and service. The College excelled in scholarship during the year. Three hundred and sixty-six new, or renewal, awards were made with a value of almost \$40 million in research funding. Among the research Centers and Institutes in the College, the Center for Advanced Studies (Physics), the Center for Research in Ecological

Studies and Technology (Biology) and the Earth Data Analysis Center (Earth and Planetary Sciences/Geography) each brought in well over \$1 million in new awards. The Institute for Social Research (Sociology) and the Office of Contract Archeology (Anthropology), were both awarded over \$2.5 million in new research and contract funding. These Centers provide highly valued services to the State of New Mexico while supporting many graduate students and research publications. The Long Term Ecological Research (LTER) office and Sevilleta projects within the Biology Department were both awarded multi-million dollar grants during FY08, as was the Center for Evolutionary and Theoretical Immunology. Many of the new awards made to College units (including Biology, Chemistry and Mathematics) were to support graduate education, and some specifically aimed at increasing the participation of under-represented groups in the sciences. Every one of the hundreds of research grants awarded to College faculty support research publications and the educational mission of the University, providing equipment and stipends for the next generation of researchers and faculty to the State, the nation and the world.

In the area of teaching, the College generated a total of 350,385 unrestricted student credit hours (SCH), the most of any college or school in the University by far. Across 20 departments and 2 study programs, the Department of Mathematics & Statistics led the way with 44,133 SCH, followed by English (34,253), Psychology (30,472), Biology (26,404), and Sociology (21,952). The quality of the teaching in the College continued on its path of high excellence. Faculty members in the College were recognized for their teaching excellence with University awards and College awards. The Presidential Teaching Fellowship, the highest teaching honor at UNM, was awarded to an English Professor. Another of our faculty was awarded the Teacher of the Year Award. The College recognized 3 Faculty and 2 Teaching

Assistants with its own Teaching Excellence Awards. As part of the College's goal of advancing faculty development, 3 special meetings for newly hired faculty members were hosted during the year. An opening social reception was held at the start of the fall semester, followed by 2 other meetings in order to discuss the concerns and issues that may have arisen among the new faculty members in the College, including the important questions of appropriate teaching loads.

The College also continued its extensive commitments to community service in 2007-08. In a very general sense, the challenge for large universities like UNM lies in establishing pipelines to introduce K-12 students to higher education in part to get young people to believe in higher education and realize that college can be a real option to them after high school. Such programs in the College are carried out in the Departments of Mathematics & Statistics, Biology, and English, as well as the Africana Studies Program. College museum programs, including the Maxwell Museum and the Museum of Southwestern organize service activities, exhibits, docent training, special invitations to the public schools, and archaeological tours for students and older audiences. The Sustainability Studies Programs partners with outside organizations to sponsor various kinds of sustainability activities in the area of sustainable agriculture. The Peace Studies Program sponsored a major Peace Studies Fair with extensive involvement of community non-profit organizations. Finally, clinical services to students and the outside community were provided throughout the year in the Departments of Psychology, Speech & Hearing, as well as Agora.

The College leadership changed in 2007. Professor Brenda Claiborne was appointed

Dean on August 1, 2007, replacing Interim Dean Vera Norwood, and Professor Mark Ondrias

was appointed Senior Associate Dean. The Dean and the Associate Deans, with input from the

Chairs and Directors, established a set of goals for the College that focused on improving student

success, increasing faculty diversity, enhancing excellence in scholarship, improving opportunities for students to study abroad, increasing private donations, and building a leadership team within the College. A number of objectives were established under each goal. As part of improving student success, the College placed a priority on one particular objective: expanding participation in outcomes assessment activities for courses and programs. The College made significant progress in meeting this objective as well as the majority of the objectives under each goal.

As the year progressed, budget projections indicated that the number of faculty planning to retire or resign from UNM at the end of 2007-2008 was significantly less than the 3-year average. Because the College is dependent on "salary savings" from retirements and resignations to fund part-time instructors and a portion of its complement of teaching assistants, projections indicated a potential deficit of over \$1 million dollars for FY09. Thus the Dean and the leadership team in the College spent a considerable amount of time communicating with the upper administration about this possible problem and making detailed plans to reduce spending for the 2008-2009 academic year.

In the Spring of 2008, the College and all units within the College revised their strategic plans. The revised plan for the College incorporated the goals noted above, along with updated objectives. While all of the objectives are important for the 2008-2009 academic year, the Dean's office and the College plan to place the highest priority on ensuring that all departments have established outcome assessment plans in place by January 2009 and that at least some instructors and degree programs have used the assessment data to improve course delivery and degree program planning. Not only are these activities required by UNM policy but University's

progress in this arena will be subjected to scrutiny by the Higher Learning Commission team at the reaccreditation site visit scheduled for Spring 2009.

II. ADMINISTRATION

Interim Dean Vera Norwood extended her term through July 31, 2007 and then Brenda J. Claiborne took her post as the permanent Dean on August 1, 2007. Jane Slaughter also remained as Senior Associate Dean for Faculty until August 1, 2007, at which time, Phillip Gonzales, Professor of Sociology, became the Associate Dean for Faculty in the College, assuming those responsibilities. These responsibilities included organizing and advising the College tenure and promotion review committees (see Table 2), meeting with faculty coming up for reviews, consulting with department chairs on faculty progress through the ranks, and reviewing and making recommendations to the Dean on all tenure, promotion and mid-probationary reviews. He also advised the dean and chairs on policies and practices related to annual reviews and posttenure reviews of faculty. He supervised the directors of the College's centers and institutes during the Fall Semester of 2007. In Spring 2008, the responsibility of supervising center and institute directors was shifted over to the Associate Dean for Instruction and Curriculum. Gonzales also served as the College Hiring Officer, with oversight of search, recruitment and selection efforts associated with the appointment of new faculty in the College (see Table 3 for results of these activities). He convened and served on the College Sabbatical Review Committee. Thirty applications for sabbatical were approved this year. Gonzales also oversaw the reviews and awards of Research Semester requests, which provides Junior Faculty with a semester release from teaching responsibilities. Seven assistant professors took research semesters in fall 2007 and five in spring 2008.

Gonzales also administered the College's Faculty Development Fund (see Table 4), which is funded with \$30,000 from the Office of the Vice President for Research and Economic Development, and \$15,000 from the Dean. That program provided funding for conferences on subjects ranging from "Archimedes Revealed," to the "Tenth Annual New Mexico Analysis Seminar" to public events for Black History Month.

From the previous year, the College continued discussions with various faculty members of ways to encourage student travel abroad programming, and helped make international experience a regular and sustained part of faculty and student life. In another development, Associate Dean Gonzales took over the liaison from departing faculty member Alejandro Aceves with the NSF NM-PAID Advance Grant headquartered at New Mexico State. As part of this effort, he attended the summer chair's workshop at an Elephant Butte conference site, which involved heads of departments at New Mexico State, New Mexico Tech, and Los Alamos National Laboratory.

Gonzales engaged individual faculty members in discussions on their retirements and he participated in the process of constructing counter offers to faculty members who were offered positions at other universities. Also, Mike Dougher, continued as the Associate Dean for Research and Mark Ondrias as the Associate Dean for Curriculum and Instruction. Dr. Ondrias took on additional duties and was named the Senior Associate Dean.

III. RECENT SIGNIFICANT DEVELOPMENTS IN THE COLLEGE

Three departments and/or centers in the College underwent successful accreditation reviews: Communications and Journalism, Clinical Psychology, and the Department of Speech and Hearing Sciences. Five departments underwent Academic Program Review this year:

Biology, Geography, Linguistics, Psychology, and Spanish/ Portuguese. The Department of Biology had three major capital events: a fall ribbon-cutting ceremony to open the renovated 24,000 square-foot teaching complex in Castetter Hall; the start of construction of the 12,000 square-foot Phase I addition to southwest side of Castetter Hall; and, the acquisition of \$2.7 million in legislative monies for Phase II of the Castetter project. In addition, a \$16 million bond was passed for the planned Mathematics and Science Learning Center.

A major focus of the College was on the priority goals and associated objectives that Dean Claiborne and the leadership team established in the Fall 2007 semester (see Overview section above). Four additional issues assumed critical importance over the course of the year which required action within the College.

First, based on Dean Claiborne's service on the UNM Steering Committee for Accreditation, and as Chair of the Criterion III subcommittee, it became obvious that much work needed to be done to prepare a realistic report to the Higher Learning Commission, particularly on assessment and learning outcomes in the College of Arts and Sciences. Thus, she hired a special assistant for assessment in the Dean's office to assist with university-wide activities, directed the Associate Dean for Curriculum and Instruction to make assessment his top priority, and directed the chairs to work quickly with their faculty to meet university-wide goals. The College made significant progress putting assessment plans in place and are beginning to use assessment data to affect course and curricula planning within the College.

Second, in January, 2008, the College of Arts and Sciences faced the daunting prospect of a projected deficit at the end of June, 2009, calling for prompt measures to be taken to adjust the FY 09 budget. Thus, a great deal of College time and energy was spent on budgetary issues. The Dean and her staff worked diligently to determine the cause of the projected deficit: she

worked with the chairs and directors to implement a 2% budget cut across the board in the College. Because the bulk of cuts would have to come from the PTI budget, she worked with the departmental chairs to limit the number of sections to cut and to ensure that tenure-track faculty members were able to teach critical sections. In addition, she directed the chairs to conduct a detailed analysis of teaching loads in their departments. As a follow-up to this report, the Dean's office will be working with the chairs over the course of the next year to develop criteria for scholarly productivity in each discipline, as well as reasonable teaching loads for all faculty in the College. Unfortunately, the demands of the budget short-fall in the College required that four searches for faculty and lecturers that were underway in three departments be cancelled. The College will develop a plan to recoup these losses as soon as possible.

Third, Dean Claiborne was asked by the HED to help develop a proposal for planning a Professional Science Master's degree in New Mexico. Such a degree would offer graduate training aimed at preparing students for the workplace, and planning efforts would take into account employers needs. The proposal was endorsed by the Governor, and submitted to the National Governor's Association. The College was notified that the proposal was funded, and she will be engaged with others in the New Mexico group to begin a state-wide planning effort.

Fourth, there were a number of procedural issues that needed to be addressed by the Dean's office. For example, the Dean and the Associate Dean for Faculty worked with Legal Counsel to standardize offer letters to new faculty in the College – all letters are now unambiguous. The flow of documents through the Dean's office has also been standardized to ensure the required oversight regarding the personnel and budget implications of requests. As another example, the Deans' office is in the process of developing additional web-based tools for

use by departments in reporting and planning. These will become invaluable as the College moves toward performance-based budgeting.

IV. AFFIRMATIVE ACTION

The College continued its efforts to increase the cultural and gender diversity among its faculty during the 2007-08 academic year. In line with the Regents' policy concerning diversification of search committee membership, all departmental search committees included minority and female members and all searches disseminated their ads in outlets designed to reach diverse pools of potential applicants.

Appointments resulting from searches conducted during AY 2007-08 added seventeen new tenure-track and tenured faculty members. Ten of these were female, three Hispanic, four Asian, and one African American. The College considers these substantial numbers and is pleased to have been so successful in expanding the gender and cultural diversity of College faculty.

During AY 2007-08, the College made a special effort to raise the level of its faculty salaries, setting the salaries in its hiring plan based on averages from a set of UNM's institutional peers as taken from a study by the Office of Institutional Research. The effect of this across-the-board action helped address equity within the faculty salary structure for members of the underrepresented groups who were hired. In addition, the College supported Prof. Julie Shigekuni's successful request to the Provost to increase her salary by \$5000 based on minority equity grounds. In the year ahead the College will continue existing programs for faculty development, and consider new initiatives, particularly special requests for targeted faculty hires. In addition, working with the new Vice President for Equity and Inclusion, Dr. Josephine de

León and the Title V Grant to HSIs the College will pursue ways to leverage funds to support diversity hires.

V. RESEARCH AND SCHOLARLY ACTIVITIES

The College of Arts and Sciences continues to be a top research performer among academic units at UNM in FY 2008 with 366 awards received and almost \$40 million in funds awarded, representing a growth of nearly 6% in number of awards and 22% in total value of awards over FY07. In FY 08, over 170 College faculty were awarded sponsored research grants, and the faculty as a whole produced hundreds of articles, books, chapters and edited books as well as presentations at professional meetings.

This growth in research is advantageous for three reasons. First, it permits our faculty to become more active through their leadership roles in their disciplines and their professional societies, which advances UNM's reputation as a major 'Research Extensive' University within the United States. Second, continued growth in funded research supports the next generation of researchers through direct support for graduate students and post-docs. These students not only support faculty research, they collaborate on publications and often teach important classes in College departments. Third, higher sponsored research at UNM generates an influx of mostly Federal money to New Mexico that would otherwise not be available to UNM or the State. While most of the external sponsored research funding within the College of Arts and Sciences is received in the 'Natural Sciences' (Biology, Physics and Astronomy, Chemistry, Earth and Planetary Sciences) and Mathematics, the College has received far more than the national norms of funding for our efforts in Psychology and the Social Sciences.

In order to expand and leverage this impressive research growth, the Associate Dean for

Research works closely with College Faculty, Research Center Directors, the Dean and the College Grants Specialist (Elly Van Mil) to achieve important goals including expanding opportunities for student research training support.

Grant Proposals Submitted, Awarded, Rejected. During this year, Elly Van Mill, the Grants Specialist assisted with preparing and submitting 23 proposals (plus 12 UNM preproposals—all selected) totaling \$18,172,386 in possible funding. To date 4 proposals were awarded totaling \$3,946,013, and 6 proposals are pending amounting to \$7,774,908.

Program Proposals	Date	Funds	Awards	Pending
· -	Submitted	Requested		
NSF Research in Disabilities Education - Horse CAMP – Paul Polechla	2/12/2007	\$298,053		
NSF PAESMEM - Mary Ann Nelson	3/6/2007	\$10,000		
NSF URM UNO - Cook/ Gannon – Preproposal and Proposal to NSF	3/6/2007, rev.7/27/2007	\$999,984	\$1,010,000	
NSF Informal Science Ed Planning Grant – P.Polechla	3/8/2007	\$75,000		
NSF Ethics Education in Science & Engineering- changed to 1—yr pilot program - Mary Domski, Chuck Fleddermann	4/6/2007, 7/15/2007	\$298,563	\$100,000	
InPsych - IHS - Steve Verney, Camilla Venner	5/4/2007	\$725,206		
NIH Biology Animal Facility Improvement Program – Kevin O'Hair, Sam Loker	5/21/2007	\$500,000		\$500,000
NSF LTER REU Site - Scott Collins & Les McFadden	9/18/2007	\$267,465	\$267,465	
Ford Foundation LOI - Alok Bohara Nepal Study Center	9/24/2007	\$300,000		
NSF Creative IT Tom Caudell & Jack Ox – Fine Arts and A&S faculty	9/18/2007	\$224,907		
NIH R21 - NIH - Steve Gangestad	10/2/2007	\$227,000		
DH Lawrence Ranch - Federal Priorities Request	10/29/2007	\$1,400,000		
CEMRRAT Grant - APA - Steve Verney and Kamilia Venner	1/7/2008	\$9,562		
PREP Renewal - NIH - Richard Cripps	1/21/2008	\$1,500,000		\$1,500,000
IMSD - NIH - Maggie Werner-Washburne	2/21/2008	\$2,568,548	\$2,568,548	
Summer Seminar (in India)- NEH - Feroza Jussawalia	2/27/2008	\$135,000		
IGERT Campus Preproposal	3/3/2008			
IGERT NSF Preproposal	4/5/2008	Invited to submit		

NIH Animal Resource Improvement	5/22/2008	\$500,000		\$500,000
Program			1	
Title V Collaborative Program	6/25/2008	\$525,772		
Title V Institutional Program	6/25/2008	\$2,282,418		
NSF Informal Science Education Planning	6/19/2008	\$75,000		\$75,000
Grant				
CGS Peterson's Project for Scholarly	7/30/2008	\$50,000		
Integrity				l
Bridges to the Baccalaureate	9/18/2008	\$2,400,000		\$2,400,000
MSB IGERT - Preproposal and Full	10/20/2008	\$2,799,908		\$2,799,908
Proposal				l
TOTALS		\$18,172,386	\$3,946,013	\$7,774,908

This is included in the record of the past 4 ½ years, which amounts to 53 proposals that were submitted for funding requests that total \$61,540,100; 14 were funded with awards totaling \$34,854,513, and 6 are currently pending, with funding requests amounting to \$7,774,908.

Through the efforts of all those in the College office, many additional support services were provided to the faculty and graduate students in the 20 Departments, 8 Programs and research centers in the College.

Scholarly Productivity. While research grants and awards are certainly an important metric, the College's scholarly productivity in 2008 as measured by peer-reviewed articles, books, and other scholarly works continued to be very impressive. While it is difficult to provide exact counts across the vast array of disciplines and programs included in the College of Arts and Sciences, a conservative estimate of all articles, books, chapters and edited volumes produced in 2008 would exceed 1,000. At least twice this number of presentations of work and results at professional meetings occurred. One of the proclaimed advantages of a research university is that its students are afforded opportunities to participate in research as part of their educational experience, and that is clearly true in the College of Arts and Sciences, where the vast majority of published articles were coauthored with students. In addition, faculty in the College are extremely active in supervising undergraduate honors theses, and more than 1000 undergraduates

were involved in faculty sponsored research projects last year. Moreover, there were several programs in the College last year specifically intended to get undergraduates, particularly under represented students, involved in research. Those continuing programs include the Alliance for Minority Participation (NSF, Laura Crossey, PI), Initiatives to Maximize Student Diversity (NIH, Maggie Werner-Washburne, PI), Minority Access to Research Careers (NIH, Mary Anne Nelson, PI), Post-baccalaureate Research Education Program (NIH, David Keller, PI), and Undergraduate Nurturing Opportunities (NSF, Joe Cook, PI).

Initiatives to Improve the Research Climate. The Associate Dean for Research continued the work of previous years, along with other Associated Deans for Research to complete, distribute and promote the findings of the Research Study Group, reviewing the sponsored research process at the University. This last year saw the beginnings of a complete overhaul of the Office of Vice President for Research and Economic Development, with substantial and significant consequences for the College research office and researchers.

The College of Arts and Sciences will continue to be a major participant in this rapidly growing research mission of UNM through our representation on the Executive Research Advisory Council, formed as a result of the review of the research office. The College research office works to enhance the economic competitiveness of New Mexico, and most importantly to expand our faculty and student involvement in our research mission. The key to our past and future success rests in the professional dedication and motivation of our faculty to seek additional research opportunities as they build upon existing research strengths.

VI. CURRICULUM, TEACHING AND ENROLLMENT MANAGEMENT

Summary data on the various aspects of the College's teaching efforts are presented in Tables 8 and 9, reporting the total number of degrees awarded and degrees awarded by department. The decade-long increase in SCH for the College continued to be especially significant because an ever-increasing fraction of the College's teaching load is being borne by part-time instructors and graduate students. The total budget for part-time instruction in the College this year was \$4.4M (both A&S and external funding).

The College continued its highly successful Interdepartmental Teaching Assistant Program. This program allows Arts and Science departments with insufficient TA budgets to serve their graduate students by referring qualified students to departments that have sufficient support but not enough graduate students to meet their instructional needs. During the 2007-08, the program funded 22 TA lines (13 in English, 7 in Spanish & Portuguese, 1 in Mathematics & Statistics, and 1 in Foreign Languages & Literatures).

Curriculum Development

Arts and Sciences also played an active role in promoting the use of new pedagogies in the classroom. The College helped fund day-long symposia and workshops concerning the use of technology in large courses and the establishment of a "Writing Across the Curriculum" program. Funding was also provided for an expansion of the Supplemental Instruction (SI) program administered by the Center for Academic Program Support (CAPS). The number of SI sections offered for Physics, Chemistry and Political Science courses was increased substantially in collaboration with the UNM Title V Program. The College actively encouraged the creation of on-line offerings by providing additional funding for coordination, technical resources, and instructor compensations for on-line programs. The English department was particularly active in

this regard, offering a substantial portion of its Technical and Creative Writing courses (219 and 220) as on-line sections.

Initiatives to improve success in gateway courses and, hence, graduation rates were continued in Math and English. Both departments received special funding from the Provost to develop a suite of new initiatives aimed at helping students through entry level courses. These included intersession workshops (for students that nearly passed English 101 or Math 120 courses but failed the written portfolio or final exam, respectively), second eight-week courses, and new hybrid or fully on-line course content. Initiated in 2006-2007, these innovations were implemented this academic year with good success.

In addition to the expansion and improvement of existing academic programs within the College, three degree programs that were launched in 2006–2007 began to flourish. Nanoscience and Microsystems (NSMS), Sustainability Studies, and the BA/MD programs continued to build their programs, admit students, and offer courses. All three programs have developed new and exciting curricula that are specially designed for a focused group of major. The BA/MD and NSMS programs are joint ventures requiring close collaborations with the Schools of Medicine and Engineering, respectively. The Sustainability Studies Program has begun innovative and timely projects to promote experiential learning, research, and service activities to implement practical solutions for a sustainable future for the bioregion, the Southwest, and the planet.

Enrollment Management Initiatives

In order to address ever increasing enrollment pressures in specific high demand courses, the College initiated an aggressive program of enrollment management. The College enthusiastically participated in the creation of intersession courses for both the Fall and Spring

semesters. The fall intersession was particularly successful. The College offered 30 courses from 12 departments and the majority of these courses filled to within 90% of capacity.

Summer Session

The 2007 Summer Session allocation to the College was \$870,000, an increase over the previous year. Much of the increase in funding was used to offer more high demand courses. In particular, collaboration with the Office of the Provost produced a viable plan to offer more high demand laboratory courses. In addition to a full range of on-campus courses for degree-seeking students, the College continued to support unique summer programs such as the intensive German Summer School in Taos, field schools in Anthropology and Geology, and the English Department's Summer in London program.

VII. SPECIAL PROJECTS AND FUNCTIONS

Advisement Center

Under the supervision of Mark Ondrias as Special Assistant to the Dean for Advisement and Student Success, the College Advisement Center oversees the student undergraduate population. The Center admits undergraduate students to the College of Arts and Sciences once they have been accepted into the department of their major. The Center's seven advisors monitor the academic progress of over 6500 students. They are responsible for monitoring the academic progress, success, and shortcomings of all A&S students, certifying their graduation, updating their intended course of study, and, if necessary, placing students on probation and/or suspending them for unsatisfactory progress in their program of study. These Center staff members advise students on general degree issues that are not specific to the departments of their major or minor. They partner with students to assist them in achieving their academic goals. The Center was

responsible for the certification of approximately 1300 Arts and Sciences baccalaureate graduates this academic year. The number of Arts and Sciences students enrolled during 2007-2008 consists of the following: Summer 2007 – 1761, Fall 2007 – 5327, and Spring 2008 – 5767. The total number of visits to the Advisement Center during 2007-2008 was 9492 (an increase of approximately 650), which does not include out of office advisement sessions or electronic communications. The Center continues to see an increase in electronic communication. Students seem to prefer the flexibility to contact their advisor via email. Emails to the Artsci email alone has grown from just under 700 in 05-06 to 817 in 06-07 and over 1500 in 07-08. This does not include the emails that have gone directly to the advisors' personal email accounts.

Changes/Initiatives: The advisement director continued the evaluation of policy and procedures for the College. The Center has continued to reinforce the idea that advisement is a partnership between the advisor and student. It has increased the number of group sessions for students and have changed its format to reflect a set of learning objectives that augment the students' understanding of their own degree and their ability to be an active participant. The Center has expanded the use of an advisement syllabus to all A&S students. Giving the students responsibility and an active part in their navigation is the first step in engaging them in the advisement process.

The Center and the departments have continued to refine the communication across the college. To improve information, communication, and advisement practice, the advisors' workload was redistributed based on majors. This has improved the communication between them and the College Center. The degree application process has been completely redesigned. Now students must attend a Graduation Planning Workshop. In this session students learn how

to read their audit and compare requirements to plan for graduation efficiently. After attending this mandatory workshop they must email the Center with an *educated* projection of their graduation date. Students no longer have the departments sign off on the audit; instead they go to the department only if an exception needs to be made. Departments are concerned that now they will not see their students as much, so instead of that hold, the College has been exploring other options such as advisor approval of pre-requisites for a Center core course in their major or department specific holds.

Traffic/Availability: The Center operates on an appointment-based system Monday through Thursday, with Friday the walk-in day, to accommodate the students' need to seek assistance on "deadline days". The Center has had a favorable response to the adjustment to thirty minutes appointments. Group seminar advisement sessions for transferring into Arts and Sciences as well as graduation planning are now mandatory sessions with the option of a one on one appointment after if needed. These seminars are offered several times a week throughout the semester but are limited due to the lack of space to conduct them on a regular basis. The Center was able to secure a classroom, but at very unpopular times.

Collaborations: The Center has strengthened its relationships with other departments and student centers around campus for the betterment of student advisement. Several Freshman Academic Choice classes were given presentations or group advisement by the Director or her staff during class time. A&S Advisors have also volunteered advisement support to the College Enrichment Program as well as UNM Summer Bridge. Through the work of the Provost's Committee on Advising, Arts and Sciences have two "Pre-major" advisors that are housed at University College. The College pays for .25 of their salary and in return they will serve the College's prospective students that need assistance in the transfer process. They represent the

College at many on-sites and college fairs, allowing the Center to offer more availability to the current students during those times. A&S has seen increased enrollment in the past year with the inception of this program. As a side effect of this initiative, A&S has seen an increase in students that do not necessarily intend to graduate with one of our degrees but are housed here for the time being. Toward the end of the last academic year, Stephanie Hands created a second major that is classified as "Undecided". This marker for students states they will be moving to another College in the future. This will serve as a way to track these students in the future and offer them alternatives to true A&S advisement requirements. The center has started designating this marker since the summer of 2007. To date Arts and Sciences is housing over 500 students with this designation.

College Academic Committees

College of Arts and Sciences Graduate Committee

The charge of the College of Arts and Sciences Graduate Committee is to be responsible for maintaining and enhancing the quality of graduate education in the College.

The A&S Graduate Committee was reconstituted in the fall of 2005 according to the new by-laws of the College (see Table 7). The responsibilities of this committee are to represent graduate program interests to the Dean of Arts & Sciences and the Office of Graduate Studies and to report developments to the College faculty members through the departmental graduate advisors. This includes consideration of actions related to curriculum change, instructional programs, academic advisement for graduate students, and changes in administrative or academic regulations which affect graduate programs.

The Committee met each semester to consider topics relevant to the Graduate Programs of individual departments and the College's working relationship with the Office of Graduate

Studies. The implementation of the new BANNER student system and the reorganization of the operations of the Office of Graduate Studies provided opportunities to upgrade the procedures for graduate admissions and the processing of TA contract. Ad-hoc committees were formed to address these issues. These committees were instrumental in establishing new avenues of communication with OGS.

College of Arts and Sciences Undergraduate Committee

The charge of the College of Arts and Sciences Undergraduate Committee assumes responsibility for maintaining and enhancing the quality of undergraduate education in the College. This includes conducting activities related to curriculum change, instructional programs, academic advisement, and changes in administrative or academic regulations which affect undergraduate programs.

Each of the 20 academic departments in the College designates one faculty representative (voting faculty as defined in the Faculty Handbook) to the College of Arts and Sciences

Undergraduate Committee (see Table 7). The Committee also includes representatives from interdisciplinary degree-granting programs and staff academic advisors within the College.

Visitors to the meetings are welcome, and may be called upon to speak to the group as necessary.

The Subcommittee on Curriculum (consisting of four members of the A&S faculty and chaired by Assoc. Dean Ondrias) reviews requests from departments both within and outside the College for curricular and/or program requirement changes that may impact one or more Arts and Sciences departments. The Undergraduate Committee and Curriculum Subcommittee were active participants in the initial implementation of the student BANNER system. Members of the Committee met with representatives of the BANNER implementation team on several

occasions. The College Advising Office served as a focal point for addressing difficulties encountered with student registration and transfer equivalencies.

College Grant and Scholarship Initiatives

The Teacher's Institute and Science Education Institute of the Southwest

The Teachers' Institute began in 1999 with support from DeWitt Wallace Readers' Digest Foundation as a demonstration site for the Yale-New Haven Teachers Institute. Pursuing its mission of contributing to K-12 education by improving teachers' access to knowledge, the Institute offers credit-bearing seminars each summer and shorter workshops the year around in a range of liberal arts and fine arts disciplines, both on the UNM campus and at other sites that provide hands-on access to learning opportunities for teachers. The Science Education Institute of the Southwest (SEIS) has provided programs in response to the needs of New Mexico's science teachers since 2005. SEIS, a collaborative effort among UNM, Sandia National Laboratories, the New Mexico Museum of Natural History and Science, and the Albuquerque Public Schools, also involves educators from such programs as the former LodeStar Astronomy Center and other local and regional groups significant to science education. The TI is jointly led by two faculty co-directors, Prof. Wanda Martin (English) and Prof. Matt Nyman (Natural Science) with the administrative support provided by the College Office. Dr. Martin is responsible for the Humanities and Social Science activities of the Institute, while Dr. Nyman is in charge of the programs related to the Natural Sciences. Dr. Nyman is also the UNM Director of SEIS. These institutes continued to function at a high level during the past year, conducting the Taos Writer's Institute, offering a variety of seminars, courses and workshops for K-12 teachers, and actively pursuing funded collaborations / projects with Sandia National Laboratories and other national funding agencies.

The College was also home to a variety of other K- 12 and Teacher Training activities. The Teacher's Success Council was formed in 2007 in collaboration with the College of Education. This is a proactive working group that brings together faculty and administrators from A&S and the College of Education to improve teacher education at UNM. The TSC is charged with improving the curriculum alignment between the two Colleges. It is currently working to insure that students in various A&S programs have a straightforward pathway to obtain a minor in secondary education (the first step in NM high school licensure). Finally, a variety of externally funded initiatives providing in-service outreach to public schools were active in 2007-2008, including the K-12 (Biology and E&PS), La Meta (Math) and CEMELA programs.

College Scholarships

In 2007-08, the College of Arts and Sciences continued to expand and update its webenabled descriptions of our scholarship program, including the seven awards, and how students
could apply for them. The application period was from January 1 to April 1, 2007, and over 100
applications were received with 32 complete portfolios, which were reviewed by the College
Scholarship Committee (Laura Crossey, Deborah Evans, Diane Marshall, Chuck Paine, and
Charlie Steen). The committee reviewed all of the completed files and chose recipients for six of
the awards. The seventh award, the Frank O. and Sadie M. Lane Endowed Scholarship, has its
own procedure and a separate review committee that chooses new recipients each year.

This was the third year that the Robert Noyce Scholarships was awarded in the College. This initiative is funded by the National Science Foundation and is intended for students who are currently pursuing an undergraduate degree in science or math and wish to change their careers in order to become secondary teachers. Only one Robert Noyce Scholarship

was awarded this past year. The College awarded eight scholarships totaling over \$30,000 for the 2007-08 academic year.

The scholarship award recipients for 2007-08 are as follows:

Scholarship Recipient

Charles E. Brown and Katherine M. Brown Scholarship Stephanie Chu F.P. Clements Endowed Scholarship Ralph W. Douglass Memorial Scholarship Marjorie Yepsen & Carleen F. Farnam Endowed Scholarship George A. Kaseman Memorial Scholarship Frank O. and Sadie Lane Scholarship Robert Noyce Scholarship Dr. Harry Vanderpool Endowed Scholarship

Rose Afandi Christopher Franklin Pamela Reed Angelina Lee Gonzalez-Aller Alexandra Andrego Stella Armijo Xiaoshen Jin

Dean's List - College of Arts and Sciences Honor Roll

The criteria for inclusion on the Dean's List are a semester GPA of 3.75 or higher while being enrolled for 12 or more credit hours with letter grades. Over 1200 students achieved this honor with 409 receiving this distinction in both the Fall 2007 and Spring 2008 semesters. Students who met the criteria for inclusion on the Dean's List received a notation on their transcript and an email of appreciation and congratulations signed by Associate Dean Ondrias. The College also displays a list of awardees on the A&S homepage.

VIII. DEVELOPMENT EFFORTS

In fiscal year 2007-2008, the College of Arts and Sciences Development Office raised \$6,570,568 in gifts from individuals, corporations and foundations.

One of the highlights was a \$700,000 gift from the Mellon Foundation aimed at increasing the numbers and rate at which Native American and Latino doctoral students complete their

degree requirements. This gift highlights the needs of our students as they attempt to finish their dissertation projects and move into their chosen fields.

The College also received a \$1,500,000 gift for the estate of Selma Greenberg. This gift created the Joseph H. and Selma Greenberg Fellowship Endowment fund.

Staff changes include the addition of our new Senior Director of Development, Bill Uher. Debbie Dobson resigned her position as Development Officer at the University. Eva Lipton continues on as the part-time Program Director for the Development Office. The College plans to fill two existing positions which have been open since May of 2007. The expectation is that both these positions will be grade 15 development officers.

The University of New Mexico Foundation hired two key additions to the development team. John Stropp was hired on June 1 as the President of the UNM Foundation. Stropp comes to UNM from Texas A&M where he held a similar role for many years. The Foundation also hired John Welty as Vice President. Welty spent the last 19 years at the University of Arizona, also in a similar role. The comprehensive campaign is still in the silent phase. Campaign council is being interviewed and will most likely begin work in early 2009.

ANNUAL REPORT OF THE DEPARTMENT OF AMERICAN STUDIES COLLEGE OF ARTS AND SCIENCES

July 1, 2007 to June 30, 2008

Prepared by Alex Lubin, Chair

The faculty in American Studies continues to operate as a committee-of-the-whole in setting policy and implementing its curriculum for undergraduate and graduate students. During the 2007-2008 year, Professor A. Gabriel Meléndez served as Chair of the department, Alex Lubin served as Graduate Director and Rebecca Schreiber served as Undergraduate Director.

I. Significant Developments

The Department worked hard to develop a handbook of department policies and procedures, to implement a departmental outcomes assessment program, and to develop a strategic plan for the next three years, one that articulates how the department can work to help the University achieve its goals. The strategic plan emphasizes the Department's importance as center of Southwestern United States cultural studies, as well as its ability to educate students on the role of New Mexico in the United States and the world.

The department continues to recruit a diverse graduate student population and to train more minority doctoral students than most of our peers in American Studies. To this end the Department became one of the participants in the Mellon Foundation's graduate fellowship program that will enable us to support the work of Hispanic and Native American graduate students.

We continue to grow our reputation as a center of transnational American Studies research. Within our field we are distinct due to our faculties research and teaching areas in U.S./Mexico and U.S./ Middle East cultural politics. Our transnational focus ought to enable us

to be regarded highly in the National Research Council rankings that will begin to include American Studies programs next year.

At the conclusion of AY 07-08, Professor Gerald Vizenor was promoted to the rank of Distinguished Professor. Also, Professor Rebecca Schreiber was awarded the College of Arts and Science Outstanding Teaching Award.

II. Significant Plans and Recommendations for the Near Future

The Department's Strategic Plan articulates five core strategic priorities and goals. They are: 1) Recruiting faculty graduate students, and undergraduates of color; 2) Ensuring that the undergraduate and graduate programs train students in all of the areas that are important to the department and that we continue to build on the success of faculty excellence in research and publishing; 3) Recruit faculty as well as students at every level of the department and increase administrative support staff; 4) Maintain the department's faculty staffing levels as well as build our strength in the areas of Environment, Science, and Technology; 5) Build community within the department, across campus and outside the University.

III. Faculty Appointments

In 2007-2008 the department welcomed two tenure-track hires, both of which are jointly appointed with other academic units. Amy Brandzel is shares an appointment with Women's Studies while Michael Trujillo shares an appointment with Chicano/Hispano/Mexicano Studies. Splitting FTE hires into .50 probationary hires has meant creating new forms of faculty evaluation that involve all impacted academic units. Dr. Amy Brandzel helps the University develop capacity in the area of gender/sexuality studies while Dr. Michael Trujillo brings expertise in the cultural and folklore of New Mexico.

IV. Separations of faculty

Associate Professor, Dr. Amanda Cobb, who had been on leave the previous year, decided to resign her appointment in the Department effective May 2008. She will direct a new Chickasaw History and Research Center in Ada, Oklahoma. Assistant Professor, Dr. Jake Kosek accepted a probationary, tenure-track appointment to the Geography Department at the University of California, Berkeley which will begin August 2008.

V. Publications of the Department

Assistant Professor Amy Brandzel

Co-authored a book review for the Journal of History of Sexuality.

Assistant Professor Alyosha Goldstein

 "On the Internal Border: Colonial Difference, the Cold War, and the Locations of underdevelopment" in Comparative Studies in Society and History 50:1 (January 2008)

Assistant Professor Michael Trujillo

- Published "Onate's Foot: Remembering and Dismembering in Northern New Mexico"
- Published entries in the Encyclopedia of Latino Folklore.

Assistant Professor Rebecca Schreiber

 Published, "Dislocations of Cold War Culture, Exile, Transationalism, and the Politics of Form," in Duke edited collection.

Associate Professor Alex Lubin

• Lubin, ed., Revising the Blueprint: Ann Petry and the Literary Left (Mississippi).

Professor Laura Gomez

 Published Manifest Destinies: the Making of the Mexican American Race (New York University Press).

Professor A. Gabriel Meléndez

- Published, "Who are the Salt of the Earth? Competing Images of Mexican and Americans" in edited book
- Published "Ejemplos Metaforicos: Self Presentation and History in Chicana Autobiography and Life Narrative," in the conference proceedings of the 5th Biannual Mult-Ethnic Studies: Europe and Americas Conference.

Professor Vera Norwood

- Submitted "How to Value a Flower: Locating Beauty in a Toxic Landscape" to a SUNY press edited volume
- Placed two chapters in edited collections.

Professor Gerald Vizenor

- · Published Craneurs
- Published Literary Chance: Essay on Native Survivance
- · Published "Mister Ishi" in California Magazine.
- Published "The Amimosh Driving School" and Oshkiwiinag: Hearlines on the Trickster Express," in Stand Magainze.

V. Outside Professional Activities of Staff Members

Assistant Professor Rebecca Schreiber

- Member, Site Resource Committee, 2008 American Studies Association Annual Meeting
- President, Rocky Mountain American Studies Association

Assistant Professor Michael Trujillo

Member, Advisory Board, Mellon Fellowships for Doctoral Students

Associate Professor Alex Lubin

 Chair, Site Resource Committee, 2008 American Studies Association Annual Meeting

Professor A. Gabriel Meléndez

- Keynote speaker: "Hitting the Ground Running, Making a Smooth Transition to Graduate School," McNair Scholars National Conference, September 2007, UNM
- Member, Site Resource Committee, American Studies Association 2008 conference.
- Member, Advisory Board, Mellon Fellowships for Doctoral Students

Professor Gerald Vizenor

- Keynote, Undergraduate Division Graduation Exercises, University of California, Berkeley
- Keynote, Institute for American Indian Research, UNM
- Special Lecture, Institute for Advanced Study, University of Minnesota
- Special Seminar, American Studies, University of Minnesota
- Series editor, University of Oklahoma Press
- · Editorial Board, North American Indian Prose Award
- Editorial Board, University of Nebraska Press

DEPARTMENT OF ANTHROPOLOGY

College of Arts and Sciences

University of New Mexico

ANNUAL REPORT

JULY 1, 2007-JUNE 30, 2008

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DEPARTMENT OF ANTHROPOLOGY JULY 1, 2007-JUNE 30, 2008

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DEPARTMENT OF ANTHROPOLOGY JULY 1, 2007-JUNE 30, 2008

Significant Developments during the Academic Year 2007-2008

DEPARTMENT ACTIVITY BY SUBFIELD

Subfields

The Department maintains graduate and undergraduate programs in four subfields: Archaeology, Biological Anthropology, Ethnology, and Human Evolutionary Ecology. In the Spring 2008, the Biological Anthropology and Human Evolutionary Ecology subfield merged to form the Evolutionary Anthropology subfield. The combination of undergraduate and graduate programs will continue throughout the following year. For the purposes of this report, the two subfields will be presented under the title of Evolutionary Anthropology. Conveners (annually elected by the subfield) call subfield meetings at least monthly.

Advisory Group

The subfield conveners, undergraduate director, graduate director, and the Chair meet twice a month during the academic year to advise the Chair on matters relating to personnel, administration, and budget; make recommendations about related planning, policy, procedures, and other issues for discussion and vote by full faculty. The Advisory Group is a liaison between the Chair and the subfields and programs. Advisory Group members are expected to attend faculty meetings.

Archaeology

UNM Southwestern Archaeology Field School

In June and early July 2008, the UNM Southwestern Archaeology Field School collaborated with archaeologists from the Valles Caldera Trust to conduct surface survey and limited test excavations at the Valles Caldera National Preserve in the Jemez Mountains of New Mexico. The field school, directed by Adjunct Assistant Professor Ariane Pinson, investigated patterns of Archaic high altitude land use, settlement and subsistence, focusing particularly on the record of rock shelter use in this area. This research is important because although many models of Archaic subsistence incorporate summer use of high altitude regions, there has been little archaeological field work in these areas with which to evaluate these models. Of the field school's 15 students, half came from outside of New Mexico, and some traveled from as far away as Canada and California to attend.

UNM Chaco Canyon Stratigraphy Project

The Chaco Stratigraphy Project wrapped up fieldwork in June, 2007, and Professor W.H. Wills supervised final backfilling in October, 2007. Professors Wills & Crown continue laboratory analyses and are working to integrate various analytic studies by our collaborators. They organized a session at the SAAs that reported on the different analytical efforts. That session included papers by two UNM undergraduates. They are now beginning the first phase of a new remote sensing project at Chaco that builds on the stratigraphic work just finished.

Distinguished Professor Patricia Crown received \$325,000 from NSF for 2007-2009 to analyze artifactual material from the trash mounds at Pueblo Bonito. Eight students, including four graduate students and four undergraduate students, are employed on the project, which is being conducted in the Anthropology Annex. Crown supervises the employees and conducts some of the research as well. The results will compare what was placed in trash with the whole artifacts from the rooms in Pueblo Bonito, as well as with the trash from other Chacoan sites. Crown also received a large collaborative RAC grant (with Steve Cabiniss and Julia Fulghum) for residue analysis of ceramics from the trash mound. To date, three senior theses and one high school volunteer intern project have resulted from the trash mound study. Three additional senior theses and two dissertations are planned for this material.

2008 UNM Uxbenká Field School

In spring and summer 2008 Assistant Professor Keith Prufer continued research at Uxbenká, Belize funded by a \$129,000 grant from NSF (2007-2009) to study the development of complex polities and interpolitiy exchange. In summer 2008 nine undergraduate students from UNM, University of south Florida, University of LaTrobe (Australia) and University of Minnesota participated in a five week field fieldschool at Uxbenká. Additional funding for the field program came from a Title VI-A award to LAII. In 2008 one MA thesis (Wichita State Univ.) was completed and currently there are four PhD students working on projects towards their dissertations.

2008 UNM/Universidad de Cantabria El Mirón Cave Prehistoric Project

In summer 2008, Distinguished Professor Lawrence Straus and Professor Manuel González Morales directed the 13th season of the El Mirón Cave Prehistoric Project in Cantabria, Spain. The UNM contingent (Straus and 3 UNM graduate students) was again funded by a grant from the National Geographic Society, supplemented by a grant from the Research Allocations Committee. Laboratory analyses were conducted in Santander and Ramales, focusing on lithic artifact sorting, measuring and classification, as well as on the study of manuports (mainly fire-cracked rocks and anvils from Lower Magdalenian hearths) and data-base management. Radiocarbon dating and consultation with collaborating Spanish scientists were also done. Yuichi Nakazawa and Ana Belen Marín completed their respective UNM and UC Ph.D.s, the former on hearth structure contents and the latter on Upper Magdalenian and Azilian faunas. UNM Ph.D.s by John

Rissetto on Magdealenian lithic raw materials & by Elisabeth Stone on bone needles & fiber technology are underway.

Hawaii Archaeological Research Project

For the second time the Department of Anthropology participated in an eight-week archaeological field training program in Hawaii. This program is directed by Dr. Michael Graves and is funded by a National Science Foundation Research Experiences for Undergraduate (NSF-REU) Site Program. 10 students from across the US compete for positions in this program; five, this year were from UNM. The program integrates field work (survey, mapping, and excavation) with basic archaeological research focused on the development of irrigated agriculture in the district of North Kohala on the Island of Hawaii. This program is part of a larger project funded by the National Science Foundation Human and Social Dynamics Initiative to document and understand the relationship between dry and wetland agriculture and the development of the Hawaiian state in the eighteenth century. Students in the NSF-REU program conducted research projects on a variety of topics, presented their papers in a public forum, and one student (from UNM) was selected to give a presentation at the Society for Hawaiian Archaeology annual meeting. Co-directing the field training program in the summer of 2008 was Dr. Mark McCoy who received his BA in Anthropology from UNM before earning his doctorate from UC Berkeley. Two of the teaching assistants for this program are from UNM, as well.

Ice Patch Archeology

Principal Investigator, E. James Dixon led a four person archeological survey of five small glaciers, or "ice patches" in Alaska's Wrangell St. Elias National Park and Preserve. In addition to the PI, the survey team included Dr. William Harrison (geophysicist), Albert Craig (Native American - tribal representative), and Jess Millhausen (University of Colorado Graduate Student). This was the second year of a five-year research project funded by the National Science Foundation Office of Polar Programs. This research has discovered numerous organic artifacts, including wellpreserved tools, weapons, and a basket. On-going research goals include annual observations to record, quantify, and analyze the processes of ice patch ablation and to record and collect the unique artifacts they contain. Research continues to investigate the role perennial ice patches play in high latitude human adaptations. Required permit acquisition included: Protection of Human Subjects Assurance Identification/Internal Review Board Certification/Declaration of Exemption, NPS Scientific Research and Collecting Permit, Archaeological Resources Protection Act (ARPA) Permit, and Helicopter Use Permit, The PI prepared and submitted Alaska Regional ASMS Site Condition Assessment Forms, a progress report to the National Science Foundation, and an Investigator's Annual Report to the Wrangell-St. Elias National Park and Preserve.

Ethnology

International Indigenous Research Conference, April 3-4, 2007

"Sipapu Secular: Planting Seeds of Our Research" An was organized by IFAIR and cosponsored by the Department of Anthropology (Ethnology); Society of Native American Graduate Students, Native American Studies Indigenous Research Group, and Zimmerman Library Indigenous Nations Library Programs. Inter/National graduate student research presentations selected by UNM faculty proposal. UNM Faculty respondents followed each presentation with Q&A following. The conference Keynote Talk was given by UNM Distinguished Professor, Gerald Vizenor. 120 faculty, students, in and out-of state attended the two-day event.

Film Screening, "Paatuwaqatsi H20pi Run to Mexico," This special film documents 26 Hopi runners' 2,000-mile trek from the Hopi Mesas to Mexico City to carry a message of water to the 2000 World Water Forum. Department of Anthropology Lecture Hall, October 17, 2007. The program featured the film director, V.Masayesva, Jr. and two of the runners who took questions after the screening. Attendance was 250.

Anthropology of World Beat Special Performance

Departments of Anthropology, Music, & Native American Studies, in partnership with College of Fine Arts and Outpost Performance Space, supported a 10 day teaching and concert residency in Fall 07 for Ghanaian musicians Nii Noi Nortey and Nii Otoo Annan. Steven Feld has worked with Nortey and Annan in Ghana since 2004, and they lectured and performed in his Anthropology of World Beat class in addition to other FAS & CFA classes.

Peace Studies

Peace Studies, which is housed in the Department of Anthropology, sponsored an exhibit of the photographs of Alan Pogue, accompanied by a talk by the author. Mr. Pogue's photographs, which depict social issues in the United States, are internationally known. Peace Studies also sponsored an event centered on Darfur, hosting Daoud Hari, journalist and translator for the New York Times and other U.S. and British new organization. Daoud Hari spoke about the situation of tribes people in Sudan and that of Darfuri refugees in Chad.

Peace Studies mounted its annual Peace Fair, which featured panels on the Nuclear Imagination, The Greening of New Mexico and Peaceful Alternative to Violent Conflict. UNM Anthropology faculty Sylvia Rodriguez, UNM PhD Laura McNamera, Dr. Janet Page-Reeves who often teaches in the department, and PhD candidate Patrick Staib were among those participating in the panels.

Evolutionary Anthropology

Evolutionary Anthropology is a new subfield in UNM's Department of Anthropology formed by merging Biological Anthropology with Human Evolutionary Ecology. The new subfield has a total of 8 participating faculty as well as 3 associated faculty and 48 graduate students. Evolutionary Anthropology has successfully merged both the undergraduate and graduate programs of the two subfields.

Hominoid Reproductive Ecology Laboratory (located in Patio 209) was completed in May 2008. Martin Muller and Melissa Emery Thompson codirect the lab, which conducts a range of hormonal assays, with emphasis on non-invasive methods (e.g., urine and saliva sampling) to integrate physiological measures into behavioral studies of humans and other primates. In addition to their long-term studies with the Kibale Chimpanzee Project and a consortium of orangutan field studies, Drs. Muller and Emery Thompson will provide graduate training in laboratory methods and offer convenient services to research partners in UNM's evolutionary anthropology, psychology, and biology departments. This year, the lab has already conducted research on factors influencing stress levels in wild chimpanzees, reproductive development of captive orangutans, reproductive function of aging chimpanzees, and physiological correlates of human disgust responses. In association with the new lab, 12 graduate students from 3 departments are currently taking a course on introductory laboratory skills and research design.

Primate Enrichment Program at the Rio Grande Zoo is ongoing, and we are now entering our fifth year of providing enrichment at the zoo. Enrichment is provided for all primates, animals housed in the cat/carnivore area of the zoo, and to the polar bears. Items that we use often have a one-time usage, and we are constantly in need of these items. Our program currently has about 15 graduate and undergraduate volunteers who provide enrichment seven days a week.

Dr. Hillard Kaplan continued his research in Bolivia with \$3,167,000 in grants to fund the Tsimane Research project. He also continued other grant funded projects such as The Human Life Course and the Biodemography of Aging (NIA), Grandparenting and the Evolution of Post-Menopausal Lifespan (NSF), Inflammation and Metabolic Risk and the Aging Process: Diet, Disease, and Development (NIA), Mellon Network on Collecting Biomarkers in Latin America (Mellon), and Alternative Field Methods for Collecting Biomarkers (Mellon).

Dr. Heather Edgar is Co-Principal Investigator on the National Institutes of Health Funded "Web-Based Library of Orthodontic Cases" along with Drs. Phillip Kroth, Assistant Director of Health Sciences Informatics Program Development and Edward Harris, University of Tennessee Health Sciences Center. The grant provides \$413,000 to create an on-line archive of Orthodontic cases that demonstrate the range of ethnic and individual variation in tooth shapes and occlusion health professionals are likely to encounter.

Drs. Keith Hunley and Heather Edgar are developing an article based on the *Race Reconciled? Symposium* which took place last year. It will be published next year as a special issue of the American Journal of Physical Anthropology.

Graduate Student Successes:

National Scholarship Awards

Louis Alvarado, National Science Foundation Research Graduate Fellowship, 2008-2011.

Elvira Pichardo, Mellow Foundation Dissertation Fellowship, 2008-2011.

Jonathan Stieglitz, National Science Foundation Dissertation Improvement Grant, "Conflict and Cooperation in Nuclear and Extended Families among the Tsimane' of Bolivia, August 2007-2008.

Professional Appointments

Karen Kramer, Associate Professor of Anthropology, Harvard University 2007-present .

Jeff Winking, Assistant Professor, Dept. of Anthropology, Texas A&M, 2008-present.

Andrea Evans Cooper, Assistant Professor, San Juan Community College, NM, 2008-present.

Carole Lambourne, Research Assistant Professor, Department of Family Medicine, Practice Partner Research Network, Medical University of South Carolina, 2008-present.

DEPARTMENT ACTIVITY

Department Committees

Graduate: The committee oversees all graduate student matters, including curriculum, scheduling, allocation of GA/TA/RAships, outcomes assessment and nominations for various graduate scholarships and awards. The Coordinator of Program Advisement is also a committee member.

Undergraduate: The committee oversees all undergraduate matters, including curriculum, scheduling, 101, outcomes assessment and advising. The Coordinator of Education Support is also a committee member.

Instructional Resources: The committee meets annually in September and periodically as needed to coordinate and oversee all matters related to the instructional use of computers, media, renewable and permanent laboratory supplies, and field equipment. It maintains an inventory of current resources and reviews and makes recommendations on all equipment expenditures (laboratory, computer, field, etc.). In consultation with the Graduate and Undergraduate Committees, the Instructional Resources Committee develops a comprehensive, visionary, long- and short-term plan for instructional programs. This plan helps inform Department grants, equipment requests, policy and

future directions. The Department Administrator and the User Support Analyst II are also committee members.

Space Committee: Established by Chair Graves in Fall 2007 to assume responsibilities for "the allocation and use of space" from the Instructional Resources Committee, the Space Committee is chaired by a member of the Advisory Group and has representatives from each of the other subfields. The committee coordinates and oversees all matters related to the allocation and use of space. It makes recommendations on office and laboratory use and prepares proposals for minor and major capital improvements. The Department Administrator is also a committee member.

Post-Tenure and Salary Review: Three senior faculty members evaluate and rank each tenure-track faculty member's, calendar-year record of teaching, scholarly work and service for the Chair's use in post-tenure reviews and salary decisions. The Department adopted a "Merit/Productivity Scoring System" in October 1994 and this has been modified at various times since. Post-tenure review was instituted in 1996-97. Before 2007 the Post Tenure Faculty Evaluation Committee was elected by the faculty. Membership now rotates with one person appointed and one dropped each year.

Annual Review, Mid-Probationary Review, Tenure and/or Promotion Review: These committees are appointed annually or periodically as appropriate.

Non-Tenure-Track Faculty Review: Three tenured faculty members conduct annual, academic-year reviews of each continuing non-tenure-track faculty member (Lecturer III, Research, Adjunct) for the Chair's use. The Associate/Assistant Chair chairs the committee. This was a new committee in Spring 2008.

Student Committees

Anthropology Graduate Student Union (AGSU): AGSU represents the Department's graduate students in the Department and on campus in order to promote their academic, professional and social interests. It meets monthly as need and sponsors a Graduate Symposium showcasing student research each Spring semester. There is representation from AGSU at some faculty meetings, on some faculty review and hiring committees, and in the University-wide Graduate and Professional Student Association (GPSA), an independent service organization established in 1969 to serve all part-time and full-time graduate students. The GPSA budget comes from student fees. It supports various campus organizations and through its Student Research Allocation Committee (SRAC) funds student research projects (thesis and dissertation) and travel to research-associate conferences. The GPSA also allocates funds to the AGSU at the rate of \$4 per student enrolled per semester.

Undergraduate Anthropology Society (UAS): UAS is open to all students regardless of concentration. Students join by being added to the UAS e-mail list. Its purpose is to promote the study, appreciation and advancement of anthropology as the science that studies humankind in all of its aspects and to foster the use of anthropological knowledge in addressing human problems and conditions. UAS encourages a multidiscipline

academic approach as well as involvement in the campus and surrounding communities.

Hibben Allocation Committee

Since 2004 the Frank C. Hibben Charitable Trust has donated \$750,000 to UNM in support of Anthropology and Native American Students in the Department, the Museum and the College of Arts and Sciences. Another \$200,000 will be donated in 2008-09. The Hibben Allocation Committee is chaired by the Museum Director with the Department Chair, the Dean (or designee), the Provost/Vice President for Academic Affairs (or designee) and the President (or designee) as members. The committee makes recommendations to the Trust each year on the following year's funding level and distribution for graduate student support in Anthropology. (Recipients are designated annually by the Hibben Selection Committee, the Graduate Committee and one representative from the Museum appointed by the Director.)

Joint Standing Committees

Board of Archaeologists: The Board of Archaeologists is made up of Archaeology subfield faculty, the director and associate director of the Office of Contract Archeology, and the director and archaeological curators of the Maxwell Museum of Anthropology. Constituted by UNM President William E. Davis in 1979, the Board is authorized to represent the University in implementing and enforcing policy governing archaeological research on University lands in order to assure that University cultural resources are utilized in the most conservative and productive manner possible and to insure that information and data recovered from University cultural resources are preserved for future research. It is also charged to play a helpful role in furthering the quality of archaeological research and to make recommendations concerning permission to conduct archaeological research on University lands. The most prominent University-owned archaeological properties include the Kuaua Site presently administered by New Mexico State Monuments as the Coronado Monument, the Paa-ko Site (LA 162), and the Pottery Mound Site (LA 416). Until recently the University also owned the 9550-acre Cañada de Cochiti Grant, commonly known as the Jim Young Ranch tract, which contains over a thousand prehistoric and historical archaeological sites.

Clark Field Archive & Library (CFAL) Policy Committee: In 2007 Clark Field Archive & Library is still housed in the Anthropology Building and jointly operated by the Department, Maxwell Museum and the Maxwell Museum Association (MMA) with oversight by the Policy Committee, which has representation from each of the three units. Almost all of its collections of about 12,000 books and over 25 active journal titles have been donated, with the exception of several journal subscriptions supported by the Department and MMA. CFAL houses a complete collection of Department doctoral dissertations and selected masters' theses, a map collection and an extensive collection of reprints. About half of these collections are unique on the UNM campus and are catalogued on Libros, UNM's computerized system. It also serves as a repository for field notes and records that have been donated to the Museum by faculty and associates. The main source of CFAL funding is the MMA's annual Albuquerque Antiquarian Book Fair, the oldest and largest such event in the state, usually held during the first full

weekend in April.

Convocation

The 10th Annual Departmental Convocation took place on Saturday, May 12, 2007 in Anthropology Lecture Hall 163 at 1:00 pm. Convocation was hosted by Dr. Michael Graves, Chair. Our special guest speaker was Dr. Laura McNamara, Adjunct Assistant Professor of the Department of Anthropology and Principal Member of Technical Staff, Sandia National Laboratories. Dr. McNamara is also an alumni of the Department. Dr. Ann Ramenofsky presented the Bachelor of Arts and Bachelor of Science degrees, while Dr. Sylvia Rodriguez presented the Master of Arts, Master of Science and Doctor of Philosophy degrees. She also presented the departmental awards. We held a reception for graduates and their guests on the front lawn of the Department following the convocation. Additional information regarding degrees and departmental awards can be found under the Graduates and Student Fellowships and Awards sections in this report.

Fundraising

Endowments

Anthropology Endowments, UNM Foundation	6/30/2007	6/30/2008
Karl Schwerin Fellowship	\$ 17,532.00	\$ 17,194.00
Frieda Butler Scholarship	\$ 15,486.00	\$ 14,787.00
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Helen McCaig Spuhler Scholarship	\$ 397,878.00	\$ 380,348.00
MacCaulley Scholarship	\$ 23,237.00	\$ 23,151.00
Anthropology Graduate Student		
Support	\$ 62,830.00	\$ 61,552.00
Basehart-Briollo Memorial		
Anthropology	\$ 17,495.00	\$ 17,475.00
NM Folklore Scholarship	\$ 15,228.00	\$ 14,541.00
Ortiz-Lamphere Policy Fellowship	\$ 260,065.00	\$ 248,819.00
Ortiz General Endowment	\$ 461,495.00	\$ 441,080.00
Ortiz NEH Endowment	\$ 293,315.00	\$ 280,072.00
Snead-Wertheim	\$ 43,566.00	\$ 90,786.00
David Stuart	\$ 32,000.00	\$ 36,013.00
	\$1,640,127.00	\$ 1,625,818.00

Graduate Student Support Fund

The Anthropology Graduate Support Fund was initiated during the Anthropology Department 75th Anniversary Celebrations in 2003. This endowment fund receives monies from unsolicited donations and those donations elicited from publishing the Department of Anthropology Newsletter which specifically targets our 1100+ alumni.

The goal of the fund is to reach \$100,000 and offer four research grants (one in each subfield) to our graduate students.

Anthropology Centennial Fund and Department Newsletter

The Centennial Fund (formerly 75th Anniversary Fund) was also begun during the 75th Anniversary celebrations. Its purpose is to fund the printing and distribution of the Department Newsletter, in other words it is the operating account for the Support Fund. Much of the current fund was raised from selling 75th Anniversary T-shirts. We developed two new saleable items during the 2007-2008 year, which were launched at commencement 2008 and in the Spring issue of the Newsletter. These items include a recyclable shopping bag and a coffee mug, both of which are given to donors contributing \$10 or more to support the Department.

The Department of Anthropology Newsletter, a biannual production since 2005, is issued at commencement (May) and in late Fall (November). The Newsletter has grown from its original 8-page format dedicated to news of the Anthropology Department and Maxwell Museum, to a 12-page format that encompasses the Department (faculty and student awards, research, publications, travels), Maxwell Museum news, Alfonso Ortiz Center, Chaco Culture National Historical Park, fundraising for both graduate and undergraduate research, and special events. The Newsletter also includes feedback and news items from our alumni. The Editorial Board for 2007-2008 included Michael Graves, Bruce Huckell, Lisa Huckell, Carole Nagengast, Ann Braswell and Jennifer George.

Clark Field Archive

The Clark Field Archive & Library (CFAL) is jointly operated by the UNM Department of Anthropology, the Maxwell Museum, and the Maxwell Museum Association (MMA). CFAL collections encompass about 12,000 books and monographs, and over 110 journal titles. It also houses a complete collection of PhD dissertations and selected master's theses from the Anthropology Department, a map collection, and an extensive collection of reprints. All these materials deal with anthropological subjects and serve the entire UNM anthropology community, including the Anthropology Department, Maxwell Museum and its Association, and the Office of Contract Archaeology. Many of the materials housed in the Clark Field Archive have been donated by Department of Anthropology faculty over the years.

Almost all of CFAL's materials have been donated, with the exception of a couple dozen journal subscriptions supported by the Anthropology Department and MMA. About half the CFAL's collections are unique on the UNM campus, and perhaps in the state. CFAL collections are cataloged on LIBROS, UNM's computerized system. The catalog may be accessed at almost any computer on campus and via the Internet. This year, cataloguing was completed on all reprints and copies, allowing the collection of over 12,000 sources to be accessed online.

The MMA's annual <u>Albuquerque Antiquarian Book Fair</u> is an important source of funding for the Clark Field Archive, and is the oldest and largest such event in the state. The book fair is usually scheduled during the first full weekend in April.

Ortiz Center for Intercultural Studies

The Ortiz Center Gathering Space

The new Ortiz Center Gathering Space was developed this year and facilitated the new interactive space in the North Gallery of the Maxwell Museum that is dedicated to the memory of the late Professor Alfonso Ortiz. The inaugural exhibition, "Elements of the Earth" will feature an exhibition of pottery and related stories from Ohkay Owingeh (San Juan Pueblo) co-curated by Master Potter and UNM Instructor, Clarence Cruz of Ohkay Owingeh, and Kathryn Klein. Scheduled to open Fall 2008. The Gathering Space will provide a venue for Ortiz Center sponsored exhibitions that are co-curated by community members. (This is a minor capital project that took two years to complete. The touch screen presentation and video of Okhay Owingeh potters was completed in June 2008.)

Ortiz Family Program, Passport to People

Ortiz "Passport to People Program" presents a series of artisan demonstrations, hands-on family activities associated with changing exhibitions at the Maxwell, such as "El Rio" 2006-07; "North by Southwest: Bering Sea Communities" 2007-08; "Elements of the Earth 2008" and "Weaving Generations Together: Evolving Creativity in the Maya of Chiapas" opening in Fall 2009. Program developed by Kathryn Klein, and Maxwell Museum's Curator of Education, Amy Grochowski, and the Coordinator of Public Programs, Mary Beth Hermans. Free to the public and open to all ages on Saturdays. (Five programs were conducted in 2007-2008 with average of 200 visitors attending per program.)

Haak'u – A Plan to Prepare: The Sky City Cultural Center and Museum Initiative A collaborative project with the pueblo of Acoma to support the development of permanent exhibitions for the new facility. On-going.

Development of the Exhibition Weaving Generations Together: Evolving Creativity in the Maya of Chiapas Mexico

An exhibition co-curated by Patricia Greenfield (author), Kathryn Klein, and Amy Grochowski, Curator of Education. The exhibition planning includes built-in educational family activities to enhance visitor experience by learning about the process of learning and contemporary Maya family life in Chiapas, Mexico. Ortiz events include "Passport to People Program" in collaboration with the Natural History Museum's "Celebra Ciencia" program and Maya visitors from Chiapas. Spring 2009.

Native American Leadership Institute Conference

Native American Leadership Institute Conference is a joint project with the Leadership Institute, Santa Fe, to conduct a two day discussion with community leaders on Native American language retention. The conference was coordinated with Professor Louise Lamphere, of UNM Department of Anthropology, and Curator of the Museum of Indian

Arts and Culture, Tony Chavarria, May 2007.

Fostering Indigenous Business and Entrepreneurship in the Americas

Sponsored by Anderson School of Management Marketing and Heritage, this conference explored business opportunities for indigenous communities. Lectures and Sessions included: Cultural Heritage and Tourism Session, Brian Vallo Director Indian Pueblo Cultural Center, Cultural Preservation through Tourism; Vernon Lujan, Director Poeh Cultural Center, Museum Tribal Museum and Cultural Center Management. Jim Enote, Executive Director of A:shiwi A:wan Museum and Heritage Center, Zuni, Walking Straight on a Crooked Path, and K. Klein Collaborative Partnerships and Community Projects: UNMs Alfonso Ortiz Center. November 7-9 2007. Session chaired by Kathryn Klein.

Ortiz Center Native American Collections: The Museum to Museum Project Zuni Collection Review A:shiwi A:wan Museum and Cultural Center

The goals of the program include: Collections review all items that come from the Zuni Pueblo by A;shiwi A;wan museum staff members; extend the collections to the Zuni community through digital images of collections at the Maxwell; identify objects for the host museum (Maxwell Museum); Zuni staff members will contribute descriptions, narratives, comments, identifications, biographies; prioritize objects to be photographed in digital formats for the A:shiwi A:wan Museum and Cultural Center; photographs will be used to help collect oral histories and comments from Zuni community members.

Long term goals of the program include: Contribute to knowing where Zuni objects are located in collections throughout the world; contribute to gathering Zuni narratives about the Zuni collections at the Maxwell using the objects; help conserve Native American cultural heritage Project established June 2008.

Ortiz Center Public Policy Lecture Series/Louise Lamphere Public Policy Fellowship An endowed graduate scholarship to support the development of seminars, the Public Policy Lecture Series lectures, and workshops. Established in 2003.

Ortiz Public Policy Fellow 2007-2008 Marian Skahaan - Native American Language Retention Workshops

Coordinated by Lamphere Public Policy Fellows, visiting scholars and community members are invited to speak throughout the year On-going.

Lectures 2007-2008:

"Doctors Without Borders and Life in Crisis," November 2007. Dr. Peter Redfield,

"Globalization 'Southern Style': Transnational Migration and Organizing Workers Across Difference in Mississippi's Poultry Industry," November 2007. Angela Stuesse, Ph.D. Candidate, Anthropology, University of Texas at Austin and Weatherhead Fellow at the School of Advanced Research.

"Indigenous Land Rights in the Making: The Case of the Maya of Southern Belize," February 2008. James Anaya, James E Lenoir Professor of Human Rights Law and Policy University of Arizona, Rogers College of Law.

"Iron Hand in Ethnographically Informed Gloves? Anthropology, Torture, and the Importance of Engaged Critique in the Global War on Terrorism," April 2008. Laura A. McNamara, Ph.D. Member, AAA Ad Hoc Commission on the Engagement of Anthropology with the US Security and Intelligence Communities.

Mellon Foundation Fellowships

Building Future Leadership for the Advancement of Native American and Latino Humanistic Social Science at the University of New Mexico

UNM received a \$700,000 grant from the Andrew Mellon Foundation to fund a cohort-based fellowship program focused on advanced doctoral students from under-represented or disadvantaged groups who will be earning doctoral degrees in one of six social science or humanities departments at the University of New Mexico. The program's objectives are to increase the rate at which these students complete their doctorate and enter the workforce, particularly as college and university faculty. The program began this fall 2008 and will continue for four years, until 2012. UNM has backed this program with matching funds that total nearly \$300,000.

Goals of the Proposed Mellon Foundation Program:

- Provide competitive, multi-year graduate fellowships to students completing their doctoral degrees in Anthropology, American Studies, Communications and Journalism, History, Linguistics, and Sociology;
- 2. Increase the numbers of doctorates from these groups, including those who are Hispanic or Native American, in the social sciences and related humanities at UNM;
- 3. Place these individuals as they complete their studies as faculty at American universities and colleges.

Current Achievements:

- 1. We have selected 6 graduate students for the senior doctoral fellowships: 3 who will receive one year of funding; 2 who will receive 2 years of funding, and 1 who will receive 3 years of funding.
- 2. Because the Mellon grant funds have been distributed into an interest-bearing account we were also able to provide one year of tuition funding for another 6 graduate students, all of whom had applied for the doctoral fellowships.
- 3. On September 29, 2008 we sponsored a reception for all 12 students that included a welcome from President Schmidly and a presentation by Dr. Sylvia Rodriguez, Professor of Anthropology and Director of the Alfonso Ortiz Center for Intercultural Studies.

We expect our first cohort of completed doctorates by May 2009 when the 3 one year fellows will have completed their degree requirements.

SIGNIFICANT PLANS AND RECOMMENDATIONS

Professor Michael Graves began his first full academic year as Chair in August 2007. Associate Professor Osbjorn Pearson served as Assistant Chair in the year. Drs. Sylvia Rodriguez and Ann Ramenofsky continued to serve as Graduate Director and Undergraduate Director, respectively. Graves modified the composition of the Advisory Group to include the Assistant Chair, the conveners of the three subfields (Wills, Weigle, Pearson), and the Graduate and Undergraduate Directors.

This was a year of considerable activity in the Department of Anthropology. We welcomed several new faculty members: Dixon (Archaeology and Director of the Maxwell Museum), Muller (Evolutionary Anthropology) Nelson (Evolutionary Anthropology), Prufer (Archaeology). We recruited two new faculty lines, in the archaeology of South America and a senior evolutionary anthropologist. The faculty also identified their priorities for faculty recruitment in the future. A Space Committee was developed and they completed a comprehensive plan for the future large and small capital improvement projects for the Department. With the planned move of the Chaco Center program to the Hibben Center, renovating this space is a priority. We also completed the renovation of the main office complex and established a new biological anthropology laboratory in the Patio Office Complex. As the result of flooding of the Anthropology basement in the summer 2007, the laboratory complex was completely renovated as well.

The subfields and biological anthropology and human evolutionary ecology began working on the integration of their programs into a single undergraduate and graduate degree concentration. The Department will now be comprised of three subfields: archaeology, ethnology and evolutionary anthropology.

In an effort to place the funding for the Department of a firmer, more predictable basis, we now have a comprehensive budgeting process that includes state funds, extramural and intramural contract and grants, and UNM Foundation payouts. The annual budget for the Department in 2007-08, including all funds, was approximately \$3.5 million. We received approximately \$1.5 million in new extramural awards this year. The State Legislature also approved an addition to the recurring appropriation to support programming at the Ortiz Center. The Department also led a successful grant proposal to the Mellon Foundation to support senior graduate fellowships to students in 6 disciplines (including Anthropology) that will total nearly \$1,000,000 (with UNM commitments) over four years.

The Department completed a Strategic Plan for 2008-2013 that establishes a vision for the program and means towards achieving greater prominence. The Department also began the process of data collection and writing for the fall 2008 Self Study and External Review.

APPOINTMENTS AND SEPARATIONS

APPOINTMENTS

Faculty

Martin Muller, Assistant Professor Sherry Nelson, Assistant Professor Keith Prufer, Assistant Professor Ronda Brulotte, Lecturer III

Staff

Melissa Emery Thompson, Post Doctoral Fellow (February 2008) Matt Tuttle, User Support II (March 2008)

SEPARATIONS

Faculty

Debra Komar (June 2008, Resignation)

Staff

Erica Capling (September 2007, Resignation) Yolanda Nieto (May 2008, Resignation)

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- Feld, Steve. (CD+DVD) The Castaways Project (with Virginia Ryan), 32 page art booklet, audio CD, 15 minute video on DVD (soundtrack composer and filmmaker/producer) Santa Fe: VoxLox.
- Feld, Steve. (CD) Another Blue Train. Accra Trane Station (performer/producer). Santa Fe:VoxLox.
- Feld, Steve. (CD) Topographies of the Dark, Accra Trane Station (performer/producer).

 Santa Fe: VoxLox 1 5. (DVD) Hallelujah (1 hour documentary film; producer/camera/sound) Santa Fe: VoxLox
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CONTRACTS AND GRANTS

Faculty grants (total \$4,163,285):

National Science Foundation, "Investigating the Material Culture of the Pueblo Bonito Trash Mounds," PI: Patricia Crown, fund 2R99Z, 08/15/07 – 07/31/09, \$328,510.

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Wenner Gren Foundation, "The Ynalche Project: Water, Land, Politics and Society on the Late Prehispanic North Coast of Peru," PI: Frances Hayashida, fund 2RB19, 05/07/08 – 01/31/09, \$24,997.

UNM, Research Allocation Grant, "Host, Pathogens and the Re-Emergence of Tuberculosis in an Immunologically Compromised Indigenous Population of Eastern Paraguay," Dr. Magdalena Hurtado, \$4,000.

UC Santa Barbara, "Grandparenting and the Evolution of Post-Reproductive Lifespans," PI: Hillard Kaplan, fund 2R46R, UCSB primary with NSF, UNM sub award, 08/01/04 – 07/31/09, \$209,103.

Santa Fe Institute, "The Human Life Course and Biodemography of Aging," PI: Hillard Kaplan, fund 2R49L, SFI primary with NIH/NIA, UNM & UCSB subs, 10/01/04 - 04/30/09, \$1,620,770.

Wenner Gren Foundation, "The Use of Material Culture to Establish Ethnic Identity in International Investigations of Genocide," PI: Debra Komar, fund 2R85B, 12/01/06 – 07/31/08, \$22,931.

UNM, Research Allocation Grant, "San Rafael Oral History Project," Dr. Louise Lamphere, \$3,660.

National Endowment for Humanities, "Challenge Grant Alfonso Ortiz," PI: Louise Lamphere and Garth Bawden, fund 2R622, 12/01/98 – 07/31/07, \$144,881.

Mellon Foundation, "Building Future Leadership for the Advancement of Native American and Latino Humanistic Social Science at the University of New Mexico," PI: Louise Lamphere, fund 2R28Z, 01/01/08 – 07/31/13, \$700,000.

University of Alabama-Birmingham, National Institute of Health, "Molecular Epidemiology and Natural History of SIVcpz," PI: Martin Muller, fund 2R11G, UA primary with NIH, UNM sub award, 09/01/07 – 08/30/08, \$12,594.

Teacher Allocation Committee Grant, "Development of Laboratory Materials for Biological Anthropology Courses" Dr. Sherry Nelson, \$4,980.

UNM, Research Allocation Grant, "Kayabi Perspectives on Twentieth Century Brazilian Indian Relations: A View from the Missions," Dr. Suzanne Oakdale, \$1,715.

National Science Foundation, "The Uxbenka Archaeological Project," PI: Keith Prufer, fund 2R084, 09/18/07 – 11/30/09, \$83,507.

National Science Foundation, "Collaborative Research: (AOC) Development and Resilience of Complex Socioeconomic Systems: A Theoretical Model and Case Study from the Maya Lowlands," PI: Keith Prufer, fund 2RB53, 09/15/08 – 02/29/12, \$274,379.

Teacher Allocation Committee Grant, "New Course: The Anthropology of Water" Dr. Sylvia Rodriguez, \$2,700.

National Geographic Society, "Origins of Cantabrian Magdalenian: Excavations in Cueva del Miron" PI: Lawrence Straus, fund 2R87P, 05/15/07 – 01/30/09, \$22,000.

UNM, Research Allocation Grant, "The Solutrean-Magdalenian Transition in Cantabrian Spain: Continuing research at the Montane Site of El Miron Cave," Dr. Lawrence Straus, \$4,000.

National Science Foundation, "Archaeological Investigations at Chaco Canyon, NM," PI: Wirt Wills, fund 2R56V, 06/01/05 – 11/30/08, \$219,995.

National Science Foundation, "REU: Archaeological Investigations at Chaco Canyon, New Mexico," PI: Wirt Wills, fund 2R56V, 06/01/05 – 11/30/07, \$3,750.

National Geographic, "Archaeological Investigations at Chaco Canyon, New Mexico: Continued Study of National Geographic Society Trenches," PI: Wirt Wills, fund 2R72Y, 06/01/06 – 12/30/07, \$28,000.

Student grants: (total \$118,190)

National Science Foundation, "El Cholo: A Case Study Evaluating Site Variability and Social Organization in the Upper General Valley, Costa Rica," PI: Garth Bawden and student Roberto Herrera, fund 2R88A, 03/01/07 – 02/28/09, \$14,985.

National Science Foundation, "Tribes, States, and Landscapes: Social Structure, Land Use and Ecological Sustainability in Islamic Iberia," PI: James Boone and student Scott Worman, fund 2R89Z, 05/01/07 – 04/30/09, \$15,000.

National Science Foundation, "Impermanent vs. Intensive Agriculture: Population, Mobility, and Village," PI: Bruce Huckell and student Robert Powers, fund 2R54R, 04/01/05 – 03/31/09, \$11,998.

National Science Foundation, "Conflict and Cooperation in Nuclear and Extended Families among the Tsimane," PI: Hillard Kaplan and student Jonathan Stieglitz, fund 2R99J, 08/01/07 – 01/31/09, \$15,000.

National Science Foundation, "Late Upper Paleolithic Bone and Fiber Technologies: A Functional Analysis of Osseous Implements from the Magdalenian of Northern Spain," PI: Lawrence Straus and student Elisabeth Stone, fund 2R96M, 08/15/07 - 01/31/10, \$14,997.

National Science Foundation, "Woodland Period Mortuary Practices, Ancestorhood, and Ideology in West-Central Illinois," PI: Suzanne Oakdale and student Jason King, fund 2R85U, 01/01/07 – 12/31/08, \$11,997.

Leakey Foundation, "The Prevalence of Osteoarthritis in Wild Versus Captive Great Apes," PI: Osbjorn Pearson and student Demelza Poe, fund 2R70K, 01/01/06 - 12/31/07, \$11,404.

National Science Foundation, "Population Dynamics in Pre-Hispanic Northern Mexico," PI: Osbjorn Pearson and student Sophie Kohn, fund 2R85N, 01/15/07 - 12/31/07, \$10,829.

National Science Foundation, "Early Contact Period Interaction in the Western Spanish Borderlands," PI: Ann Ramenofsky and student Jennifer Boyd, fund 2R57W, 08/01/05 – 07/31/07, \$11,980.

Total of grants for FY08: \$4,281,475

GRADUATES

The Department of Anthropology provides baccalaureate degrees in both arts and sciences, along with masters and doctoral degrees. In 2007-08, 116 students graduated in Anthropology. Over the past seven years more than 772 students have earned degrees in Anthropology at UNM.

Academic Year	Number of BA/BS	Number of MA/MS	Number of PhD	Total
2002	88	30	9	127
2003	80	29	12	121
2004	75	12	9	96
2005	66	15	15	96
2006	79	23	12	114
2007	82	16	4	102
2008	91	14	11	116
TOTALS	561	139	72	772

Bachelor of Arts and Bachelor of Science

Summer/Fall 07

Brittany R. Hancock (BS)
Julia L. Hartmann (BS)

David M. Holtkamp (BA) Brandon J Beebe (BS) Laura P. Burnham (BS) Sammuel E. Kramer (BS) Rachel C. Bush (BA) Joshlyn G. Martinez (BA) Megan I. Coalson (BA) Melina C. Martinez (BS) Erik J. Coleman (BA) Lauren B. McBride (BA) Adrienne L. Coleman (BA) Rebecca A, McClure (BA) Amy L. Donahue-Grossman (BA) Amy V. Montoya (BA) Izabella K Fojud (BS) Stephanie M. Parks (BA) Pamela J. Gerber (BA) Carmelita F. Parraz (BA) Pamela S. Pearson (BA) Hillary M. Gorman (BA) Lee C. Graham (BA) Erica L. Schukar (BS)

Mary L. Whitehair-Frazier (BA)

Spring 08

Javier A. Herrera (BS)

Bo S. Johnson (BA)

Jessica A. Housand (BA)

Colin T. Baugh (BA) Elijah M. Kamermans (BA) Jeremy D. Begay (BS) Tamiko M. Kawawa (BS) Julia A. Bell (BA) Ruben S. Kerr (BA) Rachel Berardinelli (BA) Anna E. Knackstedt (BA) Hilary J. Bethancourt (BA) Melakeh B. Kurdi (BS) Katherine L. Boles (BA) Jessica C. Lacasse (BA) Beniamin M. Brooks (BA) Vincent J. Lee (BA) Megan G. Brovarney (BS) Casey M. Leo (BA) Laura Burnham (BS) Annemarie S. Mal (BA) Amanda S. Catron (BA) Sasha N. Miranda (BA) Rebecca J. Clark (BS) Jennifer A. Montoya (BA) Daniel K. Cummings (BA) Sarah R. Patteson (BS) D'Ziana M. Dendy (BA) Aaron C. Pedersen (BS) John M. Draper (BA) Danielle N. Pierce (BA) Kendra K. Edwards (BA) David M. Plaza (BA) Sureyya C. Elci (BS) Robert T. Puccetti (BS) Mariso Encinias (BA) Sean A. Ondes (BA) Jennifer E. Ferreira (BS) Shanhna S. Rajan (BS) Thomas J. Fitzgerald (BA) Douglas Rocks-Macqueen (BA) Rebecca C. Fowler (BA) Amos W. Roddy (BA) Rhonda L. Francisco (BS) Miriam Rodriguez (BS) Brenda S. Galaz (BS) Morgan Rountree (BS) Magdelene N. Gallegos (BA) C C. Savis (BA) Richard C. Gardner (BA) Jessica L. Sebring (BS) Lyndsey B. George (BA) Lindsey G. Sheffield (BA) Gabriela I. Gomez (BA) Katherine Thannisch (BA) Jessica M. Gross (BA) Erin L. White (BS) Heather R. Gardner (BS) Nina E. Williams (BS)

George W. Woods (BA)

Edward J. Worden (BA)

Clementine Zavelle (BA)

Bachelor of Arts and Bachelor of Science with Honors

Spring 08

Lewis Borck (BA) Archaeology

Honors Paper: Preliminary Results of an Organic Residue Analysis of Ceramics from Pueblo Bonita. Chaco Canyon

Mentor: Patricia Crown

Michael L. Deason (BA) Biological Anthropology

Honors Paper: Fluctuating Asymmetry and Elite Distance Running

Mentor: Osbjorn Pearson

Mary A. Shreve (BA) Archaeology

Honors Paper: Hispano-Romans or Visigoths: Who Inspired the Creation of the

Churches in Visigothic Spain

Mentor: James Boone

Alexander R. Woody (BA) Ethnology

Honors Paper: The Carguero as Public Spectacle

Mentor: Suzanne Oakdale

Master of Arts and Master of Science

Summer/Fall 07

William T. Brown (MA)

Helen E. Davis (MS)

Elvira Pichard (MS)

Stephanie M. Sanchez (MA)

Jessie A. Sanderlin (MA)

Tadesse Belen Sisay (MS)

Margaret K. Watson (MA)

Spring 08

Elizabeth A. Albright (MA)

Louis C. Alvarado (MS)

James C. Ellis (MS)

Caroline M. Gabe (MS)

Paul L. Hooper (MS) (with distinction)

Keiko Kitagawa (MS)

Bonnie Young (MS)

Doctor of Philosophy

Summer/Fall 07

Carole A. Lambourne

Dissertation: Early Socioecological Determinants of Adolescent Behavioral Strategies Magdalena Hurtado (chair)

Yuichi Nakazawa

Dissertation: Hearth-Centered Spatial Organization: A comparative Approach to the Study of Palimpsests in Late Upper Paleolithic Sites in Hokkaido (Japan) and Cantabria (Spain)

Lawrence Straus (chair)

Spring 08

Anna L. East

Dissertation: Reproduction and Prenatal Care in Arizona Prehistory: An Examination of Patterns of Health in Perinates and Children at Turkey Creek, Point of Pines Pueblo, and Grasshopper Pueblo
Osbjorn Pearson (co-chair), Jane Buikstra (co-chair)

Christina M. Getrich (with distinction)

Dissertation: American by Birth, Mexican by Blood: Cultural Citizenship and Identity among Second-Generation Mexican Youth
Louise Lamphere (chair)

Marcus J. Hamilton

Dissertation: Quantifying Clovis Dynamics: Confronting Theory with Models and Data Across Scales
Bruce Huckell (co-chair), James Boone (co-chair)

James D. Kilby

Dissertation: An Investigation of Clovis Caches: Content, Function, and Technological Organization
Lawrence Straus (co-chair), James Boone (co-chair)

Yann C. Klimentidis

Dissertation: Using Genetic Admixture to Examine Social and Phenotypic Aspects of Ethnicity Among New Mexican Hispanics and Native Americans
James Boone (co-chair), Geoffrey Miller (co-chair)

Kari M. Schmidt

Dissertation: An Assessment of the Settlement and Subsistence in Emergent Agricultural Economies in the Tucson Basin, United States, and Chihuahua, Mexico Bruce Huckell (co-chair), Wirt Wills (co-chair)

Ian Thompson (with distinction)
Chahta Intikba Im Aiikhva (Learning from the Choctaw Ancestors): Integrating
Dissertation: Indigenous and the Experimental Approaches in the Study of
Mississippian Technologies
Joe Watkins (co-chair), Bruce Huckell (co-chair)

Jonathan E. VanHoose Dissertation: Learning Lineages as Reflected in Ceramic Production in Early Historic Northwest New Mexico Ann Ramenofsky (chair)

Adriana Ramirez de Arellano Pagan (with distinction)

Dissertation: Voice and Identity in Legal Narratives of Gender Violence and Sexual

Torture in the Southwestern United States

Louise Lamphere (chair)

STUDENT AWARDS & FELLOWSHIPS

Undergraduate Student Awards, 2007-2008

Krisztina Kosse Memorial Scholarship

The Krisztina Kosse Memorial Scholarship is awarded annually by the Maxwell Museum of Anthropology to honor the memory of Dr. Krisztina Kosse, an archaeological scholar of the European Iron Age and for many years the Curator of Collections at the museum until her death in 1995. The scholarship is a cash award of \$200 given to an outstanding senior concentrating in archaeology, preferably with a special interest in or focus on Old World complex societies.

Recipient in 2007-2008: Daniel Thompson

Barbara MacCaulley Endowment Scholarship

The Barbara MacCaulley Endowment Scholarship is awarded annually by the Department of Anthropology to honor the memory of Barbara MacCaulley, who graduated from the university in 1951 and then pursued a career in the Foreign Service until her death in 1984. The scholarship is a variable cash award between \$400 and \$500 given to an outstanding undergraduate with a concentration in archaeology who is a full-time student entering their senior year with high motivation to pursue a career in archaeology.

Recipient in 2007-2008: Sarah Dixon

John Campbell Undergraduate Research Scholarship

Dr. John Martin Campbell, former Chair of the Department of Anthropology, has established a research scholarship for undergraduates. The funding is designated to support research costs for students, including travel support for students who are attending and participating in professional meetings.

Recipient in 2007-2008: Sarah Dixon and Lewis Borck

Indigenous Scholarships

The Indigenous Scholarships are \$1500 awards to undergraduate students who are members of officially recognized indigenous groups, including Native Americans and Pacific Islanders.

Recipients in 2007-2008: Vernacio Aragon, Jeremy Begay, Jeremy Seaton, and Lisa Sieben

Graduate Student Awards, 2007-2008

Frieda D. Butler Award

The Frieda D. Butler Award is given annually by the department of Anthropology to honor the memory of Mrs. Butler, who established an endowment in 1975, when her grandson, Dr. Richard A. Barrett, was a member of the department faculty. In 1981 Butler's daughter Margaret A. Barrett requested that a portion of the fund's income be used for "a small award to a promising graduate student in anthropology." The Butler Award of \$400-\$450 is given to an outstanding master's student who has not yet taken the doctoral specials examination. The recipient delivers a public lecture during the Fall semester.

Recipient in 2007-2008: Helen Davis

Lecture: Does a culture-free intelligence test really exist? Health and learning among Tsimane, a traditional and transitional population.

Karl H. Schwerin Graduate Fellowship in Ethnology

The Karl H. Schwerin Graduate Fellowship in Ethnology is awarded annually by the Department of Anthropology. Professor Schwerin of the department faculty endowed the fellowship, which was first awarded in 1999, for an ethnology graduate student who has not yet begun dissertation research and has not received other support. The recipient of \$500 is selected on the basis of scholastic ability, research potential, and financial need.

Recipient in 2007-2008: Margaret Motulouwitz

Frank J. Broilo, Harry W. and Margaret Basehart Memorial Endowment Scholarship The Frank J. Broilo, Harry W. and Margaret Basehart Memorial Endowment Scholarship is awarded annually by the Department of Anthropology to honor the memory of Frank J. Broilo, the first director of UNM's Office of Contract Archaeology until his death in 1979; Professor Harry W. Basehart, professor emeritus of anthropology until his death in 1988 and editor of the Department's Journal of Anthropological Research from 1962 to 1974 and 1981 to 1982; and his wife Margaret Basehart, who died in 1992. The scholarship is a cash award of \$500 given to deserving graduate students who are pursuing a course of study in archaeology and ethnology. The scholarship alternates annually between archaeology and ethnology graduate students, and this academic year has been awarded to four archaeologists.

Recipient in 2007-2008: Lucas Kellet and Kari Schleher

James and Helen McCaig Spuhler Graduate Fellowship

James N. Spuhler, who died in 1992 at the age of 75, is considered by many in the field to be the founder of anthropological genetics. Spuhler was the first physical anthropologist to be rigorously trained in human genetics, and he was the one who inspired the consistent introduction of a full understanding of modern genetic analysis into anthropological teaching and research. His wife, Helen McCaig Spuhler, endowed the Spuhler Graduate Fellowship in Biological Anthropology through her will. This award is given annually to an outstanding graduate student in Biological Anthropology.

Recipient in 2007-2008: Vitale Sparacello

Ruth E. Kennedy Award

The Ruth E. Kennedy Award is given annually by the Maxwell Museum of Anthropology to honor the memory of Ruth E. Kennedy, wife of Edwin L. Kennedy, a major donor to the museum. Initiated in 1981, the award recognizes Mrs. Kennedy's abiding interest in public education. The Kennedy Award of \$100 is given to an outstanding doctoral candidate chosen by the department faculty. The recipient delivers a public lecture during the Spring semester.

Recipient in 2007-2008: Sara Jamieson

Lecture: Is it in the Body or Mind? Wayuu Conversations about Culture.

Ethel-Jane Westfeldt Bunting Fellowship in Anthropology

Established in 1998, this fellowship provides an annual fellowship award in the amount of \$3000 per year for three years. Candidates must be enrolled as a third-year graduate student or have completed the MA but not yet completed Specials. The Fellowship is provided to students working toward a PhD in Ethnology or Archaeology.

Recipient in 2007-2008: Phil Geib

Karl Schwerin Graduate Fellowship in Ethnology

Established in 1996, this fellowship provides \$600 scholarship support to graduate students studying ethnology, cultural anthropology or social anthropology in the Department of Anthropology. The fellowship is awarded to students who have received no other support, and primary consideration is based on scholastic ability and research potential.

Recipient in 2007-2008: Margaret Motulouwitz

Tom L. Popejoy Dissertation Award

The prize is awarded, on a rotating basis, to the author of the most outstanding dissertation submitted in one of three major research areas. This year the selection was made from the Social Sciences and Education area. Dissertations nominated by departments are considered by a panel of judges for excellence at the highest academic and technical level, good literary form, and general human interest. The award is \$1000.

NEXT ANTHROPOLOGY ROTATION 2010

Ortiz Public Policy Fellowship

The Alfonso Ortiz Center for Intercultural Studies awarded the first Louise Lamphere Public Policy Grant in 2006-2007. Eligible candidates for this award must be in the Ethnology Program and at the stage of writing up the dissertation, and should be conducting research that is both collaborative and relevant to a policy issues. Ideally, they will also be resident in Albuquerque. Possible policy areas include, but are not limited to health care, immigration, education, labor or workplaces issues, human rights, and the environment. The grant carries a stipend of \$10,000.

Recipient in 2007-2008: Marianne Skahan

The Frank Hibben Charitable Trust

Frank Hibben first came to New Mexico in the mid-1930s on an expedition to collect small mammals and birds for the Cleveland Museum of Natural History. A 1933 Princeton University archaeology graduate, Hibben was so fascinated by the Native American cliff dwellings that he decided to attend graduate school at the University of New Mexico and make New Mexico his home. Dr. Hibben received a master's degree in zoology with field studies of the mountain lion from the University of New Mexico in 1936. He continued his education at Harvard, receiving his PhD in archaeology in just one year, and then returned to New Mexico to begin his teaching career at UNM. In 2002, construction was completed on the Hibben Center for Archaeological Research. The Center is the home of the Hibben Trust, a \$10 million endowment which furnishes annual grants to students working in the field of archaeological research.

2007-2008 Hibben Scholarships

1st year students: Adam Okun and Adam Nazaroff

2nd year students: Felipe Colon and Christopher Merriman

2007-2008 Hibben Senior Awards Jennifer Macy and Lois Frank

2007-2008 Hibben Junior Awards

1st year students: Herman Leo Gutierrez and Kelli Shoaf

2nd year students: Caroline Gabe and Phil Geib

2007-2008 Hibben Senior Dissertation Award Connie Constan and Jonathan Van Hoose

2007-2008 Hibben Non-Recurring Special Award Antonio Chavarria and Nicholas Jarman

Graduate Dean's Dissertation Fellowship

Provided through the Office of Graduate Studies, this \$8000 award is intended to provide support to students completing their doctoral dissertations.

Recipient 2007-2008: Nicole Kellett

Field Site Development Grants

Provides financial support for graduate field work. An award of \$2000 is disbursed among successful candidates.

Recipients in 2007-2008: Sean Gantt, Christina Mello, Chris Merriman, Kelly Sawyer

Arts and Sciences Special Recruitment Award

An award of \$5000 is provided to students to recruit and retain them during their doctoral coursework.

Recipient in 2007-2008: Adam Okun

Higher Education Development (HED) Graduate Fellowship

The Graduate Scholarship Program was created to increase graduate enrollment at public post secondary institutions, particularly among those students who are minorities and women. The maximum award amount is \$7,200 per year. This award may be renewed annually based on academic standing. Recipient must serve 10 hours per week in an unpaid internship or assistantship. Recipient must also be provided with 10 hours per week of paid internship or assistantship, including tuition waiver and health insurance. These scholarships are intended for full-time students from groups traditionally underrepresented in their field who have financial need.

Recipients in 2007-2008: Lavinia Nicolea, Patrick Staib, Louis Alvarado, Sean Bruna, Kelly Sawyer, Herman Leo Gutierrez

Graduate Travel Awards

The Department provides travel funding on a competitive basis to graduate students who will attend and present at professional meetings. Awards are generally \$300 each.

Recipients in 2007-2008: Jill Ahlberg-Yohe, Wesley Allen-Arave, Jennifer Boyd, Phil Geib, Lavinia Nicolae, Nicole Kellet, Patrick Staib, Hannah Fretwell, Lucas Kellet, and Tim Peterson

Student Contract and Grant Awards listed in Contract and Grant Section of this Report

PROFESSIONAL ACTIVITIES AND HONORS

Boone, Jim

"Leadership, Cooperative Networks and the Origins of Inequality;" James L. Boone and Paul Hooper. Annual Meetings of the Society for American Archaeology; Vancouver, B.C., Canada; March 29, 2008.

Brulotte, Ronda

Art, Artifact and Authenticity: Woodcarving and Archaeological Replicas in Oaxaca, Mexico, School for Advanced Research, Santa Fe, NM, 2008.

Visual Regimes of Exclusion and Oaxacan Archaeological Heritage, American Anthropological Association, Washington, D.C., 2007.

Art, Artifact and Authenticity: Woodcarving and Archaeological Replicas in Oaxaca, Mexico, Hulbert Center for Southwest Studies Aficionados Luncheon, Colorado College, Colorado Springs, CO, 2007.

Director, *Conexiones* 2008 Program in Michoacan, Mexico, University Honors College and the Department of Spanish and Portuguese, University of New Mexico, Albuquerque, NM.

Anthropology Colloquia Series Co-Organizer, Department of Anthropology, University of New Mexico. 2007-present.

Member, Peace Fair Organizing Committee, Peace Studies Program, University of New Mexico. 2008.

Co-Organizer, "Oaxacan Life and Art" Artisans of the World Series, Maxwell Museum of Anthropology, University of New Mexico. 2008.

Co-Organizer (with Dr. Keith Prufer), Indigenous Land Rights Conference, University of New Mexico, 2008-present.

Chapman, Richard

Presenter at public hearing concerning proposed excavations at Alameda Elementary School (12/12/07)

Guest Lecturer for NMSU Anthropology 507 "Cultural Resource Management II" (2/20/08)

Illustrated talk to San Juan Basin Archaeological Society (2/28/08)

UNM Board of Archeologists (Chair)

UNM Historic Preservation Committee (Anthropology Department representative)

New Mexico Archaeological Council Fall Conference, Albuquerque, NM 11/17/07

Society for Historical Archaeology 41st Annual Conference on Historical and Underwater Archaeology, Albuquerque, NM (1/12/08)

Senior Principal Investigator, Albuquerque Public Schools. Kindergarten Building Excavations at LA 421, the Alameda School Site (final report)

Senior Principal Investigator, Albuquerque Public Schools. Testing Program for Alameda Elementary School Kindergarten Playground (LA 421)

Senior Principal Investigator, Albuquerque Public Schools. Geophysical and Archeological testing for Alameda Elementary Drainage Improvement Project (LA 421)

Senior Principal Investigator, Albuquerque Public Schools. Excavations and Monitoring for Alameda Elementary Drainage Improvement Project (LA 421)

Senior Principal Investigator, *Albuquerque Public Schools*. Excavation and Monitoring for APS West Side Educational Corridor (Mid School and Elementary School construction

Senior Principal Investigator, Anthony-Berino Chamber of Commerce. Archeological Survey of Business Park Tract, Doña Ana County, NM

Senior Principal Investigator, Bandelier National Monument. Site Update Survey Bernalillo County

Senior Principal Investigator, *Bandelier National Monument*. Osteological and Historical artifact analysis of assemblages from the Historic Alameda Church Cemetery and Plaza (analysis and final report)

Senior Principal Investigator, Central New Mexico Community College. Archeological

Excavations at LA 131957, CNM West Side Campus, Bernalillo County, New Mexico (final report)

Senior Principal Investigator, Central New Mexico Community College Archeological Survey of CNM Rio Rancho Campus Tract

Senior Principal Investigator, *Enserca Engineering*. Excavation, Monitoring, and Analysis for 47 Sites along the Mid-America Pipeline (MAPL)

Senior Principal Investigator, Enterprise Products Operating, LLC (EPCO)

Crown, Patricia

Presenter, Chacoan Cylinder Jars. Paper presented in the symposium, "The Chaco Stratigraphy Project: Ongoing Research and Preliminary Results." 73rd Annual Meeting of the Society for American Archaeology. March, Vancouver. (2008)

Presenter, With Lewis Borck. Preliminary Results of Organic Residue Analyses of Ceramics from Pueblo Bonito, Chaco Canyon. Paper presented in the symposium, "The Chaco Stratigraphy Project: Ongoing Research and Preliminary Results." 73rd Annual Meeting of the Society for American Archaeology. March, Vancouver. (2008)

Presenter, Archaeological Research on Children. Paper presented in the symposium, "Convening a Summit of Anthropologists studying Childhood: "Just like children, we can learn to get along." 106th annual Meeting of the American Anthropological Association. November, Washington, D.C. (2007)

Dissertation Committee, Jon Van Hoose, 2008, UNM, Navajo Ceramics

Dissertation Committee, Anna East, 2008, UNM, Reproduction and Prenatal Care in Arizona Prehistory: An Examination of Patterns of Health in Perinates and Children at Grasshopper, Point of Pines, and Turkey Creek Pueblos

Undergraduate Honors Advisor, Lewis Borck, 2007/2008, UNM Organic Residues at Pueblo Bonito (with presentation at the 4th Annual UNM Undergraduate Research and Creativity Conference)

High School Research Mentorship in Ceramics Laboratory, Marth Hughes, Senior Project, Albuquerque Academy (2008)

Internal Member, Department of Biology External Review, University of New Mexico (2008)

Outside Reviewer for Tenure/Promotion, SUNY Binghamton (2007)

Outside Reviewer for Tenure/Promotion, Arizona State University (2007)

Reviewer, Cambridge Archaeological Journal

Reviewer, Journal of Anthropological Research

Reviewer, Journal of Archaeological Method and Theory

Reviewer, American Anthropologist

Reviewer, American Antiquity

Reviewer, Journal of Anthropological Archaeology

Reviewer, National Science Foundation (2007-2008)

Reviewer, American Philosophical Society

Chair, Society for American Archaeology, Committee on Award for Excellence in Archaeological Analysis

Head of Editorial Board, Pottery Southwest (2006-present)

Southwest Seminars Series (Santa Fe non-profit) (2007)

University of Missouri Adult Day Connection lecture (2007)

University of Arizona Southwest Land, Culture and Society Distinguished Lecture (2007)

University of Arizona Department of Anthropology invited lecture (2007)

Southwest Seminars Series (Santa Fe non-profit) (2008)

University of Iowa Department of Anthropology Brown Bag Series (2008)

University of Iowa Invited Lecture (2008)

University of New Mexico Department of Womens Studies Invited Lecture (2008)

Search Committee, Department of Anthropology Senior Biological Anthropologist Search

Member, Department of Anthropology Space Committee

Chair, Department of Anthropology Code 1 Review for Keith Prufer

Dixon, James

Symposium discussant at the annual meeting of the Society for American Archaeology

Manuscript reviewer for several journals and proposals to the National Science Foundation

Presented several public lectures

Chaired and served on numerous committees

Served a the lead respondent for two UNM internal audits.

Edgar, Heather

National Library of Medicine NIH Informatics Grant, \$413,373. Role: Principal investigator. Phillip Kroth and Edward Harris, Co-P.I.s.

National Institute of Justice Research and Development in Forensic Anthropology Grant, \$22,526 (pending). Role: Principal investigator of subaward. Nicholas Hermann, P.I.

National Institutes of Health, National Center for Minority Health and Health Disparities Loan Repayment Program Recipient, 2008-2009.

What's New at The Maxwell: Recent Acquisitions. Winter/Spring 2007-2008. Role: Cocurator, with Catherine Baudoin, Patrick Hogan, Kathryn Klein, and Dave Phillips. Maxwell Museum of Anthropology Bawden Gallery.

Feld, Steve

Six months research in Accra, Ghana on Jazz and Cosmopolitanism

Work toward completion of Bosavi Digital Archive (a digital archive of photographs, films, audio, and texts from 40 years research in Bosavi, Papua New Guinea, in collaboration with E.L. Schieffelin (University College, London) and B.B. Schieffelin (NYU); funded by the Tides Foundation.

Art/Performance in USA, Ghana, UK, Italy, Finland

Video Screenings in USA, Ghana, Italy, UK, Finland

Invited lectures, workshops, and professional presentations in USA in Santa Fe, Tempe, Milwaukee, Boston, NYC; in Europe in Oslo, Bergen, Milan, Rome, Venice, Manchester, Helsinki

Currents, Keynote Lecture: Beyond Text? Granada Centre for Visual Anthropology and Department of Anthropology, University of Manchester, Manchester, UK

Annette Weiner Memorial Lecture, Dept. of Anthropology, NYU

Greater Boston Anthropology Consortium Distinguished Lecture, Wellesley College 6. Continuing appointment as Professor II, Institute of Musicology, University of Oslo, Norway, (20% Professorial term appointment for 2007-2012)

Field, Les

"The Many Uses of Nicaraguan Pottery: Three Decades of Change Among the Potters of San Juan de Oriente, Nicaragua," Invited Lecture, University of Helsinki, Finland, November 7, 2007.

"Writing Collaborative Ethnographies: When We Read What They Write," Annual Meetings of the American Anthropological Association (Washington DC), 2007.

Snead-Wertheim Endowed Lectureship in Anthropology and History (awarded April 2008)

Fulbright Research/Lecturing Fellowship, 2008-2009 (awarded March 2008)

Book Review: Quest for Tribal Acknowledgment: California's Honey Lake Maidus. Sara-Larus Tolley (2007) <u>American Indian Culture and Research Journal</u> 31(1): 162-164.

Book Review: Seeing Indians: A Study of Race, Nation, and Power in El Salvador. Virginia Tilley (2007) <u>Journal of Latin American Studies</u> (39)1: 214-216.

Book Review: Courage Tastes of Blood: The Mapuche Community of Nicolás Ailío and the Chilean State, 1906-2001. Florencia E. Mallon (2007) Journal of Latin American and Caribbean Anthropology 12(1): 268-270.

Graves, Michael

Chair, Department of Anthropology

McCoy, M.D., and M.W. Graves, Valley and Gulch Agriculture: Innovation, Adaptation, and Agricultural Development in Windward North Kohala, Hawai'i Island. Paper presented in "Agricultural Production and Subsistence in the Pacific: Recent Analyses and Investigations" organized by J. Field and W. McElroy, at the 73rd Annual Meeting of the Society for American Archaeology, Vancouver, BC. March 27-30, 2008.

Graves, M.W., J. Field, M. Oxley, and J. Espiritu, Agricultural Production and Lithic Distribution in Pololu Valley, North Kohala, Hawai'i Island. Paper presented in

"Agricultural Production and Subsistence in the Pacific: Recent Analyses and Investigations" organized by J. Field and W. McElroy, at the 73rd Annual Meeting of the Society for American Archaeology, Vancouver, BC. March 27-30, 2008

Ladefoged, T.N., C. Lee, and M.W. Graves, Modeling Life Expectancy and Surplus Production in Pre-contact Territories in Leeward Kohala, Hawai'i. Paper presented in "Agricultural Production and Subsistence in the Pacific: Recent Analyses and Investigations" organized by J. Field and W. McElroy, at the 73rd Annual Meeting of the Society for American Archaeology, Vancouver, BC, March 27-30, 2008

Graves, M.W., Discussant, "Forum on Field Schools: Funding and Futures" organized by Bonnie Pitblado and Lawrence Todd, at the 73rd Annual Meeting of the Society for American Archaeology, Vancouver, BC. March 27-30, 2008

Graves, M. W., J.S. Field, and J. Espiritu, *The Development of Agricultural Complexes in Pololu Valley, Kohala, Hawai'i Island.* Paper presented in "Archaeology and Prehistory of Kohala" organized by M.W. Graves and M. D. McCoy, at the Annual Meeting of the Society for Hawaiian Archaeology, Outrigger Keauhou Beach Resort, Kona, HI. October 20-21, 2007.

McCoy, M. D., M.W. Graves, and J.S. Field, Agricultural Variation in Windward North Kohala, Hawai'i Island: Preliminary Results of the 2007 Hawaii Archaeological Research Project. Paper presented in "Archaeology and Prehistory of Kohala" organized by M.W. Graves and M. D. McCoy at the Annual Meeting of the Society for Hawaiian Archaeology, Outrigger Keauhou Beach Resort, Kona, HI. October 20-21, 2007.

Richards, L., C. Calugay, M. D. McCoy, and M. W. Graves, Mahele Land Claim Awards in North Kohala, Hawai'i Island: Results from Recent Research. Paper presented in "Archaeology and Prehistory of Kohala" organized by M.W. Graves and M. D. McCoy at the Annual Meeting of the Society for Hawaiian Archaeology, Outrigger Keauhou Beach Resort, Kona, HI. October 20-21, 2007.

Huckell, Bruce

Taught the Southwestern Summer Archaeological Field School (Anth 375/575) in Summer 2007 at the Mockingbird Gap Clovis site (10 students)

Continued to serve as a member of the Anthropology Department newsletter committee

Continued as Interim Director of the Maxwell Museum from July 1, 2007-Dec. 1, 2007

Resumed position as Senior Research Coordinator Dec. 1, 2007

Resumed leadership of the Collections/Research Division

Worked with several other individuals for passage of a cultural resources protection ordinance for the City of Albuquerque; passed into law in spring of 2007

Arranged with three individual artifact owners the donation of a large portion of the Beach Clovis Cache to the North Dakota Heritage Center

Attended the Society for American Archaeology annual meeting in Vancouver; presented one paper, coauthored a poster, and served as a discussant in an invited symposium

Joined the University Press Committee as a member

Fall 2007-Spring 2008 Served as a member of the search committee for the new Senior Development Officer, College of Arts and Sciences

Spring 2008 Served as a member of the Mid-Probationary Committee for Heather Edgar, Department of Anthropology

National Geographic Society; A Cache of Clovis Artifacts near Beach, North Dakota (\$16,832), 2007.

Lancaster, Jane

Scientific Editor, Human Nature

Member, Graduate Committee, Fall 2007

Chair, Keith Hunley's Mid-Probationary Review Committee, Fall 2007

Member of the Main Campus Institutional Review Board, June 2007-June 2011

Convener, Human Evolutionary Ecology

Member, Annual Review Committee for Martin Muller

Mentor, Sherry Nelson

At-Large Board Member, Evolutionary Anthropology Society, American Anthropology Association Section, 2004-2008

Member, Publications Committee, Human Behavior and Evolution Society

Review for Promotion to Full Professor, Beverly Strassman, Department of Anthropology, University of Michigan, 2007

Review for Promotion to Full Professor, Richard Bribriescas, Yale University, 2007

President, National Alliance on Mental Illness, Albuquerque NM Chapter, 2002-2008

Secretary, National Alliance on Mental Illness, Albuquerque NM Chapter, 2008-

Faculty Sponsor, Primate Enrichment Program, Rio Grande Zoo, Albuquerque 2002-present

Campus Neighborhood Association, Lease Committee, 2006–2008

Muller, Martin

"Sexual coercion among chimpanzees" Invited talk. University of New Mexico, Department of Psychology. (March 2008)

"Male coercion and female choice in wild chimpanzees." Invited talk. University of California, Davis. Ecology and Evolution Seminar Series. (May 2008)

Represented the Kibale Chimpanzee Project at the Max Planck Institute for Evolutionary Anthropology's (Leipzig) meeting of the Chimpanzee Cultures Collaborative Project. (October 2008)

"Fatherhood and testosterone in Hadza hunter-gatherers and neighboring Datoga pastoralists." Human Behavior and Evolution Society, Annual Meeting. Williamsburg, Virginia. June 2007 (MN Muller, FW Marlowe, R Bugumba & PT Ellison)

The human life course and the biodemography of aging. H Kaplan, M Gurven, E Crimmens, C Finch, M Muller, E Erdei, J Winking & ME Thompson. National Institutes of Health (submitted 2008)

Developmental instability and oxidative stress. S Gangestad, M Flinn, D Leone, MN Muller. National Institutes of Health (submitted 2008)

LTREB Collaborative Research: The adaptive value of coalitions and long-term social bonds among wild chimpanzees. MN Muller and RW Wrangham. National Science Foundation, 5 year grant (\$260,820 requested for UNM's share) (submitted 2008)

Stress, energetics and the costs of reproduction in wild chimpanzees. National Science Foundation. MN Muller, M Emery Thompson & RW Wrangham. 3 year grant (\$259,128 requested: all for UNM) (submitted 2008)

Member, Search Committee for Senior Biological Anthropologist

Reviewer, American Journal of Primatology

Reviewer, Physiology and Behavior

Reviewer, Current Biology

Reviewer, American Journal of Primatology

Reviewer, Behavioral Ecology and Sociobiology

Reviewer, L.S.B. Leakey Foundation

Nelson, Sherry

Consultant for development of a new human evolution exhibit for the Maxwell Museum University of New Mexico (2008)

University of New Mexico Anthropology departmental seminar series coordinator

Peer reviews: Palaeogeography, Palaeoclimatology, Palaeoecology; Human Nature; Mammalian Biology; Naturwissenschaften; grant evaluations for the Academy of Finland and the National Natural Science Foundation of China

"Reconstructing Miocene hominoid paleoecology." SIBBS (Seminar in Biological and Biomedical Sciences) lecture series, University of New Mexico. (2008)

"Sivapithecus: the life and death of a Miocene ape." Ancestors Lecture, Maxwell Museum of Anthropology, University of New Mexico. (2008)

"Mesowear analysis of selenodont ungulates in the Middle to Late Miocene of the Siwaliks, Pakistan: dietary and paleoenvironmental implications." Society of Vertebrate Paleontology. Belmaker, Nelson, Morgan, Barry, and Badgley. (2007)

Oakdale, Suzanne

"A Kayabi Shaman and his Global Assemblages." Paper presented in the Plenary Session of the meetings for the Society for the Anthropology of Lowland South America, Oxford University, England, June 2008.

Member, three-person group functioning as the book review editor for the *Journal of Anthropological Research*

Member, Advisory Board for Tipití: Journal of the Society for the Anthropology of Lowland South America

At-large board member, the Society for the Anthropology of Lowland South America

Reviewed 2 books for the University of Nebraska Press, 1 book proposal for Duke University Press.

Prufer, Keith

Continued research at Uxbenká, Belize funded by a \$129,000 grant from NSF (2007-2009) to study the development of complex polities and interpolitiy exchange.

The 2008 summer field session had nine undergraduate students from UNM, University of South Florida, University of LaTrobe (Australia) and University of Minnesota. Students participated in a five week field field school at Uxbenká. Additional funding for the field program came from a Title VI-A award to LAII.

Committee service: In 2008 one MA thesis (Wichita State Univ.) was completed and currently there are four PhD students working on projects towards their dissertations.

Rodriguez, Sylvia

Association of Latina and Latino Anthropologists 2007 Book Award, for <u>Acequia: Water Sharing</u>, Sanctity, and Place.

Sarah Belle Brown Community Service Award, UNM, March 4, 2008

- "Acequias and the Moral Economy of Water," Taos Historical Society, July 7, 2007.
- "Acequias and the Moral Economy of Water," Ft. Burgwin (SMU), July 17, 2007.
- "Acequias and the Moral Economy of Water," UNM School of Law, September 12, 2007.
- "Acequias and the Moral Economy of Water", New Mexico Acequia Commission, Office of the State Engineer, Santa Fe, September 28, 2007.

Panelist for Round Table Discussion on The Shift of Land, Northern New Mexico Community College, October 17, 2007.

- "Acequias, Globalization, and the Moral Economy of Water," presentation at Liquid Assets, a public symposium co-sponsored by the Museum of New Mexico, Friends of Archaeology, and the School for Advanced Research, Santa Fe, November 3, 2007.
- "Acequias, Globalization, and the Moral Economy of Water," Biology Department Colloquium, UNM, February 28, 2008.
- "Acequia Irrigation Traditions in the Taos Valley," Preservation and Pilgrimage, New Mexico Heritage Preservation Alliance annual conference, March 13, 2008.
- "The Matachines Dance: Spiritual Conquest and Ritual Memory," Institute for Medieval

Studies Lecture Series, UNM, April 2, 2008.

"Mapping Traditional Landscapes in New Mexico Communities," Public Forum and Workshop, UNM School of Architecture and Planning, April 26, 2008.

"The Matachines Dance as Social Drama" Matachines panel, Gathering 2008, NM Folk Arts Program, National Hispanic Cultural Center, May 16, 2008

"Mapping the Irrigated and Sacred Landscape," Third Annual Land and Water Institute, Highlands University, May 20, 2008.

"Over Behind Mabel's on Indian Land: Utopia and Thirdspace in Taos," SMU Ft. Burgwin Archaeological Field School, June 9, 2008.

KRZA & affiliates, December 28, 2007.

KTAO, Dec 5, 2007 & ongoing, Weekly 15-minute program on the Anthropology of New Mexico and the Southwest, hosted by Nancy Stapp.

Testimony on behalf of the Sanchez, Molino, Lovatos ditches at Taos City Council Public hearing on Valverde Commons, February 4, 2008

Singer, Beverly

Documentary Film Produced. *The Answers Lie Within: The Institute of American Indian Arts in Southern Africa*, Producer/Director/Editor. October 2007 (27 min. and 56 min.) The film is being used to expand the Kellogg Foundation initiatives that intersect cultural and economic programs in Southern Africa in partnerships with Native American arts and culture in the U.S.

Invited Consultant, Dialogue on "Indigenous Peoples' Development with Identity." Global Consultation-Workshop and Dialogue on "Indigenous Peoples and Development with Identity," Rome, Italy, from 14 to 18 March 2008. Tebtebba Foundation (Indigenous Peoples' International Centre for Policy Research and Education) in cooperation with the International Fund for Agricultural Development (IFAD). CGIAR (ConsultativeGroup on International Agricultural Research), UN agencies and NGOs concerning Principles of Engagement with Indigenous Peoples.

International Research Conference Sponsor. Spring 2008, Institute For American Indian Research hosted the first International Indigenous Graduates' Student Conference and Symposium at UNM on April 3 &4 with over 130 in attendance.

Straus, Lawrence

Re-elected (by the US National Academy of Sciences) for an unusual third term to the US National Committee for the International Union for Quaternary Research (INQUA).

Editorial Boards of six European archeology/prehistory journals

US representative on the Commission on the European Upper Paleolithic of the International Union for Pre- and Proto-Historic Sciences (UISPP).

Presenter in a specialized 3-day symposium on the Solutrean in France, whose proceedings are in press.

Reviewed over two dozen grant proposals for US and foreign agencies/foundations and manuscripts for other journals.

Informal adviser for several Spanish (Universidad de Cantabria) students, notably Igor Gutierrez Zugasti.

Translation and/or edititing manuscripts for Spanish colleagues as a professional courtesy.

Elected member of the UNM Academic Freedom & Tenure Committee in 2007-08

Chair, joint Department of Anthropology/Maxwell Museum Clark Field Archive & Library Policy Committee and continues to serve as the Library Liaison for Anthropology

Chair, Search Committee for South American archeology Assistant Professor

Member of the probationary review committee for an Assistant Professor Keith Prufer

French & Spanish Language Examiner for Anthropology

Chair/co-chair or member of numerous Ph.D. dissertation committees

Member, European Studies Faculty

Member, UNM/US Park Service Planning Committee for the "Set in Stone" rock art symposium held at UNM in Fall 2007.

Coordinator, two JAR Distinguished Lectures: Jean Clottes, in conjunction with "Set in Stone" and Regna Darnell

Special issue of JAR in memory of UNM Professor Robert Santley

Stuart, David

Thirteen public lectures, including KUNM Radio, "The Ecuador Effect", OASIS(a series of three lectures on Prehistoric New Mexico), and the usual National Park Service lectures, including at Chaco Canyon, Bandelier Nat. Mon., Petroglyph Park, Aztec Nat. Monument, Tijeras Pueblo, School of Advanced Research

Four other lectures on NE Mexico Arch for local Archaeological Societies

Nine public book readings

Formal Consulting on enhancing student graduation rates at U. Missouri main campus

DEPARTMENT OF ANTHROPOLOGY JULY 1, 2007-JUNE 30, 2008

DEPARTMENT LECTURES

August 22, 2007. Dr. Enrique LaMadrid, Latin Amerian Folk Music: Tradition, Innovation, and Social Justice. Hibben 105. (Artisans of the World Lecture Series)

September 19, 2007. Dr. Jean Clottes, Rock Art: An Endangered Heritage Worldwide. Anth 163. (Journal of Anthropological Research Distinguished Lecture)

October 25, 2007. Dr. Walter Van Horn, Eskimo Drawings. Hibben 105. (Artisans of the World Lecture Series)

November 1, 2007. Dr. Peter Redfield, *Doctors Without Borders and Life in Crisis*. Hibben 105. (Ortiz Public Policy Lecture Series/Anthropology Colloquia Series)

November 7, 2007. Helen Davis, Does a Culture-Free Intelligence Test Really Exist? Health and Learning Among the Tsimane, A Traditional and Transitional People. Hibben 105. (Frieda Butler Memorial Lecture)

November 15, 2007. Angela Stuesse, Ph.D. Candidate, Anthropology, University of Texas at Austin and Weatherhead Fellow at the School of Advanced Research, Globalization 'Southern Style': Transnational Migration and Organizing Workers Across Difference in Mississippi's Poultry Industry. Hibben 105. (Ortiz Public Policy Lecture Series/Anthropology Colloquia Series)

January 23, 2008. Dr. Rebecca Schwendler, Hokona: A Unique, Multi-faceted Pueblo III Site Near El Morro National Monument. Hibben 105.

January 31, 2008. Dr. Sherry Nelson, The Extinction of Sivapithecus: Faunal and Environmental Changes Surrounding the Disappearance of a Miocene Hominoid in the Siwaliks of Pakistan. Hibben 105. (Ancestors Lecture)

February 2008. James Anaya, James E Lenoir Professor of Human Rights Law and Policy University of Arizona, Rogers College of Law, *Indigenous Land Rights in the Making: The Case of the Maya of Southern Belize.* Hibben 105. (Ortiz Public Policy Lecture Series)

February 7, 2008. Dr. Regna Darnell, University of Western Ontario, Benedictine Visionings of the Southwest Cultural Diversity: Beyond Relativism. Hibben 105. (Journal of Anthropological Research Distinguished Lecture Series)

February 8, 2008. Dr. Regna Darnell, University of Western Ontario, Nomadic Legacies: Native North American Residential Mobility and Decision-Making. Anth 178. (Journal of Anthropological Research Specialized Seminar)

February 14, 2008. Jeffrey Tobin, PhD from the Department of Critical Theory & Social Justice, Occidental College, Models of Machismo: The Troublesome Masculinity of Male Tango Dancers. Hibben 105. (Anthropology Colloquia Series)

February 21, 2008. Dr. Matthew Bandy, SWCA Environmental Consultants, History and Process in Titicaca Basin State Formation. Anth 248.

February 25, 2008. Dr. Kevin Vaughn, Purdue University, Prehispanic Craft Production and Mining in Nasca, Peru. Anth 248.

March 3, 2008. Dr. Donna Nash, University of Illinois-Chicago, Plotting Connections Between Households and States: Technology and Political Economy on the Wari Frontier, Moquegua, Peru. Anth 248.

March 6, 2008. Dr. Frances Hayashida, University of Minnesota, Water, Land and Politica on the Late Prehispanic North Coast of Peru. Anth 248.

March 7, 2008. Christina Getrich, PhD Candidate, "American by Birth, Mexican by Blood": Cultural Citizenship and Identity among Second-Generation Mexican Youth. Anth 178. (Dissertation Defense)

March 13, 2008. Dr. Margaret Connell-Szass, The Celtic Connection: Gaetacht and Its Indigenous People. Hibben 105.

March 24, 2008. Dr. Jeffrey Long, University of Michigan Medical School, Natural Selection for an Allele that Blocks Ethanol Metabolism. Anth 248.

March 24, 2008. Yann Klimentidis, PhD Canddiate) Using Genetic Admixture to Examine Social and Phenotypic Aspects of Ethnicity Among New Mexican Hispanics and Native Americans. Scholes 101. (Dissertation Defense)

March 31, 2008. Dr. Steven Leigh, University of Illinois-Urbana, *The Evolution of Human Brain Growth*. Anth 248.

April 2, 2008. Sara Jamieson, Is It in the Body or the Mind: Wayuu Conversations about 'Culture'. Hibben 105. (Ruth Kennedy Award Lecture)

April 2, 2008. Dr. Sylvia Rodriguez, The Matachines Dances: Spiritual Conquest and Ritual Memory. Woodward Hall. (Society for American Archaeology Colloquia Series)

April 2, 2008. Mark Hungerford, Anthropology and Archaeology Jobs Outside of Academia. SUB, Luminaria. (Undergraduate Anthropology Society Special Guest Lecturer)

April 2008. Laura A. McNamara, Ph.D. Member, AAA Ad Hoc Commission on the Engagement of Anthropology with the US Security and Intelligence Communities, Iron Hand in Ethnographically Informed Gloves? Anthropology, Torture, and the Importance of Engaged Critique in the Global War on Terrorism. Hibben 105. (Ortiz Public Policy Lecture Series)

April 3, 2008. Dr. Chris Kuzawa, Northwestern University, Anchoring the Future to the Past: The Fetal Origins of Adult Biology and Health in the Philippines. Hibben 105.

April 17, 2008. Dr. J.J. Brody, A Mutable Art: Mimbres Pottery Painting in the Modern World. Hibben 105.

April 19, 2008. Dr. Joseph Masco, Engineering Ruins and Affect: The Use of Nuclear Fear in Cinema and Photography from the Early Cold War until the 'War on Terror.' SUB Ballroom A. (2008 Graduate Student Research Symposium)

April 21, 2008. Adriana Ramirez de Arellano, PhD Candidate, Voice and Identity in Legal Narratives of Gender Violence and Sexual Torture in the Southwestern United States. Scholes 101. (Dissertation Defense)

April 24, 2008. Dr. Melissa Emery-Thompson, Ecology of Reproduction in Wild Chimpanzees. Hibben 105. (Anthropology Colloquia Series)

May 5, 2008. Kari M. Schmidt, PhD Candidate, An Assessment of Settlement and Subsistence in Emergent Agriculture Economies in the Tucson Basin, United States. Scholes 101. (Dissertation Defense)

DEPARTMENT OF ANTHROPOLOGY JULY 1, 2007-JUNE 30, 2008

HUMAN NATURE

Springer. Science bought *Human Nature* from Transaction Publications in 2006. The transfer of the journal began with Volume 18(2) of 2007. Beginning with Volume 19(1), Springer Science introduced a new cover format that uses an archival or fieldwork photograph featuring the research of one of the included papers. This innovation provides a handsome, fresh appearance for *Human Nature* that emphasizes the change of publisher.

During the 2007-2008 publication year, *Human Nature* received a total of 65 submissions of which: 33 were rejected, 9 were accepted, and 23 are still in the review process or under revision. This gives an acceptance rate of 21%. The submission and acceptance numbers are similar to the previous year.

Altogether Transaction published 447 pages of Human Nature in four issues, for a total of 28 articles distributed in two general and two special issues: The Human Behavioral Ecology of Contemporary World Issues: Applications to public policy and international development edited by Bram Tucker and Cooperation and Kin Investment edited by D. Reher, A. Bittles and M. Murphy. Special issues forthcoming are: Cultural Dimensions of Kin Investment edited by Donna Leonetti, Evolutionary Studies of Cooperation edited by John Patton, and Gendered Inequalities in Evolutionary Perspective edited by Rebecca Bliege-Bird and Monique Borgerhoff Mulder.

The Scimago Journal Rank for *Human Nature* in 2007 is 5th out of 51 Anthropology journals and 12th out of 26 Social Science/Biomedical journals. Its SJR rating is 0.115. SJR is a measure of the journal's relative impact on its field, based on its number of citations and number of articles per publication year as well as the rank of the citing journals. The Journal Citation Reports ranking for 2007 is 11th out of 57 Anthropology journals with an Impact Factor of 1.5.

DEPARTMENT OF ANTHROPOLOGY JULY 1, 2007-JUNE 30, 2008

JOURNAL OF ANTHROPOLOGICAL RESEARCH (JAR)

In calendar year 2007, JAR received and reviewed 65 manuscripts. Each manuscript was read by the editor and two to four specialists. 47 manuscripts were received between Jan 1 and June 30, 2008, and 14 additional manuscripts have been received since July 1, 2008. We have continued to note an increase in submissions from foreign authors. This fact requires additional effort by the Editor, Copy Editor, and Compositor, but helps bring JAR (and UNM) increased international exposure.

JAR has maintained its subscription base with subscribers from all 50 states, Washington D.C., Puerto Rico, and Guam, plus 55 foreign countries on five continents. Free subscriptions are provided to UNM Anthropology Faculty, JAR Editorial Board, Dean of Arts & Sciences, President, Zimmerman Library, as well as indexing agents both in the U.S. and abroad.

Volume 63, 2007 contained 604 printed pages: 16 articles, a review essay, plus editorials, obituaries, and 103 book reviews.

Volume 64, 2008, nos. 1, 2, and 3 have been published for 2008 and no.4 is in production. Volume 64, no. 3 was a special issue on Mesoamerican archaeology dedicated to the memory of Robert S. Santley. The guest editors are Patricia A. McAnany and Christopher Pool, and it contains articles by Dr. Santley's former students and colleagues.

JAR already has assigned articles for Volume 65, no.1, and the second issue of the year will most likely be a special issue on the Holocene-Pleistocene Transition in Cantabrian Spain with guest editors Sarah McClure and Steven Schmich.

As in the past year, JAR has donated books to various libraries:

Zimmerman (31)
Clark Field Archive (23)
Latin American and Iberian Institute (5)
Africana Studies (6)
Clark Field Book Fair (13)
Center for Southwest Research (1)

Subscribership to JAR On-Line continued to increase from an initial 63 subscribers in 2006, to 136 currently.

JAR Distinguished Lectures 2007 - 2008

Dr. Regna Darnell (University of Western Ontario)
Benedictine Visionings of the Southwest Cultual Diversity: Beyond Relativism.
February 7, 2008

Dr. E. Paul Durrenberger (Penn State University)

The Last Wall to Fall: The Anthropology of Collective Action & Labor Unions in the Global System

November 6, 2008

Dr. Paola Villa (University of Colorado Museum) has accepted our invitation for March 2009.

Stone Tools for the Hunt: Hunting Weapons of Neandertals and Early Modern Humans. Her lecture will be on March 26, 2009

Editorial Board:

Philip K. Bock, Steven Feld, Louise Lamphere, Carole Nagengast, and David Stuart, together with Lawrence G. Straus, now make up the Board.

Associate Editors: Steven Churchill (Duke University), John Comaroff (University of Chicago), Raymond DeMallie (Indiana University), E. Paul Durrenberger (Pennsylvania State University), Donald K. Grayson (University of Washington - Seattle), Michael Herzfeld (Harvard University), Jane Hill (University of Arizona), Barbara Mills (University of Arizona), Mary Moran (Colgate University), Jeremy A. Sabloff (University of Pennsylvania), Maureen Trudelle Schwarz (Syracuse University), Bruce Smith (Smithsonian, National Museum of Natural History), Mary C. Stiner (University of Arizona), Stephen A. Tyler (Rice University)

Book Review Editors:

Ethnology and Linguistic Anthropology: David Dinwoodie, Les Field, and Suzanne Oakdale

Archaeology and Paleoanthropology: Lawrence G. Straus

Physical and Biological Anthropology: Osbjorn Pearson

Copy Editor: June-el Piper*

Layout: Donna Carpio*

Employees: Ann Braswell Business Manager/Book Review Copy Editor

Ethan Kalosky Student Book Review Coordinator (Anth grad

student)

Web Page:

Upgraded and maintained in 2007 and 2008 by Sean Bruna, Anthropology graduate student.

The University of New Mexico Press represented JAR at the meetings of the Society of American Archaeology, and the American Anthropological Association. An advertisement was run in the March 2008 issue of Current Anthropology.

Professional Composition* Anthropological Consulting and Editing

(AC&E), Albuquerque, New Mexico

Printing and Binding: Thomson-Shore, Dexter, Michigan

Distribution Subcontract: Unit Packaging, Ann Arbor, Michigan

JAR On-Line: Hosted by the Scholarly Publishing Office,

University of Michigan

Subscription Rates for hard copy increased from \$50.00 to \$60.00 for institutions and from \$30.00 to \$35.00 for individuals beginning January 1, 2008. The subscription fee for on-line access for institutions remained the same at \$25.00. Postage was increased to \$8.00 for foreign subscriptions. Individual copies were raised to \$18.00 for institutions and \$14.00 for individuals (pricing includes postage).

JAR Research Assistantship: For the first time this year, JAR has been able to fund a graduate student research assistantship. Archaeology PhD candidate, Elisabeth A. Stone was awarded this position.

ANNUAL REPORT of the DEPARTMENT of BIOLOGY



FY 2007–08 Annual Report by:

Eric S. Loker, Chair Department of Biology The University of New Mexico

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THE UNIVERSITY OF NEW MEXICO DEPARTMENT OF BIOLOGY

FY 2007–2008 EXECUTIVE SUMMARY

The 2007–2008 academic year has been an eventful one for the Biology Department. With Dr. Diane Marshall's assistance, we spent much of 2007 preparing a self-study for a decadal external program review that took place early in April, 2008. Copies of our self-study, the review team's report, and our departmental response to the report all accompany this document and provide important insights into the current status of the Biology Department (see Appendices K, L & M). In November 2007, we held a ribbon-cutting ceremony to open our fully renovated 24,000-sq.-ft. teaching complex in the basement of Castetter Hall. In February 2008, we began construction of the 12,000-sq.-ft. Phase I addition on the south side of Castetter Hall, with completion expected in early 2009. This past year also held sad moments as former Biology chairman, UNM's Vice President for Research and Economic Development, Dr. Terry Yates, passed away on December 11, 2007.

The 2007–2008 academic year also has been a tumultuous time in UNM's history. UNM has suffered budget shortfalls in the research office and in the College of Arts & Sciences. Among the financial consequences for departments was the imposition of a hiring freeze. In Biology, our search for a cell/molecular biologist was cancelled, thus making two years in a row that we have been unable to make this important hire. This was particularly frustrating because we already had gone through the entire search process and identified excellent candidates we wanted to hire. As noted by our external review team, the need to pursue aggressively faculty hires in cell/molecular biology so as to acquire a critical mass and to engage in a phased replacement of our three distinguished professors nearing retirement are important department priorities.

In spite of all the financial difficulties and administrative upheavals, Biology continues to experience an almost unbelievable level of demand for its undergraduate academic programs, supports a thriving graduate program, and carries out an intensive research agenda that has generated \$66M in financial resources and considerable academic prestige for UNM and the state of New Mexico. All of these accomplishments are fragile in their own ways, and as UNM enters a difficult financial period, it can not be taken for granted that Biology will prosper. With respect to undergraduate enrollment, we have recorded greater number of majors (1,380), more credit hours (26,787) and higher enrollments in non-major courses (41% increase in Biol. 123) than ever before. Although it is fortunate that Biology remains a subject area in demand, the strain of this demand continually challenges us to find the resources to maintain quality instruction. We note that were it not for the imposition of student fees on all of our courses, the Biology Department would continuously run a deficit, because the materials and services funds provided to us by UNM and the state are grossly inadequate and have not been increased substantially in more than a decade. UNM's higher administration is now pressuring us to generate even more credit hours, at a time we feel that we should be focusing more on raising admission standards and improving retention and quality. The impact of the economic recession on our future enrollments we are experiencing currently is a matter of conjecture, but likely to be negative. As of this writing, we are facing expected cuts in our state funding that may run as high as 5%.

With respect to our graduate program, there has been a steady decline in our applications. Although this has yet to reduce significantly the size of our graduate program, it seems inevitable that a decline will occur. This is part of a national trend, and our challenge is to figure out ways to beat this trend. The best solutions to this problem are (1) to improve advertising and outreach, (2) for our faculty to remain productive so as to attract excellent students, and (3) through our own activities, to create opportunities for high-caliber graduate research that are unlikely to be forthcoming from the state.

Given the ongoing expenditures related to waging two wars and the striking global economic downturn, our federal grant-funding has suffered and will continue to do so. For example, new biology grant awards and their combined amounts have declined in the past three years. Our grant-related economy is affected further by the higher administration taking a much higher proportion (now 65% as opposed to 56%) of the overhead generated by our grants. For years, we have been able to achieve far more than the typical UNM department because of our prowess in obtaining research funding. In essence, we have created an island of prosperity that now is threatened unless we remain diligent. We must continue to apply for funding and be tenacious in reapplying if need be. We need to find new ways to collaborate and new sources of funding to support our research.

Another major development with which Biology must cope is UNM's decision to embark on an extensive expansion in the form of a Rio Rancho campus (UNM West). Unless prevented by a general economic collapse, it seems inevitable that this expansion will occur and, as suggested by our review team, rather than fight UNM West, it is advisable for us to get out ahead of the curve and plan a big presence there. The impact of the expansion—and the attendant diversion of limited resources—on all aspects of the academic mission at the Main Campus is still very much a subject of concern.

In conclusion, although we have accomplished much, are viewed as one of the strongest academic units on campus, and are often in the vanguard for promoting improvements and change at UNM, this is no time for Biology to rest on its laurels or shrink from the considerable challenges that lie ahead in maintaining our excellence in both teaching and research. One of our greatest challenges is to educate continually our ever-changing administration of our merit, and to maintain teaching and research as the university's highest priorities. We must fight to retain traditional academic values in light of UNM's apparent tendencies to adopt increasingly a business model and to be driven by short-term goals about generating credit hours rather than a long-term vision for academic excellence.

This is the fifth departmental annual report prepared by Biology Chairman Dr. Eric S. Loker. Since the Fall of 2005, he has been ably assisted by two associate chairs, Dr. Steve Stricker, who has as his major responsibilities oversight of building-related matters and the establishment of committee assignments, and Dr. Richard Cripps, who has as his major responsibilities the scheduling and staffing of our classes and oversight of student advising. Provided below are several summary sections that highlight the activities of the Biology Department during the 2007–2008 academic year.

STUDENTS

For more information about all aspects of the undergraduate and graduate programs of the Biology Department, the reader is referred to the exhaustive self-study provided to our external review team, included in this report as Appendix K.

Undergraduate Program

Overall Demand on Biology Courses and Programs: Our latest numbers suggest that the overall demand for Biology courses and programs has never been higher (see Tables 1–3). The number of declared Biology majors has increased again, exceeding 1,300 for the first time. Once again, the total number of credit hours generated has increased, for the first time topping 26,000, and registering an 8.3% increase over last year. This reflects a continuing optimism among our students with respect to the number of career options basic training in biology offers: dentistry, medicine, veterinary school, biotech industry, conservation biology, and graduate training in biology, to name a few.

Demand for the non-majors courses, Biol. 110 and particularly Biol. 123, remains strong, the latter showing a 41.5% increase! An effective partnership with the College of Arts & Sciences, in particular aided by Dr. Cripps' diligent efforts, has helped us meet those demands, thus they are not the issue they were four years ago. The focus has shifted from the immediate concern of accommodating all of our students by simply finding them seat to working to improve the quality of instruction, particularly at the upper levels of undergraduate instruction. Several developments enable this: the stable presence of an experienced team of lecturers, brand-new teaching facilities that went on-line in the Fall, 2007, and implementation of course fees for all of our courses that enable us to provide more modern equipment and materials for our classes. Although we have made some progress in recent years in increasing the support staff for our teaching mission (the introductory program now has a staff assistant, as does the microbiology program), as noted by the external review team, it would be very helpful to have another 1.0 FTE support staff to assist with the preparation, equipment maintenance and coordination of our upper-level undergraduate courses. This is especially important now because we have brand-new teaching facilities, and we need someone to supervise them to ensure they are used optimally. How all aspects of our undergraduate program will be influenced by expected state-funding shortfalls remains to be seen.

Another problem looming that we must be mindful of is the Anatomy and Physiology (A&P) teaching program (Biol. 237/247L, 238/247L, 447) directed by Lecturer Jim Swan. This program is among the most popular offerings of our undergraduate curriculum and traditionally has been taught in the Pharmacy Building on the North Campus. The intention of the Health Sciences Center is to move the teaching of these courses to a new North Campus Domenici Education Building. We need to be sure that Jim is given adequate space to teach these courses in the new facility, so that the high demand can continue to be met. We also are alarmed by a recent decision made at the college level to no longer allow the use of cadavers in these courses. In our opinion, there is no adequate substitute for cadavers in the teaching of anatomy, and this aspect of Lecturer Swan's courses always has been immensely popular with our students. We are concerned that CNM will attract our A&P students because they will continue to use cadavers in their classes. We also are concerned that the right of our faculty to make decisions about the content of our courses is being jeopardized.

Table 1: Number of Students With a Declared Major in Biology

	Fall 2004	Spring 2005	Fall 2005	Spring 2006	Fall 2006	Spring 2007	Fall . 2007	Spring 2008
Undergraduate:								
A&S	816	841	821	865	856	867	889	971
University College	262	262	423	346	397	383	436	389
Second Major	n.a.	n.a.	23	18	9	21	15	20
Total:	1,078	1,103	1,267	1,229	1,252	1,271	1,340	1,380
Graduate:	100	97	101	97	93	97	101	98

Table 2: Total Student Credit Hours (SCH)

Year	SCH	Year	SCH ·	. Year	SCH 🗱
1989–90	17,527	1999-00	21,882	2004–05	23,270
1991–92	20,944	2000-01	21,358	2005–06	24,155
1993–94	22,135	2001–02	21,459	200607	24,723
1995–96	23,360	2002-03	21,832	2007–08	26,787
1997–98	21,627	2003-04	22,883		

Table 3: Student Credit Hours by Semester

Semester	2002-03	2003-04	2004-05	2005-06	2006-07	2007-08
Summer	649	1,109	1,379	1,359	1,330	1,330
Fall	10,707	11,200	11,001	11,502	11,316	12,399
Spring	10,476	10,574	10,890	11,294	12,077	13,058
Total	21,832	22,883	23,270	24,155	24,723	26,787

Implementation of the New Majors Core Curriculum: The history of the phased implementation of our still relatively new core curriculum is shown in Table 4. One can see a progressive increase in enrollment in Biology 201, 202, 203 and 204. The overall level of enrollment in all four new core courses has increased by approximately three-fold from 2004–05 to 2007–08, in part due to the now full implementation of all four courses. We also note, however, that on top of this trend, in every academic year, there is an increase in the number of students enrolling in Biol. 201. By all accounts from the instructors involved, the new core curriculum has been a step forward, including new emphases on problem solving, working in teams, and achieving a more comprehensive understanding across the

spectrum of modern biology. The biggest concern now, however, is whether UNM and the state will provide us the resources needed to keep this curriculum modern, fresh and relevant.

Another big shortcoming is evaluating how our students are doing and whether the program is achieving its goals. We undertook a survey in Biol. 201–202 in the Spring of 2007 that illuminated some important points. While there were generally favorable comments concerning the students' satisfaction with the Biology Department and its cadre of instructors and advisors, we note that there is always room for improvement. Most useful to us was the observation that, of all the students taking Biol. 201, 63% professed to be Biology majors. Consequently, more than 30% of students plan on taking Biol. 201 and 202, but no further courses in the Biology core. Presumably, these represent prehealth students; in the future, it would be helpful to investigate more closely the intent of this 30%. We also note that, of the students taking Biol. 201, 60% plan to attend medical or other pre-health schools, whereas only 11% plan to enter graduate school in biology. It would be interesting to determine how this number changes during the course of a Biology major's career, using similar evaluations in higher level classes.

Clearly, more work and more personnel are required to analyze fully the progress of our students and the efficacy of the new core curriculum in reaching its goals. Nevertheless, these data, which were generated using our own initiative and very limited resources, provide a useful entry point into such an analysis. We also note that Biology has decided to devote to outcomes assessment a fixed percentage of ~5% of our course fees. This will enable us to improve, in a sustained way, our monitoring of these courses to determine if they are having their desired effect, and to point out ways that they can be improved.

Table 4: Number of Students Registered in Core Courses, Fall 2004-Spring 2008

Course:	Fall - 2004	Spg. 2005	Fall 2005	Spg. 2006	Fall 2006	Spg. . 2007	Fall 2007	Spg 2008	Total
201	219	238	266	320	313	375	390	360	2,481
202	37	118	193	196	223	241	254	279	1,541
203		25	73	96	136	143	175	144	792
204	_	_	29	91	92	127	137	166	642
Total	256	381	561	703	764	886	956	949	5,456

Non-Majors Service Courses: Demand remains high for our two introductory level, non-majors courses, Biol. 110 and Biol. 123, with the latter showing a precipitous increase this past year, probably mostly because we simply offered more sections (Table 5). This suggests there still may be untapped demand for this course. As noted above, one significant change that has occurred in recent years is that meeting the enrollment demands for Biol. 110 and Biol. 123 has not been nearly so problematic. The lack of seats in such courses used to be mentioned regularly in both campus and Albuquerque newspapers as a limiting factor for students graduating from UNM in a timely manner. A big part of the solution has been the hiring of an excellent cadre of lecturers to meet the demand for these two particular courses. Our lecturers are valued faculty members who have good ideas about how to teach

students and who make many valuable contributions to the governance of our department. With expected funding shortfalls, we are afraid that, once again, these courses will be making headlines for the wrong reason—lack of available seats.

Table 5: Number of Students Registered in Beginning Biology Courses for Non-majors

Courses	2002-03		2004-05			2007-08
110	489	527	556	609	585	584
123	269	555	791	1,028	987	1,397

Actions to Improve Our Undergraduate Program: Every year we are given the opportunity to request equipment funds from our college, and every year we submit an extensive request focused on our undergraduate courses. In 2007–08, we received \$19,000 for new microscopes for our introductory and microbiology labs and for a new Scantron machine for grading exams. However, given that the state-funded materials and services budget provided by the College of Arts & Sciences has remained virtually flat for many years, while our actual expenses for running courses continue to increase, with approval of the UNM administration, we implemented a comprehensive program of charging course fees for virtually all of our courses (see Appendix F). Although it is well understood that this poses an additional financial burden on our students—one that really should be borne by the state—we have tried to keep these fees reasonable, and we are meticulous about ensuring that these fees actually are spent improving the courses involved. It is fair to say that this action has improved dramatically our ability to upgrade the equipment and supplies available to our undergraduates. For example, this past year these funds were used to purchase new computers for the anatomy and physiology labs.

Our biggest investment in time, energy and money in improving our undergraduate teaching program has been to bring the funds associated with passage of a student-funded bond initiative (a sum of \$7M) to fruition in the form of a completely remodeled floor of Castetter Hall entirely dedicated to new classroom and teaching lab facilities. This project, which began in January 2007, was completed by mid-October 2007, and a formal ribbon-cutting ceremony was held on November 9, 2007. A total of 24,000 sq. ft. of space provides five new teaching labs, each of ~1,200 sq. ft.—three for our majors core and two for upper-level instruction. We also have three new classrooms, with 41, 56 and 106 seats, primarily for undergraduate instruction. Also associated with this remodel are new offices for seven of our lecturers, an advising complex, and new interior and exterior study areas designed to draw students into the department. Additionally, Biology has been a main contributor to planning and developing a \$24M Math/Science Learning Center, another building funded by the student bond issue, which will commence construction in 2009. This building will include three more labs for our non-majors Biology courses. When this building is complete, we will have succeeded in completely deactivating the old introductory biology teaching labs that had been in continuous use since 1952 when the old wing of Castetter Hall was built.

Undergraduate Research: The Biology Department has been a leader at UNM in creating a climate in which our undergraduates are encouraged to get first-hand experience in undertaking biological research under the direction of a faculty mentor. A survey of our 2004 graduates indicated

that more than half of our students had participated such an invaluable experience during their tenure in our department, and this tradition continues. Biology's Annual Research Day continues to be a cornerstone of our program in undergraduate and graduate research. Our 17th Annual Research Day was held April 11, 2008; our keynote speaker was Dr. Charles R. Fisher, who spoke on the topic of "Chemoautotrophic Symbioses: Making the Best of a Potentially Toxic Environment." Research Day featured 11 oral presentations (four undergraduate and six graduate) and a record number of posters, 57 (34 undergraduate and 23 graduate).

Six of our students graduated with academic honors in 2007–08, and four of our students were recipients of National Science Foundation Scholarships in Science, Technology, Engineering and Mathematics (Tamara Brooks, Erin Hahn, Brandon Velivis and Victoria Youngblood). Seven students participated in the Minority Access to Research Careers (MARC) Program, and 33 undergraduate students and eight graduate student participated in the Initiatives to Maximize Student Diversity (IMSD) Program.

Degrees: Another annual highlight is our graduation ceremony, held on May 17, 2008. Our commencement address was given by State Representative Danice R. Picraux (D) of Bernallio. An unofficial total of 38 students received their Bachelor of Arts diploma, and 227 students received their Bachelor of Science diploma. As is noted in Table 6, the number of students receiving either a B.S. or B.A. degree in Biology is likely at an all-time high for us (265), though reporting difficulties in the central administration have made it difficult to obtain accurate numbers in the past.

Table 6: Degrees Awarded in Biology (unofficial count obtained for May graduation)

	2001-02 [†]	2002-03	2003-04	2004-05	2005-06	2006-07	2007-08
B.S.	209	207	186	213	132	229	227
B.A.	2.7	29	26	37	21	26	38
M.S.	7	9	6	7	7	4	5
Ph.D.	13	16	14	11	14	21	8

[†] A&S 2001-02 data: B.S. 128, B.A. 19

Graduate Program

Our graduate program continues to be strong and our graduate students continue to perform at a remarkably high level, as more thoroughly documented in Appendix J.I.A.5. There were 103 graduate students enrolled in our program at the start of the Fall 2007 semester, slightly up from last year's figure of 101. During the last year (Summer '07, Fall '07 and Spring '08), we awarded five M.S. and eight Ph.D. degrees (see Table 6 and Appendix D). This represents a decrease in the number of Ph.D. degrees awarded, as compared to 2006–07 (21), but is more typical of recent years (11 in 2004–05 and 14 in 2005–06).

In 2007–08, we received 71 new applications for admission into our program (as compared to 70 the preceding year), modestly reversing a downward trend we had seen for several years. Of the 71

applications received, admission was offered to 22 and, of these, 21 accepted. Our acceptance rate of 95.5% (21 of 22) is very high, continuing the strong trend from the previous two years (100% in 2004–05, 69% in 2005–06, 74% in 2006–07).

Of the 21 new students who began their studies in Fall 2007, there were five new M.S. and 17 new Ph.D. students. The number of graduate students entering our program was 24 in Fall 2002; 18 in Fall 2003; 28 in Fall 2004; 18 in Fall 2005; 23 in Fall 2006; and 23 in Fall 2007. Thus, there is no sign of a decline in our actual recruitment of graduate students into our program, though we would prefer to have more applications and we need to work harder to increase applications. We continue to attract blue-chip students and to compete successfully with prestigious universities to recruit such students. Our on-line application process has been improved dramatically, but this needs to be scrutinized to see if it could be improved further. An update of the department's web page with respect to its attractiveness for graduate recruitment needs to be done, and we need to reconsider ways to entice foreign applicants.

We must consider our graduate program with respect to national trends regarding employment opportunities for graduates in the biological sciences that have been highlighted recently in *Nature* (Check, E. 2007. More biologists, but tenure stays static. *Nature* 448:848-849, 23 August 2007). In other words, should we bemoan the fact that our graduate program is not growing, in a difficult funding climate, when opportunities for employment, either as academicians or as research scientists, are static?

We have to be mindful continually of the stipends we award students (\$14,634.80 for Master's students, \$15,866.70 for Ph.D. students), which, for the time being, especially when considered with respect to the cost of living in Albuquerque, and the health and other benefits UNM provides, are considered by our students to be competitive. Nevertheless, many national programs now compensate graduate students at significantly higher levels.

FACULTY

Composition: At the start of the Fall 2007 semester, we had nine lecturers and 40 tenure-track faculty members on campus. This number includes new A&S Dean Brenda Claiborne and new UNM President David Schmidly, both of whom obviously have full-time administrative commitments beyond the Biology Department. Drs. James H. Brown, Clifford N. Dahm and Astrid Kodric-Brown were all on sabbatical during the Fall 2007 semester.

Dr. Vaishali Katju, an expert on molecular evolution, was hired as an assistant professor, to begin officially at the start of the Fall 2007 semester. Dr. Helen Wearing, a theoretician with interests in modeling of infectious diseases, also was hired to begin in Fall 2007. Dr. Wearing was hired under the auspices of the B.A./M.D. program centered in the College of Arts and Sciences, and she has a 50:50 joint appointment in Mathematics and Statistics and Biology. Dr. Paul Farnsworth was hired as a Lecturer III and began his employment in Biology in Fall 2007.

Dr. Larry L. Barton retired at the end of the Spring 2008 semester. Dr. Barton compiled a long and productive record studying physiological and environmental microbiology and remains an active

emeritus professor. Dr. Robert Frankis decided to resign his Lecturer III position during the Summer of 2007.

Dr. Terry L. Yates, a Biology faculty member and former chairman, who served as a full-time Vice Provost for Research and Economic Development at UNM, fell ill in the summer of 2007 and passed away on December 11, 2007.

Dr. Thomas F. Turner became Director of the Museum of the Museum of Southwestern Biology in the summer of 2007.

The 2007-08 academic year was a disappointing one with respect to making faculty hires. We held a search for a cell/molecular position and, after identifying excellent candidates and making an offer to our first choice (who turned us down for another position elsewhere), our search was summarily cancelled such that we were unable to make an offer to our second or additional candidates. Budget shortfalls at the college level were cited as the reason for the cancelled search.

Dr. Andreas Wagner is on leave of absence for the 2007–08 academic year at the University of Zurich, Switzerland.

The 2007–08 year was one that involved extensive formal tenure and promotion cases. Dr. Charles Cunningham, Dr. David T. Hanson, and Dr. Steve Poe were all tenured and promoted to the rank of Associate Professor. Dr. Felisa Smith, an associate professor, was granted tenure. Dr. Ulfar Bergthorssen came up for mid-probationary review and was approved for another three-year appointment. Sabbatical requests were submitted for the Fall 2008/Spring 2009 semesters by Dr. Steve Poe, and for the Spring 2009 semester by Drs. Robert L. Sinsabaugh and David T. Hanson; all have been approved since.

As for some parting comments regarding faculty composition, although by some means of counting the overall number of tenure-track faculty has never been higher, the aggregate scientific productivity of the Biology faculty, as measured by the number of publications, has declined slightly from a high in 2004-05. Obviously, this is of concern, begging the question, why? Part of the explanation lies in the fact that our overall funding is declining as well (see below). This means we have fewer dollars to hire technicians/students/postdocs to help us do our work. Another reality is that we are not hiring junior faculty to replace retiring or departed faculty: 2008-09 marks the second year in a row when we have not made a hire, and the prospects for 2009-10 look bleak as well. Also, many of our faculty are, in essence, near full-time administrators or on leave of absences doing similar jobs elsewhere, as follows: Thomas F. Turner as newly-appointed director of the Museum of Southwestern Biology; Eric S. Loker as chair of Biology and director of Center for Evolutionary and Theoretical Immunology (CETI); Steven A. Stricker and Richard M. Cripps as associate chairs of Biology; Margaret Werner-Washburne as director of the Initiatives to Maximize Student Diversity (IMSD) program; Mary Anne Nelson as director of the Minority Access to Research Careers (MARC) program; Bruce T. Milne as director of UNM's Sustainability Program; and James H. Brown and Felisa Smith as director and codirector, respectively, of the Program in Interdisciplinary Biological and Biomedical Sciences (PIBBS); Robert D. Miller visiting program director at NSF during 2007-08; Clifford N. Dahm, visiting administrator at the CALFED program in 2008-09.

Also, regarding overall numbers of faculty, as pointed out long ago by a previous program review, and reiterated once again in our recently completed review, given that the Biology Department covers the entire spectrum of modern biology on the Main Campus (for example, there are no entomology, botany or biotechnology departments at UNM), we are stretched to the limit and more hires must be made in the biological sciences if we are even to come close to the level of representation in biology seen at our peer institutions. As underscored by our external review and highlighted in both the review team's report and our response to the review, the most pressing issues related to faculty right now are to achieve some critical mass in cell/molecular biology, and to begin at the earliest possible time (now) to make efforts to replace our three distinguished professors before they retire. We also must continue to enable new initiatives seeking to building interdisciplinary bridges and bring targeted areas of excellence to our department that do not merely duplicate areas emphasized in many other institutions.

Issues Related to Lecturers: As noted earlier in this report, one of the relatively new dynamics with respect to the Biology Faculty is the presence and impact of our team of lecturers, now numbering 8.5 FTE: five Lecturer II's (L. Couch, C.L. Council-Garcia, C.O. Fridrick, M.G.M. Shaner, J. Swan), three full-time Lecturer III's (P. Farnsworth, B.V. Hofkin, K.A. Howe), and one 0.5 FTE Lecturer III (C. Adema). Both the Biology Department and UNM in general have never addressed fully several important issues related to the status of lecturers as faculty members. Among the important list of items that need to be clarified for lecturers are: a meaningful system to provide promotion and career advancement; a sustainable means to evaluate annually lecturer performance, including means to identify superior performance as well as sub-par performance that may not merit contract renewal; improved methods for ensuring longer term commitment by UNM to lecturers; and the provision of ways to allow lecturers to extend and enhance their professional development. (See Appendix K.)

Unfortunately, as UNM lurches towards financial crisis in 2008–09, it seems very unlikely that lecturers' issues will receive any of the attention they deserve and increasingly the goal may be to simply keep them employed. Also, as highlighted by the ongoing chair selection process as this document is being written, it is clear that there is still a need to clarify issues pertaining to the voting rights of lecturers. On the one hand, a strong argument has been made that lecturers are faculty members who have the right to vote in general, and in particular should have the opportunity to vote on who their new boss will be. Conversely, the new chair will be a tenure-track faculty member and some of our faculty feel strongly that such choices should only be made by other tenure-track faculty. This needs to be discussed and resolved after our current chair search is concluded.

Faculty Accomplishments: In 2007, the tenure-track faculty published 78 articles in scientific journals. In addition, 11 book chapters and reports were published, as well as one book (MacDonald, S.O. and Cook, J.A. 2007. The Mammals and Amphibians of Southeast Alaska. Museum of Southwestern Biology, 191 pp.) and two edited volumes (Barton, L.L. and Hamilton, W.A., eds. 2007. Sulphate-reducing Bacteria: Environmental and Engineered Systems. Cambridge University Press, Cambridge. 532p.; Storch, D., Marquet, P. and Brown, J.H., eds. Scaling Biodiversity. Cambridge University Press, Cambridge). Thirty-one of our tenure-track faculty members (86%) reported publications in 2006. Between the years 2000–2007, of the 95 articles originating from the State of New Mexico published in the two preeminent scientific journals of our time, Science and Nature, 27

(28%) of them originated from the Biology Department, far more than any other unit in the state, including LANL and the School of Medicine.

What follows are some vignettes indicating honors received or noteworthy accomplishments of our faculty during 2007–08.

Several of our faculty (Cripps, Hofkin, Litvak, Shaner, Thornhill) were singled out for their teaching prowess by organizations like the Mortar Board Honor society, sororities, or athletic teams.

Dr. Milne had his undergraduate minor degree program in Sustainability Studies approved in Fall 2007. Dr. M. Werner-Washburne, Dr. F.A. Smith, Dr. E.C. Toolson and Dr. H. Wearing all developed important new curricula.

Dr. Christopher Witt organized a new UNM Birding Club.

Dr. Donald O. Natvig continued to serve as editor-in-chief of Mycologia.

Dr. Joseph A. Cook was elected a member of the board of directors of the American Society of Mammalogists.

Dr. Scott L. Collins was the lead P.I. and organizer of an NSF strategic-planning effort on Integrated Science for Society and the Environment.

Dr. Richard M. Cripps continues to serve as a regular study-section member at NIH, Skeletal Muscle Biology and Exercise Physiology program.

Dr. Robert D. Miller served as Program Director, Physiological and Structural systems cluster, in the directorate for biological sciences for NSF, from August 2007–August 2008.

Dr. Bruce V. Hofkin for the 10th consecutive year continues to produce *The Biocast* on KANW, a popular outreach mechanism underwritten by the Biology Department.

Sponsored Research: In 2007–08, 47 new research grants were obtained by the Biology Department, with a total value of \$5,082,786. This figure is a reduction from 2006–07 (\$12,547,326) and the high-water mark of \$14,296,847 of 2005–06, reflecting both the general downturn in federal funding occurring nationally and the worsening national economy. The total grant portfolio held by the Biology Department exceeds \$66 million (direct and indirect costs). It is a difficult funding climate now because we must work harder to secure funding, a process now often requiring multiple submissions of grants. We also must be clever and search for additional sources of funding if we are to continue to have our programs thrive.

Some of the exciting new awards funded either with a start date between July 1, 2007 and June 30, 2008 or that were not mentioned in our previous report are as follows:

Drs. Scott L. Collins, Donald O. Natvig, William T. Pockman and Timothy K. Lowrey received a \$250K award from NSF to upgrade residence capacity at the Sevilleta Field Station.

Dr. Joseph A. Cook was successful in getting the URM: Undergraduate Nurturing Opportunities (UNO) program re-funded by NSF, for \$1.01M.

Dr. David T. Hanson was successful in getting a \$360K grant on leaf respiration and metabolism funded by NSF.

Dr. Marcy E. Litvak received a \$395K grant to study woody plant encroachment from the U.S. DOE.

Dr. Robert D. Miller received a \$600K grant on marsupial immunology from NSE

Dr. William T. Pockman received a \$713K grant on hydraulic mechanisms in piñon-juniper woodlands from the U.S. DOE.

Dr. Thomas F. Turner received a \$345K grant to study community responses to river drying from NSF.

Dr. Margaret Werner-Washburne received a \$560K grant from NSF to study quiescent cells in yeast.

The Biology Department is fortunate to have so many successful research and training programs in our midst. This is a tribute to the hard work and creative efforts of our faculty, with essential support roles being played by the Biology staff. The last couple of years, however, have witnessed the emergence of significant problems relating to grants administration on the Main Campus, culminating in the production of an extensive Research Study Group report that calls for extensive changes in the organization and management of sponsored projects. The report can be seen in its entirety at: http://research.unm.edu/rsg/reports/reportfinal.pdf. Although the Main Campus research office is now under new administration and we have considerable confidence going forward that grants administration will improve, this is likely to be at considerable expense and will result in, for each research dollar earned, less associated overhead money flowing back to the college and to the department. This, coupled with a decrease in the size of our overall grant portfolio, is going to spell difficult financial times for the Biology Department in coming years.

MUSEUM OF SOUTHWESTERN BIOLOGY (MSB)

See the summary of MSB activities in Appendix H.

STAFF MATTERS

Currently, the Biology Department staff includes 89 members, of which 26 are paid in part or full by I&G funds (see list below and Appendix B). The staff performs minor miracles on a regular basis to keep the department functioning as efficiently as possible. There were several significant staff events in the past year. The first was the resignation of Yvonne Martinez-Ingram, who left the department for the staff of the College of Arts and Sciences and a well-earned promotion. Catherine St. Clair replaced Yvonne, and we took this opportunity to redefine her position as an administrative assistant dedicated solely to the Department Chair. Human-resource functions formerly handled by Yvonne were divided between Reneé Santillanes (staff, research faculty and postdoctoral hiring) and Marla Wonn (tenure-track faculty). Second, both of the department's Coordinators for Lecture Demonstration resigned in the last year. Jack Miles replaced Andrina Ortiz as assistant to Cara Lea Council-Garcia, coordinator of

undergraduate lower-division major and non-major laboratory courses. Ivan Wang, long-time assistant to Lee Couch, coordinator of the Microbiology facility, was replaced by Yvonne Bishop early in FY 2007–08. Finally, Cindy Mortensen resigned as Graduate Student Program Coordinator early in FY 2007–08, also accepting a significant promotion in the Registrar's Office; a search for her replacement will be concluded momentarily.

Staff
Staff Separations
Post-Docs
Research Faculty
Faculty/Postdoctoral Associate Separations 10
Visiting Faculty
Unpaid Undergraduate Student Lab Volunteers 2
Unpaid Graduate Student Lab Volunteers 2
Visiting Scientific Staff 1

BUILDING PROJECTS

The issue of providing better space for the many activities of the Biology Department remains a central concern that has occupied much of the time of the departmental administration. Here it is important to acknowledge the superb efforts of Associate Chair Dr. Steve Stricker and our Facilities Manager Mr. John Cox, who have spent countless hours hammering out the details required to complete our basement renovation and make it ready for full occupancy in early 2008. They also have been instrumental in planning and helping implement construction of Phase I of our addition.

During the spring and summer of 2004, Biology played an instrumental role in working to gain approval for the ~\$135M student-funded capital bond issue. This was approved and is helping Biology in three important ways:

- (1) Funds totaling \$7M for the renovation of 24K sq. ft. of the basement of the new wing of Castetter Hall as a teaching complex that now has been completed.
- (2) Also included in the student-funded bond issue is a sum of \$5.6M to construct the Phase I portion of the expansion of Castetter Hall, which will support research activities of Biology faculty. After much discussion, this facility is to be situated in the space between Castetter and Marron Halls. Currently, Phase I is envisioned as 15,000 sq. ft. distributed over two floors. It will house NIH-funded investigators associated with the CETI program on the second floor, and currently, the first floor is being set aside for use by Dr. Jim Brown's PIBBS program, for which supplemental funding of ~\$400K was obtained. Construction commenced in June 2008, with occupation expected in March 2009.

Additionally, funds for Phase II of the Castetter expansion, totaling \$2.78M, were obtained from the 2006–07 New Mexico Legislative Session. These funds will be used to construct a new greenhouse

on the roof of the Phase I building, with the remainder applied toward the initiation of construction of the Phase II portion of the building, which currently is envisioned to be a ~21,000 sq. ft. structure comprised of three floors of equal size. Given the deplorable condition of the Biology Annex, the UNM administration has decided it would be best to move the Annex operations to a new floor prepared for them in the Phase II structure. Another floor of Phase II is slated for occupancy by NIH-funded investigators, and the third floor will be used by investigators with thriving, funded programs who need more space. To help us achieve the goal of completing the Phase II structure, the 2008 New Mexico Legislature placed Phase II of the Biology addition (\$5M in funding) on the 2008 General Obligation Bond Issue, which was just approved in the general election. Additionally, UNM has contributed another \$2.25M to the project from another of its bond issues. Thus, we have funds to continue after completion of Phase I with construction of Phase II, the design for which is already well underway. We anticipate not having sufficient funds to complete the project, so UNM has placed us once again on their capital projects priority list for the 2009 legislative session for \$2.78M. Although we think it likely we will not secure this kind of funding in a difficult economy, we should obtain at least some funding from the legislature to enable us to move forward.

(3) The final segment of the student bond issue that involves the Biology Department is a \$16M Math/Science Learning Center. This building will be on the west side of Main Campus near the Hibben Museum, and will include at least three new teaching laboratories to support the heavy enrollments we experience in our non-majors Biology courses. This building also is intended to encourage multidisciplinary interactions with other departments such as Mathematics. The sum of \$16M has been augmented by \$8M obtained from a successful request to the 2005–06 legislative session, bringing to \$24M the total funds for this project. Construction for this project is slated to begin in early 2009.

Remaining Infrastructure Upgrades: Important issues remain with respect to improving our infrastructure. They are the need for (1) a new, versatile vivarium facility to support the animal care needs of the main campus so they can be AAALAC accredited; (2) space to teach our anatomy and physiology courses with cadavers, courses which are likely to be removed from their current home in the Domenici Education Building on North Campus; and (3) replacement of Marron Hall, which now houses offices for our IMSD program, the Natural Heritage N.M. program, graduate students, and emeritus faculty. Increasingly, this facility is a liability and should be condemned and replaced with a new building (Phase III of our expansion?) that includes the three functions mentioned above.

The final infrastructure matter requiring resolution is our Sevilleta Field Station, the funding status for which currently is not stable. Given that the station now has a new building coming on-line purchased by federal dollars, and an adequate and sustainable annual operating budget is not yet available, this matter requires the urgent attention of the UNM administration.

SOME PARTING COMMENTS (AND CONCERNS) FROM 2007–2008

The following comments are taken straight from our departmental response to our 2008 external review. They succinctly encapsulate many of our concerns about the current state of our department and of UNM.

The extensive recommendations presented by the External Review Team provide importance guidance for the continued excellence of the UNM Biology Department. The attached document details the departmental response to each recommendation. In addition, the Museum of Southwestern Biology, a separate administrative unit from Biology, but populated by Biology faculty serving as curators and with a long, intimate association with Biology, provides their own summary response to the review (see below).

In this summary, we focus on three key recommendations that: (1) encapsulate the most serious issues that threaten sustained excellence in the Biology Department and (2) require immediate and sustained assistance from the University administration to address.

The External Review Team clearly perceived the pernicious effect that the stagnation of faculty growth has had on the department. They strongly recommended a moderate and immediate increase in faculty size, coupled with a plan to anticipate retirement of key faculty members in EEOB (ecology, evolution and organismal biology). In response to this recommendation, we present a hiring plan that is the result of careful, long-term planning by the department and which is in line with the departmental strategic plan. This plan consists of the recruitment of two new cell/molecular biologists (CMB), two new faculty members in support of the CETI (our NIH-funded Center for Evolutionary and Theoretical Immunology) renewal proposal (if successful), and three hires in EEOB to replace the distinguished faculty who are on the verge of retirement. In order to preserve the integrity of our outstanding programs, these hires need to take place over the next four years. If implemented, this plan will result in sustained prominence of the outstanding EEOB program, achievement of critical mass in CMB, and integration of the different sub-disciplines within the department to achieve overall excellence. In the absence of a commitment to these hires, it is the consensus of the External Review Team and the Biology Department faculty that excellence cannot be sustained.

The declining quality of applicants to the graduate program in Biology is a serious obstacle to improving the national standing of the department, and several recommendations from the External Review Team focus on this issue. The Department can address some of these recommendations directly, but others require institutional support. In particular, we must continue to increase graduate student stipends by at least 8% annually for two more successive years as the single most important factor in attracting and recruiting superior students. In addition, the department needs to mount a vigorous outreach program involving electronic and print advertisement, recruiting visits to campus, and active recruitment of under-served groups. Finally, the department needs to stabilize funding for key elements of our infrastructure, including the Sevilleta Field Station. These objectives can only be achieved with the administrative and financial support of the University.

The External Review Team identified significant shortcomings in student advisement, IT support, tracking and assessment of student success, and laboratory preparation for 300–400-level courses. The department requires institutional assistance to address these important issues by recruiting another student advisor, an IT specialist, a part-time assessment person, and an additional person for lab preparation.

The External Review Team viewed the development of the Rio Rancho Campus as an important opportunity. The department is eager to assist with the Rio Rancho development, but there are significant uncertainties about the effect of the new campus on research-intensive and higher-plane

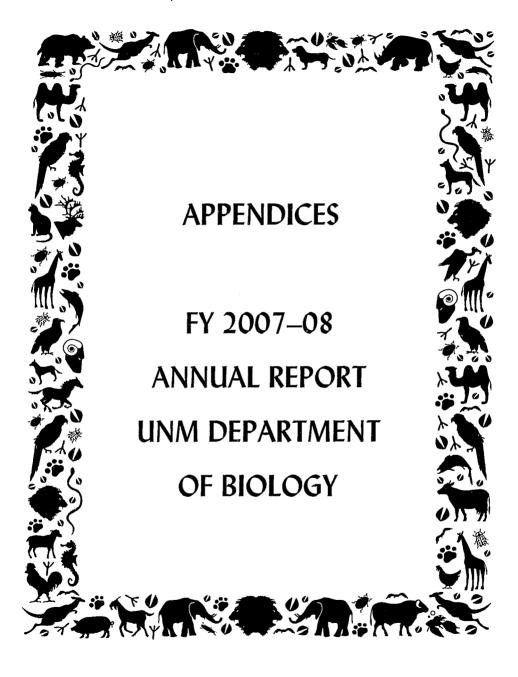
functions of the Main Campus. Until these uncertainties are discussed and clarified with the administration, they will inhibit full departmental participation.

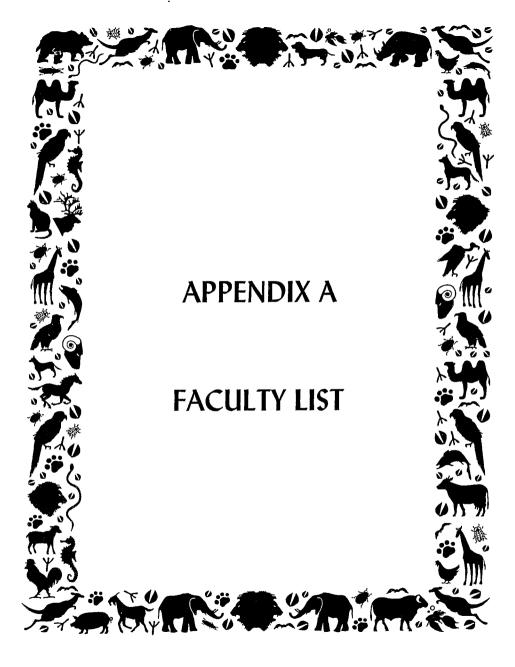
Regarding the review team's bottom line assessment of the department as "very good," we are acutely aware as seasoned grant writers that the term "very good" means we have work to do, and we look forward to partnering with UNM's administration to strive towards achievement of the review team's suggested goals.

Eric S. Loker

Regents' Professor and Chairman

November 21, 2008





UNM Department of Biology FY 2007–08 Faculty

Distinguished Professors

James H. Brown Eric L. Charnov A. Randy Thornhill

<u>Professors</u>

Larry L. Barton Scott L. Collins Joseph A. Cook Clifford N. Dahm Astrid Kodric-Brown Eric S. Loker Timothy K. Lowrey Diane L. Marshall Robert D. Miller Bruce T. Milne Donald O. Natvig Mary Anne Nelson Robert L. Sinsabaugh Howard L. Snell Steven A. Stricker Eric C. Toolson Robert B. Waide

Associate Professors

Richard M. Cripps Charles Cunningham William T. Pockman Felisa A. Smith Thomas E. Turner Andreas Wagner (on leave) Blair O. Wolf

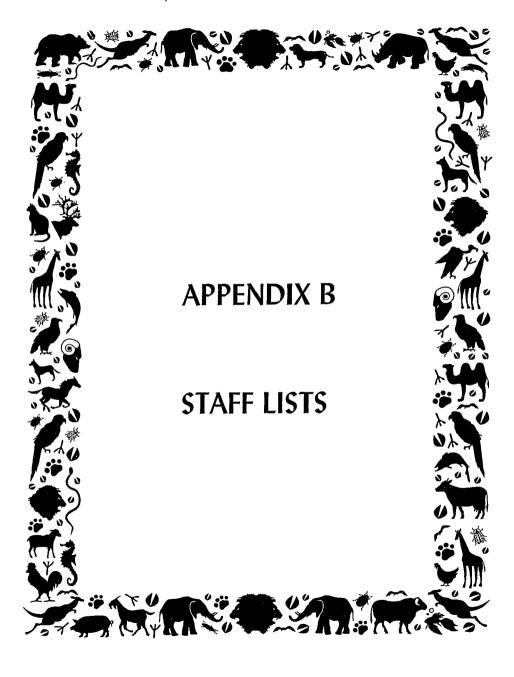
Margaret Werner-Washburne

Assistant Professors

Ulfar Bergthorsson
David T. Hanson
Vaishali Katju
Marcy E. Litvak
Kelly B. Miller
Steven Poe
Cristina D. Takacs-Vesbach
Helen J. Wearing (joint appointment with
Math & Statistics)
Christopher C. Witt

Lecturers

Coenraad Adema Lee Couch Cara Lea Council-Garcia Paul Farnsworth Christina O. Fridrick Bruce V. Hofkin Kelly A. Howe Marieken G.M. Shaner James Swan



UNM Department of Biology FY 2007–08 Staff

Arzate, Jasmin Atencio, Lupe Avritt, Joy

Baca, Kennedy Baca, Patricia

Baca Denton, Michele Bishop, Yvonne Brantley, Sandra Brault, Paul Brown, Renee

Bustamante, Joslyn Canderlaria Ley, Roxane

Chauvin, Yvonne
Costa, Duane
Cox, John B.
Craig, John A., Jr.
Davis, Nancy L.
DeWitt, John W.
Dunnum, Jonathan
Elwell, Jennifer
Farrington, Michael
Fitzpatrick, Kelly
Forus Michelle

Forys, Michelle Friggens, Michael T. Garcia, Larissa E. Garcia, George

Giermakowski, Jacek T.

Gomez, Celina Gurule, Frank Hawk, Andrew

Hebert, Gerard

Hill, Judson P Horger, Terry

Jackson, Charles Johnson, Andrew Johnson, Jennifer

Kavka, Jennifer Keeshen, Rebecca A. Koontz, Terri L. Lejeune, Christian

Lightfoot, David C.

Administrative Assistant II
Administrator–Group

Research Tech/Life Sciences Administrative Assistant II & Accounting Clerk

Administrative Assistant I Sr. Research Tech/Life Sciences Coordinator, Lecture Demonstration Sr. Museum Collection Manager

Administrative Assistant II Systems Analyst II Program Coordinator

Sr. Student Program Advisor Sr. Research Tech/Life Sciences

Analyst/Programmer II
Manager, Facility Operations
Analyst/Programmer I
System Administrator
Facilities Services Manager
Sr. Museum Collection Manager
Sr. Research Tech/Life Sciences
Sr. Research Tech/Life Sciences

Sr. Research Tech/Life Sciences
Lab Tech

Research Scientist III Supply/Stock Clerk

Supervisor, Adminstrative Support Museum Collection Manager Administrative Assistant II

Lab Animal Tech

Field Research Tech/Life Sciences

Editor

Research Scientist II

Program Coordinator–Sustainability Field Research Tech/Life Sciences Museum Collections Manager

Research Scientist I Program Manager Office Administrator Research Scientist I Research Scientist I

Sr. Museum Collection Manager

Lovato, Candice Lovato, Tyanna L. Lun, Cheng Man

MacDonald, Stephen

Marshall Hathaway, Jennifer Martin, Cheryl

McCollough, Charles McConnell, Marjorie

McCoy Hayes, Shannon McOwiti, Thomas

Miles, Jack Milford, Elizabeth R.

Moore, Douglas I.

Mygatt, Jane Nag, Kamalika

Neville, Terri Brotman Osborn, Catherine

Parmenter, Cheryl Paulsen, Heather

Ricci, Roy Rice, Anne

Rosenberg, George E.

Sacher, Sandy San Gil, Inigo Sandoval, James

Sledge, David Smith, Jacqueline

Snyder, Alexandra M. Soole, Abby

St Clair, Catherine

Thibault, James
Thomey, Michell
Tonne, Phillip C.

Torres, Julie A. Wetherill, Karen R.

White, Marshall Williams, James L

Wonn, Marla F. Wyman, Florence

Xia, Yang

Research Assistant

Sr. Research Tech/Life Sciences

Research Scientist I

Curator II

Research Scientist I Student Programs Specialist

Database Administrator Sr. Program Manager

Program Coordinator

Public Information Representative Coordinator, Lecture Demonstration

Research Scientist II

Research Scientist II
Sr. Museum Collection Manager

Research Tech/Life Sciences GIS Analyst

Administrator-Group

Museum Collections Manager Accountant III

Supervisor, Animal Research Facility

Data Manager

Research Scientist II
Field Research Tech/Life Sciences

Sr. Applications Support Analyst

Accountant II

Analyst/Programmer Specialist
Sr. Research Tech/Life Sciences

Museum Collection Manager Fiscal Services Tech

Administrative Assistant III

Research Scientist I Research Scientist I

Sr Research Scientist I Administrative Assistant III Research Scientist II

Sr Web Designer

Systems Analyst I
Department Administrator II

System Administrator Research Scientist I

Staff Separations

Brandenburg, William Downey, Laura Farris, David Griffin, Carol-Ann Hatton, Elizabeth Jakubanis, Jessica Mortensen, Cynthia Racz, S. Elizabeth Ruby, Maria Santillanes, Renee Shore, Gregory Sprott Bonito, Patricia Stewart, Justin Stout, Barbara Anne Stursova, Martina

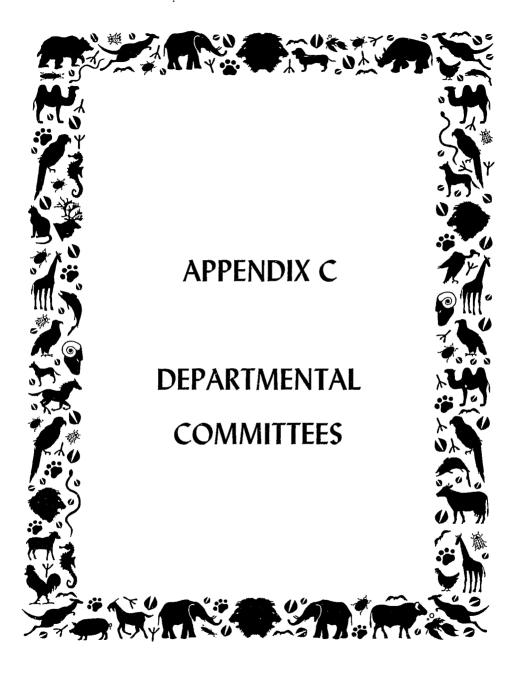
Senior Research Tech/Life Sciences Senior Research Engineer III Systems Analyst I Administrative Assistant II Senior Research Tech/Life Sciences Field Research Associate/Biol Sciences Coordinator, Program Advisement Field Research Associate/Biol Sciences Coordinator, Program Advisement Supervisor, Administrative Support Analyst Programmer III Technical Editor Office Assistant HS/Associate Scientist II Research Tech/Life Sciences Accounting Tech

Staff Hires

Baca, Kennedy
Forys, Michelle
Hawk, Andrew
Lovato, Candice
Martin, Cheryl
Nag, Kamalika
Soole, Abby

Swearingen, Douglas

Administrative Assistant II & Accounting Clerk Lab Tech Field Research Tech/Life Sciences Research Assistant Student Program Specialists Research Tech/Life Sciences Fiscal Services Tech



Faculty Committee Assignments – 2007/2008

Chairman Eric (Sam) Loker

Associate Chairs Rich Cripps Steve Stricker

<u>Director, Museum of SW</u> <u>Biology</u> Tom Turner

Graduate Student Selection
Bob Sinsabaugh, Chair
Ulfar Bergthorsson
Marcy Litvak
Bruce Milne
"Cindy Mortensen"
Steve Poe

Cell Biology Search Rich Cripps, Chair Charlie Cunningham Mary-Anne Nelson Tina Vesbach Helen Wearing BGSA, Tom Kennedy

BGSA, Eric Schaad

Tenure and Promotion
Joe Cook, Chair
Scott Collins
Don Natvig
Will Pockmann
Mary Anne Nelson

Honors Program Maria Ruby

Undergraduate Policy Committee Howard Snell, Chair Steve Stricker Maria Ruby Jim Swann

BGSA, Casev Gilman

Dept Review / Outcomes Christina Fridrick (F) Diane Marshall

Graduate Policy Randy Thornhill, Chair Ric Charnov Astrid-Kodric Brown (Sp.) Blair Wolf (F) BGSA, TBA Space/Buildings Steve Stricker, Chair John Cox "Cindy Mortensen" Roy Ricci

George Rosenberg

Seminars
Dave Hanson
Shannon McCov-Haves

BGSA. Angela England

Graduate Advisors Ric Charnov Don Natvig

Computers
Eric Toolson, Co-Chr
Nancy Davis, Co-Chr
Renee Brown
Anne Rice
George Rosenberg
BGSA, TBA

Greenhouses
Diane Marshall, Chair
David Hanson
Jane Mygatt
Joy Avritt
BGSA, Nathan
Abrahamson

Research Day
Kelly Howe, Chair
Coen Adema
Michelle Baker
Bruce Hofkin
Steve Poe
Anne Rice
Michelle Steinauer
Chris Witt
BGSA, Angela England
BGSA, TBA
BGSA, TBA

Graduation
Paul Farnsworth, Co-Chr
Marieken Shaner, Co-Chr
Kelly Howe
Anne Rice
"Cindy Mortensen"
Jim Swan

Biology Graduate Student Association BGSA, Co-Pres.'s Will Pockmann, Faculty sponsor Curators
Joe Cook, Mammals
Tim Lowrey, Herbarium
Kelly Miller, Arthropods
Howard Snell,
Amphibians/Reptiles
Tom Turner, Fishes
Chris Witt, Birds
Terry Yates, Genomic
Resources

Museum SW Biology Exec Committee Tom Turner, Chair Curators, and Mike Bogen, Terry Yates, Steve Stricker

Scholarships Larry Barton, Chair Leah Larkin "Cindy Mortensen" Diana Northup Heather Paulsen Maria Ruby Steve Stricker BGSA, TBA

Undergraduate Academic Advising
Maria Ruby, Advising
Coordinator
Roxanne Candelaria-Ley
Cara-Lea C-G (Sp)
Kelly Miller
Marieken Shaner
Felisa Smith
Eric Toolson

Pre-Vet Advising Bruce Hofkin

Department Publicity Lee Couch

<u>Field Programs and Vehicles</u> Bob Sinsabaugh Blair Wolf

Mol. Biology Facility Richard Cripps

Microscopy Facility Steve Stricker

<u>Library Liaison</u> Maggie WW

LTER Director Scott Collins

LTER Network Office Director Bob Waide Sevilleta Field Station Director Don Natvig IMSD Director Maggie Werner-Washburne **CETI Director** Eric (Sam) Loker **BGSA Computer Pod** BGSA, TBA Website Re-design Randy Thornhill Animal Care and Use Blair Wolf New Grad Student Orientation Chris Witt (2008-9) Vaishali Katju (2008-9) Glass Case Displays Lee Couch Biological Society of New

Biological Society of New Mexico/UNM Foundation
Don Duszynski, Chair
Bob Dickerman
Terry Yates

Salary Committee
Cliff Dahm
Howard Snell
Astrid Kodric-Brown

Univ. & College Committees <u>AGEP Representative</u> Felisa Smith

A&S Senior Promotion TBD by A&S

A&S Tenure and Promotion TBD by A&S

A&S Undergrad Representative Tim Lowrev

Center for Research in Ecol Sci and Tech Bob Waide

Consortium for the Americas

Bruce Milne (F) Jim Brown (Sp)

Faculty Senate Howard Snell

RAC Committee Bob Waide

UNM Biosafety Coen Adema

UNM Radiation Control Committee Ulfar Bergthorsson

<u>University Scholarship and</u> <u>Awards Committee</u> Howard Snell

UNM Sustainability
Studies Program, Director
Bruce Milne

UNM Freedom/Tenure Tim Lowrey

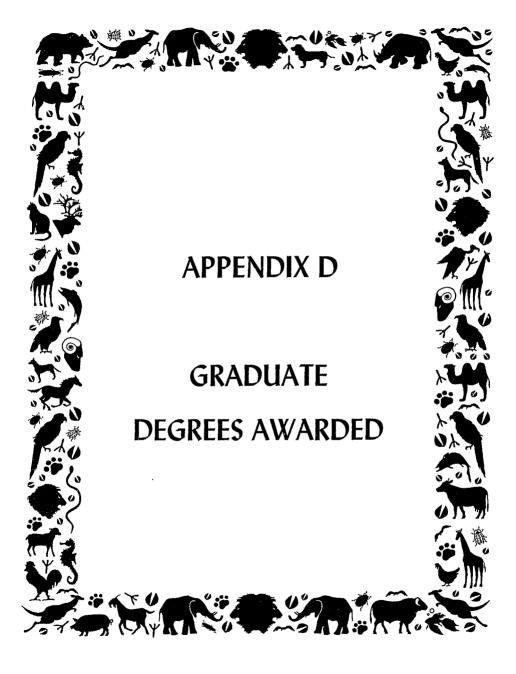
UNM Admissions and Registration Larry Barton

PIBBS Director Jim Brown Felisa Smith

MARC Director
Mary Anne Nelson

SEEDS Chapter Scott Collins

10/7/08



UNM Department of Biology Graduate Degrees Awarded by Semester, 2007–08

SUMMER 2007

M.S.

Dean, David A., Maximization of Shannon Diversity: How Energy and Water Partition Species Richness." (B.T. Milne)

Helander, Lynda A., "Molecular Mechanisms of Cardiac Morphogenesis in *Drosophila melano-gaster*." (R.M. Cripps)

Hollis, Jennifer L., Plan II. (D.L. Marshall)

Olp, Jonathan J., Plan II (R.D. Miller)

Orr, Teri J., "Rodents and Cacti: A Stable Isotope Investigation of a Key Plant Functional Group and its Consumers." (B.O. Wolf)

Ph.D.

Bateman, Heather L., "Ecological Restoration: Examples from the Middle Rio Grande." (H.L. Snell)

Keil, Pamela L., "Decision-making During Fights: Exploring Contest Behavior in the Sierra Dome Spider." (A. Kodric-Brown)

Reynolds, Jerusha, "The Effect of Habitat Fragmentation on Plant Pollinator Mututalisms: An Experimental Approach Using Wild Radish, *Raphanus sativus* L. (Brassicaceae) as a Model Organism." (D.L. Marshall)

Schwarz, Ryan S., "Evolution of Innate Immune Systems: Toward Understanding the Immune System of the Cnidarian *Hydractina symbiolongicarpus*." (E.S. Loker)

Weise, Christa D., "Bat Communities in Neotropical Lowland Forests in Panama." (T.L. Yates)

FALL 2007

Ph.D.

Crenshaw, Chelsea L., "Carbon and Nitrogen Dynamics in Stream Ecosystems." (E.S. Loker)

Magana, Hugo A., "A Case for Classifying the Rio Grande Silvery Minnow (*Hybognethus amarus*) as an Omnivore." (D.T. Hanson)

SPRING 2008

Ph.D.

Porras-Alfaro, Andrea, "Diversity, Distribution Patterns, and Effect of Nitrogen Fertilization on Fungal Communities in a Semiarid Grassland," With Distinction. (D.O. Natvig)

SUMMER 2008

M.S.

Frances, Jose A., "Spatial Genetic Structure and Population History of the Wolverine in Western Northern America with an Emphasis on the Peripheral Population." (J.A. Cook)

Hulebak, Erik P., "Species Limits in Panamanian Anolis limifrons." (S. Poe)

Imani-Shikhabadi, Reza A., "Gene Expression Analysis of Stress-challenged *Schistosoma mansoni* Worms." (C. Cunningham & E.S. Loker)

Lipinski, Kendra J., "Genome Adaptation During Recovery from Mutation Accumulation in Obligate Outcrossing Populations of Caenorhabditis elegans," With Distinction. (U. Bergthorsson)

Ph.D.

Boyer, Alison G., "Evolution and Ecological Correlates of Body Size, with Special Emphasis on Pacific Island Birds." (J.H. Brown)

Fincher, Corey L., "Infectious Disease, the Ecology of Human Values, and Cross-national Variation in Human Life History." (R. Thornhill)

Harding, Larisa E., "Out of the Americas: A Mitochondrial History of Mustela frenata." (T.L. Yates)

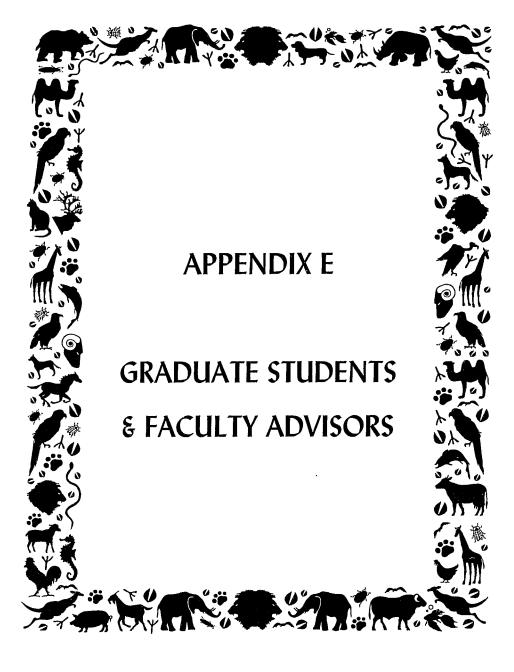
Lease, Hilary M., "Does Size Matter? The Scaling of Respiration, Energy and Structure in Arthropods." (B.O. Wolf).

Newberry, Teresa L., "Multi-scale Temporal Variability of Water Relations in Piñon Pine (*Pinus edulis*). (W.T. Pockman)

Parra, Zuly E., "T Cell Antigen Receptors in Marsupials: A Mix of Ancient Conservation and Novel Surprises." (R.D. Miller)

Ryan, Kathryn M., "The Homeotic Selector Genes and the NK Homeodomain Transcription Factor Tinman Together Control Cardiac Seven-up Expression in the *Drosophila* Dorsal Vessel." (R.M. Cripps)

Zeglin, Lydia H., "Microbial Diversity and Function at Aquatic-Terrestrial Interfaces in Desert Ecosystems." (C.N. Dahm)

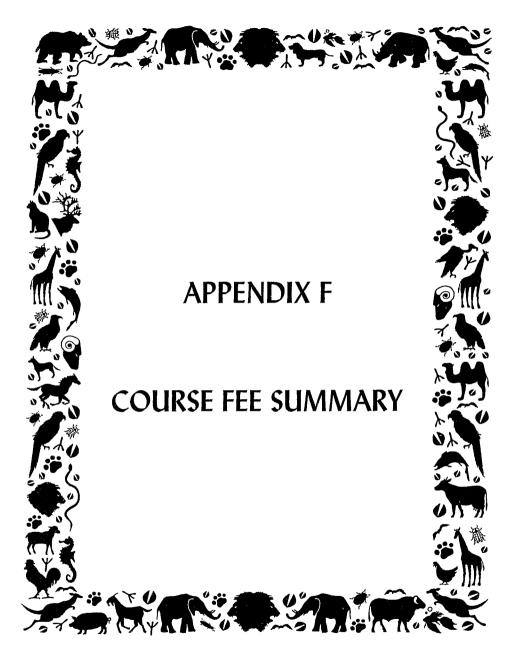


UNM Department of Biology GRADUATE STUDENTS & FACULTY ADVISORS, 2007–08

<u>STUDENT</u>	<u>ADVISOR</u>	STUDENT	<u>ADVISOR</u>
Abrahamson, Nathan	Marshall, D.L.	Franklin, Melissa	Charnov, E.L. &
Andres, Diana	*		Watson, P.
Archuleta, Michelle			Lowrey, T.K.
Barker, Brittany	Waide, R.B.	Gaines, Karen	Molles, M.C. Jr.
Barnes, Melanie	Marshall, D.L.	Giermakowski, Jacek	Snell, H.L.
Baum, Nina	Milne, B.T.	Gilman, Casey	Wolf, B.O.
Bettinelli, Julieta	Toolson, E.C.	Green, Laura	Pockman, W.T.
Bickford, Christopher	Hanson, D.T.	Gross, Amanda	Claiborne, B.
Bishop, Yvonne	Barton, L.L.	Gryzmala, Traci	Miller, K.B.
Boyer, Alison	Brown, J.H.	Harding, Larisa	Yates, T.L.
Brese, Daniel	Collins, S.L &	Hayes, Charles	Wolf, B.O.
	Litvak, M.E.	Helander, Lynda	Cripps, R.M.
Burnside, William	Brown, J.H.	Hope, Andrew	Cook, J.A.
Calabrese, Laura	Wolf, B.O.	Horner, Mark	Dahm, C.N.
Carles, Elizabeth	Nelson, M.A.	Hulebak, Erik	Poe, S.
Carvajal, Andrea	Collins, S.L.	Hung, Angela	Kodric-Brown, A.
Cleavall, Lauren M. Miller, K.B.		Hyde, Theresa	Wolf, B.O.
Crawford, Dolly Smith, F.A.		Imani, Reza	Cunningham, C.
Crenshaw, Chelsea	Loker, E.S.		& Loker, E.S.
Davidson, George	Werner-Washburne,	Kanigel, Kimberly	Nelson, M.A.
	M.	Kennedy, Thomas	Turner, T.R
Dawson, Natalie ^e	Cook, J.A.	Kitchen, Christopher	Natvig, D.O.
DeLong, John	Milne, B.T.	Koerner, Sarah	Collins, S.L.
Dichosa, Armand	Barton, L.L.	Krabbenhhoft, Trevor	Turner, T.F.
Dunn, William	Milne, B.T.	LaBeau, Elisa	Berthorsson, U.
Edelman, Andrew	Kodric-Brown, A.	Latella, Ian	Snell, H.L.
England, Angela	Marshall, D.L.	Lease, Hilary	Wolf, B.O.
Eppig, Christopher	Thornhill, R.	Letendre, Kenneth	Thornhill, R. &
Evangelisti, Annette	Wagner, A.		Watson, P.
Evansen, Ryan	Litvak, M.E.	Linderoth, Ondrea	Collins, S.L.
Farslow, James	Bergthorsson, U.	Lipinski, Kendra	Bergthorsson, U.
Fincher, Corey	Thornhill, R.	Loud Bear, Angela	Hanson, D.T.
Frances, Jose	Cook, J.A.	Magana, Hugo	Hanson, D.T.
		Malaney, Jason	Cook, J.A.
		-	

<u>STUDENT</u>	<u>ADVISOR</u>	<u>STUDENT</u>	<u>ADVISOR</u>	
Martinet, Maceo	Dahm, C.N.	Rearick, Jolene	Cook, J.A.	
Martinez, Diego	Nelson, M.A.	Redfern, Joanna	Lowrey, T.K.	
Mathiasen, Cindy	Wolf, B.O.	Ryan, Kathryn	Cripps, R.M.	
McIntyre, Julie Kodric-Brown, A.		Ryan, Mason	Poe, S.	
Medieros, Juliana Pockman, W.T.		Santistevan, Miguel	Milne, B.T.	
Medrano, Michael Molles, M.C. Jr.		Sawyer, Yadeeh (Escobedo)	Cook, J.A.	
Melman, Sandra	Loker, E.S.	Schaad, Eric	Poe, S.	
Mitchell (Maas), Kendra	Takacs-Vesbach, C.	Simpson, Heather	Marshall, D.L.	
Morriss, Ginny Cripps, R.M.		Snider, Jessica	Pockman, W.T.	
		Swenton, Daniella	Kodric-Brown, A.	
-		Thomas, Jason	Cook, J.A.	
Nearns, Eugenio	Miller, K.B.	Tichy, Jennifer	Dahm, C.N.	
Newberry, Teresa Pockman, W.T.		Van Horn, David	Dahm, C.N.	
Nonaka, Etsuko Collins, S.L.		Wang, Xin Xin	Miller, R.D.	
Okie, Jordan Brown, J.H.		Warne, Robin	Wolf, B.O.	
Parra, Zuly Miller, R.D.		West, Rhiannon	Thornhill, R.	
Pena-Phillipides, Werner-Washburne,		White, Sue	Pockman, W.T.	
Juan Carlos M.		Whiteman, Shawn	Smith, EA.	
Pershall, Alaina	Wolf, B.O.	Wilson, Wade	Turner, T.F.	
Phillips, Reese Brand	Snell, H.L.	Winslow, Frederic	Wolf, B.O.	
Plaut, Jennifer	Pockman, W.T.	Wright, Jeremiah	Wagner, A.	
Porras-Alfaro, Andrea	Natvig, D.O.	Zeglin, Lydia	Dahm, C.N.	
Powers, Heath	Pockman, W.T. &	Zuo, Wenyun	Brown, J.H.	

Hanson, D.T.



Course Fees Review

Overall FY 2003/04-2007/08

The Course Fees Account was established to help departments recuperate costs associated with expensive teaching classes. Unfortunately, because funding from the Legislature is inadequate to support fully the teaching mission, the Course Fees Account passes to all students some or all of the costs associated with teaching. In FY 2006–07, when the Biology Department faced extreme deficits in the I&G account, as well as providing state-of-the-art equipment for a new basement renovation that teaches the core undergraduate laboratory classes, the decision was made to charge the following course fees:

- \$5.00 for all lecture classes;
- \$10.00 for all discussion classes;
- \$30.00 for all lab classes;
- \$75.00 for all field trip and anatomy and physiology classes.

This account must be spent on course-related supplies and is reconciled after every semester. This account also is subject to the Banner and Regent's taxes. The Biology Dept. was able to contribute \$45,000 to finish lab renovations in the new teaching classrooms/labs, which is important in showcasing the programs that the department offers. The following table shows the revenue received for each fiscal year from courses fees.

Course Fees Revenue					
	FY 2003-04	FY 2004-05	FY 2005-06	FY 2006-07	FY 2007-08
Revenue	\$62,378.25	\$71,260.00	\$83,674.30	\$136,079.20	\$177,293.48
Banner Tax	_	\$712.60	\$836.74	\$1,360.79	\$1,772.93
Total Revenue	\$62,378.25	\$70,547.40	\$82,837.56	\$134,718.41	\$175,520.55

Because course demands and expenses have increased continuously, the total revenue has increased significantly over the past five years. The following table shows the percentage increase by fiscal year.

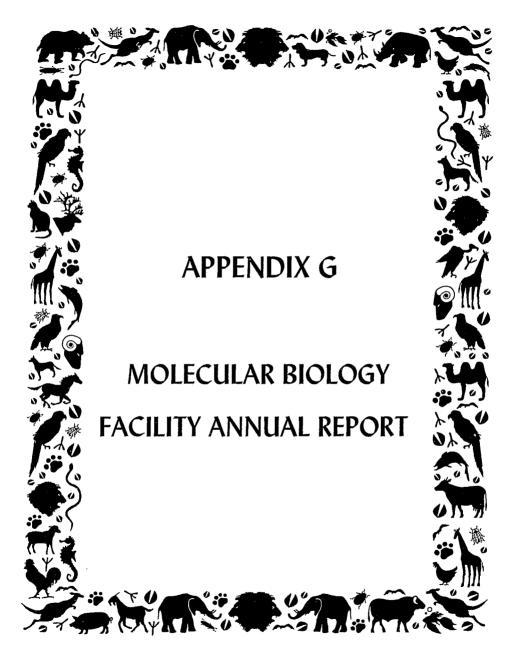
Course Fee Revenue Increase						
	FY 2003-04	FY 2004-05	FY 200506	FY 2006-07	FY 2007-08	
Total Revenue	\$62,378.25	\$70,547.40	\$82,837.56	\$134,718.41	\$175,520.55	
Percentage Increase	4.03%	11.58%	14.80%	38.51%	23.24%	

The major expenses in the Course Fee Account are laboratory supplies. On average, 95.4% of all expenditures incurred in this account are related directly to lab supplies needed to teach classes. The other expenses are related to copying and general administrative costs.

The following chart shows how much money was available to spend on each student based on student data enrollment with respect to the Total Revenue from the table directly above.

Average Student and Credit Allotments					
	FY 2003-04	FY 2004-05	FY 2005-06	FY 2006-07	FY 2007-08
Total Revenue	\$62,378.25	\$70,547.40	\$82,837.56	\$134,718.41	\$1 <i>7</i> 5,520.55
No. of Students	9,924	9,668	10,325	10,028	11,511
No. of Credit Hours	23,143	23,250	23,820	23,393	26,842
Student Allotment	\$6.29	\$7.30	\$8.02	\$13.43	\$15.25
Credit Allotment	\$2.70	\$3.03	\$3.48	\$5.76	\$6.54

Note: Notice that student enrollment continues to increase every year, as well as the number of credit hours being offered. The average student allotment support over the past five years is \$10.06, and the average credit allotment support is \$4.31. While this money still does not cover all of the costs associated with teaching laboratory classes, it does help to support the teaching mission. This year was the first fiscal year of implementation of the course fees. The department expects to generate approximately \$210,000 in revenue to help support the teaching mission, because enrollment continues to increase. Unfortunately, because I&G needs keep increasing, the Department relies more and more on the revenue from course fees. Because the fees are nominal, the Department does not experience a decline in enrollment.



MOLECULAR BIOLOGY FACILITY

Department of Biology Fiscal Year 2007-2008 Annual Report Robert D. Miller

The Molecular Biology Facility (MBF) at the UNM Department of Biology provides three principal areas of support. First, it is a common equipment facility for faculty and students who routinely use the tools of molecular biology in their research. Second, it is a support facility for faculty and students who do not have laboratory space of their own suitable for conducting research that utilizes molecular biology techniques. Third, the MBF provides support for several classes with teaching equipment, student training, and outreach to non-UNM organizations. All three roles are equally important and interdependent. Faculty and students from other A&S Departments, including Anthropology, Earth & Planetary Sciences, and Chemistry, and from the Schools of Medicine and Engineering, also utilize the MBF for both research and training. Based on the data contained in this report, the MBF is arguably among the most heavily utilized support units within the Biology Department.

The MBF's role in education and training in the Department and the community continued this fiscal year. Four courses taught within Biology (Biol. 425, 444, 446, 478) used the facility. The most critical role in training which the MBF plays, however, remains direct, hands-on research experience for graduate students and undergraduates working on independent projects with faculty mentors.

Highlights for the 2007-2008 fiscal year include:

- Based on data from the Office of Research Services, there were 51 grants active this
 fiscal year that utilized or depended upon the MBF. These grants amounted to more than
 \$22 million in total awards.
- Based on a search of the SciSearch database maintained at the Los Alamos National Laboratory, there were 21 MBF-related peer-reviewed manuscripts published in fiscal year 2007-2008.
- More than 64000 sequence, microsatellite, amplified fragment length polymorphism (AFLP), and terminal restriction fragment length polymorphism (T-RFLP) samples were run on the MBF's two ABI 3130xl Genetic Analyzers.

MOLECULAR BIOLOGY FACILITY AT THE UNM DEPARTMENT OF BIOLOGY

STAFF

Director: Robert D. Miller

Research Scientist/Manager: George H. Rosenberg

Research Scientist/COBRE Project: Jennifer Hathaway

Teaching Assistants:

Jose Frances (Fall 2007) and Ginny Morris (Spring 2008 and Summer 2008)

MAJOR NEW EQUIPMENT ACQUISITIONS

Agilent 2100 Bioanalyzer is used to gather quantitative and qualitative data about RNA, DNA, or protein samples.

Two additional Sequencher keys to allow more users to simultaneously access the Sequencher software, which is used for DNA sequence analysis.

USERS: 2007-2008

Faculty (28):

Adema, Barton, Bergthorsson, Brown, Cook, Cripps, Cunningham, Gangested (Psychology), Hanson, Hunley (Anthropology), Kodric-Brown, Loker, Lowery, Marshall, Miller, R, Miller K, Natvig, Nelson, Pockman, Poe, Sinsabaugh, Smith, Stricker, Takacs-Vesbach, Thronhill, Turner, Werner-Washburne, Yates

Adjunct or Part-time Faculty (8):

Michelle Baker, Sara Brant, Jerry Dragoo, Bruce Hofkin, Leah Larkin, Jeff Nekola, Diana Northup, Si-Ming Zhang

Postdoctoral Fellows (13):

Anthony Aragon, Don Benn, Anton Bryantsev, Ayesha Burdett, Maria Chechenova, Bill Dvorachek, Ben Hanelt, Larissa Harding, Megan Osbourne, Hong Nian, Vijay Ramakrishnan, Michelle Steinauer. Fernando Torres-Perez

Graduate Students (37):

Michelle Archuleta, Britney Barker, Dolly Crawford, Natalie Dawson, John DeLong, Armand Dichosa, Jose Frances, Jozlyn Garcia-Bustamante, Lynda Helander, Andrew Hope, Mark Horner, Erik Hulebak, Reza Imani, Trevor Krabbenhoft, Ray Joe, Elisa LaBeau, Kendra Lipinski, Jason Maleney, Sandra Melman, Kendra Mitchel, Ginny Morris, Euginio Nearns, Zuly Parra, Stacey Peters, Andrea Porras-Alfaro, Joline Rearick, Joanna Redfern, Meghan Rogahn, Kathryn Ryan, Yadeeh Sawyer, Heather Simpson, Jessica Snyder, Jason Thomas, Dave VanHorn, Xin Wang, Wade Wilson, Lydia Zeglin

Undergraduates (61):

Rene Aguilera, Vani Aran, Michelle Archuleta, Alicia Arguelles, Aurora Auwen, Patrick Blair, Jesse Byrd, Joseph Campbell, Josh Castillo, Michele Denton, Katrina Diamond, Tracey Diver, Ben Ediger, William Edelman, Ricardo Galdomez, Matt Garcia, Jana Gauntt, Ginger George, Julie Glaser, Jake Greenberg, Sarah Guilinger, Justine Hall, Jarrett Hines, Antoine Ho, Alicia Hodson, Olau Jackson-Weaver, Regan Karnes, Thai Lee, Katie Liberatore, Lindsay Livingstone, Monia Lucero, Lena Moffett, Ashley Montoya, Kathryn Moore, Stephanine Moquin, Monica Moya, Cloyce Nelson, Sierra Netz, Phong Nguyen, Medina Nourestani, Amaka Nwagbologu, Vance Oas, Kylea Odenback, Clare Parker, Mabel Padilla, Levon Phelan, Hallie Rane, Jennifer Rice, Marilyn Rodriguez-Wang, Gina Ryan, Charles Sanchez, Cheryl Sensibaugh, Alana Sharp, Jessica Smith, Elisha Song, April Tafoya, Phillip Tapia, Nicole Telles, Laura Urrea, Jesse Vanwestrienen, Melissa Wilson

Visiting Scientists Using the Facility (7):

Megan Friggins (Northern Arizona University) working with Dr. Yates/Parmenter Robin Simons (Chemical Engineering/UNM Lopez Lab)
Carol Linder and Lisa Bentson (New Mexico Highlands University)
Pat Dolan (Sandia Labs)
Vamshi Abbanaboina and Mary Ann Shaw (New Mexico Highlands University)

Research Staff (20):

Michele Adams, Erica Baca, Vint Blackburn, Pauline Cupit, Michele Denton, John Dunnum, Jennifer Ellwell, Kelly Fitzpatrick, Michele Forys, Jennifer Hathaway, Elizabeth Hatton, Jessica Jakubanis, Mary Ann Jaramillo, Candice Lovata, Tyanna Lovato, Bonnie Lun, Elizabeth Racz, George Rosenberg, Yelena Smagley, Barbara Stout

INSTRUCTION AND TRAINING

Formal Courses that used the MBF

Biol 425 Molecular Genetics Biol 444 Genomics & Genomic Analysis Biol 446/546 Molecular Methods Biol 478 Plant Physiology

Undergraduate Training Programs whose students or Fellows used the MBF

- 1. IMSD
- 2. MARC

SPONSORED PROJECTS USING THE MBF

Principal Investigator(s): Adema, C

Sponsor: DHHS Amount: \$1,617,430

Title: Anti-Pathogen Responses in Biomphalaria Glabrata

Project Period: 4/1/03-3/31/09

Principal Investigator(s): Miller, R

Sponsor: NSF

Amount: \$600,000

Title: Marupial Immunobiology Project Period: 5/1/07-4/30/11

Principal Investigator(s): Miller, R

Sponsor: NSF Amount: \$6,000

Title: Marupial Immunobiology REU supplement

Project Period: 5/1/07-4/30/11

Principal Investigator(s): Cook, J

Sponsor: NSF Amount: \$512,690

Title: Beringian Coevolution Project II

Project Period: 8/1/04-12/31/08

Principal Investigator(s): Cook, J

Sponsor: NSF

Amount: \$30,000

Title: REU Beringian Coevolution Project II

Project Period: 8/1/04-12/31/08

Principal Investigator(s): Cook, J

Sponsor: Forest Service Amount: \$49,983

Title: Mammal Inventory of the Tongass National Forest

Project Period: 7/19/05-7/31/10

Principal Investigator(s): Cook, J

Sponsor: Forest Service Amount: \$92,600

Title: NFIM Mammal Monitoring and Inventory of the Tongass National Forest

Project Period: 7/22/05-9/30/08

Principal Investigator(s): Cook, J Sponsor: US Fish/Wildlife

Amount: \$195,200

Title: Molecular Perspectives on Tongass

Project Period: 7/29/03-7/30/08

Principal Investigator(s): Cripps, R

Sponsor: NIGMS Amount: \$1,870,007

Title: Genetic Regulation of Muscle Fiber Diversity

Project Period: 5/1/01-4/30/09

Principal Investigator(s): Cripps, R

Sponsor: DHHS Amount: \$51,756

Title: Genetic Regulation Of Muscle Fiber Diversity

Project Period: 5/1/04-4/30/09

Principal Investigator(s): Cripps, R

Sponsor: NIH

Amount: \$1,031,947

Title: Genetic Regulation of Cell Fate in the Drosophila Heart

Project Period: 4/1/05-3/31/09

Principal Investigator(s): Cripps, R

Sponsor: AHA Amount: \$198,000

Title: Genetic Control of Muscle Remodeling in Drosophila

Project Period: 1/1/08-12/31/10

Principal Investigator(s): Cripps, R

Sponsor: March of Dimes

Amount: \$246,713

Title: Specification and Function of the Cardiac Pacemaker

Project Period: 6/1/08-5/31/11

Principal Investigator(s): Hanson, D

Sponsor: NSF Amount: \$360,000

Title: Light Enhanced 13C Enrichment of Dark Respired C02: Implications for Leaf Internal

C02 Conductance and Respiration in the Light

Project Period: 7/1/07-7/31/10

Principal Investigator(s): Larkin, L

Sponsor: Forest Service Amount: \$15,108

Title: Biology and Management of Woody Plants in a Semi-arid Grassland

Project Period: 4/18/07-6/30/09

Principal Investigator(s): Larkin, L

Sponsor: NSF Amount: \$332,333

Title: RESVSYS: A Holistic Approach to a Holartic Group: Subgeneric Relationships Within

the Genus Andrena Fabricius Project Period: 3/1/04-3/31/08

Principal Investigator(s): Loker, S Sponsor: Dept of Agriculture

Amount: \$16,768

Title: MR-Collaboration; Praziquantel Resistance in Egypt: Testing and Use of an In-Vitro

Project Period: 9/1/05-8/31/09

Principal Investigator(s): Loker, S

Sponsor: NIH Amount: \$986,699

Title: Biology of Trematode-Snail Associations

Project Period: 3/1/06-2/29/09

Principal Investigator(s): Loker, S

Sponsor: DHHS Amount: \$3,841,410

Title: COBRE: Center for Evolutionary and Theoretical Immunology

Project Period: 9/30/03-6/30/09

Principal Investigator(s): Loker, S

Sponsor: NIAID

Amount: \$1,389,147

Title: Evo-epidemiology of Schistosoma mansoni in Western Kenya

Project Period: 4/1/04-4/30/09

Principal Investigator(s): Loker, S

Sponsor: DHHS Amount: \$679,944

Title: COBRE: Center for Evolutionary And Theoretical Immunology

Project Period: 9/30/03-6/30/09

Principal Investigator(s): Loker, S

Sponsor: DHHS Amount: \$299,233

Title: Cobre: Center for Evolutionary And Theoretical Immunology

Project Period: 9/30/03-6/30/09

Principal Investigator(s): Loker, S

Sponsor: DHHS Amount: \$133,100

Title: COBRE: Center for Evolutionary And Theoretical Immunology

Project Period: 9/30/03-6/30/09

Principal Investigator(s): Lowrey, T

Sponsor: NMDEMNR Amount: \$125,000

Title: New Mexico Biodiversity Collections Consortium

Project Period: 7/1/08-6/30/09

Principal Investigator(s): Marshall, D

Sponsor: Dept of Agriculture

Amount: \$76,555

Title: Genetic Variability, Life History & Mating System of Invasive Plant FY 05-06

Project Period: 9/1/05-8/31/08

Principal Investigator(s): Miller, K

Sponsor: NSF

Amount: \$166,524

Title: Collaborative Research: Phylogeny, Behavior and Silk Evolution of Webspinners

(Embioptera), A Little-known Insect Order

Project Period: 2/15/07-8/31/09

Principal Investigator(s): Miller, K

Sponsor: NSF Amount: \$19.810

Title: Collaborative Research: Phylogeny, Behavior and Silk Evolution of Webspinners

(Embioptera), A Little-known Insect Order

Project Period: 2/15/07-8/31/09

Principal Investigator(s): Natvig, D

Sponsor: Forest Service

Amount: \$27,500

Title: Does Drought Exacerbate Damage Caused by Bark-Beetle-Associated Fungi in Pinyon-

Juniper Woodland Ecosystems? Project Period: 5/5/06-8/15/09

Principal Investigator(s): Natvig, D

Sponsor: Forest Service

Amount: \$6,785

Title: Does Drought Exacerbate Damage Caused by Bark-Beetle-Associated Fungi in Pinyon-

Juniper Woodland Ecosystems? Project Period: 5/5/06-8/15/09 Principal Investigator(s): Nekola, J

Sponsor: NSF Amount: \$33,346

Title: Collaborative Research: Radiocarbon Dating of North American Gastropod Shells

Project Period: 8/15/06-7/31/09

Principal Investigator(s): Nelson, M

Sponsor: NIH Amount: \$346,436

Title: Undergraduate Biomedical Reseach Training at UNM/MARC

Project Period: 6/1/06-5/31/09

Principal Investigator(s): Northup, D

Sponsor: NSF

Amount: \$291,644

Title: Identification of Microbial Signatures in Biogenic Cave Ferromanganese Deposits

Project Period: 8/15/03-7/31/08

Principal Investigator(s): Northup, D

Sponsor: NSF Amount: \$5,000

Title: Identification Of Microbial Signatures in Biogenic Cave Ferromanganese Deposits

Project Period: 8/15/03-7/31/08

Principal Investigator(s): Northup, D

Sponsor: NSF

Amount: \$112,982

Title: Collaborative Research: Biogenic Cave Carbonates: Identifying Surface Carbon Inputs to

Subsurface Ecosystems

Project Period: 9/1/07-8/31/10

Principal Investigator(s): Northup, D

Sponsor: T&E, INC

Amount: \$2,343

Title: Characterizing Under Surveyed Microbial Mat Communities in the Lava Tubes of El

Malpais National Monument Project Period: 12/1/07-11/30/08

Principal Investigator(s): Takacs-Vesbach, C

Sponsor: SNL Amount: \$40,000

Title: SURP FY07-08 Application of Molecular Techniques to the Study of Microbial Biofilms

Project Period: 10/1/07-9/30/08

Principal Investigator(s): Thornhill, R

Sponsor: NSF

Amount: \$340,883

Title: Genetic Conflicts Of Int, Fluct Assymand The MHC

Project Period: 8/1/02-1/31/08

Principal Investigator(s): Turner, T

Sponsor: NSF Amount: \$413,329

Title: CAREER: Museum-Based Approaches to Ecology and Evolution of Aquatic Systems: An

Integrated Research and Educational Program

Project Period: 5/1/02-4/30/08

Principal Investigator(s): Turner, T

Sponsor: NSF Amount: \$30,800

Title: REU:CAREER: Museum Based Approaches to Ecology and Evolution of Aquatic

Systems

Project Period: 5/1/02-4/30/08

Principal Investigator(s): Turner, T

Sponsor: NSF Amount: \$10,958

Title: Local Adaptation and Gene Flow in a Fragmented Host System: Crepidostomum Farionis

(Digenea) and Oncorhynchus Clarki Virginalis (salmoinade) in NM

Project Period: 6/15/06-8/31/08

Principal Investigator(s): Turner, T Sponsor: US Fish & Wildlife

Amount: \$112,948

Title: Assessment of Diversity at the Major Histocompatibility Complex in the Rio Grande

Silvery Minnow (Hybognathus Amarus)

Project Period: 9/21/06-1/2/09

Principal Investigator(s): Turner, T

Sponsor: NM Game & Fish

Amount: \$24,000

Title: Genetic Monitoring of the Pecos Bluntnose Shiner

Project Period: 5/25/07-6/30/09

Principal Investigator(s): Turner, T Sponsor: Bureau of Reclamation

Amount: \$305.967

Title: Assessment and Monitering of Rio Grande Silvery Minnow Genetics

Project Period: 7/15/07-9/30/12

Principal Investigator(s): Turner, T

Sponsor: NSF Amount: \$222,709

Title: Community Responses to River Drying in an Arid-Land Ecosystem: a Field and

Experimental Study

Project Period: 8/15/07-7/31/09

Principal Investigator(s): Werner-Washburne,M

Sponsor: NIGMS Amount: \$1,405,991

Title: A Compendium of Gene Expression in Stationary Phase

Project Period: 7/1/02-6/30/08

Principal Investigator(s): Werner-Washburne,M

Sponsor: NSF Amount: \$125,213

Title: Analysis of Quiescent and Non-quiescent Cells in Stationary-Phase Yeast Cultures

Project Period: 7/1/05-6/30/08

Principal Investigator(s): Werner-Washburne,M

Sponsor: DHHS Amount: \$65,454

Title: Compendium Of Gene Expressionin Stationary Phase

Project Period: 7/1/02-6/30/08

Principal Investigator(s): Werner-Washburne,M

Sponsor: NSF Amount: \$590,947

Title: The Biogenesis and Survival of Vegetative, Quiescent Yeast Cells

Project Period: 1/22/07-3/31/10

Principal Investigator(s): Werner-Washburne,M

Sponsor: NIGMS Amount: \$553,933

Title: Initiative for Minority Student Development at UNM

Project Period: 3/1/03-12/31/09

Principal Investigator(s): Yates, T

Sponsor: NSF

Amount: \$1,683,268

Title: Ecological Drivers of Rodent-Bourne

Project Period: 9/1/03-2/28/09

Principal Investigator(s): Zhang, S

Sponsor: NIAID Amount: \$742,875

Title: Molecular Studies of Immuno-Parasitology in Snails

Project Period: 7/1/07-6/30/10

PEER REVIEWED PUBLICATIONS WHICH UTILIZED THE FACILITY

Adema C, Lun C, Hanelt B. Transcriptome analysis of Biomphalaria glabrata, snail host of Schistosoma mansoni. (2007) American Journal of Tropical Medicine and Hygiene 77(5):294-295.

Arai S, Bennett S, Sumibcay L, Cook J, Song J, Hope A, et al. Short report: Phylogenetically distinct hantaviruses in the masked shrew (Sorex cinereus) and dusky shrew (Sorex monticolus) in the United States. (2008) American Journal of Tropical Medicine and Hygiene 78(2):348-351.

Barton H, Northup D. Geomicrobiology in cave environments: Past, current and future perspectives. (2007) Journal of Cave and Karst Studies 69(1):163-178.

Coles B, Nekola J. Vertigo malleata, a new extreme calcifuge land snail (Gastropoda: Vertiginidae) from the Atlantic and Gulf coastal plains of the USA. (2007) Nautilus 121(1):17-28.

Duszynski D, Lynch A, Cook J. Coccidia (Apicomplexa: Eimeriidae) infecting cricetid rodents from Alaska, USA, and northeastern Siberia, Russia, and description of a new Eimeria species from Myodes rutilus, the northern red-backed vole. (2007) Comparative Parasitology 74(2):294-311.

Hendren J, Shah A, Arguelles A, Cripps R. Cardiac expression of the Drosophila Sulphonylurea receptor gene is regulated by an intron enhancer dependent upon the NK homeodomain factor Tinman. (2007) Mechanisms of Development 124(6):416-426.

Koehler A, Hoberg E, Dokuchaev N, Cook J. Geographic and host range of the nematode Soboliphyme baturini across Beringia. (2007) Journal of Parasitology 93(5):1070-1083.

Lun C, Madrid T, Hanelt B, Adema C. Anti-trematode parasite responses of the snail Biomphalaria glabrata: Architecture of FREP loci. (2007) American Journal of Tropical Medicine and Hygiene 77(5):84-85.

Lynch A, Duszynski D, Cook J. Species of coccidia (Apicomplexa: Eimeriidae) infecting pikas from Alaska, USA and northeastern Siberia, Russia. (2007) Journal of Parasitology 93(5):1230-1234.

McPhee M, Osborne M, Turner T. Genetic diversity, population structure, and demographic history of the Rio Grande sucker, Catostomus (Pantosteus) plebeius, in New Mexico. (2008) Copeia 1:191-199.

Parra Z, Baker M, Hathaway J, Lopez A, Trujillo J, Sharp A, et al. Comparative genomic analysis and evolution of the T cell receptor loci in the opossum Monodelphis domestica. (2008) BMC Genomics 9:111.

Peters M, Turner T. Genetic variation of the major histocompatibility complex (MHC class II beta gene) in the threatened Gila trout, Oncorhynchus gilae gilae. (2008) Conservation Genetics 9(2):257-270.

Porras-Alfaro A, Herrera J, Natvig D, Sinsabaugh R. Effect of long-term nitrogen fertilization on mycorrhizal fungi associated with a dominant grass in a semiarid grassland. (2007) Plant and Soil 296(1-2):65-75.

Porras-Alfaro A, Herrera J, Sinsabaugh R, Odenbach K, Lowrey T, Natvig D. Novel root fungal consortium associated with a dominant desert grass. (2008) Applied and Environmental Microbiology 74(9):2805-2813.

Powell A, Jacobson D, Natvig D. Ancestral polymorphism and linkage disequilibrium at the het-6 region in pseudohomothallic Neurospora tetrasperma. (2007) Fungal Genetics and Biology 44(9):896-904.

Steinauer M, Wilson I, Mkoji G, Agola E, Ndugu I, Maina G, et al. Molecular and evolutionary epidemiology of Schistosoma mansoni in human hosts. (2007) American Journal of Tropical Medicine and Hygiene 77(5):96.

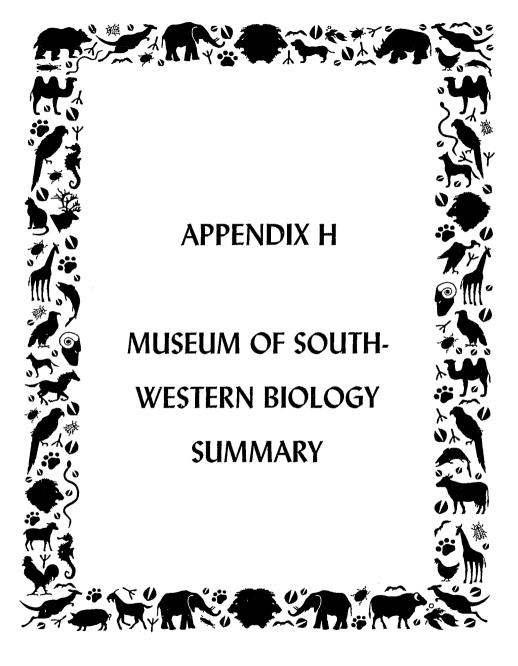
Steinauer M, Agola L, Mwangi I, Mkoji G, Loker E. Molecular epidemiology of Schistosoma mansoni: A robust, high-throughput method to assess multiple microsatellite markers from individual miracidia. (2008) Infection Genetics and Evolution 8(1):68-73.

Stout B, Zhang S, Adema C, Loker E. Relationship of specific fibrinogen-related proteins to acquired resistance in the snail Biomphalaria glabrata. (2007) American Journal of Tropical Medicine and Hygiene 77(5):81.

Takacs-Vesbach C, Mitchell K, Jackson-Weaver O, Reysenbach A. Volcanic calderas delineate biogeographic provinces among Yellowstone thermophiles. (2008) Environmental Microbiology 10(7):1681-1689.

Tanaka K, Bryantsev A, Cripps R. Myocyte enhancer factor 2 and chorion factor 2 collaborate in activation of the myogenic program in Drosophila. (2008) Molecular and Cellular Biology 28(5):1616-1629.

Zhang S, Zeng Y, Loker E. Characterization of immune genes from the schistosome host snail Biomphalaria glabrata that encode peptidoglycan recognition proteins and gram-negative bacteria binding protein. (2007) Immunogenetics 59(11):883-898.



Museum of Southwestern Biology Annual Report for 2007

MSB Director's Summary

Highlights

As of December 31, 2007, I completed five months of a two-year term as Director of the Museum of Southwestern Biology beginning in August 2007. Former MSB Director, Don Duszynski, left to take a position as special advisor to UNM President Schmidly at the end of July 2007. The final phases of construction of the CERIA building were completed under Don's directorship, as was finalization of an MOU with the US Geological Survey (USGS) to integrate their collections into the MSB, which is now nearly complete. Don made enormous contributions to the MSB and his efforts moved the MSB immeasurably forward in many ways. He oversaw the hiring of two new curators who began their positions in 2007. For the first time in its history, the MSB is fully staffed with curators and collection managers who are all supported from statefunded lines, excepting the newly established Division of Parasitology. Our two newest curators, Chris Witt (Birds) and Kelly Miller (Arthropods) began their appointments in January 2007.

Tragically, UNM and the MSB lost the curator and founder of the Division of Genomic Resources, Dr. Terry Yates, in December 2007 after a battle with cancer. Terry 's accomplishments were monumental and he is sorely missed by his colleagues and friends in the MSB. Prior to his death, Terry was awarded honorary membership in the American Society of Mammalogists, the highest honor that professional society bestows. Shortly after Terry's death, the MSB and the UNM Foundation worked together to establish the Terry Yates Endowment for Field Mammalogy. Today this fund has over \$100,000 to support young scientists in field and laboratory research in mammalogy. Dr. Joe Cook agreed to serve as interim Curator of Genomic Resources until a new curator can be found.

In August 2007, the Museum and UNM hosted the American Society of Mammalogists Annual Meeting in June 2007. This society has more than 1,000 members and we were able to showcase MSB Facilities and Collections to this national scientific body. In addition, the MSB hosted Dr. Phyllis Johnson, Director of the USDA Beltsville Agricultural Research Center (USDA-BARC), the Chairman of Biology Dr. Sam Loker, and incoming Dean of Arts and Sciences Dr. Brenda Claiborne. Our goal was to propose and explore a plan to relocate the U.S. National Parasite Collection to the MSB. This remains a major goal of the MSB and we continue to work with new USDA-BARC director Dr. Joseph Spence, curator of the USNPC Dr. Eric Hoberg, and Smithsonian curator of Entomology Dr. Scott Miller to pursue relocation and establishment of the collection here.

Significant Accomplishments in support of the College Mission

The MSB made substantive contributions to the education, research, and service missions of the College of Arts and Sciences and the University of New Mexico. Ten highlights for 2007 include:

Graduate and Undergraduate Training

- MSB faculty and staff directly mentored and trained 40 graduate students and 55 undergraduate students in 2007. The MSB provides high-quality, hands-on student research training, research, and curatorial experience. This experience translates into placement into jobs in the academic, government, and non-government (NGO) sectors in biology, ecology, evolution, natural resource management and conservation, and natural history museum management.
- 2) In 2007, MSB faculty and staff generated \$1.1 million for a museum-centered undergraduate training program that focuses on nurturing our diverse students to professional careers in the sciences.
- 3) The MSB formed and led a consortium of researchers in A&S, COE, and HSC that led to a successful preproposal to the NSF aimed at developing an Integrative Graduate Education and Research Training (IGERT) program to be established at UNM. This program is unique in the country and would bring \$3M for graduate education if funded. Of 412 preproposals received by the NSF, the MSB-IGERT received the highest possible reviews and was placed in the 'high priority' for funding category. The full proposal is due 20 October 2008.
- 4) The MSB has been instrumental in working with the Maxwell and other UNM Museums to reinvigorate the Museum Studies program at UNM.

Classroom Teaching and Support

5) MSB faculty and staff taught 22 courses at UNM and contributed specimens to 25 courses across campus. Students consistently rate inclusion of biological specimens highly in their undergraduate coursework. The MSB also offers the only undergraduate certification in Conservation Biology in New Mexico. This program provides training and know-how to tackle environmental issues that face New Mexico and the world.

Research Productivity and Support

- 6) MSB Faculty and Staff published 50 papers in peer-reviewed scientific journals in 2007. MSB specimens were cited in 68 scientific papers by scientists outside of UNM, which more than doubles the impact of specimen-based research productivity supported by the MSB. A total of 140 specimen loans were made in 2007 in support of scientific inquiry worldwide.
- 7) MSB Faculty and Staff have \$8.8 million in new and in-force grants and contracts from a variety of agencies including the NIH and NSF. The MSB is the primary UNM liaison to state and federal natural resource management agencies in research and advisory capacities, and serves a special role in open space planning in the City of Albuquerque.

Collections and Natural History Resources Development

8) The MSB cataloged more than 550,000 new specimens and acquired three 'orphaned' collections from University of Illinois, the U.S. Fish and Wildlife Service, and the New

- Mexico Department of Game and Fish. Relocation and curation of these specimens was supported by new grants from the NSF, USFWS, and NMDGF. Acquisition of these collections further enhances the MSB role as an internationally recognized repository for natural history collections. Major research expeditions to Africa and Central and South America were mounted by MSB personnel.
- 9) Through a cooperative agreement with the U.S. Geological Survey, the MSB has integrated nationally known federal collections, making these specimens and associated data more visible and available to the scientific community.
- 10) In 2007, the MSB laid the groundwork for a new Division of Parasitology, dedicated to the concept of 'integrated' research collections that simultaneously provide information of pathogens, parasites, and hosts for comprehensive study of epidemiology, pathology, ecology and co-evolution of infectious diseases and hosts. This is an emerging area of research that will undoubtedly generate enormous student and researcher development at UNM.

Short and Long-term Goals for the MSB: At our annual retreat held in August 2007, and at a number of MSB executive committee meetings throughout the year, we identified a number of goals, programs and key resources we will strive to accomplish over the next five years. They are:

1. Establish a Division of Parasitology. In response to continued and unprecedented environmental change and the ongoing emergence and resurgence of infectious diseases, we propose the creation of the new Division of Parasitology in the Museum of Southwestern Biology. National and international research agendas aimed at elucidating the dynamic linkages between hosts, parasites, environmental change and human health will be pursued, leveraging existing strengths, strengthening intra-university relationships, The newly created Division of Parasitology at the MSB will be an international resource for systematics, taxonomy, identification, ecological and epidemiological research in parasitology and will diversify and leverage UNM's continued leadership in these research arenas. The new Division of Parasitology represents the development of new capacity to address current and emerging challenges to science and society. As a recognized leader in collections-based research and biodiversity informatics, the MSB is uniquely positioned to bridge existing gaps between collection-based research and environmental and biomedical science: resources of the MSB have been critical for policy makers, natural resource managers, and government and business leaders because they support investigations and decisions related to human health, climate change, conservation, and land management. Moreover, the Division of Parasitology will move UNM to the leading edge of efforts to understand and combat emerging infectious diseases by facilitating efforts to assess the complex and dynamic linkages between hosts and parasites in a changing world. The Division of Parasitology was established in January 2008 with a substantial donation of specimens from the Rausch collection and ongoing research initiatives at UNM (e.g., Beringian Coevolution Project, Center for Evolutionary and Theoretical Immunology).

We also are working to relocate and transfer the U.S. National Parasite Collection (USNPC) from Beltsville, Maryland to the MSB. Relocation, transition and consolidation of the USNPC will involve five critical components represented by (1) curation and integration of liquid and dry specimens collections; (2) developing cyber-infrastructure and catalogues; (3) housing literature resources including an extensive reprint collection extending back to

- the 1800's; (4) historical catalogues documenting diverse global collections of parasites since the late 1800's; and (5) critical instrumentation. As part of this package, we propose temporary reassignment for USDA curatorial staff to the MSB for five years to ensure a timely and effective transition of the collection. Proposed funding for this initiative is included in UNM's 2009 Federal Legislative Priorities.
- 2. Develop and launch an MSB-centered informatics program. This program would be charged with maximizing the visibility and utility of our extensive specimen-based databases and to enhance development of a number of initiatives at UNM including the National Tuberculosis Archive, the U.S. National Parasite Collection, and genome and field data projects in the Department of Biology, to name a few. Most importantly, we ultimately aim to find resources for a faculty/curator of a Division of Informatics (DOI) would be a world-renowned scholar who develops data intensive mathematical models and algorithms for predicting decadal patterns of environmental change. We envision the DOI as a centralized, core resource that serves the UNM community at large, but based in the MSB. At minimum, we will seek to hire a full-time I/T systems administrator to implement the new database system. Our plan is to leverage this position through programmatic grant proposals like the proposed NSF IGERT grant.
- 3. Work to develop and establish integrated online database systems for all Divisions of the MSB. This will require substantial planning and collaboration among divisions and success will depend heavily on a new I/T systems administrative hire. This goal emerges naturally from the previous goal of establishing a formal informatics program in the MSB.
- 4. Implement an undergraduate training program afforded by recently awarded NSF-URM. Our first cohort of students was accepted into this program in Fall semester 2007. Details about students, research projects, and faculty mentors can be found at http://www.msb.unm.edu/mammals/UNO.html#mentors.
- 5. Develop and submit a museum-centered interdisciplinary graduate training program through development of an NSF-IGERT proposal. In 2007, we assembled a team of faculty researchers at the University of New Mexico (Table 1) who are interested in developing a museum-centered graduate training proposal aimed at documenting and understanding how abiotic and biotic systems change from molecular to ecosystem scales. There are three major underlying research areas: (i) identifying and understanding relationships of environmental change and host-pathogen interactions focusing both on human and wildlife diseases; (ii) using museum collections to uncover evolutionary and ecological change in biota that results from landscape and water use and global climate change in the American Southwest over decadal time scales; and (iii) developing informatics and modeling approaches to both create and use integrated relational databases that link specimens, environmental, molecular and geographic information.

If successful, our MSB-IGERT program will prepare students to meet substantial environmental challenges and for the job market by providing a strong grounding in their respective disciplines but also by providing a culture and infrastructure to allow them to tackle environmental and biotic changes in novel, integrative, and multidisciplinary ways. Most importantly, students will be equipped to bring time series data to bear on evaluating and predicting responses to environmental change over decadal time scales. Use of natural history collection specimens, data and materials will undoubtedly motivate new uses and ways of integrating databases in a reciprocally illuminating process that is likely to spark renewed interest in resources available in natural history collections.

6. Work to revitalize the museum studies program at UNM through MSB collaborations with other UNM Museums (e.g., Maxwell, Meteorite, and UNM Art Museums). Recently, the College of Arts & Sciences hired a new director in the UNM Maxwell Museum who is charged with revitalizing the Museum Studies program at UNM. The College has contributed significant resources including a new faculty position in addition to the new Director to coordinate this effort.

Significant Challenges to Growth and Development of the MSB

We face a number of challenges to implementation of our goals that mainly revolve around a general lack of resources for staffing and operational budgets. We address the following challenges below, and propose some solutions:

1. We Lack Two Critical Positions. The MSB is sorely lacking in not having financial resources to support two critical positions: (1) an IT/Systems Administrator to develop and maintain cyber-infrastructure, and (2) a building manager to take care of the day-to-day operation of the complexities of CERIA. At present, our database management plan is reactive rather than proactive; we deal with problems involving data security, data backup/management, systems maintenance, IT innovation, trouble shooting viruses/worms, purchasing hardware and software in highly piecemeal fashion using private contractors that vary tremendously in quality and service.

IT/Systems Administrator rationale and proposed solution: So much of the potential and promise for development of the MSB relies on enhancing our visibility and accessibility through electronic media such as the World Wide Web. We have enormous potential to provide integrated databases that could serve as tools to address questions of great societal import regarding emergence of pathogens and natural resource abundance and distribution. Our progress in this area has been seriously hampered by lack of personnel in computer systems administration. At minimum, we will seek to hire one full-time IT/ Systems Administrator to manage and implement database and server systems. Our plan is to leverage this position through programmatic grant proposals like the proposed NSF IGERT grant, and UNM legislative priorities like relocation and integration of the U.S. National Parasite collection and creation of the National Tuberculosis Archive.

Building manager rationale and proposed solution: To address the shortfall in professional building management in the MSB and CERIA, we propose that UNM fund a 0.5 FTE assistant building manager, to assist the current Biology Facility Operations Manager (John Cox) in taking on building management of CERIA. This is a critical time for infrastructure support because CERIA is now fully online, Biology has just constructed new undergraduate lecture and laboratory facilities, and Biology is in the early phases of construction of a new wing. The responsibilities of John Cox and the half-time assistant would be to manage Castetter Hall, The Biology Annex, CERIA, and new Castetter Wing.

This half-time position is critically important for a number of reasons. First, there is no building manager in CERIA and these duties have fallen to our museum administrator, Cathy Osborn. Building management of a complex facility like CERIA is outside the scope of her duties and outside our collective areas of expertise. CERIA serves the MSB and all its specialized facilities,

Media Arts in the College of Fine Arts, the LTER Network office and all associated telecom and computer software and hardware, and the Sevilleta LTER site offices and databases, and yet the entire burden for building management falls on the MSB. This is not an insignificant task. Cathy estimates that building and security issues occupy about 15 to 20 hours per week of her time. Admittedly, we are in the post-construction phase of ironing out problems; nevertheless we estimate about 10 hours per week will be spent on building management and security issues. We think this position could also be very cost effective and a good deal for the College. We envision a situation where the College, Biology, the MSB, and Fine Arts enter a cost-sharing deal to fund this position—perhaps with the potential to transfer to state funding in the future. This position could help protect the substantial investment that A&S and the University have made in this suite of buildings.

2. Critical Limitations on Fluid Collection Space. Since the 2003 occupation of the renovated old UNM Bookstore by the Museum of Southwestern Biology (MSB), all of the MSB divisions have acquired additional collections not originally factored into the estimated growth figures of 1998-99 when designing collection storage space for the Museum. Especially for invertebrates and vertebrates, there have been unanticipated acquisitions of specimens. Important additions to the MSB collections include a large backlog of ethanolpreserved New Mexico insect collections taken from pitfall sampling and an increasing number of collections from South America and Africa since the hire of a Curator of Arthropods. There is also the Rausch Collections of Parasites acquired by the Division of Mammals and strong support both within and outside of the MSB to acquire the U.S. National Parasite Collections, currently located in Beltsville MD. All of these collections increase the importance of the MSB as a national and international resource for scientific research in ecology, systematics, molecular systematics, population studies, and emerging disease research. Currently, there are rooms/areas within the Museum facility that have been identified as potential collections space for the Museum. These areas, if minimally renovated, would make a big difference in specimen access and if important collections could be accepted (or not) by the MSB. The UNM Fire Marshal has mandated new collection space for fluid-preserved materials in the MSB, which makes this a health and safety issue.

Proposed Solution: CERIA 125 conversion from classroom space to fluid collection space. To alleviate shortfalls of fluid collections space, we propose a two phase plan. For Phase I, we propose that Room 125, a classroom on the lower level of CERIA Building 83, be used as a temporary storage area for select collections currently housed in the main fluid collection room, Room 145. These select collections include: large containers holding large specimens of fishes, reptiles, and mammals that are blocking the exit pathways, 165 boxes of a newly acquired collection of fishes from the N.M. Department of Game and Fish in the main hallway of lower floor of CERIA Building 83, and jars of specimens that must be removed from select mobile carriages so that these units can be retrofitted for pull-out tank shelves. Once these collections are stored in Room 125, the reconstruction of Room 145 can begin. This phase will add 45 roll-out shelves, manufactured to hold stainless steel tanks ("coffins") for large specimens of vertebrates, to the lowest shelf spaces on three of the mobile carriages currently holding collections specimens in jars. A stationary unit of roll-out shelves and linear shelving also will be built along the south wall in the back of Room 145. Phase II construction will involve the complete reconstruction of Room 125 to accommodate fluid-preserved specimens. This reconstruction will involve bringing

the room up to code for storage of specimens in 70% ethanol. The room is already equipped with an emergency sprinkler system. With other infrastructure in place, the renovation of the floor, walls, and HVAC system can be done in a cost effective manner.

- 3. Operating Budgets for Collection Care/Improvement. The operational budget for the Museum of Southwestern Biology is just under \$50,000 for collections care, curation of new material, databasing, etc. This money is allocated to divisions at the beginning of the state fiscal year. There is considerable disparity among divisions in operating funds. Among the best-supported divisions are Mammals, the Herbarium, Fishes, and Amphibians and Reptiles. Budget increases in these divisions usually have been negotiated as part of grant proposal packages that have a large curatorial component. The divisions of Arthropods and Birds are inadequately supported with operating budgets that are \$2,000 and \$3,000, respectively, for the entire year (not including a 1% university-imposed tax to support computerization of contract and grant accounting, etc.). Both divisions are headed up by new, highly motivated curators who are preparing research grants, and we plan to request budget increases commensurate with scholarly and curatorial activity in these divisions as a part of grant proposal packages. In general, total allocations to the MSB have remained static and have not kept pace with inflation over the last five years despite rising costs of curation, shipping, electronic infrastructure, etc.
- 4. Faculty Curator Credit/Compensation. In December 2007, the entire faculty of the Biology Department ratified a document entitled "Codifying Responsibilities for MSB Curators," which lays out the expectations and duties of faculty curators in the MSB. This constitutes important recognition that faculty curators have duties that exceed the normal responsibilities of UNM Biology Department faculty members. We have yet to consider reallocation of teaching responsibilities and summer compensation for faculty curators. The MSB will work with the chairman of Biology and the Dean of Arts and Sciences to consider reallocation of duties and summer compensation to rectify this situation. The codification of curator duties document also requires that each faculty curator meet the general expectations of the MSB laid out there. Curators will be assessed each year by the Director in a letter to the Biology Department Chair that indicates whether faculty curators meet these standards. We propose that 0.25 FTE for faculty curators reside in a museum line (resulting in a one course per year reduction in teaching), and that faculty curators receive a \$4,000 summer SAC for uncompensated work in summer.

MSB DIVISIONAL REPORTS

DIVISION OF AMPHIBIANS AND REPTILES

DIVISION HIGHLIGHTS

Collection growth in 2007 has increased considerably when compared to the annual number of specimens catalogued in previous years (a 60% increase from last year). Staff at the division increased collecting efforts in the field, as part of a project that aims to improve distribution maps for New Mexico reptiles and amphibians. Work on this project and the associated voucher collection, funded in early 2007 by a grant from the New Mexico Department of Game and Fish, will remain the focus of divisional activities in 2008. Currently our total collection consists of 71,447 specimens. The number of specimens will soon increase since we have started the process of integrating the USGS collection, which will add nearly 13,000 specimens to the collection.

The number of requests for information from both scientists and the general public was similar to the previous year. During 2007, the website for the division averaged over 400 unique hits per month. Access to our collection's data via other online avenues (HERPNET, INRAM, GBIF, etc) averages over 2,400 hits a month (these are hits of our data within those other sites, not just hits to the sites). Online publications, including a list of New Mexico species and a bibliography related to them, have been downloaded, on average, over 100 times per month. Other means of communication, including phone and email, have resulted in the Curator and the Collection Manager handling 165 requests for information. These various accesses of our collection's data and information come from countries across the globe.

Throughout the year, we continued our outreach and collaboration with other scientists. We organized and hosted a regional meeting on conservation issues related to amphibians and reptiles (Southwest Partners in Amphibian and Reptile Conservation http://chelydra.unm.edu/swparc). We also worked with collection managers at other universities on an electronic survey of herpetological collections in the USA. We presented those findings at the annual meeting of ichthyologists and herpetologists in June. Using data gathered for the survey, we compared MSB's herpetological collection to other collections. Most notably, the number of specimens added to the MSB collection per year is on par with other collections, but the rate is above average when only public institutions are considered. We have continued working closely with the New Mexico Department of Game and Fish and we're starting new initiatives with the City of Albuquerque regarding Urban Biological Diversity.

TABLE OF COLLECTION USE

Collection: Growth (specimens: A catalogued & a entered in collection)	Loans/# specimens (outgoing)	Loans (incoming)	Visitors (noi including flour groups)	Information Requests Personally a Responded	Publications Gring MSB Specimens
1244	6	6	189	165	6

Direct Website Access2 ("Hits") 5,000 Indirect Collection Access3 ("Hits") 28,800 Downloads of Division Documents 1,200

²Direct Website access represents access to our Division's webpages.

COURSES USING THE COLLECTIONS

BIOL. 204, Animal Form and Function, Spring and Fall semesters, 264 students BIOL. 386, General Vertebrate Zoology, Spring and Fall semesters, 65 students

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers

Snell, H.L.

Spring BIOL. 379 – Conservation Biology, 38 students.

BIOL. 699 - Dissertation, 3 students

BIOL, 551 - Research Problems, 1 student

Summer BIOL. 699 – Dissertation, 1 student

Fall BIOL. 386 – General Vertebrate Zoology, 30 students

BIOL. 551 - Research Problems, 1 student

BIOL, 699 - Dissertation, 2 students

Poe, S.

BIOL. 203 – Beginning evolutionary biology, 190 students

BIOL. 436 – Phylogenetics, 4 students

BIOL. 536 - Phylogenetics, 11 students

BIOL. 502 - Philosophy of Biology, 5 students

B. Graduate Students

Phillips, R.B.

BIOL. 248, Human Anatomy & Physiology Lab I, Spring, 90 students (3 sections)

BIOL. 247, Human Anatomy & Physiology Lab II, Fall, 90 students (3 sections)

¹Research Visitors are those visiting the collection as part of research activities, Outreach visitors are those visiting as part of tours.

³Indirect Collection Access represents access to data associated with our specimens via other websites such as HERPNET, INRAM, GBIFF, etc.

COLLECTION MANAGEMENT

During 2007, 20 accessions resulted in over 1200 new specimens added to the main collection. The majority of these new specimens came from our divisional project aimed at increasing knowledge of the distribution of New Mexico amphibians and reptiles through the New Mexico Department of Game and Fish (see Awards section below).

Because last year we greatly improved our electronic resources and updated our administrative files, during 2007 we concentrated on our library resources. We have obtained and installed shelving to accommodate our growing library of publications and donated journals. In addition, we established databases of our library holdings, as well as databases of citations either related to collection staff or specimens.

Intensive field work by collection staff also resulted in significant amounts of time dedicated to cataloging the incoming specimens. Additionally, during fall we have begun the process of integrating the USGS collection into MSB. An agreement with USGS will ultimately result in nearly 13,000 specimens added to the MSB collection. We anticipate integration to be complete by fall 2008.

AWARDS, GRANTS, AND CONTRACTS

\$15,000. New Mexico Department of Game & Fish, Share with Wildlife Program, Banner #048817. Distribution of New Mexico's Amphibians and Reptiles. H.L. Snell PI and J.T. Giermakowski co-PI. May 2007 – Jun 2008. \$15,000 (F&A, \$1,364).

H.L. Bateman, A. Chung-MacCoubrey (Co-Principal Investigators). Grant from the Bosque Initiative Group, USDI U.S. Fish and Wildlife Service. \$11,000.

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes None.

B. Journal Articles

Hulebak, E.P., S. Poe, R. Ibañez, E. E. Williams. 2007. A striking new species of Anolis lizard from Panama. Phyllomedusa 6:3-8.

Milinkovitch, M.C., D. Monteyne, M. Russello, J.P. Gibbs, H.L. Snell, W. Tapia, C. Marquez, A. Caccone and J.R. Powell. 2007. Giant Galápagos tortoises; molecular genetic analyses identify a trans-island hybrid in a repatriation program of an endangered taxon. BMC Ecology 7(2): 1-7. (http://www.biomedcentral.com/1472-6785/7/2)

Phillips, R.B., C.S. Winchell, and R.H. Schmidt. 2007. Dietary overlap of an alien and native carnivore on San Clemente Island, California. Journal of Mammalogy 88:173-180.

Phillips, R.B., D.B. Harris and H.L. Snell. 2007. Bait Stations for Detection and Control of Alien Rats in Galapagos. The Journal of Wildlife Management 71(8): 2736-2742.

Poe, S. and C.Y. Miranda. 2007. A new species of phenacosaur Anolis from Peru. Herpetologica 63:219-223.

Poe, S. and R. Ibañez. 2007. A new species of Anolis lizard from the Cordillera de Talamanca of western Panama. Journal of Herpetology 41:263-70.

Poe, S., J. R. Goheen, E. P. Hulebak. 2007. Convergent exaptation and adaptation in solitary island lizards. Proceedings of the Royal Society of London Series B 274:2231–2237.

C. Web-Based

None.

D. Technical Reports

None.

E. Theses/Dissertations Completed

Bateman, Heather L. 2007. Ecological restoration: Examples from the Middle Rio Grande. [Ph.D. Dissertation]. Albuquerque: University of New Mexico, Dept. of Biology. July.

F. Work In Progress

Poe, S., C. Y. Miranda, E. Lehr. In press. Notes on variation in Anolis boettgeri Boulenger 1911, assessment of the status of A. albimaculatus Henle and Ehrl 1991, and description of a new Anolis (Squamata: Iguania) similar to A. boettgeri. Journal of Herpetology.

Poe, S. and C. Y. Miranda. In press. Another new species of green Anolis from the eastern Andes of Peru. Journal of Herpetology.

Poe, S., J. Velasco, E. E. Williams. Accepted pending revision. New or problematic Anolis from Colombia VIII: Descriptions of two nomen nudum species. Breviora.

Schaad, E. and S. Poe. In review. Evolution of venom toxicity in pit vipers. Journal of Herpetology.

G. Publications/Reports Based on MSB Specimens/Data by Outside Researchers Benavides, E. 2007. Molecular Phylogenetics of the Lizard Genus Microlophus (Squamata: Tropiduridae): Aligning and Retrieving Indel Signal from Nuclear Introns. Systematic Biology 56:776-797.

Christman, B.L., J.M. Christman, and M.R. Cummer. 2007. Geographic distribution. Lampropeltis triangulum celaenops. USA:NM: Luna Co. Herpetological Review 38:104.

Christman, B.L., and M.R. Cummer. 2007. Geographic distribution. Scaphiopus couchi. USA:NM: Guadalupe Co. Herpetological Review 38:1. Cole, C.J., C.W. Painter, H.C. Dessauer, and H. L. Taylor. 2007. Hybridization Between the Endangered Unisexual Gray-Checkered Whiptail Lizard (Aspidoscelis dixoni) and the Bisexual

Western Whiptail Lizard (Aspidoscelis tigris) in Southwestern New Mexico. American Museum Novitates 3555:1-31.

Hill, M.T., T.B. Cotten, and C.D. Crowder. 2007. Geographic distribution. Bufo woodhousii. USA:NM: Lea Co. Herpetological Review 38.

Hill, M.T., and M.D. Hill. 2007. Geographic distribution. Rana blairi. USA:NM: Doña Ana Co. Herpetological Review 38:216.

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

Poe, S. University of New Mexico. Evolution in solitary island lizards.

B. Contributed Talks/Posters (*presenter)

Bateman, H. L.*, M. J. Harner, and A. Chung-MacCoubrey. Toads respond to spring flooding along the Middle Rio Grande, New Mexico. 40th Joint Annual AZ/NM Meeting of The Wildlife Society and AFS. Albuquerque, NM. February.

Bateman, H.L.*, A. Chung-MacCoubrey, and H.L. Snell. Effects of non-native plant removal on lizard abundance along the Middle Rio Grande in New Mexico. Joint Meeting of the Ecological Society of America and Society of Ecological Restoration. San Jose, CA. August.

Giermakowski J.T.*, CA Wolfe, NE Rios. An Ongoing Online Survey of Ichthyological and Herpetological Collections: Identifying Current Issues in Collections. Poster presentation. Joint Meeting of the American Society of Ichthyologists and Herpetologists (ASIH), Herpetologists' League (HL), and Society for the Study of Amphibians and Reptiles (SSAR), St. Louis, MO. June.

Giermakowski J.T.*, Snell H.L. Covariation of Size and Vegetative Productivity in Galapagos Tortoises. Oral presentation. Joint Meeting of the American Society of Ichthyologists and Herpetologists (ASIH), Herpetologists' League (HL), and Society for the Study of Amphibians and Reptiles (SSAR), St. Louis, MO. June.

Giermakowski J.T.*, Snell H.L. Where to look? Maps of likely occurrence and absence for the herps of New Mexico. Poster presentation. Southwestern Partners in Amphibian and Reptile Conservation. Albuquerque, NM. May.

C. Attendance at Professional Meetings

H.L. Bateman

40th Joint Annual AZ/NM Meeting of The Wildlife Society and AFS. Albuquerque, NM. February.

Joint Meeting of the Ecological Society of America and Society of Ecological Restoration. San Jose, CA. August.

J.T. Giermakowski

First Annual Meeting of the Southwest Partners in Amphibian and Reptile Conservation. Albuquerque, NM. May.

Joint Meeting of the American Society of Ichthyologists and Herpetologists (ASIH), Herpetologists' League (HL), and Society for the Study of Amphibians and Reptiles (SSAR), St. Louis. MO. June.

H.L. Snell

First Annual Meeting of the Southwest Partners in Amphibian and Reptile Conservation. Albuquerque, NM. May.

- D. Service as Editor or on Editorial Board of a Journal
- H. L. Snell, Chair of the Museum of Southwestern Biology Publications Committee
- **E.** Service as Officer of Professional Society/Organization None.

OTHER PROFESSIONAL ACTIVITIES

A. Presentation to General Audience in a Scholarly Capacity None.

B. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

None.

C. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc.

H.L. Snell.

New Mexico Department of Game & Fish Species Recovery Board.

Conservation Fellow of the Saint Louis Zoo.

Service with the City of Albuquerque Councilors and City administrators on Urban Biological Diversity initiatives.

J.T. Giermakowski.

Member of Collections Committee for the American Society of Ichthyologists and Herpetologists.

Chair of Survey Subcommittee for the American Society of Ichthyologists and Herpetologists.

Member of New Mexico Department of Game & Fish Species Recovery Board. Local organizing Chair. 2007 meeting of the Southwest Partners in Amphibian and Reptile Conservation. Albuquerque, NM. May.

Collection Manager Representative to the Museum of Southwestern Biology Executive Committee.

D. Journal Referee

H.L. Bateman. Journal of Restoration Ecology (1).

S. Poe. American Naturalist (1). Proceedings of the Royal Society of London (1). Zoologica Scripta (1). Herpetologica (2). Copeia (1).

H.L. Snell. Journal of Wildlife Management (1). Frontiers in Ecology and the Environment (1).

R.B. Phillips. Folia Zoologica (1).

E. Hosting Professional Colloquia and Groups

None.

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc.

J.T. Giermakowski.

Local organizing Chair. 2007 meeting of the Southwest Partners in Amphibian and Reptile Conservation. Albuquerque, NM. May.

B. Public Service

H.L. Snell

Work with New Mexico Department of Game & Fish on Species Recovery issues.

Reviewed two NSF Proposals.

R.B. Phillips.

Judge for the 2007 Intel International Science and Engineering Fair.

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC.

H.L. Bateman

Grove Dissertation Scholarship, Department of Biology, UNM, \$9,000.

New Mexico Graduate 3% Scholarship Tuition Award, UNM; \$2,500.

DONATIONS AND GIFTS RECEIVED

None.

CURRENT STAFF

A. Faculty/Staff

Snell, H.L. Professor and Curator

Degenhardt, W.D., Curator and Professor Emeritus

Poe, S., Assistant Professor and Curatorial Associate

Giermakowski, J.T. Collection Manager

B. Graduate students

Bateman, H.L., Ph.D./Snell Giermakowski, J.T., Ph.D./Snell Huleback, E.P., M.S./Poe Latella, I.M., M.S./Snell and Poe Phillips, R.B., Ph.D./Snell Ryan, M.J., Ph.D./Poe Schaad, E., Ph.D./Poe

C. Undergraduate Student Workers and Volunteers Reichert, S.

MUSEUM ASSOCIATES

A. Curatorial Associates

Painter, C.W., New Mexico Dept of Game & Fish Stuart, J.N., New Mexico Dept of Game & Fish

B. Research Associates

Fitzgerald, L., Texas A&M University Fritts, T.H., retired

DIVISION OF ARTHROPODS

DIVISION HIGHLIGHTS

Collecting trips to Zambia, Bolivia, Alaska, British Columbia Setup of Curator Miller's molecular lab New student associates (Hodson, Telles, Edelman, Tafoya) Teaching of Entomology 485

TABLE OF COLLECTION USE

Specimens Accessioned	Loans ((origoing)	(incomitib) [rosins	aopaW	Indomentión Regnásis	Publications Chinedists Specimens
12000	4	0	91	200	2

COURSES USING THE COLLECTION

A&S 198-602, Freshman Learning Community (FLC), 22 students BIOL. & HONORS 324L, Natural History of the Southwest, 12 students BIOL 485, Entomology, 17 students

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers

Brantley, S.L.

A&S 198 (FLC 602), Freshman Learning Community Program, University College, "It IS a Bug's Life: People in an Insect's World," 22 students

Larkin, L.L.

BIOL 402/502, Plant/Insect Interactions, 10 students

Lightfoot, D.C.

BIOL 550, Ecological Research Design and Statistical Analysis, 1 student.

Along with Sandra Brantley, extensive mentoring in insect identification for graduate students Hilary Lease, Alaina Pershall, and Robin Warne for their projects involving movement of carbon and nitrogen through food webs.

McIntyre, J.L.

BIOL 402/502, Plant/Insect Interactions, guest lecture on her dissertation research

Miller, K.B.

BIOL 485L, Entomology, 17 students

COLLECTION MANAGEMENT

With more undergraduate and graduate students working in the division, we increased our efforts to curate and relabel older specimens (pinned and alcohol) in preparation for database entry. We also received 2,000 specimens from Kelly Miller and Gino Nearns to accession and curate. With some of Kelly Miller's startup money we purchased drawers to accommodate the newly processed specimens but continue to be limited by lack of cabinet space. The teaching collection was reorganized and expanded, and additional field equipment purchased, to be able to better support the needs of the Entomology class.

AWARDS, GRANTS, AND CONTRACTS

\$332,235. NSF/REVSYS. DEB # 0344288. A holistic approach to a holarctic group: subgeneric relationships within the genus Andrena Fabricius (Hymenoptera: Andrenidae) with a revision of the subgenus Callandrena Cockerell. L.L. Larkin, PI. 04/04-03/07. \$111,005 (F&A \$37,002).

\$41,000. FWS/Middle Rio Grande Bosque Initiative. Grant no. 201815G933. Development and publication of a field guide to bosque plants and animals. J.-L. E. Cartron, D.C. Lightfoot, S.L. Brantley, T. Lowrey and J. Mygatt, co-PIs. 09/05-08/07. \$41,000 (F&A \$0).

\$5,000. USGS/BRD contract order #06FTSA0059. Continuation of long-term monitoring of ground-active arthropods at Bandelier National Monument. S.L. Brantley and D.C. Lightfoot. 07/06-06/07 \$5,000 (F&A \$0).

\$5,000. Univsersidad Autonoma de Mexico / University of New Mexico. Ana Davidson. Separate and combined effects of prairie-dogs and cattle on a desert grassland in northern Mexico. Ground-arthropod and grasshopper component managed by D.C. Lightfoot and S.L. Brantley. 08/07-08/08 (F&A \$0).

National Geographic Society. R.M. Shelley and M.F. Medrano. Travel grant to document the biodiversity of the arthropod class Diplopoda (millipedes) in southern coastal Alaska. (F&A \$0).

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes None.

B. Journal Articles

Bergsten, J. & K.B. Miller. 2007. Phylogeny of diving beetles reveals a coevolutionary arms race between the sexes. PLoS ONE, 2(6): e522.

Davidson, A. D. and D. C. Lightfoot. 2007. Interactive effects of keystone rodents on the structure of desert grassland arthropod communities. Ecography 30:515-525.

Miller, K.B., Alarie, Y. & M.F. Whiting. 2007. Description of the Larva of Notaticus fasciatus (Coleoptera: Dytiscidae) Associated with Adults Using DNA Sequence Data. Annals of the Entomological Society of America, 100(6): 787-797.

Miller, K.B., Bergsten, J. & M.F. Whiting. 2007. Phylogeny and classification of the diving beetle tribe Cybistrini (Coleoptera: Dytiscidae). Zoologica Scripta, 36: 41-59.

Lingafelter, S.W. & E.H. Nearns. 2007. Five new species of longhorned beetles (Coleoptera: Cerambycidae) from Dominican Republic in genera Ataxia Haldeman, 1845; Atimiola Bates, 1880; Drycothaea Thomson, 1868; Eburia Lepeletier & Audinet-Serville, 1830; and Hormathus Gahan, 1830. The Coleopterists Bulletin, 61(2): 177-191.

Woodley, N.E. & E.H. Nearns. 2007. The type material of Buprestidae (Coleoptera) in the Fernando de Zayas collection, Havana, Cuba. The Coleopterists Bulletin, 61(3): 334-338.

C. Web-Based

None.

D. Technical Reports

Brantley, S.L., D.C. Lightfoot 2006. Long-term studies of ground-dwelling arthropod biodiversity at Bandelier National Monument. Submitted to USGS, Jemez Mountains Field Station.

E. Theses/Dissertations Completed

None.

F. Work in Progress (Only in press and already submitted)

Cartron, J.-L.E., Lightfoot, D.C., Mygatt, J., Brantley, S.L. and Lowrey, T. 2007. A field guide to the plants and animals of the Middle Rio Grande Bosque. UNM Press. Due Fall 2008.

Lightfoot, D.C., S.L. Brantley and C.D. Allen. Geographic patterns of ground-dwelling arthropods across multiple ecoregion transitions in the North American Southwest. In press, Western North American Naturalist.

Medrano, M. 2007. Paper accepted for the Proceedings of the Richard Hoffman 80th Birthday Symposium.

Pendleton, R.L., B.K. Pendleton, K.R. Wetherill and T. Griswold. In press. Reproductive biology of Larrea tridentata: a preliminary comparison between core shrubland and isolated grassland plants at the Sevilleta National Wildlife Refuge, New Mexico. In: Kitchen, S.L., R.L. Pendleton and T.A. Monaco, comps. 2007 Shrublands under fire: disturbance and recovery in a changing world: 2006 June 6-8, Cedar City UT. Proceedings RMRS – P-xx. Fort Collins, CO, USDA, Forest Service, Rocky Mountain Research Station.

Weissman, D. B. and D. C. Lightfoot. In press. Techniques for the Field Capture and Captive Rearing of Jerusalem Crickets. Sonoran Arthropod Studies Institute. 2007 Invertebrates in Captivity Conference Proceedings.

G. Publications/Reports Based on MSB Specimens/Data by Outside Researchers None.

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

Miller, K.B. 2007. Females who play hard-to-get are for suckers: Mating systems in diving beetles, Syracuse University.

Miller, K.B. 2007. Females who play hard-to-get are for suckers: Mating systems in diving beetles, Arizona State University.

B. Contributed Talks/Posters (*presenter)

Brantley, S.L.* and Lightfoot, D.C.* 2007. New Mexico biodiversity and MSB tour. Oral presentation, The New Mexico Network for Women in Science and Engineering: Expanding Your Horizons in Science and Mathematics, Albuquerque. March

Nearns, E.* 2007. A preliminary morphological study of Oncideres c. cingulata (Say) (Coleoptera: Cerambycidae: Lamiinae: Onciderini). Poster presentation, Entomological Society of America, San Diego, December.

Hodson, A.M.* and Larkin, L.L. 2007. Using molecular techniques to identify flower hosts in bees. Poster presentation, UNM Department of Biology Annual Research Day. April.

Kennedy, T.L*. and Turner, T.F. 2007. The role abiotic processes on the temporal dynamics of the macroinvertebrate community in the Rio Grande. Poster presentation, UNM Department of Biology Annual Research Day. April.

Miller, K.B.* 2007. The phylogeny of whirligig beetles (Coleoptera: Gyrinidae): Stopping the spin. Oral Presentation, Entomological Society of America, San Diego. December.

Noll, B.* and Brantley, S.L.* 2007. Getting students to take ownership of their learning. Oral presentation, UNM Office of Support for Effective Teaching Success in the Classroom. February

Parker, C.* and Larkin, L.L. 2007. The phylogenetic history of host plant choice in Andrena bees. Poster presentation, UNM Biology Research Day. April.

Weissman, D. B. and D. C. Lightfoot.* 2007. Techniques for the Field Capture and Captive Rearing of Jerusalem Crickets. Sonoran Arthropod Studies Institute. 2007 Invertebrates in Captivity Conference, Tucson, AZ. July

Wetherill, K. 2007. Reproductive biology of Larrea tridentata: a comparison of core and isolated bushes. Poster presentation, Sevilleta LTER/Jornada LTER Joint Symposium, July

C. Attendance at Professional Meetings

Brantley, S.L., Miller, K.B. and Nearns, E. 2007. Entomology Collections Network Meeting, San Diego, CA. November

Nearns, E. 2007. Beetle Families of the World Workshop, Bozeman, MT. June

Nearns, E. 2007. Larval Coleoptera Workshop, Bozeman, MT. June

Nearns, E. 2007. North American Workshop in Cladistics Methods, Columbus, OH. July

D. Service as Editor or on Editorial Board of a Journal None.

E. Service as Officer of Professional Society/Organization None.

OTHER PROFESSIONAL ACTIVITIES

A. Presentation to General Audience in a Scholarly Capacity None.

B. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

None.

C. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc.

Gaines, K.H.

2005-present. Member, Society for Conservation Biology Freshwater Working Group.

2001-present. Member, North American Benthological Society Conservation and Environmental Issues Committee.

Larkin. L.L.

2006-2007. UNM Department of Biology Research Day Committee.

Larkin, L.L.

2006-2007. Member, task force for peer-review of interactive keys, www.discoverlife.org.

D. Journal Referee

Brantley, S.L. 2007. Reviewed paper for Collection Forum. February.

E. Hosting Professional Colleagues and Groups None.

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc. MSB hosted the 21st annual meeting of the Society for the Preservation of Natural History Collections and the Natural Science Collections Alliance, 23-27 May 2006.

David Lightfoot and Sandra Brantley led field trip to the Sandia Mountains, to visit the plants and animals associated with the 4 life zones there.

B. Public Service

Brantley, S.L. and D.C. Lightfoot

Provided specimens and information on venomous arthropods to Dr. Arthur Mares for the UNM Student Health Center health fair, September.

McIntyre, J.L.

Presentation on Arthropods to St. Timothy's Montessori School students, May 2007. 4-6 year olds, 3 merged classes, total of students.

Science Fair Judge at Monte Vista Elementary School, December 2007.

Presentation on Arthropods to Monte Vista Elementary School students, December 2007. 2 5th grade classes, total of 60 students.

Wetherill, K.

Guest speaker on Native Bees at Festival of the Cranes, Bosque Del Apache NWR. November 2007

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS

None

DONATIONS AND GIFTS RECEIVED

Richard Holland, 3000 specimens: moths, butterflies, other insect taxa collected in NM.

Eric Metzler, 2000 specimens

Kelly Miller, 2000 specimens

Eugenio Nearns, 6 books, 1000 specimens

CURRENT STAFF

A. Faculty/Staff

Kelly Miller, Assistant Professor, Curator

Manuel Molles, Professor Emeritus, Curator Emeritus

Clifford Crawford, Professor Emeritus, Curator Emeritus

Sandra Brantley, Research Assoc, Professor, Senior Collection Manager

David Lightfoot, Research Assoc. Professor, Senior Collection Manager

B. Graduate Students

Julieta Bettinelli, Ph.D. candidate

Lauren Cleavall, Masters student

Karen Gaines, Ph.D. candidate

Eugenio Nearns, Ph.D. candidate

Traci L. Grzymala, Masters student

Tom Kennedy, Ph.D. candidate

Ondrea Linderoth-Hummel, Ph.D. candidate Julie McIntyre, Ph.D. candidate Michael Medrano, Ph.D. candidate

C. Undergraduate Student Workers and Volunteers

Sharyn Davidson, volunteer William C. Edelman, undergraduate Alicia M. Hodson, undergraduate Emily P. Hodson, undergraduate Nicole D. Telles, undergraduate

MUSEUM ASSOCIATES

A. Research Associates

Ana Davidson, postdoctoral fellow, UNM and UNAM Leah Larkin, Research Asst. Professor Eric Metzler, Ohio State University, retired Karen Wetherill, Research Scientist II, Sevilleta LTER

DIVISION OF BIRDS

DIVISION HIGHLIGHTS

We established a five-year convenio with an NGO in Peru, CORBIDI, that is dedicated to biodiversity studies and collecting. We accomplished two major expeditions to Peru that collected 1841 specimens of over 300 species in just under 3 months of field time. Once accessioned to MSB, our avian tissue collection will jump from 19th to 15th largest in the world in terms of both diversity and number of specimens. We successfully renewed our permits with the Peruvian government to continue our work there in 2008.

We accessioned a world-class series of Sandhill Cranes (397 specimens) that was received from Greg Schmitt of Kirtland, NM. Greg collected this series of specimens when he was an Endangered Species Biologist in the NM Dept. of Game and Fish, running a hunter check station. Greg spent many hours preparing these specimens as skeletons and flat skins. These crane specimens represent all three breeding populations that winter in New Mexico and many have tissue samples associated with them for genetic analysis.

Seven custom-built, low-profile specimen cases were added to the collection to maximize space utilization in the dry collections while maintaining compliance with fire codes with respect to clearance below sprinklers.

We established a Synoptic Series of New Mexico Birds within the main series to be used for demonstration, teaching, or inter-specific comparative studies. To date, this sub-collection consists of 287 specimens that provide an overview of New Mexico bird diversity. In 2008, we will work to make this collection comprehensive, with over 500 species represented.

TABLE OF COLLECTION USE

Specimens :: Accessioned ::	Loans (outgoing)	Loans (incoming) 5	Visitors .	Informátion Requesis	Publications : Crime MSB Specimens
897	10	6	67	30	7

COURSES USING THE COLLECTIONS (2)

BIOL. 486L, Ornithology: Fall semester, 18 students

BIOL. 386, General Vertebrate Zoology: Fall semester, 36 students

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers (7)

Witt, C. C. and B. O. Wolf: BIOL 486, Ornithology: Fall semester, 18 students.

Witt, C. C.: Spring and Fall semesters: BIOL 502: Molecular Systematics Discussion, 2 enrolled students, many participants.

Witt, C. C.: Guest Lecture, "Biology of Tropical Birds," BIOL 461L: Tropical Biology, 15 students.

Wolf, B. O.: Fall 2007, Ecology Graduate Core: team-taught with Felisa Smith, Scott Collins & Jeff Nekola. Biol. 516. (ca. 20 students)

Wolf, B. O.: Spring 2007, Graduate Field Biology, field ecology course held in Bahia Kino, Sonora, Mexico, Biol. 515. (ca. 10 students)

Wolf, B. O.: Spring/Fall 2007 Animal Physiological Ecology: lab seminar. Biol. 402/502. 1 unit, 15 students

COLLECTION MANAGEMENT

The data proofing project continued this year, with about half of the nonpasseriform birds completed, mostly by work-study student Keith Adams. Specimen records have not been updated in the database yet, but are in an excel spreadsheet that needs to be reincorporated into the main database.

We continue to use the Arctos Database as a data management tool for our collection. It is continuing to be developed, but the data entry process has now been improved enough that we are satisfied with the system.

United States field work this year took us to all corners of New Mexico in search of Vesper Sparrows, and also into Colorado. A large portion of our time is dedicated to obtaining and maintaining collecting permits. We received specimens from six accessions this year, with most of our specimens, as usual, coming from wildlife rehabilitators in the state. These are generally received from Kathleen Ramsay, of The Wildlife Center, Espanola, Penny Elliston of Wildlife Rescue, Inc, Albuquerque, and from Shirley Kendall, Corrales. Other major accessions were frozen pheasants received from the Kalij Conservatory and a tremendous series of Sandhill Crane specimens immaculately prepared by C. Gregory Schmitt of Kirtland, NM, as mentioned previously in Highlights (above). Large accessions of specimens that we have collected in Peru will be imported in 2008.

AWARDS, GRANTS, AND CONTRACTS

Title: REU Supplement: The Phylogenetic and Biogeographic History of High Altitude Adaptation in Hummingbirds: Selection on Hemoglobin Proteins as a Function of Oxygen Supply and Demand; PI: J. A. McGuire, (written and carried out by Christopher C. Witt); Funding agency: National Science Foundation; Amount: \$15,940.

Wolf, B. O. A preliminary investigation of the use of wildlife water developments by the bird and bat community on the KOFA National Wildlife Refuge, Arizona Game and Fish Department. 6/1/2007-2/1/2008, \$55, 900.

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes None.

B. Journal Articles

Gilman, C. A., and B. O. Wolf. 2007. Use of portable ultrasonography as a nondestructive method for estimating reproductive effort in lizards. Journal of Experimental Biology 210:1859-1867.

McGuire, Jimmy A., Christopher C. Witt, Douglas L. Altshuler, J. Van Remsen, Jr. 2007. Phylogenetic systematics and biogeography of hummingbirds: Bayesian and maximum likelihood analyses of partitioned data and selection of an appropriate partitioning strategy. Systematic Biology 56: 837-856.

Williams, Sartor O. III. 2007. A January Specimen of the Flammulated Owl from Northern New Mexico. The Wilson Journal of Ornithology 119: 764-76

Williams, Sartor O. III. 2007. Fifth report of the New Mexico Bird Records Committee. New Mexico Ornithological Society Bulletin 35: 61-86.

Witt, Christopher C. and Satya Maliakal-Witt. 2007. Why are diversity and endemism linked on islands? Ecography 30: 331-333.

C. Web-Based

None.

D. Technical Reports

Johnson, A. B., and C. C. Witt. 2007. A Survey of Birds of the Western Andean Cordillera above Incahuasi, Lambayeque, Peru, 28 June – 13 July, 2007. Technical Report to the Centro de Ornitología y Biodiversidad, Lima – Peru. 16 pages.

Witt, C. C. 2007. Informe final a INRENA (Lima-Peru) del proyecto con título: "Evolución de los picaflores y otras aves en la Cordillera de los Andes". Authorización No 76-2005-INRENA-IFFS-DCB. Submitted July 4, 2007.

E. Theses/Dissertations Completed None.

F. Work In Progress

Dickerman, R. W. Notes of the Elf Owls of western Texas, adjacent Coahuila, and southeastern New Mexico, with description of a new subspecies. Western Birds. In press.

Dickerman, R. W. 1950's Tabasco, A zip trip (collecting redwings in Central America in 1968). In A fleeting moment of perfect flavor: Biological explorations in Middle America (Kevin Winker, ed.). in press, University of Florida Press.

Williams, S. O. III, P. Mehlhop and D. A. Zimmerman, in September 2006 signed a publication agreement with UNM Press to produce a comprehensive book "Birds of New Mexico."

Dickerman, R. W., and A. B. Johnson. 2008a. Notes on Great Horned Owls nesting in the Rocky Mountains, with a description of a new subspecies. Journal of Raptor Research 42:20-28.

Dickerman, R. W., and A. B. Johnson. 2008b. Wing-tail measurements of Bubo virginianus from Texas. Southwestern Naturalist 53:128-129.

Hackett, S. J., R. T. Kimball, S. Reddy, R. C. K. Bowie, E. L. Braun, M. J. Braun, J. L. Chojnowski, W. A. Cox, K. L. Han, J. Harshman, C. J. Huddleston, B. D. Marks, K. J. Miglia,

W. S. Moore, F. H. Sheldon, D. W. Steadman, C. C. Witt, and T. Yuri. 2008. A phylogenomic study of birds reveals their evolutionary history. Science 320:1763-1768.

Johnson, A. B., and K. Winker. 2008. Autumn stopover near the Gulf of Honduras by Nearctic-Neotropic migrants, Wilson Journal of Ornithology 120:277-285.

G. Publications/Reports Based on MSB Bird Division Specimens/Data

Brant, S. V. 2007. The occurrence of the avian schistosome Allobilharzia visceralis Kolarova, Rudolfova, Hampl et Skirnisson, 2006 (Schistosomatidae) in the tundra swan, Cygnus columbianus (Anatidae), from North America. Folia Parasitologica 54:99-104.

Kerr, K. C. R., M. Y. Stoeckle, C. J. Dove, L. A. Weigt, C. M. Francis, and P. D. N. Hebert. 2007. Comprehensive DNA barcode coverage of North American birds. Molecular Ecology Notes 7:535-543.

McGuire, J. A., C. C. Witt, D. L. Altshuler, and J. V. Remsen. 2007. Phylogenetic systematics and biogeography of hummingbirds: Bayesian and maximum likelihood analyses of partitioned data and selection of an appropriate partitioning strategy. Systematic Biology 56:837-856.

Shepherd, T. M., and K. J. Burns. 2007. Intraspecific genetic analysis of the summer tanager Piranga rubra: implications for species limits and conservation. Journal of Avian Biology 38:13-27.

Williams, S. O. III. 2007. A January specimen of the Flammulated Owl from Northern New Mexico. Wilson Journal of Ornithology 119:764-766.

Willoughby, E. J. 2007. Geographic variation in color, measurements, and molt of the Lesser Goldfinch in North America does not support subspecific designation. Condor 109:419-436.

Yuri, T., R. T. Kimball, E. L. Braun, and M. J. Braun. 2008. Duplication of accelerated evolution and growth hormone gene in passerine birds. Molecular Biology and Evolution 25:352-361.

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

Witt, C. C. 2007. Hummingbird evolution into the Andes: History revealed by the integration of molecular systematics and physiology. Invited Seminar, Institute of Arctic Biology, University of Alaska, Fairbanks, March, 2007.

Witt, C. C. 2007. Hummingbird evolution into the Andes: History revealed by the integration of molecular systematics and physiology. Invited Seminar, Louisiana State University Museum of Natural Science, October 19, 2007.

Wolf, B. O. 2007. Are saguaros a "keystone" resource for consumers? An isotopic view of a plant- animal interaction, Department of Biology, University of California, Riverside.

Wolf, B. O. 2007. Seasonal and annual shifts in pathways of carbon flow through an arid grassland-shrubland food web, Department of Biology, University of California, Riverside.

B. Contributed Talks/Posters

Witt, C. C. 2007. Resistance to environmental hypoxia by Andean hummingbirds. The Conference of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists, (GREEB), Abiquiu, New Mexico, September 22.

Murray, I., and B. O. Wolf 2007. Nutritional ecology of chelonians via stable isotope analysis, 2007 Joint Meeting of Ichthyologists and Herpetologists, St. Louis, MO, 11-16 July.

Pershall, A., R. Warne and B. O. Wolf. 2007. Small mammal utilization of pulsed resources quantified through stable isotope analysis., 87th Annual Meeting of the American Society of Mammalogists, Albuquerque, NM, 6-10 June.

Mathiasen, C. C., I. Murray, B. O. Wolf, F. A. Smith. 2007. Portable ultrasonography: developing non-destructive techniques for quantifying reproductive effort under field conditions, 87th Annual Meeting of the American Society of Mammalogists, Albuquerque, NM, 6-10 June.

Pershall, A. D., Warne, R., Wolf, B. O. Small mammal utilization of pulsed resources quantified through stable isotope analysis. Abstract with poster. Society for Integrative and Comparative Biology Annual Meeting, January 2007, Phoenix, Arizona.

Wolf, B. O., R. Warne, S. Engel and I. Murray. 2007. Using stable isotope approaches to trace pathways of carbon flow through a food web; responses to short and long-term climate variability, Joint symposium on Long Term Ecological Research Programs in New Mexico, New Mexico State University, 12 July.

Wolf, B. O. The use of stable isotope approaches to answer questions about avian movements, physiology, behavior and ecology, 77th Annual meeting of the Cooper Ornithological Society, Moscow, Idaho, 20-23 June.

C. Attendance at Professional Meetings

Witt, C.C.

Conference of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists, (GREEB), Abiquiu, New Mexico, September 22.

Wolf, B. O.

Society for Integrative and Comparative Biology Annual Meeting, January 2007, Phoenix, Arizona. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque, NM, 6-10 June.

D. Service as Editor or on Editorial Board of a Journal

Williams, S. O. III

New Mexico Editor, North American Birds (USA). Editor, New Mexico Ornithological Society Field Note Wolf, B. O.

Editorial Board, Oecologia (USA)

E. Service as Officer of Professional Society/Organization Wolf. B.O.

Chair, Publications Committee, The Cooper Ornithological Society; Elected member, Board of Directors, The Cooper Ornithological Society; SORA (Searchable Ornithological Research Archive) Coordinator (elibrary.unm.edu/SORA).]

OTHER PROFESSIONAL ACTIVITIES

A. Colloquium Presentations

None.

B. Presentation to General Audience in a Scholarly Capacity

Christopher C. Witt. May 2007. Hummingbird Science Day -- a daylong series of presentations and interactive activities. Truman Middle School, Albuquerque, NM.

Johnson, A. B., and C. C. Witt, 2007. Hummingbirds of the High Andes: Can hummingbirds fly higher than Mt. Everest? Invited lecture to the Central New Mexico Audubon Society, Albuquerque, NM.

Pershall, A. D., Warne, R., Mathiasen, C., Wolf, B. O. Quantifying the importance of seasonal resource pulses to a small mammal community and influence of these pulses on consumer population dynamics through stable isotope analysis. Poster presentation at Sevilleta/Jornada Research Symposium July 2007.

Pershall, A. D., Warne, R., Mathiasen, C., Wolf, B. O. Quantifying the importance of seasonal resource pulses to a small mammal community and influence of these pulses on consumer population dynamics through stable isotope analysis. Poster presentation UNM Research Day, April 2007, Albuquerque, NM.

C. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

None.

D. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc None.

E. Journal Referee

Williams, S. O. III Wilson J. Ornithology Witt, C. C. Ecography, Molecular Ecology Wolf, B.O. Condor, Auk, Functional Ecology

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc.

Wolf, B. O., Workshop organizer. The use of stable isotope approaches to answer questions about avian movements, physiology, behavior and ecology, 77th Annual meeting of the Cooper Ornithological Society, Moscow, Idaho, 20-23 June, 2007.

B. Public Service

Williams, S.O. III

Secretary of the New Mexico Bird Records Committee
New Mexico Coordinator of the North American Breeding Bird Survey (BBS)

Wolf, B.O.

Associate Editor, Oecologia (USA)

Chair, Publications committee, The Cooper Ornithological Society, 1999-present. Institutional Animal Care and Use Committee

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC.

None

DONATIONS AND GIFTS RECEIVED

Sandhill Cranes from C. Gregory Schmitt

Pheasants from Kalij Conservatory

7 state-of-the-art low profile specimen cabinets from Robert W. Dickerman 2000 4WD Ford Ranger, donated as Division field vehicle by Robert W. Dickerman

CURRENT STAFF

A. Faculty/Staff

Christopher C. Witt, Curator of Birds Andrew B. Johnson, Collection Manager Blair O. Wolf, Associate Curator

B. Graduate students

Alison Boyer, Ph.D. Graduate Assistant

C. Undergraduate Student Workers and Volunteers

Tamara Aragon, Work Study

Keith Adams, Work Study

Zachary Hanna, REU

Jessica Castillo, REU

Theresa Hyde, Undergraduate worker (UNM)

Dora Susanibar, Undergraduate worker (PERU)

Miriam Torres, Undergraduate worker (PERU)

Jano Nunez, Undergraduate worker (PERU)

Daniel Echecopar, Undergraduate worker (PERU) Aylissa Corbet, Summer 2007, NSF REU. Hagit Salomon, 2007- honors thesis David Adrian Garcia, fall 2007-, NSF UNO student

Volunteers:
William A. Talbot
Raymond VanBuskirk
Cole Wolf
Michael Hilchey
C. Gregory Schmitt
Ben Cook
Carrie McAtee
Christopher L. Merkord
Linday Breen
Mary Walker
Stacey Peters
Kim Villescas
Charlotte Jutila
Matthew Baumann

MUSEUM ASSOCIATES A. Curatorial Associates Robert W. Dickerman John P. Hubbard

B. Research Associates Sartor O. Williams, III Hira A. Walker

DIVISION OF FISHES

DIVISION HIGHLIGHTS

Thomas F. Turner, Curator of Fishes was chosen to be Director of the Museum of Southwestern Biology for two to four years.

In 2007, 8,648 lots of fishes (504,300 specimens) were cataloged by the Museum of Southwestern Biology (MSB) Division of Fishes. Currently, there are 63,241 catalogued lots of fishes (3,426,311 specimens). In July 2007, the New Mexico Department of Game and Fish, State Reference Collections was moved from the facility in Santa Fe to the MSB. Division student employees and staff packed and loaded ca.300 boxes of fishes into a 14 foot moving truck. To date, 3,500 of 9,000 jars of specimens have been processed for integration into the main cataloged collections of MSB fishes.

\$747,601 in grants and contracts was available for ichthyological and aquatic studies by MSB Division of Fishes staff, students, and associates during 2007. \$24,942 awarded by US Bureau of Reclamation for curation of fish collections received from the San Juan River Recovery Implementation Program. Proposal submitted for a New Mexico Department of Game and Fish, USFWS State Wildlife Grant \$60,000 for curation and integration of the NM State Reference Collections of Fishes.

Outreach Summary: Tours of collections and lab were given to the attendees of the New Mexico Advanced Placement Instructors Annual Conference, 14 June 2007; students and instructor from the Southwestern Indian Polytechnic Institute, in the Natural Resources Program, 24 October 2007. MSB Division of Fishes staff and associates serve on advisory panels and recovery teams for various programs (local, State, and Federal) that serve in the conservation of several New Mexico endangered or threatened species.

TABLE OF COLLECTION USE

Collection Growth (specimens catalogued)	Loans (outgoing)	Loans: (incoming),	Visitors	Information of Requests 20.	Publications Citing MSB Specimens
504,300	18	02	33/42 days ³	55 ⁴	0 5

¹Specimen loans, return of loans, gifts, exchanges, and tissue (consumptive) transfers

COURSES USING THE COLLECTIONS

BIOL. 204L, Plant and Animal Function and Form: Spring 2007, 32 students BIOL. 240L, Plant and Animal Function and Form: Fall 2007, 87 students

BIOL. 386L, General Vertebrate Zoology: Fall 2007, 37 students

²Loans or tissue transfers from other institutions

³research, accessing specimens, or info exchange (not tour groups)/number of visitor days

⁴email, letters, telephone (not tour groups)

⁵publications in peer review journals

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers

Turner, T. F.

BIOL. 402/502 Ecology and Evolution of Fishes, Spring 2007, 4 undergraduate students, 4 graduate students

BIOL. 203L Ecology and Evolution, Spring 2007 135 undergraduate students BIOL. 203L Ecology and Evolution, Fall 2007 165 undergraduate students

B. Graduate Students

BIOL. 203L Ecology and Evolution, Fall 2007 165 undergraduate students

COLLECTION MANAGEMENT

Nine accessions of specimens were received during 2007. Contributors included U.S. Fish and Wildlife Service-Fishery Research Office, New Mexico Department of Game and Fish, the Wyoming Department of Game and Fish, New Mexico Environment Department, and American Southwest Ichthyological Researchers. The largest accession received was the NM State Reference Collections of fishes from the New Mexico Department of Game and Fish. This collection consists of approximately 9,000 lots of New Mexico fish specimens, collected between 1982 and 2003 from all major river drainages in New Mexico. 1,190 pages of field notes for all accessions, except NMDGF, have been received and digitized. The NMDGF field note collections (ca. 4,500 pages) were digitized prior to moving the specimen collections.

AWARDS, GRANTS, AND CONTRACTS

CAREER: Museum-based Approaches to Ecology and Evolution of Aquatic Systems: An Integrated Research and Educational Program. Principle Investigator: Thomas F. Turner. National Science Foundation. Total Award: \$500,000 Date: 1 May 2002 to 30 April 2008 Annual expenditure: \$100,000

REU Supplement to CAREER: Museum-based Approaches to Ecology and Evolution of Aquatic Systems: An Integrated Research and Educational Program. Principle Investigator: Thomas F. Turner. National Science Foundation. Total Award: \$12,000 Date: 15 May 2007 to 30 April 2008 Annual expenditure: \$12,000

Dissertation: Local adaptation and gene flow in a fragmented host system: *Crepidostomum farionis* (Digenea) and *Oncorhynchus clarki virginalis* (Salmonidae) in New Mexico. Principal Investigator: Thomas F. Turner; Co-Principle: Wade D. Wilson. National Science Foundation. Total Award: \$11,958 Date: 30 May 2006 to 30 April 2008 Yearly expenditure: \$6,000

Assessment of Diversity at the Major Histocompatability Complex in the Rio Grande Silvery Minnow (*Hybognathus amarus*). Principal Investigator: Megan J Osborne; Co-Principle: Thomas F. Turner. US Fish & Wildlife Service Total Award: \$96,000 Date: 21 September 2006 to 30 August 2009 Yearly expenditure: \$48,000

Community responses to river drying in an arid-land ecosystem: a field and experimental study. Principal Investigator: Thomas F. Turner. National Science Foundation. Total Award: \$345,000 Date: 15 August 2007 to 1 August 2010 Annual expenditure \$115,000

Effects of nutrient availability on periphyton growth and diversity in the Middle Rio Grande: top-down and bottom-up factors. Principal Investigator: Rebecca J. Bixby; Co-Principal: Ayesha S. Burdett. US Bureau of Reclamation. Total Award: \$126,077 Date: 1 July 2007 to 30 December 2008. Annual expenditure: \$126,077

Collaborative research and monitoring: Evaluation of the Rio Grande silvery minnow health in relation to changes in water quality, pathogens and other environmental stressors: Genetics Component. Principle Investigator: Megan J. Osborne; Co-Principal Investigators: Thomas Turner and agency biologists. US Fish and Wildlife Service. Total Award: \$47,811 Date: 2007. Annual expenditure: \$47,811

Conservation Genetics of the Rio Grande Silvery Minnow (*Hybognathus amarus*): Baseline population genetics of wild stocks and monitoring genetic effects of captive-propagated stocks. Principle Investigator: Thomas F. Turner. US Bureau of Reclamation. Total Award: \$550,000 Date: 1 July 2002 to 30 September 2007 Annual expenditure: \$114,000

Genetic monitoring of the threatened Pecos Bluntnose shiner (*Notropis simus pecosenis*). Principle Investigator: Megan J. Osborne; Co-Principle: Thomas F. Turner. Total Award: \$24,000. Dates: 1 January 2006 to 30 June 2009. New Mexico Department of Game and Fish. Annual expenditure: \$8,000

Assessment and monitoring of Rio Grande silvery minnow genetics. Principal Investigator: Thomas F. Turner; Co-Principal: Megan J. Osborne. US Bureau of Reclamation, Middle Rio Grande ESA Collaborative Program. Total Award: \$144,544 Date: 1 October 2007 to 30 September 2008. Annual expenditure: \$144,544. (Renewed for 1 Oct 2008 - 30 Sep 2009)

Curatorial services at the Museum of Southwestern Biology for the San Juan River Recovery Implementation Program Collections. US Bureau of Reclamation, Upper Colorado Regional Office. Principle Investigator: Alexandra M. Snyder; Co-Principle: Thomas F. Turner. Total Award: \$125,000 Date: 1 August 2005 to 30 September 2010. Annual expenditure: \$24,942 (Renewed for 1 Oct 2008-30 Sep 2010)

Research Project and Travel Grant. Awarded to Trevor J. Krabbenhoft by the University of New Mexico, Office of Graduate Studies. Date: 17 October 2007 Annual expenditure: \$727.00

Student Research Allocations Committee Grant. Awarded to Trevor J. Krabbenhoft by the University of New Mexico, Graduate and Professional Student Association. Date: 10 November 2007 Annual expenditure: \$500.00

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes None

B. Journal Articles

Dudley, R.K., and S.P. Platania. 2007. Flow regulation and fragmentation imperil pelagic-spawning riverine fishes. *Ecological Applications* 17:2074-2086.

Peterson, M. S., M. R. Weber, M. L. Partyka, and S. T. Ross. 2007. Integrating *in situ* quantitative geographic information tools and size-specific laboratory-based growth zones in a dynamic river-mouth estuary. Aquatic Conservation: Marine and Freshwater Ecosystems 17:602-618.

Turner, T. F., T. E. Dowling, and P. C. Marsh. 2007. Effective size, census size, and genetic monitoring of the endangered razorback sucker, *Xyrauchen texanus*. Conservation Genetics 8: 417-425.

Turner, T. F. 2007. <u>Book review:</u> The evolution of evolutionary genetics. Review of *Evolutionary Genetics: Concepts and Case Studies*. Charles W. Fox and Jason B. Wolf, eds. *Bioscience* 57: 375-376.

C. Web-Based

Appendices: Dudley, R.K., and S.P. Platania. 2007. Flow regulation and fragmentation imperil pelagic-spawning riverine fishes. *Ecological Applications* 17:2074-2086. Ecological Archives A017-082-A1 & A017-082-A2 (http://www.esapubs.org/archive)

D. Technical Reports

Dudley, R.K., G.C. White, S.P. Platania, and D.A. Helfrich. 2007. Rio Grande silvery minnow (*Hybognathus amarus*) population estimation program results from October 2006. Report to the Middle Rio Grande Endangered Species Act Collaborative Program and the US Bureau of Reclamation, Albuquerque, NM. 84 pp.

Dudley, R.K. and S.P. Platania. 2007. Rio Grande silvery minnow (*Hybognathus amarus*) population monitoring program results from October 2005 to October 2006. Report to the Middle Rio Grande Endangered Species Act Collaborative Program and the US Bureau of Reclamation, Albuquerque, NM. 195 pp.

Dudley, R.K. and S.P. Platania. 2007. Rio Grande silvery minnow (*Hybognathus amarus*) population monitoring monthly trip reports and analyses. Nine reports to the Middle Rio Grande Endangered Species Act Collaborative Program and the US Bureau of Reclamation, Albuquerque, NM. 9 @ 30 pp.

Turner, T.F. and M.J. Osborne. 2007. Genetic monitoring of the Rio Grande silvery (*Hybognathus amarus*) minnow: genetic status of wild and captive stocks in 2007. Annual Report to the US Bureau of Reclamation, September 2007. 82pp

E. Theses/Dissertations Completed

None

F. Work In Progress

Burdett, Ayesha S. and Watts, Robyn J. Modifying living space: An experimental study of the influences of vegetation on aquatic invertebrate community structure. Hydrobiologia

Kennedy, Thomas L. (2007) Predicting future threats to the long-term survival of Gila Trout using a high-resolution simulation of climate change. Climatic Change Kennedy, Thomas L. (2007) The effects of nitrate loading and *Hydrilla verticillata* in freshwater communities and implications for future management. Biological Invasions

Kennedy, Thomas L. (2007) The invasive plant *Hydrilla verticillata* and the feeding preference of Florida Apple Snails (*Pomacea paludosa*). Veliger

Krabbenhoft, T.J., F.C. Rohde, and J.M. Quattro. (2007) Concordant nuclear and mitochondrial DNA partitions define evolutionarily significant units in the imperiled pinewoods darter, *Etheostoma mariae* (Pisces:Percidae). Copeia.

Krabbenhoft, T.J., M.L. Collyer, and J.M. Quattro. (2007) Comparative morphological divergence across phylogenetically disparate taxa: convergent evolution of endemic fishes of Lake Waccamaw, North Carolina.

Krabbenhoft, T.J., F.C. Rohde, and J.M. Quattro. (2007) Threatened Fishes of the World: *Fundulus waccamensis* Hubbs and Raney, 1946 (Fundulidae).

McPhee, M. V., M. J. Osborne, and T. F. Turner. 2008. Genetic diversity, population structure and demographic history of the Rio Grande sucker, *Catostomus plebeius*, in New Mexico. Copeia 2008: 189-197.

Peters, M. B., and T. F. Turner. 2008. Genetic variation of the major histocompatibility complex (MHC class II β) in the threatened Gila trout, *Oncorhynchus gilae gilae*. Conservation Genetics. Online First. doi 10.1007/s10592-007-9336-9 2007.

Ross, S. T. and W. J. Matthews. (2007) Evolution and ecology of North American freshwater fish assemblages. In: North American Freshwater Fishes: Ecology, Evolution, and Behavior. R.L. Mayden and B.M. Burr (eds.). Johns Hopkins University Press.

Ross, S. T., W. T. Slack, R. J. Heise, M. A. Dugo, H. Rogillio, B. R. Bowen, P. Mickle, and R. W. Heard. 2007. Estuarine and coastal habitat use of Gulf sturgeon (*Acipenser oxyrinchus desotoi*) in the north-central Gulf of Mexico. Submitted to Estuaries and Coasts.

Ross, S.T. (2007). Native fishes. In: Mississippi Encyclopedia. C.R. Wilson (ed). University Press of Mississippi.

Ross, S.T. (2007) Ecology of North American Freshwater Fishes. Textbook. In preparation. University of California Press.

Snelson, F.F, T.J. Krabbenhoft, and J.M. Quattro. (2007) *Elassoma*: A new species of pygmy sunfish from Florida.

Wilson, W.D. and T.F. Turner. (2007) A phylogenetic analysis of the Pacific salmon and trout (Salmonidae: *Oncorhynchus*) based on partial ND4 sequence: A closer look at the highly fragmented inland species. Molecular Phylogenetics and Evolution.

Wilson, W.D. and T.F. Turner. (2007) Comparative analysis of the MHC DAB in *Oncorhynchus*: Functional patterns in the peptide binding pockets. Journal of Heredity.

Wilson, W.D. and T.F. Turner. (2007) Twelve microsatellite markers from the salmonid trematode *Crepidostomum farionis* (Trematoda: Allocreadiidae). Molecular Ecology Notes.

G. Publications/Reports Based on MSB Specimens/Data by Outside Researchers None

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

R.K. Dudley, G.C. White, S.P. Platania, and D.A. Helfrich. Rio Grande silvery minnow population estimation program. Invited Symposium: Middle Rio Grande Endangered Species Act Collaboration Program, University of New Mexico, Albuquerque, NM. 16-17 April 2007.

R.K. Dudley and S.P. Platania. Rio Grande silvery minnow population monitoring (1993-2007). Invited Symposium: Middle Rio Grande Endangered Species Act Collaboration Program, University of New Mexico, Albuquerque, NM. 16-17 April 2007.

M.J. Osborne and T. F. Turner. Conservation genetics of the Rio Grande silvery minnow (*Hybognathus amarus*): genetic monitoring program, 2007. Invited Symposium: Middle Rio Grande Endangered Species Act Collaborative Program. University of New Mexico, Continuing Education. April 16-17, 2007.

A.M Snyder and S.P. Platania. 2007. Case study for university research museums: design for storage of fluid preserved collections. Invited Plenary Session. 22nd Annual Meeting of the Society for the Preservation of Natural History Collections, Saint Paul MN. 21-26 May 2007

B. Contributed Talks/Posters

A.S. Burdett and T.F. Turner. River food webs during summer dry-down in the Middle Rio Grande: a study using stable isotope analysis. North American Benthological Society Annual Meetings. Columbia, South Carolina, 3 June 2007.

- T.L. Kennedy. Complex temporal patterns in the macroinvertebrate community of an arid river. Guild of Rocky Mountain Ecologists and Evolutionary Biologists. Ghost Ranch, NM
- T.J. Krabbenhoft, M.L. Collyer, J.M. Quattro. Convergent evolution of phylogenetically-disparate, endemic fishes of Lake Waccamaw, North Carolina. Joint Meeting, American Society of Ichthyologists and Herpetologists, St. Louis, MO, 11-16 July 2007.

- M.J. Osborne and T.F. Turner. 2007. Long-term genetic studies in the Rio Grande silvery minnow: An examination of effects of population decline and supportive breeding. Middle Rio Grande Endangered Species Act Collaborative Program Second Annual Symposium. University of New Mexico, Continuing Education. 16-17 April 2007.
- M. J. Osborne and T.F. Turner. Multi-locus MHC and parasite diversity in an endangered non-model cyprinid. Society for the Study of Evolution Annual Meeting, Christchurch, New Zealand, 12 16 June 2007.
- D. Swenton-Olson, A. Kodric-Brown, T.F. Turner, M.J. Osborne, and W.D. Wilson. Behavioral and molecular evidence for hybridization between *Gambusia nobilis* and *Gambusia affinis*. Desert Fishes Council, Ventura, California, 14th -18th November 2007.
- T.F. Turner, M.J. Osborne, G. R. Moyer, M.A. Benavides, and D. Alo. Life history and environmental variation interact to determine effective size to census size ratio. Symposium on Evolution in Human-Altered Environments, University of California, Los Angeles, CA. 8 10 February 2007.
- T.F. Turner and M. J. Osborne. Lessons from multigenerational genetic monitoring in an endangered species. Society for the Study of Evolution Annual Meeting, Christchurch, New Zealand, June 12 16, 2007.
- W.D. Wilson and T.F. Turner. Phylogeny of the Pacific salmon and trout (*Oncorhynchus*) based on partial ND4 sequence. The 40th Joint Annual Conference of the Arizona and New Mexico Chapters of the Wildlife Society and American Fisheries Society, Albuquerque, NM. 6-8 February 2007.
- W.D. Wilson and T.F. Turner. Major Histocompatibility Complex (MHC) Patterns in salmonids: A phylogenetic and functional analysis. Annual meeting of the Society for the Study of Evolution, Christchurch, NZ. 12-16 June 2007.

C. Attendance at Professional Meetings

A.S. Burdett

American Society of Limnology and Oceanography Aquatic Sciences Meeting. Santa Fe, NM 2-9 February 2007

Middle Rio Grande Endangered Species Collaborative Program: Second Annual Symposium Albuquerque, NM 16-17 April 2007

North American Benthological Society 55th Annual Meeting. Columbia, SC 3-8 June 2007

R.K. Dudley

Middle Rio Grande Endangered Species Collaborative Program: Second Annual Symposium Albuquerque, NM. 16-17 April 2007

T.J. Krabbenhoft

American Society of Ichthyologists and Herpetologists 87th Annual Meeting. St. Louis, MO. 11-16 July 2007

M.J. Osborne

Middle Rio Grande Endangered Species Collaborative Program: Second Annual Symposium Albuquerque, NM 16-17 April 2007

Society for the Study of Evolution Annual Meeting. Christchurch, New Zealand 12-16 June 2007

S.T. Ross

Desert Fishes Council 39th Annual Meeting. Ventura CA 14-18 November 2007

A.M. Snyder

Society for the Preservation of Natural History Collections 22nd Annual Meeting. Saint Paul MN 21-26 May 2007

T.F. Turner

Symposium on Evolution in Human-Altered Environments, University of California, Los Angeles, CA. 8-10 February 2007

Middle Rio Grande Endangered Species Collaborative Program: Second Annual Symposium Albuquerque, NM 16-17 April 2007

Society for the Study of Evolution Annual Meeting. Christchurch, New Zealand 12-16 June 2007

W.D. Wilson

The 40th Joint Annual Conference of the New Mexico and Arizona Chapters of the Wildlife Society and American Fisheries Society. Albuquerque NM 6-8 February 2007

Society for the Study of Evolution Annual Meeting. Christchurch, New Zealand 12-16 June 2007

D. Service as Editor or on Editorial Board of a Journal

T.F. Turner

Occasional Papers of the Museum of Southwestern Biology.

E. Service as Officer of Professional Society/Organization

S.T. Ross

Board of Governors, American Society of Ichthyologists and Herpetologists, Class of 2002-07. Chair, Endowment Committee, American Society of Ichthyologists and Herpetologists, 2007-2009.

Member, Executive Committee, American Society of Ichthyologists and Herpetologists, 2007-2009.

Member, Long Range Planning and Policy Committee, American Society of Ichthyologists and Herpetologists, 2007-2009.

T.F. Turner

Board of Governors, American Society of Ichthyologists and Herpetologists, Class of 2007.

OTHER PROFESSIONAL ACTIVITIES

A. Presentation to General Audience in a Scholarly Capacity

A.S. Burdett Lecture BIOL 203 An Introduction to Ecology and Terrestrial Biomes 16 October 2007

- R.K. Dudley Rio Grande silvery minnow population estimation program. U.S. Bureau of Reclamation, Albuquerque Area Office, Albuquerque, NM. April 2007.
- R.K. Dudley Rio Grande silvery minnow population estimation program. U.S. Fish and Wildlife Service, New Mexico Ecological Services Field Office, Albuquerque, NM. July 2007.
- T.L. Kennedy The role of abiotic processes in the temporal dynamics of macroinvertebrates in the Rio Grande. University of New Mexico, Department of Biology 16th Annual Research Day Albuquerque April 2007
- T.J. Krabbenhoft Morphological divergence of endemic Lake Waccamow, North Carolina fish fauna. University of New Mexico, Department of Biology 16th Annual Research Day Albuquerque April 2007
- T.F. Turner The ichthyofauna of New Mexico, University of New Mexico, Biology Honors Program in Natural History of the Southwest. October 2007
- T.F. Turner Reef fishes of the Caribbean. University of New Mexico, Department of Biology, Tropical Biology, March 2007
- T.F. Turner Lessons from long-term demographic and genetic monitoring of an endangered species. Oklahoma State University, Stillwater OK. October 2007
- T.F. Turner Lessons from long-term demographic and genetic monitoring of an endangered species. Texas A&M University, Corpus Christi TX. December 2007

Wilson, W.D. and T.F. Turner. Phylogeny of the Pacific salmon and trout (Oncorhynchus) based on partial ND4 sequence; A robust phylogeny compared to MHC patterns. University of New Mexico, Department of Biology 16th Annual Research Day Albuquerque April 2007

B. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

None

C. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc. W. H. Brandenburg

Member, Advisory Committee for Restoration of roundtail (Gila robusta) and Gila chub (Gila nigra).

Member, San Juan River Biology Committee.

Coordinator, New Mexico Area Native Fishes Report for Desert Fishes Council.

A.S. Burdett

Judge / Panel Member:

Central New Mexico Science and Engineering Research Challenge.15-17 March 2007

Intel International Science and Engineering Fair 13-19 May 2007

North American Benthological Society 55th Annual Meetings 3-8 June 2007

Reviewer for panel, National Science Foundation Ecosystem Science Cluster, 1 proposal

R.K. Dudley

Technical Advisor, Recovery Team for Rio Grande silvery minnow (*Hybognathus amarus*), U.S. Fish and Wildlife Service.

Technical Advisor, Middle Rio Grande Endangered Species Act Collaborative Program.

Invited Panelist, Rio Grande silvery minnow monitoring plan development, Middle Rio Grande Endangered Species Collaborative Program: Second Annual Symposium Albuquerque, NM 16-17 April 2007.

M. A. Farrington

Member, Advisory Committee for Restoration of roundtail (Gila robusta) and Gila chub (Gila nigra).

Member, San Juan River Biology Committee.

M.J. Osborne

Member, Rio Grande silvery minnow (*Hybognathus amarus*) Propagation and Genetics Workgroup. US Fish and Wildlife Service, Albuquerque NM.

Member, Population viability analysis of Rio Grande silvery minnow (*Hybognathus amarus*) US Fish and Wildlife Service, Albuquerque NM.

S.P. Platania

Member, Committee on Endangered and Threatened Fish Species, American Fisheries Society. Member, Recovery Team for Rio Grande silvery minnow (*Hybognathus amarus*), US Fish and Wildlife Service.

S.T. Ross

Member, Peer Review Panel, San Juan River Basin Recovery Implementation Program.

T.F. Turner

Panel, National Science Foundation Ecological Biology, 18 proposals reviewed

Ad Hoc Reviewer, National Science Foundation, 2 proposals reviewed

Advisor, Genetics issues for the Rio Grande Fishes Recovery Team, US Fish and Wildlife Service, Albuquerque NM

Member, Gila trout (Oncorhynchus gilae) Recovery Team, US Fish and Wildlife Service, Albuquerque NM.

Member, Rio Grande silvery minnow, (*Hybognathus amarus*) Propagation and Genetics Workgroup. US Fish and Wildlife Service, Albuquerque NM.

Invited Panelist, National Science Foundation Ecological Biology Cluster, October 16-22, 2007. Invited Panelist, Rio Grande silvery minnow monitoring plan development.

Invited participant, Population viability analysis of Rio Grande silvery minnow Invited Reviewer, Apache Trout (*Oncorhynchus gilae apache*) Broodstock Management Plan, US Fish and Wildlife Service

Invited Reviewer, Apache Trout (Oncorhynchus gilae apache)Recovery Plan Update, US Fish and Wildlife Service

W.D. Wilson

Representative, University of New Mexico, Department of Biology Graduate Policy Committee (2007-2008)

Full member, Sigma Xi

D. Journal Referee

A.S. Burdett, Limnology and Oceanography (1), Hydrobiologia (1), Marine and Freshwater Research (1)

R.K. Dudley, Ecography (1)

T.J. Krabbenhoft, Copeia (1), Environmental Biology of Fishes (1), Journal of Freshwater Biology (1)

M.J. Osborne, Evolution (1), Marine Biology (1)

S. T. Ross, Copeia (1)

T.F. Turner, Proceedings of the Royal Society, Series B (1), Journal of Heredity (1), Journal of Freshwater Biology (1), Limnology and Oceanography (1), Molecular Ecology (2) Molecular Ecology Notes (1) Journal of Fish Biology (1), Journal of Applied Ecology (1)

E. Hosting Professional Colloquia and Groups

None

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc. None.

B. Public Service

A.S. Burdett

National Science Foundation, Research for Undergraduate Education two students January to December 2007

R.K. Dudley

Technical and scientific advisory role for the conservation and management of threatened and endangered native fishes for the New Mexico Department of Game and Fish, U.S. Army Corps of Engineers, U.S. Bureau of Reclamation, and the U.S. Fish and Wildlife Service.

A.M. Snyder

Continue to assist in loan acquisitions and curation of freshwater mussels of the genus *Anodonta* for T.L. Myers, Ph. D. an independent Arizona researcher investigating the taxonomic relationships of this species in central and western Mexico. Donated jars, lids and gaskets to Weber State University, Provo UT for the teaching/reference collections used for their ichthyology classes.

T.F. Turner

Museum of Southwestern Biology Executive Committee and ad-hoc member of the Museum of Southwestern Biology Space Committee; University of New Mexico Faculty Senate Arts and Sciences Representative

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC. None.

DONATIONS AND GIFTS RECEIVED

None

CURRENT STAFF

A. Faculty/Staff

Ayesha S. Burdett, Postdoctoral Research Associate
Megan J. Osborne, Research Assistant Professor
Steven P. Platania, Associate Curator of Fishes
Stephen T. Ross, Curator Emeritus and UNM Adjunct Professor of Biology
Alexandra M. Snyder, Collections Manager
Thomas F. Turner, Curator of Fishes and MSB Director

B. Graduate students

Thomas L. Kennedy, Ph.D. candidate Trevor J. Krabbenhoft, Ph.D. candidate Wade D. Wilson, Ph.D. candidate

C. Undergraduate Students

Adam L. Barkalow, NMGF Intern Invertebrates
Nathan Daves-Brody, NSF-REU Research Assistant
Tracy Diver, Research Assistant Turner Lab
Alicia M. Hodson, MSB Curatorial Assistant
Nedra Iwerks, Research Assistant MSB Special Projects
Monica Tellez, NSF-REU Research Assistant
Cynthia Rivera, MSB Curatorial Assistant
Alana Sharp, Turner Lab Research Assistant
John Skillman, MSB Curatorial Assistant

MUSEUM ASSOCIATES

A. Curatorial Associates

David L. Propst, Ph. D. New Mexico Dept. of Game and Fish, Santa Fe

B. Research Associates

W. Howard Brandenburg, American Southwest Ichthyological Researchers, Albuquerque James E. Brooks, U.S. Fish and Wildlife Service, Albuquerque Brooks M. Burr, Ph.D. Southern Illinois University, Carbondale Robert K. Dudley, Ph. D. American Southwest Ichthyological Researchers, Albuquerque Michael A. Farrington, American Southwest Ichthyological Researchers, Albuquerque

Astrid Kodric-Brown, Ph.D. University of New Mexico, Albuquerque

DIVISION OF GENOMIC RESOURCES

DIVISION HIGHLIGHTS

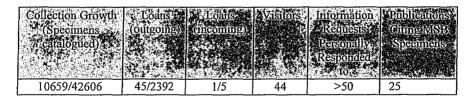
The Division of Genomic Resources (DGR) of the Museum of Southwestern Biology (MSB) is a centralized repository for cryogenic material from all MSB divisions at the University of New Mexico and other individuals and institutions worldwide for which archival agreements are extant. The DGR frozen tissue collection is taxonomically broad and contains multiple tissue samples from approximately 120,000 specimens. The collection is ranked as one of the largest tissue collections in the Western Hemisphere.

Division highlights this year include, an archival agreement completed with Dr. James Derr of Texas A&M University, College of Veterinary Medicine & Biomedical Sciences to serve as a repository for their collection of North American bison DNA samples. DGR will acquire 3,500 DNA samples from multiple bison populations. A joint press release detailing this collaboration between Universities to preserve these genomic samples from this iconic North American species is forthcoming.

Special activities this year included DGR staff participation as local committee members for the 87th annual meeting of the American Society of Mammalogists held in Albuquerque the 6-10th of June 2007. Collection manager Cheryl Parmenter served as committee co-chairman for the registration/help desk, and served on the social events, and field trips committees as well as helping with transportation and parking, signs, the fun run, breakfasts with a scientist, and the auction. Cheryl also had the honor of presenting Dr. Richard Yanagihara's poster entitled Newfound Soricid-Borne Hantaviruses in the United States at the meeting. Graduate Assistant Andrew Hope served as chairman of the oversight of signage committee and on the media tech committee. Work-study Kendra Anderson served on the help desk committee. Curator Terry Yates had many functions at the meeting.

In 2007, Curator Terry Yates contributed to the scientific community through his attendance at many meetings and by presentations to scientific societies. He maintained 24 board appointments representing the University of New Mexico (see details below).

TABLE OF COLLECTION USE



The collection growth of 10,659 NK numbers (individual specimens) would equal approximately 42,606 tissue tubes added to the DGR collection this year. Collection growth can be further broken down by divisions: 9,493 were mammal specimens, 569 were DGR specimens (no

vouchers-mammals) and 597 were Bird specimens. Loans consisted of 45 individual loans comprised of 2392 samples.

COURSES USING THE COLLECTIONS.

BIOL 402/502 Advanced Field Mammalogy. 2 Students BIOL 489 Mammalogy 15 Students BIOL 599 Thesis. 1 Student BIOL 699 Dissertation. 2 Students ART HI 407 Museum Studies

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers Yates, T. BIOL 699, Dissertation, 2 students

B. Graduate Students

Weise, Christa. Ph. D. Candidate. Community Structure, Vertical Stratification and Seasonal Patterns of Neotropical Bats.

Harding, Larisa. Ph. D. Candidate. Speciation and Biodiversity: Phylogeography and historical biogeography of *Mustela frenata*; Phylogeny of the American Mustelidae, with emphasis on two South American endemics.

COLLECTION MANAGEMENT

This year, DGR personnel focused on loan processing, specimen archiving and data verification. We archived over 10,659 new specimens, including tissues of mammals from Alaska, California, Colorado, Montana, New Mexico, Wyoming, Idaho, Utah, Nevada, Oregon, Canada, Estonia, and Chile and bird tissue from Arizona, Alaska, California, Colorado, Florida, New Mexico, Oregon, Columbia and Belize. In total, 6,500 new NK numbers were issued to researchers for the year. We processed 45 outgoing loans containing 2,392 individual specimens to 14 states and 3 foreign countries. Of these, 45 loans, 11 were for our own UNM undergraduate and graduate students. Three of the loans were for the Bird Division and 42 loans were for the Mammal Division.

AWARDS, GRANTS, AND CONTRACTS.

NSF REU to EID: Ecological Drivers of Rodent-borne Disease Outbreaks: Trophic Cascades and Dispersal Waves. 14 April 04-31 August 2007. This grant was transferred to a Co-PI. All other grants spanning 2007 are in the VP for Research and Economic Development Office.

PUBLICATIONS.

A. Books, Chapters, Edited Volumes
None

B. Journal Articles

Yates, T. L.

Arai, S., J.-W. Song, L. Sumibcay, S. N. Bennett, V. R. Nerurkar, C. Parmenter, J. A. Cook, T. L. Yates, and R. Yanagihara. 2007. Hantavirus in Northern Short-tailed Shrew, United States. Emerging Infectious Diseases 13(9):1420-1423.

<u>Calisher, C.H.</u>, K. D. <u>Wagoner</u>, B. R. <u>Amman</u>, J. J. <u>Root</u>, R. J. <u>Douglass</u>, A. J. <u>Kuenzi</u>, K. D. Abbott, C. Parmenter, T. L. Yates, T. G. Ksiazek, B. J. <u>Beaty</u>, J. N. <u>Mills</u>. 2007. Demographic factors associated with prevalence of antibody to Sin Nombre virus in deer mice in the western United States. <u>Journal of Wildlife Diseases</u> 43(1):1-11.

Frey, J. K., M. A. Bogan and T. L. Yates. 2007. Mountaintop island age determines species richness of boreal mammals in the American Southwest. Ecography 30:231-240.

Salazar-Bravo, J., and T. L. Yates. 2007. A New Species of *Thomasomys* (Cricetidae: Sigmodontinae) from Central Bolivia. Pp. 747-774 in Kelt, D. A., E. P. Lessa, J. Salazar-Bravo, and J. L. Patton (eds.). 2007. The Quintessential Naturalist: Honoring the Life and Legacy of Oliver P. Pearson. University of California Publications in Zoology 134:1-981.

Sitdikov, R. A., E. S. Wilkins, T. Yates, and B. Hjelle. Detection of Hantavirus using a new miniaturized biosensor device. 2007. Journal of Applied Research 7(1):86-107.

C. Parmenter

Arai, S., Jin-Won Song Laarni Dumibcay, Vivek R. Nerurkar, Shannon N. Bennett, Cheryl Parmenter, Joseph A. Cook, Terry L. Yates, Richard Yanagihara. 2007. *Hantavirus in the short-tailed shrew, North America*. Emerging Infectious Diseases 13:1420-1423.

Calisher, C., K. Wagoner, B. Amman, J. Root, R. Douglass, A. Kuenze, K. Abbott, C. Parmenter, T. Yates, T. Ksiazek, B. Beaty, J. Mills. 2007 Demographic Factors Associated With Prevalence Of Sin Nombre Virus in Deer Mice in the Western United States. Journal of Wildlife Diseases, 43(1)pp. 1-11.

C. Web-Based

None

D. Technical Reports

University of New Mexico, Museum of Southwestern Biology, Division of Genomic Resources: 2007 Annual Report. Joseph A. Cook, Jon L. Dunnum and Cheryl A. Parmenter.

E. Theses/Dissertations Completed

Christa Weise.

Community Structure, Vertical Stratification and Seasonal Patterns of Neotropical Bats, July 2007.

F. Work In Progress

G. Publications and reports based on museum specimens by researchers excluding Museum staff, students and Associates.

Alvarez-Castaneda, S. T. 2007. Systematics of the antelope ground squirrel (*Ammospermophilus*) from islands adjacent to the Baja California peninsula. Journal of Mammalogy, 88(5):1160–1169.

Banbury, J. L., and G. S. Spicer. 2007. Molecular systematics of chipmunks (*Neotamias*) inferred by mitochondrial control region sequences. Journal of Mammal Evolution 14:149–162.

Bradley, R. D., N. D. Durish, D. S. Rogers, J. R. Miller, M. D. Engstrom, and C. W. Kilpatrick. 2007. Toward a molecular phylogeny for *Peromyscus*: evidence from mitochondrial Cytochrome-b sequences. Journal of Mammalogy 88(5):1146–1159.

Campbell, P., A. S. Putnam, C. Bonney, R. Bilgin, J. C. Morales, T. H. Kunz, L. A. Ruedas. 2007. Contrasting patterns of genetic differentiation between endemic and widespread species of fruit bats (Chiroptera: Pteropodidae) in Sulawesi, Indonesia. Molecular Phylogenetics and Evolution 44:474–482.

Cutrera, A. P., and E. A. Lacey. 2007. Trans-species polymorphism and evidence of selection on class II MHC loci in tuco-tucos (Rodentia: Ctenomyidae). Immunogenetics 59:937–948.

Dick, C. W., D. Gettinger, and S. L. Gardner. 2007. Bolivian Ectoparasites: A Survey of Bats (Mammalia Chiroptera). Comparative Parasitology 74(2):372–377.

Ditto, A. M., and J. K. Frey. 2007. Effects of ecogeographic variables on genetic variation in montane mammals: implications for conservation in a global warming scenario. Journal of Biogeography 34(7):1136-1149.

Foot, N. J., S. Orgeig, S. Donnellan, T. Bertozzi, C. B. Daniels. 2007. Positive selection in the N-Terminal extramembrane domain of lung surfactant protein C (SP-C) in marine mammals. Journal of Molecular Evolution 65:12–22.

Frey, J. K. 2007. There is no valid record of cliff chipmunk (*Tamias dorsalis*) in the Sandia mountains, New Mexico. Western North American Naturalist 67(4):611–612.

Geluso, K. 2007. Winter activity of bats over water and along flyways in New Mexico. The Southwestern Naturalist 52(4):482–492.

Glass, G. G., T. Shields, B. Cai, T. L. Yates, and R. Parmenter. 2007. Persistently highest risk areas for hantavirus pulmonary syndrome: potential sites for refugia. Ecological Applications, 17(1):129–139.

Haukisalmi, V., L. M. Hardman, J.Niemimaa and H. Henttonen. 2007. Taxonomy and genetic divergence of *Paranoplocephala kalelai* (Tenora, Haukisalmi et Henttonen, 1985) (Cestoda,

Anoplocephalidae) in the grey-sided vole *Myodes rufocanus* in northern Fennoscandia. Acta Parasitologica 52(4), 335–341.

Koepfli, K-P., M. E. Gompper, E. Eizirik, C.-C. Ho, L. Linden, J. E. Maldonado, R. K. Wayne. 2007. Phylogeny of the Procyonidae (Mammalia: Carnivora): Molecules, morphology and the Great American Interchange. Molecular Phylogenetics and Evolution 43:1076–1095.

Matocq, M. D., Q. R. Shurtli V, C. R. Feldman. 2007. Phylogenetics of the woodrat genus *Neotoma* (Rodentia: Muridae): Implications for the evolution of phenotypic variation in male external Genitalia. Molecular Phylogenetics and Evolution 42: 637–652.

Notarnicola, J., F. A. Jimenez, and S. L. Gardner. 2007. A new species of *Dipetalonema* (Filarioidea: Onchocercidae) from *Ateles chamek* from the Beni of Bolivia. Journal of Parasitology 93(3):661-667.

Porter, C. A., S. R. Hoofer, C. A. Cline, F. G. Hoffmann, and R. J. Baker. 2007. Molecular phylogenetics of the Phyllostomid bat genus *Micronycteris* with descriptions of two new subgenera. Journal of Mammalogy 88(5):1205–1215.

Potter, S., S. Orgeig, S. Donnellan, and C. B. Daniels. 2007. Purifying selection drives the evolution of surfactant protein C (SP-C) independently of body temperature regulation in mammals. <u>Comparative Biochemistry and Physiology Part D: Genomics and Proteomics</u> 2(2):165-176.

Quintana N, H., and V. Pacheco T. 2007. Identificación y distribución de los murciélagos vampiros del Perú. Revista Peruviana Med Exp Salud Publica 24(1):81-88.

Ruedas, L. A., and J. Salazar-Bravo. 2007. Morphological and chromosomal taxonomic assessment of Sylvilagus brasiliensis gabbi (Leporidae). Mammalia 71(1/2):63-69.

Schutz, H., and R. P. Guralnick. 2007. Postcranial element shape and function: assessing locomotor mode in extant and extinct mustelid. Zoological Journal of the Linnean Society 150:895-914.

Solari, S. 2007. New species of Monodelphis (Didelphimorphia: Didelphidae) from Peru, with notes on M. adusta (Thomas, 1897). Journal of Mammalogy 88(2):319–329.

Storz, J. F., Sabatino S. J., F. G. Hoffmann, E. J. Gering, H. Moriyama, et al. (2007). The molecular basis of high-altitude adaptation in deer mice. PLoS Genet 3(3): 0448-0459.

Weyandt, S. E., and R. A. Van Den Bussche. 2007. Phylogeographic structuring and volant mammals: the case of the pallid bat (*Antrozous pallidus*). Journal of Biogeography 34(7):1233-1245.

Woodman, N. 2007. A new species of nectar-feeding bat, genus *Lonchophylla*, from western Colombia and western Ecuador (Mammalia: Chiroptera: Phyllostomidae). Proceedings of the Biological Society of Washington 120(3):340–358.

Young, R. L., T. S. Haselkorn, and A.V. Badyaev. 2007. Functional equivalence of morphologies enables morphological and ecological diversity. Evolution 61-11: 2480-2492.

ACTIVITIES IN LEARNED SOCIETIES.

A. Invited or plenary talks

Many

B. Contributed talks or posters.

T.L. Yates

Many

C. Parmenter:

Newfound Soricid-Borne Hantaviruses in the United States. The 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM. 6-10th of June 2007.

C. Attendance at professional meetings.

T.L. Yates

National Academies of Sciences Annual Mtg Washington, DC January 2007 American Society of Mammalogist Annual Mtg Albuqerque, NM. June 2007 Natural Science Collections Alliance Board of Directors Mtg Washington, DC 2007 NSCA Annual Meeting, Washington DC 2007.

RAMBO Annual Meeting 2007 Sevilleta National Wildlife Refuge, NM.

C. Parmenter

The 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM. 6-10th of June 2007. Local Committee and presenter.

RAMBO Annual Meeting 2007 Sevilleta National Wildlife Refuge, NM.

Hope, A. G:

The 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM. 6-10th of June 2007. Local Committee and presenter.

D. Service as editor or on editorial board of a journal

None

E. Service as officer of professional society or organization

Terry Yates:

Board of Directors, The National Assoc. of State Universities & Land-Grant Colleges, Nov. 2006 - 2007

Board Member, Board of Life Sciences, The National Academies of Sciences, October 2006 – June 2007

Board of Directors, New Mexico LambdaRail Inc., (NMLR), September 2006-2007 Board of Directors, New Mexico Consortium Inc., (NMC), August 2006 - 2007

Board of Directors, Ibero American Science & Tech. Education Consortium (ISTEC), 2005-2007

Board of Directors, National Center for Genome Resources (NCGR), Nov. 2005 - 2007

Chair-elect, Council on Research Policy & Graduate Education (CRPGE), June 2006-2007

President, Natural Science Collections Alliance, 2005-2007

Board of Directors, National LambdaRail Incorporated, 2004 - 2007

Executive Board, Council on Research Policy & Graduate Education (CRPGE), 2004 -2007

Chairman, New Mexico Research Council, 2003 - 2007

President, Monzano Conservation Foundation, 2003 - 2007

Board of Directors, NM Technology Research Collaborative, 2003 - 2007

Executive Board of Directors, Science & Technology Corporation @ UNM, 2001 - 2007

Board of Directors, La Semilla Institute, 2001 - 2007

Trustee, Southwestern Association of Naturalists

Board of Directors, Peromyscus Stock Center

Commission Member, Albuquerque-Chihuahua City Bilateral Commission, January 2005 - 2007

Board Member, All Species Foundation,

Chairman, Board of Trustees, Society of Systematic Biology, 1999-2007

Professor of Pathology, University of New Mexico, 1999-2007

Chairman, Board of Trustees Reserve Fund and Pooled Income Fund, American Society of

Mammalogists, 1998-2007

Professor of Biology, University of New Mexico, 1993-2007

OTHER PROFESSIONAL ACTIVITIES

A. Colloquium Presentations

Terry Yates

Many

B. Presentation to General Audience in a Scholarly Capacity

Terry Yates

NSF

C. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

Terry Yates

Many, including local rotary and other business groups.

D. Service in a Scholarly as a Member of a Local, State, Regional or National Committee, Panel etc.

Terry Yates

Program Committee, American Society of Mammalogists

Systematic Collections Committee, American Society of Mammalogists

Development Committee, Southwestern Association of Naturalists

International Commission on Systematic Collections, IUBS, Section of Thereology

Species Survival Commission (IUCN)-Insectivora, Tree Shrew, and Elephant Shrew Specialist Group

Species Survival Commission-Rodent Specialist Group

Small Mammal Recovery Team-USFW

NSF/USAID Interagency Steering Committee

Search Committee-Molecular Analyst, Smithsonian Institution

Global Environmental Facility-World Bank-Biodiversity Subcommittee

Latin American Biodiversity Committee-Smithsonian Institution

Bio Task Force on Environmental Biology, NSF

Research Needs Committee-Ecological Society of America

International Relations Committee, Chair, ASM.

OSTP Subcommittee on weapons of mass destruction

NEON Design Team, National Science Foundation

Albuquerque-Chihuahua City Bilateral Commission

CRPGE Executive Committee (Council on Research Policy & Graduation Education of the

National Assoc, of State University and Land-Grant Colleges)

Latin American Institute Liaison Committee, Dept. of Biology, 1985-2007

Coordinating Committee for Latin American Exchanges Land Use Committee

International Policy Committee

Grants Committee Latin American Institute

Academic Freedom and Tenure Committee

Council on the Americas

Integrative Cancer Biology Program Advisory Board, UNM Health Sciences Center

IACUC Committee

Annual Research Lecture Committee

Institutional Bio-Safety Committee

UNM Strategic Planning Committee

NM Research Council

UNM Research Cabinet

UNM Economic Development Council

UNM Business & Industry Advisory Cabinet

UNM Emergency Operations Center, 2006

E. Journal Referee.

Terry Yates

Journal of Mammalogy

Bioscience

SERVICE

A. Symposia, Workshops, Conferences, etc. Sponsored, Organized, Held etc.

Terry Yates

Many

B. Public Service

Terry Yates

President of Placitas Homeowners Association

Cheryl Parmenter

Division tours – provided educational tours and assistance for visitors.

Visitors

Johns Hopkins University-Infectious Disease Class-Greg Glass-14 Students

Dr. Gary Simpson

Biology New Graduate Students

LTER

USGS

EID Crew

MSB Bird Division

Dr. Michael Mares

Dr. Robert Baker and student.

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC.

Terry Yates

Research Associate -The Museum, Texas Tech University.

Elected Board of Governors, Southwestern Association of Naturalists

Appointed as one of two American representatives International Commission on Systematic Collections, IUBS

Appointed Research Associate, American Museum of Natural History, 1985-2007

Elected Trustee, Southwestern Association of Naturalists

Elected President, Natural Science Collections Alliance (NSCA), 2005 – 2007

President-elect, Council on Research Policy & Graduate Education (CRPRGE), National Society of State Universities and Land Grant Colleges

Hope, A. G.

Sigma Xi Grants in Aid of Research - \$400 awarded Fall 2007: Molecular vs. morphological vicariant evolution of rapidly evolving mammals: *Sorex minutissimus*, the tiny shrew.

DONATIONS AND GIFTS RECEIVED.

No donations or gifts.

Archival agreement-Bison FTA Card Collection 3,500 DNA specimens.

CURRENT STAFF

Faculty

Terry Yates: Curator of Genomic Resources, Museum of Southwestern Biology. Vice President for Research & Economic Development. Professor, Department of Biology, Professor and Department of Pathology.

Staff

Cheryl Parmenter: Collection manager

Students

Andrew Hope Graduate Assistant.

Comparative Phylogeography of the Sorex cinereus Complex: PhD in progress.

Kendra Anderson Undergraduate workstudy

Graduating UNM Spring 2007.

MUSEUM ASSOCIATES.

A. Curatorial Associates

None

B. Research Associates

J. Scott Altenbach UNM Department of Biology

Sydney Anderson American Museum of Natural History, New York Robert J. Baker The Museum, Texas Tech University, Lubbock, TX

Troy L. Best Department of Biology, Auburn University

Jerry Dragoo UNM Department of Biology

Jennifer Frey Eastern New Mexico University, Portales, NM

Scott L. Gardner Dept. Nematology, Curator, University Nebraska.

Sarah B. George Director, Utah State Museum.

Gary L. Graham Bat Conservation International

David J. Hafner New Mexico Museum Nat, History

Edward J. Heske Illinois Biological Survey

R. Dewitt Ivey Retired. Active in Botany, mammals Clyde Jones The Museum Texas Tech University

Dwight W. Moore Emporia State University

Robert Parmenter Valles Caldera Preserve- Chief Scientist

James L. Patton Museum of Vertebrate Zoology, University of California

Luis Ruedas Portland State University, Portland, Oregon
Jorge-Salazar Bravo Texas Tech University, Lubbock, TX
Richard A. Smartt New Mexico Museum of Natural History.

HERBARIUM

DIVISION HIGHLIGHTS

In 2007, the UNM herbarium contained more than 112,687 accessioned specimens of vascular and non-vascular plants

Development and maintenance of digital relational databases

The New Mexico Biodiversity Consortium Database contains 350,000 specimens from four university collections in NM: http://nmbiodiversity.org

Interpretive activities or Collections-related Outreach including tours for UNM students and the Native Plant Society of New Mexico and maintaining the Herbarium webpage

Collections Improvement Funding, Grant Applications/Awards: \$6000 for Database improvement-UNM and \$1000 from New Mexico Native Plant Society

Tim Lowrey and Jane Mygatt continue to collaborate on A Field Guide to the Plants and Animals of the Middle Rio Grande.

TABLE OF COLLECTION USE

Gollection 300	Loans/#	ilbozins	Visitors	information.	Palatications
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COURSES USING THE COLLECTIONS

Biol 402, Plants and People, Spring 2007- 21 students NSC 400- Geobotany, Summer 2007- 15 students

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Manager

Hanson, D.

Bio 360, Botany- 15 students

Biol 478, Plant Physiology with lab- 9 students

Biol 546, Lab Methods in Molecular Biology- 13 students

Biol 402/502, Lab Methods in Gas Exchange- 5 students

Lowrey, T.K. Biol 402, Plants and People, Spring 2007- 21 students NSC 400- Geobotany, Summer 2007- 15 K-12 Teachers

B. Graduate Students

None

COLLECTION MANAGEMENT

Herbarium staff processed and added 1158 new acquisitions to the collection. The UNM Herbarium received 33 gifts and one exchange of specimens, totaling 1829 specimens. The majority of specimens were collected from New Mexico. The herbarium logged more than 246 visits from the botanical community. We average one information request per week by e-mail and/or phone, and the Biodiversity website receives many hits per month for herbaria in the state. We continue georeferencing the collections using part time graduate student assistance. In addition, we continue to image specimens in the collection, and to-date have imaged our Type specimens, the state's threatened and endangered taxa, New Mexico collections in the Cactaceae (2676 specimens), and work continued imaging the Asteraceae.

Accessions for 2007:

2007.01	Bob Sivinski, NM State botanist, 37 specimens
2007.02	Jim McGrath, 13 specimens
2007.03	NHNM, 322 Middle Rio Grande Bosque plants
2007.04	NHNM, 29 Carlsbad National Monument plants
2007.05	NHNM, 107 Lower Santa Fe River specimens
2007.06	NHNM, 97 Middle Rio Grande Overbank project specimens
2007.07	NMSU, 8 various
2007.08	NHNM, 23 Carlsbad playas plants.
2007.09	NHNM, 71 Capulin Volcano National Monument plants
2007.10	Mygatt, 133 Bosque plants
2007.11	Bob Sivinski, NM State botanist, 43 various specimens
2007.12	BRY gift, 116 Utah specimens
2007.13	Chick Keller, 1 specimen
2007.14	Gene Jercinovic, 4 specimens
2007.15	Bob Sivinski, NM State botanist, 157 specimens
2007.16	NHNM, 36 Salinas Pueblo Missions National Monument
2007.17	Gene Jercinovic, 11 specimens
2007.18	Paula Rebert, 55 Santa Rosa Lake State Park
2007.19	Bob Sivinski, NM State botanist, 57 specimens
2007.20	Joanna Redfern, grad student 17 Fouquiera
2007.21	Joanne Schlegel, 1 Eupatorium
2007.22	KANU gift, 2 Stenotus
2007.23	GREE gift, 26 various
2007.24	David Conklin, 2 specimens
2007.25	Bob Sivinski, NM State botanist, 47 specimens
2007.26	Gene Jercinovic, 4 Euphorbia

2007.27	Arnold Clifford, 59 Navajo Indian Reservation
2007.28	Jim McGrath, 27 specimens
2007.29	Bob Sivinski, NM State botanist, 83 specimens
2007.30	NHNM, 60 Salinas Pueblo Missions National Monument
2007.31	J. Melaragno, 22 specimens2007.32 Vitality Works, 1 Goldenseal root
2007.33	Lolly Jones, 1 Asteraceae
2007.34	Don Heinze gift, 106 specimens

AWARDS, GRANTS, AND CONTRACTS

\$160,000. Institute of Geophysics and Planetary Physics at LANL. #09566-001-05. Biosphereatmosphere CO₂ exchange of terrestrial ecosystems: combining high resolution measurements and models to understand the global atmospheric carbon budget. D.T. Hanson, PI. 10/04-09/07.

\$4,000. UNM Research Allocation Committee. PEPC activity in C3 plants. D.T. Hanson, PI. 09/06-09//07.

\$480,000. Collaborative Research: Light enhanced 13C enrichment of dark respired CO₂: Implications for leaf internal CO₂ conductance and respiration in the light. National Science Foundation Integrative Organismal Biology Environmental and Structural Systems Cluster. D.T. Hanson, N. McDowell, and T. Rosenstiel. 08/15/2007- 06/30/2010

\$350,000. Integrated Bioenergy Processing System for Productive Use of NM Dairy Industry Waste Streams. New Mexico Technology Research Collaborative. R. Pate, P. Pohl, K. Hoodenpyle, D.T. Hanson, V. Cabrera, S. Deng. 02/15/2007 - 6/31/2008

\$40,000. U.S. Fish And Wildlife Service, A Field Guide to the Flora and Fauna of the Middle Rio Grande Bosque. PI: Jean-Luc Cartron. Co-PIs: D. Lightfoot, J. Mygatt, S. Brantley, and T.K. Lowrey. 09/06-09/07.

\$41, 892. Development of a Wildlife Conservation Plan for the City of Albuquerque. Co-PIs: Howard Snell and T.K. Lowrey. City of Albuquerque 10/01/2007-06/30/2008

\$250,000. Renovations to increase residence capacity at the UNM Sevilleta Field Station. PI: S. Collins. Co-PIs: T.K. Lowrey, M. Friggens, and D. Natvig. National Science Foundation. 08/01/2007-07/31/2010

\$1000. J. Redfern (Ph.D. advisee) Research grant from New Mexico Native Plant Society.

\$6000. T.K. Lowrey. Database improvement-UNM.

\$1000. T.K. Lowrey. Native Plant Society of New Mexico. Grant for database mapping.

Submitted:

Towards an isotopic early warning system of climate change impacts. Institute of Geophysics and Planetary Physics at LANL - Complex Dynamical Climate and Environmental Systems. N.

McDowell, D.T. Hanson, M. Barbour, W. Pockman, J. Randerson, B. Riley, T. Ringler, C. Still. \$100,000 per year (\$30,000 for UNM per year + student support)

Biochemical Characterization of Poplar Phosphoenol-Pyruvate Carboxylase (PEPc): exploring an enzymatic bridge between primary and secondary metabolism. Todd Rosenstiel (Portland State University) and D.T. Hanson. U.S. Department of Agriculture 10/01/2007 - 9/30/2010. \$390,000 (\$50,000 to UNM)

Pre-proposal: Production of Energy, Microbial-Feedstock-Based Biodiesel Fuel, and Coproducts from Dairy Wastes. Joint USDA-DOE Biomass R&D Initiative Solicitation RD-RBP-Biomass-2007 R. Pate, K. Hoodenpyle, D.T. Hanson, S. Lombardi, V. Cabrera, S. Deng, Q. Hu, T. French. \$1 million

Testing oxygen isotope models of carbon and water cycles. Los Alamos National Laboratory-Exploratory Research. N. McDowell, M. Barbour, D.T. Hanson, B. Riley 1/1/2008 - 12/31/2010. \$290,000 per year

RESUBMISSION How do land plants manage water over physiological, ecological and phylogenetic time scales? National Science Foundation – Frontiers in Integrative Biological Research program. B. Mishler, UC Berkeley (D.T. Hanson – lead on physiology section, 7 other institutions involved). 07/01/2007 - 06/30/20012. \$4 million (\$475,500 to UNM)

RESUBMISSION Collaborative Research: Interaction of photosynthetic and hydraulic responses to freezing and drought stress of Larrea spp. from north and south America. National Science Foundation Integrative Organismal Biology Environmental and Structural Systems Cluster. W.T. Pockman, D.T. Hanson, and B. Logan 07/01/2007 - 06/30/2010. \$341,812 to UNM

RESUBMISSION Collaborative Research: Ecophysiological traits and carbon cycle impacts of earliest land plants. National Science Foundation Integrative Organismal Biology Environmental and Structural Systems Cluster. D.T. Hanson (Collaborating PI's L. Graham, E. Waters, and M. Cook). 07/01/2007-06/30/2010. \$169,494 to UNM

RESUBMISSION Fungal loop model for the N cycle of semiarid grasslands. Ecosystem Science, National Science Foundation. R. Sinsabaugh (co-PI's S. Collins, D.T. Hanson, M. Allen). 07/01/2007-06/30/2010. \$666,723

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes

B. Journal Articles

McDowell, N., D. Baldocchi, M. Barbour, C. Bickford, M. Cuntz, D.T. Hanson, A. Knohl, H. Powers, T. Rahn, J. Randerson, B. Riley, C. Still, K. Tu, A. Walcroft. Measuring and modeling the stable isotope composition of biosphere-atmosphere CO₂ exchange: where are we and where are we going? Accepted in Fall 2007 EOS, 89(10):94-95; 2008

Barbour, M.M., G.D. Farquhar, D.T. Hanson, C.P. Bickford, H. Powers, and N.G. McDowell. A new measurement technique reveals temporal variation in δ¹⁸O of leaf-respired CO₂. Plant, Cell and Environment; 30: 456-468; 2007a.

*journal co-cover article (with following article)

Barbour M.M., G. Tcherkez, C.P. Bickford, N.G. McDowell, D.T. Hanson. A new measurement technique reveals rapid post-illumination changes in the carbon isotope composition of leaf-respired CO₂. Plant, Cell, and Environment; 30: 469-482; 2007b. *journal co-cover article (with preceding article)

Mygatt, J.E. 2007. Plant Distribution Reports. Iris pseudacorus. The New Mexico Botanist. No. 39. pp.7.

C. Web-Based

None.

D. Technical Reports

None.

E. Theses/Dissertations Completed

None.

F. Work In Progress

None.

G. Publications/Reports Based on MSB Specimens/Data by Outside Researchers Wilder, B.T., R.S. Felger, H. Romero-Morales, A. Quijada-Mascarenas. 2007. New Plant Discoveries for Sonoran Islands, Gulf of California, Mexico. J. Bot. Res. Inst. Texas 1(2):1203-1227.

Allred, K. 2007. Ranunculus acris not know from New Mexico. The New Mexico Botanist. No. 41, pp. 8.

Spellenberg, R. 2007. Astragalus missouriensis var. mimetes. Taxon report on the New Mexico Rare Plants website. http://nmrareplants.unm.edu/droplist/astmim.htm

Spellenberg, R. 2007. Astragalus humistratus var. crispulus. Taxon report in the New Mexico Rare Plants website. http://nmrareplants.unm.edu/rarelist_single.php?SpeciesID=221

Jercinovic, E. 2007. Josephine Skehan and the Mountains Near Gray. The New Mexico Botanist. No. 39. pp.1-6.

Stefanovic, S., M. Kuzmina and M. Costea. 2007. Delimitation of major lineages within Cuscuta subgenus Grammica (Convolvulaceae) using plastid and nuclear DNA sequences. American Journal of Botany. 94:568-589.

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

Hanson, D.T.

The evolution of resistance to photosynthetic CO₂ exchange. D.T. Hanson. Invited seminar speaker for the Interdisciplinary Plant Group, San Diego State University. October 2007

Early land plant adaptations to limitation of photosynthesis by CO₂ diffusion. Symposium cochair (with Liz Waters, SDSU – there was a competitive process for selection of our symposium) and speaker at joint meeting of the American Society of Plant Biologists and the Botanical Society of America. Chicago, July 2007.

New discoveries after two centuries of debate in plant biology on how gasses move through leaves. Invited seminar speaker for the Interdisciplinary Plant Group, University of Missouri-Columbia. April 2007

Leaf level control of water use efficiency: New insights using high frequency isotopic analyses. Invited seminar speaker United States Department of Agriculture Western Cotton Research Station, Maricopa, AZ. February 2007.

Lowrey, T.K.

Herbarium Networking: United We Stand. Keynote Address, Texas-Oklahoma Regional Consortium of Herbaria Annual meeting with Southwest Association of Naturalists Annual Meeting, Tarleton State University, Stephensville, TX April 2007.

B. Contributed Talks/Posters

From Plastid to Planet: How leaf-level diffusion impacts global productivity. D.T. Hanson; Seminar at UNM Biology Department; Albuquerque, NM; November 1, 2007

On-line stable carbon isotope analysis of leaf-respired CO₂. M. Barbour, G. Tcherkez, N. McDowell and D.T. Hanson. EcoFizz – 2007 (Ecological Physiology) meeting, Sydney, Australia

Using tunable diode laser spectroscopy to determine carbon isotope discrimination and internal transfer conductance in field-grown juniper. Bickford, C.P., N.G. McDowell, H.H. Powers, K.M. Brown, D.T. Hanson. Joint meeting of the American Society of Plant Biologists and the Botanical Society of America, Chicago, July 2007.

Measurement of stable CO₂ isotopes with a laser: Tunable diode laser spectroscopy applications for ecosystem measurements. H.H. Powers, J. Hunt, D.T. Hanson, and N.G. McDowell. Research Day, UNM Biology Department; Albuquerque, NM; April 2007

Using tunable diode laser spectroscopy to determine carbon isotope discrimination and internal leaf conductance in field-grown juniper. Bickford, C.P., N.G. McDowell, H.H. Powers, K.M. Brown, D.T. Hanson. Research Day, UNM Biology Department; Albuquerque, NM; April 2007

Redfern, J. (Ph.D. student) Seminar presentation at Universidad Autonoma Nacional Mexico, July 2007.

Redfern, J., D. Hafner, and T.K. Lowrey. Phylogeography of Fouquieria splendens and related Fouquieria species: evolutionary history of North American warm deserts from a botanical perspective. Ecological Society of America. July 2007. San Jose, CA.

C. Attendance at Professional Meetings

Hanson, D.T. Joint meeting of the American Society of Plant Biologists and the Botanical Society of America, Chicago, July 2007

Brouillet, L., T.K. Lowrey, L. Urbatsch, V. Karaman, and G. Sancho. Phylogeny and Evolution of the Tribe Astereae. Botany 2007 National Meetings. July, 2007. Chicago, Il.

Lowrey, T.K. Texas-Oklahoma Regional Consortium of Herbaria Annual meeting with Southwest Association of Naturalists Annual Meeting, Tarleton State University, Stephensville, TX April 2007.

Redfern, J. Ecological Society of America. July 2007. San Jose, CA.

Redfern, J. Seminar presentation at Universidad Autonoma Nacional Mexico, July 2007.

D. Service as Editor or on Editorial Board of a Journal None.

E. Service as Officer of Professional Society/Organization

Hanson, D.T. Symposium Co-chair (and co-creator) for joint meeting of the American Society of Plant Biologists and the Botanical Society of America, Chicago, IL, July 2007. Symposium title: "Comparative algal and bryophyte physiology"

Hanson, D.T. Co-head of the Western Sectional Society of the American Society of Plant Biologists, Southwestern sub-sectional region; September 2002-present.

Lowrey, T.K. Chair, Collections Committee, American Society of Plant Taxonomists (appointed).

Lowrey, T.K. Secretary, Sigma Xi Chapter, University of New Mexico (elected).

OTHER PROFESSIONAL ACTIVITIES

A. Presentation to General Audience in a Scholarly Capacity (*presenter)
Lowrey, T.K. Ice Plants in South Africa. Albuquerque Cactus and Succulent Society. August 2007.

B. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

Hanson, D.T. Symposium Co-chair (and co-creator) for joint meeting of the American Society of Plant Biologists and the Botanical Society of America, Chicago, IL, July 2007. Symposium title: "Comparative algal and bryophyte physiology"

C. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc.

Hanson, D.T.

Proposal Review Panel member for the National Science Foundation

Lowrey, T.K.

Member, New Mexico Rare Plant Technical Council

Mygatt, J.

Member, New Mexico Rare Plant Technical Council

D. Journal Referee

Hanson, D.T. American Journal of Botany (1), New Phytologist (1)

Lowrey, T.K. Sida (2), International Journal of Plant Science (1), Annals of Botany (1), Madrono (1), Systematic Botany (2), Canadian Journal of Botany (3), Lundelliana (1), Journal of Biogeography (1), Taxon (1)

E. Hosting Professional Colloquia and Groups

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc.

B. Public Service

Mygatt, J. Science Fair Judge. NWNM Regional Science & Engineering Fair. Special Botany Award category for the New Mexico Native Plant Society. March 2007.

UNM Student Health Center's 'Health Fair'. Supplied plants used for section on plant allergies. September 2007.

C. University and Departmental Committees:

Hanson, D. T.

Biology Department Seminars

Greenhouses

Graduate Admissions Committee

External Advisory Board, UNM Mass Spectrometry Facility

Lowrey, T.K.

Chair, Academic Freedom and Tenure Committee

Faculty Senate Library Committee

Director of Maxwell Museum of Anthropology Faculty Search Committee, 2007 Member, Lecturer Search Committee, Earth and Planetary Sciences

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC. None.

DONATIONS AND GIFTS RECEIVED

\$500. Native Plant Society donation for New Mexico Herbaria.

\$500. Native Plant Society (Albuquerque Chapter) donation for Field Guide to the Plants and Animals of the Middle Rio Grande Bosque.

CURRENT STAFF

A. Faculty/Staff

Lowrey, T.K., Curator Mygatt, J., Collection Manager

B. Graduate students

C. Undergraduate Student Workers and Volunteers

Zickefoose, K. Undergraduate work-study student

MUSEUM ASSOCIATES

A. Curatorial Associates

Hanson, D.T., UNM Faculty (Curator of Bryophytes) Sivinski, R., New Mexico State Botanist

B. Research Associates

Bleakly, D., Botanical Consultant Carter, J., Emeritus Professor, Colorado College and Botanist Dunmire, W., Retired U.S. National Park Service and Author Keller, C., Retired, Los Alamos National Laboratory Knight, P., Botanical Consultant Tonne, P., Natural Heritage New Mexico, Rare Plant Botanist

DIVISION OF MAMMALS

DIVISION HIGHLIGHTS.

NSF collections improvement grant funded. A \$ 259,285 grant (Curation, Databasing, and Integration of the Orphaned Illinois Mammal Collection) was funded. This will provide funding for new cases, drawers, trays and two years of student employment support to integrate the recently acquired University of Illinois Museum of Natural History (UIMNH) mammal collection (ca. 33,000 specimens). Curation, database development, and integration are now underway on this important new collection of primarily southwestern mammals collected from the 1940's through 1980's.

American Society of Mammalogists (ASM) Annual Meeting. The Division of Mammals (DOM) organized and successfully hosted the 87th meeting from 6-10 June. 580 participants attended. This was one of the largest meetings held recently. UNM has a long history of leadership in this professional society. A number of ASM Past-Presidents (e.g., Drs. Findley, Wilson, Brown), Honorary members (4) and current members of the Board of Directors (5) and Editorial Board (3) are populated by UNM faculty and alumni.

Reaccreditation of the DOM collection. The Division underwent a formal reaccreditation review by the Systematic Collections Committee during the ASM meeting. While we are still awaiting the official documentation, we have been informed that collection was successfully reaccredited.

Creation of Division of Parasitology at MSB. DOM led efforts to establish this new Division at MSB. DOM was awarded a NSF supplemental grant (NSF0726625) to transfer the helminth collections of Robert Rausch and the Beringian Coevolution Project from the USDA National Parasite Collection. These specimens were moved from Beltsville, Maryland and accessioned into DOM space in the wet collections. They form the nucleus of the newly created Division of Parasitology, now the third largest helminth collection in North America.

DOM collection reorganization. The entire wet and dry collections were reorganized, shifted and relabeled to follow the taxonomic arrangement of Wilson and Reeder 2005. Previously the collection had followed a mixture of Simpson, 1945 and Wilson and Reeder, 1993.

Successful fieldwork and collaborations with state and federal resource agencies lead to large number of newly accessioned specimens. Extensive fieldwork by faculty, staff, graduate students and undergraduate students through the western US (NM, CO, UT, NV, OR, WA, AK), western Canada (YT, BC, AB), Panama, and Chile produced significant new collections of integrated specimens (skins, skeletons, tissues, parasites). Nearly 10,000 new specimens were cataloged in 2007 (7% increase in size). Work was primarily sponsored by the National Science Foundation, National Institutes of Health, USDA Forest Service and US Fish and Wildlife Service. We are also part of a new project to survey vertebrates and parasites in Mongolia (2007-2011) with the University of Nebraska and University of Kansas.

Planning Underway for New Dermestarium. The UNM owned Elk's Club building located north of the University was condemned due to unsafe conditions during 2007. This building housed the

DOM dermestarium. Loss of our skeletal processing facility has created a huge backlog in material to be processed. Efforts are underway to finalize funding and plan to build a new facility.

Transcription of DOM accession data. During 2007, all accession data back through 1987 was transferred into our electronic database system (ARCTOS), thus allowing linkage of individual specimen to accession numbers and data.

UNO-Undergraduate Opportunities training grant awarded (\$1,015,000). The DOM had a leadership role (PI's Cook and Gannon) in securing funding for undergraduate training in science at UNM. The National Science Foundation awarded a 5 year undergraduate training grant that will host 12 undergraduate students from underrepresented groups per year in various research projects in the Biological Sciences at UNM.

COLLECTION USE

લ્કાંશીયમાં (લોક્સમાં) (લોક્સમાં) (લોક્સમાં) (લોક્સમાં)	i.oms (omgoing)	Legins - (finseming)	Visnors	information Requests Passingly Responded	Putiliterious Ching Viste pioly/ Spiecimans
9611*	30(3824) / 42(2392)**	3	168***	>100****	37

- * Currently the fastest growing collection in the western hemisphere.
- ** Loans originating in DOM / loans of mammal tissue originating in DGR Combined total of 72 loans of 6216 specimens of traditional voucher specimens and tissue samples.
- *** 46 visiting researchers (55 research days), 14 educational tours (122 people).
- **** Estimate of email or phone requests. Web visits to the DOM searchable database (ARCTOS) tracked via Google analytics = 24,758 visits (345,453 individual page views) from 125 countries (4,277 visitors referred to our site from GenBank).

COURSES USING THE COLLECTIONS

Non-UNM Courses Johns Hopkins – Emerging infectious Diseases Field Studies (Greg Glass, professor) (6 students)

Bosque School - Wildlife Biology Class (13 students)

Laguna Middle School - Science class

Polk Middle School - Wild Friends program (9 students)

Educational tours

Southwestern Polytechnic Institute (8 students)

Family School (3 students)

Aurora Academy (2 students)

A.P. Conference (10 students)

Mesalands College

Highland High Tucumcari High Manzano High West Las Vegas High Laguna High Valencia High Capital High Truman Middle School

UNM Courses

ANTH 373/573 Zooarchaeology (Fall)

BIOL 112L Biology for Non Majors

BIOL 203L Ecology and Evolution

BIOL 204L Plant and Animal Form and Function

BIOL 324L - Natural History of the SW

BIOL 402/502 Advanced Field Mammalogy

BIOL 386 General Vertebrate Zoology

ART/ART HIST Museum Studies

ART 207- Painting

BIOL 489 (Fall)-Mammalogy (15 students)

BIOL 400 (Fall) Senior Honors Thesis- (1 student)

BIOL 599 Masters Thesis—(1 student)

BIOL 699 Dissertation—(2 students)

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers

Cook, J. A.

BIOL 489 – Mammalogy, (15 students)

BIOL 402/502 - Advanced Field Methods in Tropical Mammalogy (2 students)

BIOL. 461L, Tropical Biology, Spring, 15 students + 5 faculty

Gannon, W. L.

BioMed 555 - Research BioEthics, Fall 2007, 14 students

Student Mentoring

Vani Aran-- BIOL 400 (Fall) Senior Honors Thesis

Krista Ortega REU/UMEB

Ben Edinger-Regents Scholar

Kelly Speer---Regents' Scholar

Ben Schaff-USDA support

Scarlett Swanson---NSF (REU)

Ashley Montoya -NSF-UNO

Elisha Song---NSF-UNO

Randle McCain---NSF-UNO

B. Graduate Students (labs, etc.)

BIOL 489L - Mammalogy Lab

COLLECTION MANAGEMENT

The DOM received 96 accessions (approximately 37,000 specimens, including the 33,000 UIMNH specimens which were not officially accessioned in 2006) in 2007. The majority of specimens (those not from the UIMNH collection) were generated by the Beringian Coevolution Project (consisting mainly of carnivore, soricomorph, lagomorph, and rodent material from Alaska, Canada and Siberia) and the ICIDR project (rodent material from Chile, Panama). The DOM continues its collaboration with state and federal agencies (e.g., serving as repository for both mountain lion taken by the NMGF, and Mexican wolves from the federal reintroduction program).

The majority of staff time was spent:

Reorganizing and relabeling of the wet and dry collections to follow the taxonomic arrangement of Wilson and Reeder 2005.

Preparation for the ASM meeting.

Assisting with BIOL 489 - Mammalogy.

Preparation, cataloging and installation of museum specimens.

Data entry for the incoming accessions.

Filling information requests.

Processing the large volume of material that was loaned to other investigators in 2007.

AWARDS, GRANTS, AND CONTRACTS

Cook, J.A.

A Test of Landscape Connectivity across the Sky Islands Region using Large Carnivores as Model Organisms (JA Cook, co-PI; PI is Gary Roemer, NMSU).

Wilburforce Foundation.

Total \$25,000 (F&A to NMSU)

Curation, Databasing, and Integration of the Orphaned Illinois Mammal Collection. NSF-DEB 0744025 2/01/2008-2/01/2010
Total \$ 259.285 Yearly \$130,000 (F&A \$50.052)

URM: Undergraduate Nurturing Opportunities (UNO); (JA Cook, PI)

NSF-DEB 0731350 08/01/07 - 08/01/12

Total \$1,010,000, yearly \$116,155 (F&A \$15,000)

Mongolia Vertebrate Parasite Project (S. Gardner, PI; JA Cook, Co-PI) NSF-DEB0717214 09/11/07 -9/01/09 Total \$466,000, yearly \$210,000 (Grant and F&A to University of Nebraska)

Fogarty International Training Grant
Project Title: Training in Hantavirus Ecology, Virology & Clinical Investigation in the
Americas. NIH- 2 D43 TW001133-06A1 (G Mertz, PI-Medical School; JA Cook, Co-PI)
07/01/1999 - 03/31/2011
Total \$510.000, yearly \$132.133 (F&A to Med School)

Transfer of BCP & Rausch Helminth Collections to MSB (JA Cook, PI) NSF-DEB 0726625 Amendment No. 6 to DEB-0415668 Total \$9.997 (F&A 3.000)

Molecular Genetics of Endemics; (JA Cook, PI) US Fish and Wildlife Service, Juneau (Supplement ongoing to 12/08) One year \$75,000 (F&A \$25,000)

Mammals of Alaska, (JA Cook, PI) US National Park Service (DOI) 9/1/07-9/1/08 Total one year \$14,100 (F&A \$2,100)

Mammals of Conservation Concern (JA Cook, PI) US Fish Wildlife Service 9/2007 - 11/2008 Total one year \$25,000 (F&A \$5,150)

National Science Foundation, Beringia Coevolution Project II (JA Cook, PI) NSF0415668Funded 2004-2008 Total \$610,000, yearly \$165,000 (F&A \$55,000)

NFIM Mammal Monitoring and Inventorying of the Tongass National Forest USDA Forest Service 6/2007-7/2008
Total \$40,000 (2 awards) (F&A imputed)

Dunnum, J. L.

Curation, Databasing, and Integration of the Orphaned Illinois Mammal Collection. NSF-DEB 0744025 (Dunnum, Co-PI, Cook, PI,) 2/01/2008-2/01/2010 Total \$ 259,285, yearly \$130,000 (F&A \$50,052)

Gannon, W.L. Curation, Databasing, and Integration of the Orphaned Illinois Mammal Collection. NSF-DEB 0744025 (Gannon, Co-PI, Cook, PI) 2/01/2008-2/01/2010 Total \$ 259,285, yearly \$130,000 (F&A \$50,052)

URM: Undergraduate Nurturing Opportunities (UNO); (Gannon, Co-PI, Cook, PI) NSF-DEB 0731350 08/01/07 - 08/01/12 Total \$1,010,000, yearly \$116,155 (F&A \$15,000)

National Fish and Wildlife Foundation. Impacts of abandoned mine reclamation on population dynamics and the molecular landscape of Townsend's big-eared bat (Corynorhinus townsendii). Year III. (Gannon, PI, R. E. Sherwin Co-PI) Dec 2006 through Dec 2007. Total \$215,000 (No F&A).

Improved housing of wolf (Canis lupus baileyi) specimens and its conservation in New Mexico. U. S. Fish and Wildlife Service.

Total \$3.000 (No F&A)

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes

MacDonald, S. O. and J. A. Cook. 2007. The Mammals and Amphibians of Southeast Alaska. Museum of Southwestern Biology, Special Publication 191 pages.

B. Journal Articles

Cook, J. A.

Arai, S., Jin-Won Song, Laarni Sumibcay, Vivek R. Nerurkar, Shannon N. Bennett, Cheryl Parmenter, Joseph A. Cook, Terry L. Yates, Richard Yanagihara. 2007. Hantavirus in the short-tailed shrew, North America. Emerging Infectious Diseases 13:1420-1423.

Lucid, M. K. and J. A. Cook. 2007. Cytochrome b haplotypes suggest an undescribed Peromyscus species from the Yukon. Canadian Journal of Zoology, 85:916-919.

Koehler, A. V. A., E. P. Hoberg, N. E. Dokuchaev and J. A. Cook. 2007. Geographic and host range of the nematode Soboliphyme baturini across Beringia. Journal of Parasitology. 93:1070-1083.

Duszynski, D.W., A.J. Lynch, J.A. Cook, 2007. Coccidia (Apicomplexa: Eimeriidae) infecting cricetid rodents from Alaska, U.S.A., and Northeastern Siberia, Russia, and description of a new Eimeria species from Myodes rutilus, the northern red-backed vole. Comparative Parasitology, 74:294-311.

MacDonald, S. O. and J. A. Cook. 2007. The Mammals and Amphibians of Southeast Alaska. Museum of Southwestern Biology, Special Publication 8:1-191. Lynch, A.J., D.W. Duszynski, and J.A. Cook. 2007. Species of Coccidia (Apicomplexa: Eimeriidae) Infecting Pikas from Alaska, U.S.A. and Northeastern Siberia, Russia. Journal of Parasitology 93(5):1230-1234.

Dalerum, F., J. Loxterman, B. Shults, K. Kunkel, J. A. Cook. 2007. Microsatellite markers suggest delayed female dispersal in a solitary carnivore, the wolverine. Journal of Mammalogy 88:793-800.

Waltari, E., E. P. Hoberg, E. P. Lessa, and J. A. Cook. 2007. Eastward Ho: phylogeographic perspectives on colonization across the Beringian nexus. Journal of Biogeography 34:561-574.

Dawson, Natalie

Dawson, N. G. 2007. Post Post-Doc: Are new scientists prepared for the real world? BioScience 57:16.

Gannon, W. L.

Gannon, W. L., R. S. Sikes, and the Animal Care and Use Committee of the American Society of Mammalogists. 2007. Guidelines for the Use of Wild Mammals in Research by the American Society of Mammalogists. Journal of Mammalogy 88:809-823.

Gannon, W. L. 2007. Squirrel Answer guide review. Journal of Mammalogy, 88:846.

Torrez-Perez, Fernando

Palma R.E., Torres-Pérez F. & Boric-Bargetto D. 2007. The ecology and evolutionary history of Oligoryzomys longicaudatus in southern South America. p. 671-693. In: Kelt D., Lessa E.P., Salazar-Bravo, J. & Patton, J.L. (Eds.) The Quintessential Naturalist: Honoring the Life and Legacy of Oliver P. Pearson. University of California Publications in Zoology, V. 134. Vásquez, M., Torres-Pérez F. & Lamborot M. 2007. Genetic variation within and between four chromosomal races of Liolaemus monticola (Tropiduridae) in Chile. Herpetological Journal 17:149-160.

Torres-Pérez F., Lamborot M., Boric-Bargetto D., Hernández C.E., Ortiz J.C. & Palma R.E. 2007. Phylogeography of a mountain lizard species: a deep evolutionary divergence into the Liolaemus monticola complex (Sauria: Liolaemidae). Journal of Zoological Systematics and Evolutionary Research 45(1):72-81.

Hope, A. G.

Hope, A. G. and R. R. Parmenter, (2007). Food habits of rodents inhabiting arid and semi-arid ecosystems of central New Mexico. Museum of Southwestern Biology Special Publication, No. 9, pp1-75.

Duszynski, D.

Duszynski, D. W., A. J. Lynch, and J. A. Cook. 2007. Coccidia (Apicomplexa: Eimeriidae) infecting Cricetid Rodents from Alaska, U.S.A., and Northeastern Siberia, Russia, and description of a new Eimeria species from Myodes rutilus, the northern red-backed vole. Comparative Parasitology 74(2):294–311.

Lynch, A.J., D.W. Duszynski, and J.A. Cook. 2007. Species of Coccidia (Apicomplexa: Eimeriidae) Infecting Pikas from Alaska, U.S.A. and Northeastern Siberia, Russia. J. Parasitology. 93:1230-1234.

Ubelaker, J. E., R. Easter-Taylor, A. Marshall, and D. W. Duszynski. 2007. A new species of Subulura (Nematoda: Subuluroidea) from ground squirrels, Spermophilus spilosoma Bennett, 1833, in New Mexico. Journal of Parasitology 93(5):1199–1201.

Yates, T. L.

Arai, S., J.-W. Song, L. Sumibcay, S. N. Bennett, V. R. Nerurkar, C. Parmenter, J. A. Cook, T. L. Yates, and R. Yanagihara. 2007. Hantavirus in Northern Short-tailed Shrew, United States. Emerging Infectious Diseases 13(9):1420-1423.

Calisher, C.H., K. D. Wagoner, B. R. Amman, J. J. Root, R. J. Douglass, A. J. Kuenzi, K. D. Abbott, C. Parmenter, T. L. Yates, T. G. Ksiazek, B. J. Beaty, J. N. Mills. 2007. Demographic factors associated with prevalence of antibody to Sin Nombre virus in deer mice in the western United States. Journal of Wildlife Diseases 43(1):1-11.

Frey, J. K., M. A. Bogan and T. L. Yates. 2007. Mountaintop island age determines species richness of boreal mammals in the American Southwest. Ecography 30:231-240.

Salazar-Bravo, J., and T. L. Yates. 2007. A New Species of Thomasomys (Cricetidae: Sigmodontinae) from Central Bolivia. Pp. 747-774 in Kelt, D. A., E. P. Lessa, J. Salazar-Bravo, and J. L. Patton (eds.). 2007. The Quintessential Naturalist: Honoring the Life and Legacy of Oliver P. Pearson. University of California Publications in Zoology 134:1-981.

C. Web-Based

All publications in the MSB series are available via free-download from our website.

D. Technical Reports

Dawson, N. G., S. O. MacDonald and J. A. Cook. 2007. Endemic Mammals of the Alexander Archipelago. In J. Schoen (ed). Wildlife Management on the Tongass National Forest. Audubon Special Publication

E. Theses/Dissertations Completed

Holliday, J. A. 2007. Phylogeny and character change in the feloid Carnivora. Doctoral Dissertation. Department in Biological Science, Florida State University. Fall 2007.

Koehler, A. 2007. Systematics, phylogeography, distribution, and lifecycle of Soboliphyme baturini. Master's Thesis, University of New Mexico, Albuquerque, New Mexico. 90 p. Graduated in May 2007.

Carrera Estupiñan, J. P. 2007. Relational database for Ecuadorian mammals deposited in museums around the world. Master's Thesis. Museum Sciences, Texas Tech University.

Weise, C.D., 2007. Community structure, vertical stratification and seasonal patterns of neotropical bats. Doctorial Dissertation, University of New Mexico, Albuquerque, NM, May 2007.

F. Work In Progress

J. A. Cook

Arai, S., S. Bennett, L. Sumibacay, J. A. Cook, J. Song, A. Hope, C. Parmenter, V. R. Nerurkar, T.L. Yates, and R. Yanagihara. 2008. Phylogenetically distinct hantaviruses in the masked shrew

(Sorex cinereus) and montane shrew (Sorex monticolus) in the United States. In Press. American Journal of Tropical Medicine and Hygiene.

Fedorov, V. B., A. V. Goropashnaya, G. G. Boeskorov and J. A. Cook. 2008. Comparative phylogeography and demographic history of the wood lemming (Myopus schisticolor): implications for late Quaternary history of the taiga species in Eurasia.

Runck, A., M. Matocq, and J. A. Cook. Submitted. Historic hybridization and persistence of a novel mito-nuclear combination in red-backed voles (genus Myodes).

Torrez-Perez, F.

Hjelle B. & Torres-Pérez F. Rodent Borne-Viruses. In: Clinical Virology Manual. Specter S., Hodinka R., Wiedbrauk D., & Young S (Eds). American Society for Microbiology. (Book Chapter).

G. Publications/Reports Based on MSB Specimens/Data by Outside Researchers Alvarez-Castaneda, S. T. 2007. Systematics of the antelope ground squirrel (Ammospermophilus) from islands adjacent to the Baja California peninsula. Journal of Mammalogy, 88(5):1160–1169.

Banbury, J. L., and G. S. Spicer. 2007. Molecular systematics of chipmunks (Neotamias) inferred by mitochondrial control region sequences. Journal of Mammal Evolution 14:149–162.

Bradley, R. D., N. D. Durish, D. S. Rogers, J. R. Miller, M. D. Engstrom, and C. W. Kilpatrick. 2007. Toward a molecular phylogeny for Peromyscus: evidence from mitochondrial Cytochrome-b sequences. Journal of Mammalogy 88(5):1146–1159.

Campbell, P., A. S. Putnam, C. Bonney, R. Bilgin, J. C. Morales, T. H. Kunz, L. A. Ruedas. 2007. Contrasting patterns of genetic differentiation between endemic and widespread species of fruit bats (Chiroptera: Pteropodidae) in Sulawesi, Indonesia. Molecular Phylogenetics and Evolution 44:474–482.

Cutrera, A. P., and E. A. Lacey. 2007. Trans-species polymorphism and evidence of selection on class II MHC loci in tuco-tucos (Rodentia: Ctenomyidae). Immunogenetics 59:937–948.

Dick, C. W., D. Gettinger, and S. L. Gardner. 2007. Bolivian Ectoparasites: A Survey of Bats (Mammalia Chiroptera). Comparative Parasitology 74(2):372–377.

Ditto, A. M., and J. K. Frey. 2007. Effects of ecogeographic variables on genetic variation in montane mammals: implications for conservation in a global warming scenario. Journal of Biogeography 34(7):1136-1149.

Foot, N. J., S. Orgeig, S. Donnellan, T. Bertozzi, C. B. Daniels. 2007. Positive selection in the N-Terminal extramembrane domain of lung surfactant protein C (SP-C) in marine mammals. Journal of Molecular Evolution 65:12–22.

- Frey, J. K. 2007. There is no valid record of cliff chipmunk (<u>Tamias dorsalis</u>) in the Sandia mountains, New Mexico. Western North American Naturalist 67(4):611–612.
- Geluso, K. 2007. Winter activity of bats over water and along flyways in New Mexico. The Southwestern Naturalist 52(4):482–492.
- Glass, G. G., T. Shields, B. Cai, T. L. Yates, and R. Parmenter. 2007. Persistently highest risk areas for hantavirus pulmonary syndrome: potential sites for refugia. Ecological Applications, 17(1):129–139.
- Haukisalmi, V., L. M. Hardman, J.Niemimaa and H. Henttonen. 2007. Taxonomy and genetic divergence of Paranoplocephala kalelai (Tenora, Haukisalmi et Henttonen, 1985) (Cestoda, Anoplocephalidae) in the grey-sided vole Myodes rufocanus in northern Fennoscandia. Acta Parasitologica 52(4), 335–341.
- Koepfli, K-P., M. E. Gompper, E. Eizirik, C.-C. Ho, L. Linden, J. E. Maldonado, R. K. Wayne. 2007. Phylogeny of the Procyonidae (Mammalia: Carnivora): Molecules, morphology and the Great American Interchange, Molecular Phylogenetics and Evolution 43:1076–1095.
- Matocq, M. D., Q. R. Shurtli V, C. R. Feldman. 2007. Phylogenetics of the woodrat genus Neotoma (Rodentia: Muridae): Implications for the evolution of phenotypic variation in male external Genitalia. Molecular Phylogenetics and Evolution 42: 637–652.
- Notarnicola, J., F. A. Jimenez, and S. L. Gardner. 2007. A new species of Dipetalonema (Filarioidea: Onchocercidae) from Ateles chamek from the Beni of Bolivia. Journal of Parasitology 93(3):661–667.
- Porter, C. A., S. R. Hoofer, C. A. Cline, F. G. Hoffmann, and R. J. Baker. 2007. Molecular phylogenetics of the Phyllostomid bat genus Micronycteris with descriptions of two new subgenera. Journal of Mammalogy 88(5):1205–1215.
- Potter, S., S. Orgeig, S. Donnellan, and C. B. Daniels. 2007. Purifying selection drives the evolution of surfactant protein C (SP-C) independently of body temperature regulation in mammals. Comparative Biochemistry and Physiology Part D: Genomics and Proteomics 2(2):165-176.
- Quintana N, H., and V. Pacheco T. 2007. Identificación y distribución de los murciélagos vampiros del Perú. Revista Peruviana Med Exp Salud Publica 24(1):81-88.
- Ruedas, L. A., and J. Salazar-Bravo. 2007. Morphological and chromosomal taxonomic assessment of Sylvilagus brasiliensis gabbi (Leporidae). Mammalia 71(1/2):63–69. Schutz, H., and R. P. Guralnick. 2007. Postcranial element shape and function: assessing locomotor mode in extant and extinct mustelid. Zoological Journal of the Linnean Society 150:895-914.

Sitdikov, R. A., E. S. Wilkins, T. Yates, and B. Hjelle. Detection of Hantavirus using a new miniaturized biosensor device. 2007. Journal of Applied Research 7(1):86-107.

Solari, S. 2007. New species of Monodelphis (Didelphimorphia: Didelphidae) from Peru, with notes on M. adusta (Thomas, 1897). Journal of Mammalogy 88(2):319–329.

Storz, J. F., Sabatino S. J., F. G. Hoffmann, E. J. Gering, H. Moriyama, et al. (2007). The molecular basis of high-altitude adaptation in deer mice. PLoS Genet 3(3): 0448-0459.

Weyandt, S. E., and R. A. Van Den Bussche. 2007. Phylogeographic structuring and volant mammals: the case of the pallid bat (Antrozous pallidus). Journal of Biogeography 34(7):1233-1245.

Woodman, N. 2007. A new species of nectar-feeding bat, genus Lonchophylla, from western Colombia and western Ecuador (Mammalia: Chiroptera: Phyllostomidae). Proceedings of the Biological Society of Washington 120(3):340–358.

Young, R. L., T. S. Haselkorn, and A.V. Badyaev. 2007. Functional equivalence of morphologies enables morphological and ecological diversity. Evolution 61-11: 2480-2492.

G. Dissertations and Theses completed utilizing MSB DOM specimens Holliday, J. A. 2007. Phylogeny and character change in the feloid Carnivora. Doctoral Dissertation. Department in Biological Science, Florida State University.

Carrera Estupiñan, J. P. 2007. Relational database for Ecuadorian mammals deposited in museums around the world. Master's Thesis. Museum Sciences, Texas Tech University.

8. ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

J.A. Cook

Cook, JA. And N. Dawson. 2007. Natural History Collections: Critical Research Infrastructure in the United States. Congressional National Science Foundation Exhibit. Longworth Building Washington, DC June.

Cook, JA and N. Dawson. 2007. High Latitude Science: The Beringian Coevolution Project. Congressional National Science Foundation Exhibit—Longworth Building. Washington, DC June

B. Contributed Talks/Posters

Joe Cook

Arai, S., Sumibcay, L., Yates, T., Ohdachi, S., Truong, N.U., Parmenter, C., Cook, J.A., Nerurkar, V.R., Song, J.-W., and Yanagihara, R. 2007. Search for novel insectivore-borne hantaviruses. VII International HFRS Meeting, Buenos Aires, Argentina. June.

Arai, S., L. Sumibcay, Jin-Won Song, Terry L. Yates, Vivek R. Nerurkar, Shannon N. Bennett, Cheryl Parmenter, Joseph A. Cook, and Richard Yanagihara. A Phylogenetically Distinct

Hantavirus in the Short-Tailed Shrew (Blarina brevicauda) in the United States. VII International HFRS Meeting, Buenos Aires, Argentina. June.

Arai, S., L. Sumibcay, Jin-Won Song, Terry L. Yates, Vivek R. Nerurkar, Shannon N. Bennett, Cheryl Parmenter, Joseph A. Cook, and Richard Yanagihara. 2007. A Phylogenetically Distinct Hantavirus in the Short-Tailed Shrew (Blarina brevicauda) in the United States. American Society of Mammalogists 87th Annual Meeting, June. Albuquerque. Beringian Coevolution Project. PolarPalooza, New Mexico Museum of Natural History, October-Dec 2007.

Cook, JA. 2007. Beringian Coevolution Project. INTEL International Science Fair, Departmental Display. Albuquerque. May.

Torres-Perez, F., R. A. Medina, R. Eduardo Palma, Brian Hjelle, Joseph A. Cook. 2007. Population and ecogeographic genetic structure of O. longicaudatus and Andes virus in three major Chilean ecoregions. American Society of Mammalogists 87th Annual Meeting, June. Albuquerque.

Torres-Perez, F., B. S. Barker, R. E. Palma & J. A. Cook. 2007. Population structure of a rodent reservoir for Hantavirus, O. longicaudatus, in Chile and its human implications. Evolutionary Change in Human-altered Environments: An International Summit. Institute of the Environment University of California, Los Angeles. February.

Dawson, N., M. Small. K. Stone, J. A. Cook. 2007. Islands, introductions, and endemism, Martes in the Alexander Archipelago. American Society of Mammalogists Annual Meeting, Albuquerque June.

Dawson, N., A. Hope, S. MacDonald, J. A. Cook. 2007. Endemic mammals highlight conservation hotspots in the Alexander Archipelago. Poster presentation at the International Summit on Evolutionary Change in Human-Altered Environments. Center for the Environment, University of California Los Angeles.

Koehler, A. V. A., E. P. Hoberg, N. E. Dokuchaev, N. A. Tranbenkova, J. S. Whitman, D. W. Nagorsen and J. A. Cook. 2007. Phylogeography of Soboliphyme baturini, a transBeringian nematode of mustelids. American Society of Mammalogists Annual Meeting, Albuquerque June.

Esteva, M., F. Cervantes, S, Brant, J. A. Cook. 2007. Phylogenetic relationships of Saussure's shrew from Mexico. American Society of Mammalogists Annual Meeting, Albuquerque June.

Tsvetkova A., J. Cook, E. Hoberg, H. Henttonen, S. MacDonald, J. Laakkonen, D. Goade. 2007. The Beringian Coevolution Project: Model Archives provide Baselines for Research and Management. American Society of Mammalogists Annual Meeting, Albuquerque June.

MacDonald, S. O. and J. A. Cook. 2007. Alaska Land Mammals of Conservation Concern. American Society of Mammalogists Annual Meeting, Albuquerque June.

Matsumoto, K, Cook, JA, Goethert, HK, Telford, SR. 2007. Bartonella sp. infection of red-backed voles trapped from an interior Alaskan sire where ticks are absent. American Society of Tropical Medicine and Hygiene, Philadelphia, November.

Nofchissey, RA, J. Cook, D. Goade, A. Tsvetkova, and G. Ebel. 2007. Serological evidence of Powassan virus transmission in small mammals collected in Russia, Alaska and the Southwest US. American Society of Tropical Medicine and Hygiene, Philadelphia, November.

Yanagihara, R., JW Song, S. Arai, S. N. Bennett, J. A. Cook. 2007. Evolutionary insights from newly identified soricid-borne hantaviruses. 5th International Conference on Emerging Zoonoses. Limassol, Cyprus, November.

Thomas, J. A.

Comparative Phylogeography of the Sin Nombre Virus, /Peromyscus maniculatus/ (deer mice) and the emergence of virulent strains of Hantavirus. Guild of Rocky Mountain Ecologists and Evolutionary Biologists.

Torrez-Perez, F.

Torres-Pérez F., Medina R.A, Palma R.E., Hjelle B. & Cook J.A. 2007. Population and ecogeographic genetic structure of O. longicaudatus and Andes virus in three major Chilean ecoregions. American Society of Mammalogists, University of New Mexico, USA, June 10-14.

Barker B.S., Torres-Pérez F., Palma R.E & Cook J.A. 2007. Population genetic structure of a rodent reservoir for Hantavirus, O. longicaudatus, in Chile and its human implications. Evolutionary Change in Human-altered environments. Institute of the Environment, University of California, USA, February 8-10.

Francis, J.

Phylogeography of the wolverine (Gulo gulo) with an emphasis on Southeast Alaska. American Society of Mammalogy. Albuquerque, NM, June 2007.

Phylogeography of the wolverine (gulo gulo) with an emphasis on SE AK and the kenai peninsula: preliminary results. GREEB meeting. Abiquiu, NM, Sept 2007.

Hope, A. G.

Hope, A.G. and J. A. Cook (2007) Molecular and morphological evolution of Sorex minutissimus, the tiny shrew. American Society of Mammalogists Meeting, Albuquerque, NM, Jun 2007.

Arai, S., L. Sumibcay, S. N. Bennett, J-W. Song, Z. R. Nerurkar, C. Parmenter, A. Hope, S. Brant, J. A. Cook, T. L. Yates, R. Yanagihara (2007) Newfound Soricid-Borne Hantaviruses in the United States. American Society of Mammalogists Meeting, Albuquerque, NM, Jun 2007.

Hope, A. G. and R. R. Parmenter, (2007). Food habits of rodents inhabiting arid and semi-arid ecosystems of central New Mexico. American Society of Mammalogists Meeting, Albuquerque, NM, Jun 2007.

Nofchissey, R.A., J. A. Cook, A. G. Hope, A. Tsvetkova, C. Ralph, S. Arguello, and D. Goade. Antibody Prevalence to Hantaviruses in Rodents from Alaska, British Columbia, Southwest United States and Russia. American Society of Mammalogists Meeting, Albuquerque, NM, Jun 2007.

Nofchissey. R.A., J. A. Cook, A. G. Hope, A. Tsvetkova and G. D. Ebel. Serological Evidence of Powassan Virus Transmission in Mammals Collected in Russia, Alaska and the Southwest United States. American Society of Mammalogists Meeting, Albuquerque, NM, Jun 2007.

C. Attendance at Professional Meetings

Barker, B.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Evolutionary Change in Human-altered environments. Institute of the Environment, University of California, USA, February 8-10.

Cook, J. A.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Dunnum, J.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Gannon, W. L.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Harding, L. E.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Hope, A. G.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Evolutionary Change in Human-altered environments. Institute of the Environment, University of California, USA, February 8-10.

Koehler, A.'V.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Malaney, J.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Evolutionary Change in Human-altered environments. Institute of the Environment, University of California, USA, February 8-10.

Thomas, J. A.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Guild of Rocky Mountain Ecologists and Evolutionary Biologists.

Torrez-Perez, F.

American Society of Mammalogists, Albuquerque, NM, June 2007.

Evolutionary Change in Human-altered environments. Institute of the Environment, University of California, USA, February 8-10.

Dawson, Natalie

Evolutionary Change in Human-altered environments. Institute of the Environment, University of California, USA, February 8-10.

D. Service as Editor or on Editorial Board of a Journal

Gannon, W.L.

Associate Editor, Book Reviews, Journal of Mammalogy (2005-present)

E. Service as Officer or Professional Society/Organization

Cook, J.A.

Board Member, American Society of Mammalogists (elected) 2007-2010.

OTHER PROFESSIONAL ACTIVITIES

A. Presentations to General Audience in a Scholarly Capacity

Cook, J.A.

Beringian Coevolution Project, PolarPalooza exhibit, New Mexico Museum of Natural History, October-Dec 2007

Gannon, W. L.

Bats! The Nature Center, Albuquerque Bosque, 200 people, 18 December 2007.

B. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

Cook, J. A.

On behalf of American Institute of Biological Sciences (AIBS), I met with Senator Bingaman's staff and then Rep. Tom Udall's staff regarding amendment (expansion) of Bingaman's Competitive Science Initiative (Senate Bill that was passed and signed into law) to include biological sciences. Washington, DC June 2007

C. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc.

Cook, J.A.

1 hour presentation on Wildlife Management Issues to Interagency Working Group in Juneau, AK July 2007 (Alaska Department of Fish and Game, USDA Forest Service, US Fish and Wildlife Service, National Park Service).

Cook, J.A.

Chair, Biology Tenure and Promotion Committee

Member, MSB Executive Committee

Editorial Board, MSB Publications Series, (1 manuscript managed/edited)

Chair, UNM Graduate Student Selection Committee, 2006-2007

Co-Chair, UNM Ad hoc Vehicle Policy Committee, 2006-2007

Co-Chair, Local Organizing Committee, American Society of Mammalogists 87th Meeting. Albuquerque, NM, 6-10 June 2007 (580 attendees).

Member, Resolutions Committee, American Society of Mammalogists

Member, Latin American Scholarship Committee, American Society of Mammalogists

Dunnum, J.L.

Co-Chair, Local Organizing Committee, American Society of Mammalogists 87th Meeting. Albuquerque, NM, 6-10 June 2007 (580 attendees).

Gannon, W.L.

Co-Chair, Local Organizing Committee, American Society of Mammalogists 87th Meeting. Albuquerque, NM, 6-10 June 2007 (580 attendees).

D. Journal Referee

Cook, J.A.

Molecular Ecology (2 papers), Interciencia (1 paper), Journal of Zoology (1 paper). National Science Foundation, ad hoc reviewer (2 proposals)

National Science Foundation, Panel Member, November (12 proposals)

Gannon, W.L. Journal of Mammalogy Acta Chiropterologica

Torrez-Perez, F. Revista de Biología Tropical

E. Hosting Professional Colleagues and Groups

46 visiting academics and professionals from 22 outside institutions (see following list) visited the collections for research purposes. Additionally the MSB DOM hosted the American Society of Mammalogists meeting in June. During this meeting the collection was visited by the Systematics Collections Committee for a reaccreditation review (22 committee members toured).

Cook personally hosted the following individuals:

- Dr. Sylvia Brunner, Dr. Gordon Jarrell, Dusty McDonald; University of Alaska Museum.
- Dr. Eric Hoberg, Curator, US National Parasite Lab.
- Dr. Enrique Lessa, Professor of Evolution, Universidad de la Republica.
- Dr. Marjorie Matocq, Idaho State University.
- Dr. Albina Tsvetkova, Russian Academy of Sciences

SERVICE

A. Symposia, Workshops, Conferences, etc. Sponsored, Organized, Held, etc.

American Society of Mammalogists 87th Meeting. Albuquerque, NM, 6-10 June 2007 (580 attendees).

B. Public Service

General

A significant portion of DOM staff time is spent providing information or assistance to the public either during visits to the collection, through phone calls, emails or through outreach endeavors. This is an important and ongoing activity of all DOM personnel.

Cook, J. A.

Visited Diné Tribal College in Tsalie AZ and Shiprock NM to recruit Navajo students to UNM Biology Program and establish collaborative ties.

National American Indian Science and Engineering Fair, Judge, May.

INTEL International Science Fair, Departmental Display. Albuquerque. Special Awards Judge & Grand Awards Judge. May.

Peer Evaluation of Promotion File for Dr. Jesus Maldonado, Curator, Smithsonian Institution.

March

Peer Evaluation of Distinguished Researcher File for Dr. Marjorie Matocq, Idaho State University. January.

Faculty Sponsor, UNM Wild Student Organization

Dawson, N.

Grand Awards science fair judge for local, regional, and international science fairs including the INTEL International Science and Engineering Fair and the Native American Indian Science and Engineering Fair.

Wildfriends (a program working with underprivileged youth in New Mexico in the sciences and public policy) volunteer science advisor and co-developer of "Wild Side of Ecology" curriculum for 5th-12th grade students.

Dunnum, J. L.

Mentor - Cameron Robles, Truman Middle School gifted seminar class (Peggy Lynch Hill, advisor).

INTEL International Science Fair, MSB DOM display. Albuquerque, NM.

Division tours - provide educational tours and information for visitors and school groups.

Thomas, J. A.

Laguna Middle School Science Fair Judge, EMERG GK12 Summer camp for middle school students held at the Seviletta National Wildlife Reserve.

Gannon, G.L.

Judge for 3 science fairs in fall 2007 Regional Science Fair, March 2007

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC.

Francis, J.

Student Research Allocation Committee Grant through UNM. Project Title: Landscape Connectivity and Conservation Genetics of Wolverine (Gulo gulo) of Southeast Alaska and the Kenai Peninsula.

Graduate Research Allocation Committee through UNM. Project Tile: Population Connectivity and Conservation Genetics of the Wolverine (Gulo gulo) in North America.

Hope, A. G.

Sigma Xi Grants in Aid of Research - \$400 awarded Fall 2007: Molecular vs. morphological vicariant evolution of rapidly evolving mammals: Sorex minutissimus, the tiny shrew.

Ediger, B.

Barry M. Goldwater Undergraduate Fellowship

DONATIONS AND GIFTS RECEIVED

None

CURRENT STAFF

A. Faculty/Staff

J.A. Cook, Curator

J.L. Dunnum, Collection Manager

C.A. Ramotnik, USGS Collection Manager

M.A. Bogan, Emeritus Curator

J.S. Findley, Emeritus Curator

Fernando Torres, Post-Doctoral Associate

B. Graduate students

Barker, Brittany. Ph.D. student. Landscape genetics of two frogs from Puerto Rico: Eleutherodactylus antillensis and E. portoricensis.

Crawford, Dolly. Ph.D. student. Dolly investigated molecular analysis of Microtus mexicanus: a test of the genetic distinctiveness of M. mogollonensis.

Dawson, Natalie. Ph.D. Candidate. Endemism, conservation genetics, and insular biogeography of 3 carnivores of the Tongass National Forest.

Escobedo, Yadeeh. 1st year Ph.D. Linkage corridors along the North Pacific Coast.

Francis, Jose. Master's student. Phylogeography of the wolverine (Gulo gulo) with an emphasis on Southeast Alaska.

Harding, Larisa. Ph. D. Candidate. Speciation and Biodiversity: Phylogeography and historical biogeography of Mustela frenata; Phylogeny of the American Mustelidae, with emphasis on two South American endemics.

Hope, Andrew. Ph.D. student. Comparative phylogeography of trans-Beringian Sorex: a tool for investigating geographic and genetic responses to climate change.

Malaney, Jason. Ph.D. student. Snowshoe hare historical biogeography and plant herbivore coevolution.

Rearick, Jolene. 1st year Ph.D. Phylogeography and molecular evolution of freeze tolerance in Lithobates sylvaticus.

Thomas, Jason Andrew. 3rd year Ph.D. student. Phylogeography of the Sin Nombre virus, /Peromyscus maniculatus/ a coevloutionary relationship.

C. Undergraduate Student Workers and Volunteers

Seven undergraduates worked in the collections.

Tierney Adamson

Ben Ediger

Melvin Foster

Randle McCain

Benjamin Schaff

Elisha Song

Scarlett Swanson

Jamie Raines

High School Students/Volunteers Max Maguire, Sandia Prep HS

MUSEUM ASSOCIATES

A. Curatorial Associates

James H. Brown, UNM Department of Biology Jerry W. Dragoo, UNM Department of Biology Donald W. Duszynski, UNM Department of Biology William Gahnon, UNM Research Ethics Gabor R. Racz, UNM Department of Biology

B. Research Associates

J. Scott Altenbach, UNM Department of Biology
Sydney Anderson, American Museum of Natural History, New York
Robert J. Baker, The Museum, Texas Tech University, Lubbock, TX
Troy L. Best, Department of Biology, Auburn University
M. Scott Burt, Kirksville, Missouri
Fernando Cervantes, UNAM, Mexico City, México
Paul J. Cryan, Ft. Collins, Colorado
John Demboski, Denver Museum of Science and Nature, Denver, Colorado
Eugene Fleharty, Oklahoma
Melissa Fleming, Poulsbo, Washington

Jennifer K. Frey, Las Cruces, New Mexico

Scott L. Gardner, Dept. Nematology, Curator, University Nebraska

Keith Geluso, Albuquerque, New Mexico

Ken Geluso, Lincoln, Nebraska

Sarah B. George, Director, Utah State Museum

Gary L. Graham, Texas Parks and Recreation Division

David J. Hafner, New Mexico Museum Nat. History

Art Harris, University of Texas, El Paso, Texas

Bruce Hayward, Silver City, New Mexico

Heikki Henttonen, Finland

Edward J. Heske, Illinois Biological Survey

Erik Hoberg, Beltsville, Maryland

R. Dewitt Ivey, Retired. Active in Botany, mammals

Clyde Jones, The Museum Texas Tech University

Sue Kutz, Saskatoon, Saskatchewan

Enrique Lessa, Montevideo, Uruguay

Stephen MacDonald, Silver City, New Mexico

Michael Mares, Norman, Oklahoma

Pablo Marquet, Valdivia, Chile

Rodrigo Medillín, UNAM, Mexico City, Mexico

Tony R. Mollhagen, Lubbock, Texas

Gary Morgan, New Mexico Museum Natural History, New Mexico

Dwight W. Moore, Emporia State University

Michael J. O'Farrell, Jr., Las Vegas, Nevada

Thomas J. O'Shea, Ft. Collins, Colorado

Eduardo Palma, Valdavia, Chile

Robert Parmenter, Valles Caldera, Jemez, New Mexico

James L. Patton, Museum of Vertebrate Zoology, Berkeley, California

Paul J. Polechla, Albuquerque, New Mexico

Robert Rausch, University of Washington, Seattle

Brett R. Riddle, University of Nevada, Las Vegas, NV

Jorge Salazar Bravo, Texas Tech University, Texas

C. Greg Schmitt, Farmington, New Mexico

Richard E. Sherwin, Christopher Newport University, Virginia

Fred Szalay, Los Ranchos de la Rio Grande, New Mexico

Sandy Talbot, Molecular Ecology Lab- USGS Anchorage, Alaska

Ernie Valdez, Tijeras, New Mexico

Alasdair Veitch, Department of Renewable Resources, Norman Wells, NWT, Canada

Jack Whitman, Alaska Department of Fish and Game - Fairbanks, Alaska

Don E. Wilson, Smithsonian, Washington, DC

NATURAL HERITAGE NEW MEXICO

DIVISION HIGHLIGHTS

In 2007, Natural Heritage New Mexico conducted a wide variety of projects on conservation of plants, animals, and ecosystems. With respect to rare plants, our focus was on the Sacramento Prickly Poppy, Argemone pleiacantha ssp. pinnatisecta. We conducted a range-wide survey of this species and documented declines throughout the area. We met with city, state, and federal agencies to discuss potential changes in land management to better provide for this endangered plant.

We continued our work on issues of biodiversity and Rio Grande restoration with a project on Southwestern willow flycatcher habitat and nesting with the Pueblo of Isleta; an analysis of vegetation and insects in native versus exotic vegetation, and the mapping of river bar vegetation in the Albuquerque reach as part of the Bosque Initiative sponsored by the U.S. Fish and Wildlife Service.

Using remote-sensing methods we developed for black-tailed prairie dogs, we conducted a survey of Gunnison's prairie dog disturbance on the Navajo Nation and Reservation of the Hopi Tribe. We are currently developing models to estimate current acreage of prairie dogs over the two-reservation area in Arizona, Utah, and New Mexico. Collaborating with the Institute for Culture and Ecology and the Forest Guild to develop a project on the effects of woody biomass removals on wildlife of conservation concern in pinyon-juniper.

We upgraded our GIS Enterprise geodatabase in support of our research, survey and assessment activities by switching our suite of GIS coverage to the NAD83 Datum and by bringing in-house 2005 digital, color aerial photography for the entire state plus Navajo and Hopi lands (with portions in infra-red). We also upgraded our capacity to deliver spatial conservation data to agencies via the Web along with developing and delivering map products directly for them (NPS, BLM, ACOE, FWS, DOD, NMED, NMGFD, NMARNG, and various NGOs).

Other new projects include: a joint-venture research project on prairie chickens, habitat, and livestock grazing with a Milnesand, NM ranch through the NMDGF Land Owner Incentive Program; a vegetation map for White Sands National Monument; a project site database and Web page upgrade for the Middle Rio Grande Initiative (FWS), a plant and animal inventory project at Pecos National Historic Park, an aquatic insect survey to complement our on-going monitoring and assessment of the Santa Fe River ACEC (BLM), and hosting the New Mexico Biological Collections Consortium website.

TABLE OF COLLECTION USE

(Collegico) (Coperation (Coperation (Coperation)	Posities	imheathatte Robulei	Visitoise.		Habbierijans. Trang visik Specialeis
5,368 new records, 3,012 updated records	NA	NA.	9,855 visitors to web site	105 personally, 28,043 publications downloaded	Unknown

COURSES USING THE COLLECTIONS

COURSES TAUGHT BY MSB PERSONNEL

A. Faculty/Collection Managers

Johnson, K. ARSC 198, Experience the Natural World, Fall, 18 students

B. Staff

COLLECTION MANAGEMENT

In 2007, Natural Heritage New Mexico began hosting the New Mexico Biological Collections Consortium website. We updated the data and the functionality so researchers and the public can search biological museum data from across New Mexico. There are currently 323,544 searchable specimen records in the NMBCC database representing data from four museums (MSB, ENMU, WNMU, and NMSU) and 22 divisions within those museums. New functionality includes the ability of collection managers/curators to upload new data, set security options on their data, and approve/reject users requesting secured data. We continue to host, maintain, and update other biological resource databases such as the New Mexico Ornithological Society web site/database and the Rare Plant Technical Council web site/database. We made selected biodiversity data available via the EPA data exchange network and researched web mapping software options to upgrade our web mapping sites.

AWARDS, GRANTS, AND CONTRACTS

\$36,591. NM Military Affairs Dept. Banner #048763. Biological resource support NMARNG—Invasive species 2006. Paul Arbetan, PI. 09/06-06/08. \$28,558 (F&A \$4,760).

\$73,409. NM Military Affairs Dept. Banner #048770. Biological resource support NMARNG – Protected, threatened, endangered species 2006. Paul Arbetan, PI. 09/06-06/08. \$40,824 (F&A \$6,804).

\$36,591. NM Military Affairs Dept. Banner #048762. Biological resource support NMARNG – Invasive species 2007. Paul Arbetan, PI. 09/06-06/08. \$0 (F&A \$0).

- \$64,234. NM Military Affairs Dept. Banner #048765. Biological resource support NMARNG Protected, threatened, endangered species 2007. Paul Arbetan, PI. 09/06-06/09. \$0 (F&A \$0).
- \$60,000. NM Military Affairs Dept. Banner #048772. Biological resource support NMARNG Protected, threatened, endangered species. Paul Arbetan, Pl. 09/06-06/09. \$0 (F&A \$0).
- \$25,000. NM Military Affairs Dept. Banner #048896. Rare, protected, and endangered and threatened species survey for Camel Tracks Training Site; Species monitoring for Grey Vireo. Paul Arbetan, Pl. 10/07-06/09. \$0 (F&A \$0).
- \$66,150. NM Military Affairs Dept. Banner #048897. Rare, protected, and endangered and threatened species survey for Roswell WETS. Paul Arbetan, PI. 10/07-06/09. \$0 (F&A \$0).
- \$50,000. NM Military Affairs Dept. Banner #048898. Rare, protected, and endangered and threatened species survey for Black Mtn. Training Site; Night-blooming Cereus monitoring & surveys. Paul Arbetan, PI. 10/07-06/09. \$0 (F&A \$0).
- \$143,915. Navajo Nation. Banner #048821. DOQ survey of Gunnison's prairie dog towns on the Navajo Nation & Reservation of the Hopi Tribe. Kristine Johnson, PI. 07/07-03/09. \$58,928 (F&A \$12,160).
- \$68,564. DOD. Banner #048696. Chihuahuan Desert monitoring plan phase II. Kristine Johnson, PI. 04/06-03/07. \$6,922 (F&A \$903).
- \$50,000. DOD. Banner #048558. Interdependence of pinyon pines and pinyon jays. Kristine Johnson, PI. 01/05-05/07 \$2,766 (F&A \$571).
- \$50,000. DOD. Banner #048793. Pinyon jays and pinyon pines at White Sands Missile Range. Kristine Johnson, PI. 02/07-12/08 \$42,386 (F&A \$8,746).
- \$55,000. US FWS. Banner #048786. Habitat analysis for NM DoD species at risk. Kristine Johnson, PI. 11/06-12/07 \$55,000 (F&A \$11,349).
- \$120,436. Bureau of Reclamation. Banner #048710. Water requirements for SW willow flycatcher habitat and nesting at the Pueblo of Isleta. Kristine Johnson, PI. 05/06-04/09. \$36,853 (F&A \$7,605).
- \$85,639. NMGF. Banner #048622. Database and GIS habitat analysis: lesser prairie chicken and sand dune lizard. Kristine Johnson, PI. 05/05-06/07. \$16,819 (F&A \$2,803).
- \$54,452. T.E. Parkinson Ranch. Banner #048840. Wildlife Habitat Improvement of the Parkinson Ranch. Kristine Johnson, PI. 07/07-12/09. \$7,226 (F&A \$0).
- \$17,235. NM Game & Fish Dept. Banner #048810. Gunnison's Prairie Dog Habitat Model and Survey. Kristine Johnson, PI. 05/07-08/07. \$17,235 (F&A \$2,873).

- \$10,000. BLM. Banner #048894. Biological Resource Data Collection and Storage. Rayo McCollough, PI. 09/07-09/08. \$0 (F&A \$0).
- \$238,477. NPS. Banner #048459. Bandelier National Monument vegetation mapping project. Esteban Muldavin, PI. 09/02-09/07. \$29,469 (F&A \$3,844).
- \$224,097. NPS. Banner #048546. Vegetation map for El Malpais National Monument. Esteban Muldavin, PI. 08/04-09/08. \$61,534 (F&A \$8,026).
- \$323,547. NPS. Banner #048637. Guadalupe Mtns. National Park vegetation map and classification. Esteban Muldavin, PI, 07/05-06/10. \$82,810 (F&A \$10,801).
- \$152,363. NPS. Banner #048721. Vegetation map for Petroglyphs Nat'l Monument. Esteban Muldavin, PI. 06/06-03/10. \$24,601 (F&A \$3,209).
- \$40,400. NPS. Banner #048628. Carlsbad Caverns National Park vegetation map accuracy assessment. Esteban Muldavin. PI. 07/05-12/08, \$7,966 (F&A \$1,041).
- \$8,008. NPS. Banner #048646. Photo map and initiation of a vegetation map for Ft. Davis National Historic Site. Esteban Muldavin, PI. 09/05-12/07. \$5,537 (F&A \$722).
- \$20,000. NPS. Banner #048831. Vegetation mapping accuracy assessment Bandelier and Salinas Mission. Esteban Muldavin, PI. 07/07-12/08. \$17,591 (F&A \$2,620).
- \$16,000. NPS. Banner #048842. Map tamarisk park-wide White Sands Nat'l. Monument. Esteban Muldavin, PI, 09/07-01/10, \$0 (F&A \$0).
- \$69,928. NPS. Banner #048847. Monitoring long-term vegetation dynamics in Big Bend NP. Esteban Muldavin, PI. 09/07-12/09. \$13,929 F&A \$2,074).
- \$65,472. NPS. Banner #048819. Vegetation mapping at Capulin Volcano NM & Pecos NHP. Esteban Muldavin, PI. 05/07-04/09. \$0 (F&A \$0).
- \$94,674. NPS. Banner #048697. Capulin Volcano NM & Pecos NHP vegetation mapping. Esteban Muldavin, PI. 04/06-12/08. \$37,769 (F&A \$4,926).
- \$58,016. NPS. Banner #048598. Vegetation classification Pecos National Historic Park, Capulin Volcano Nat'l. Monument, NM & Ft. Union Nat'l. Monument. Esteban Muldavin, PI. 06/05-12/06. \$195 (F&A \$25).
- \$10,000. NPS. Banner #048771. Vegetation map for the Southern Colorado Plateau Network: Salinas Pueblo Missions. Esteban Muldavin, PI. 08/03-12/07. \$484 (F&A \$63).
- \$31,500. NPS. Banner #048623. White Sands Nat'l. Monument vegetation map accuracy assessment. Esteban Muldavin, PI. 08/05-3/09. \$14,988 (F&A \$1,955).

- \$95,000. Army Corps of Engrs. Banner #048613. Vegetation sampling middle Rio Grande flood control project. Esteban Muldavin, PI. 07/05-09/07. \$25,492 (F&A \$5,111).
- \$280,000. NM Army National Guard. Banner #048624. Biological resources management program. Esteban Muldavin, PI. 08/05-06/07. \$110,397 (F&A \$22,780).
- \$131,547. US Fish & Wildlife Service. Banner #048660. River bar biodiversity studies, 08-08. Esteban Muldavin, PI. 08/03-08/08. \$20,323 (F&A \$4,168).
- \$116,700. US Fish & Wildlife Service. Banner #048783. River bar vegetation mapping, 03-04. Esteban Muldavin, PI. 09/03-08/08. \$10,779 (F&A \$2,224).
- \$13,250. US Fish & Wildlife Service. Banner #048893. Middle Rio Grande bosque initiative web page database and GIS. Esteban Muldavin, PI. 09/07-09/10. \$0 (F&A \$0).
- \$60,000. BLM. Banner #048735. Santa Fe River vegetation analysis. Esteban Muldavin, PI. 08/03-12/06. \$1,596 (F&A \$329).
- \$15,000. BLM. Banner #048895. Santa Fe River aquatic macroinvertebrate sampling. Esteban Muldavin, PI. 09/07-12/08. \$0 (F&A \$0).
- \$10,000. BLM. Banner #048711. Rio Grande vegetation monitoring program. Esteban Muldavin, PI. 05/06-12/06. \$4,968 (F&A \$1,025).
- \$10,000. BOR. Banner #048855. Albuquerque overbank project monitoring. Esteban Muldavin, PI. 09/07-09/11. \$8,391 (F&A \$1,250).
- \$19,358. NM Energy, Minerals & Natural Resources Dept.. Banner #048776. Sacramento prickly poppy research. Phil Tonne, PI. 09/06-06/07. \$19,209 (F&A \$3,202).
- \$5336. NM Energy, Minerals & Natural Resources Dept.. Banner #048899. Pediomelum, Ipomopsis, and Argemone Research. Phil Tonne, PI. 08/07-06/08. \$0 (F&A \$0).
- \$5336. NM Energy, Minerals & Natural Resources Dept.. Banner #048900. Pediomelum, Ipomopsis, and Argemone Research. Phil Tonne. PI. 08/07-06/08. \$0 (F&A \$0).
- \$9328. NM Energy, Minerals & Natural Resources Dept.. Banner #048901. Pediomelum, Ipomopsis, and Argemone Research. Phil Tonne, PI. 08/07-06/08. \$0 (F&A \$0).

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes None

B. Journal Articles

Muldavin, E.H., D.I. Moore, S.L. Collins, K.R. Wetherill, and D.C. Lightfoot. (2007). Aboveground net primary production dynamics in a northern Chihuahuan Desert ecosystem. Oecologia Published online: 30 October 2007 04/01/2007.

Muldavin, E. H., G. Harper, P. Neville, and S. Wood (In press). A Vegetation classification of the Sierra del Carmen, U.S.A. and Mexico. Proceeding of the Fifth Annual Chihuahuan Desert Symposium. Chihuahuan Desert Research Institute, Alpine TX.

C. Web-Based

D. Technical Reports

Faber-Langendoen, D, Greg Kudray, Carl Nordman, Lesley Sneddon, Linda Vance, Sue Gawler, Carmen Josse, Gwen Kittel, Shannon Menard, Elizabeth Byers, Pat Comer, Esteban Muldavin, Joe Rocchio, Mike Schafale. 2007. A rapid assessment method for assessing the ecological integrity of wetlands. Final Report to U.S. Environmental Protection Agency. NatureServe, Arlington, VA.

Johnson, K. and J. Smith. 2007. Relationship of Pinyon Jays and pinyon pines at North Oscura Peak, White Sands Missile Range, 2006 draft report. NHNM Publication No. 07-GTR-311. Natural Heritage New Mexico, Museum of Southwestern Biology, University of New Mexico. 14p.

Johnson, K., P. Tonne, J. Smith, T. Neville. 2007. DoD Legacy Species at Risk (SAR) New Mexico GIS and species accounts project. Natural Heritage New Mexico Publ. No. 07-GTRcd-321. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM.

Milford, E., E. Muldavin, and A. Browder. 2007. Vegetation sampling for the Middle Rio Grande: Resampling the 1984 Hink and Ohmart transects, Year II. Natural Heritage New Mexico Publ. No. 07-GTR-312. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 19 p. + CD.

Milford, E., E. Muldavin, Y. Chauvin, and A. Browder. 2007. Santa Fe River Riparian Vegetation Monitoring. Report 2006. Natural Heritage New Mexico Publ. No. 07-GTR-317. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 19 p.

Milford, E., E. Muldavin, and A. Browder. 2007. Vegetation Sampling of USACE Forest Restoration Sites in Corrales, Year I. Natural Heritage New Mexico Publ. No. 07-GTR-319. Natural Heritage New Mexico. University of New Mexico. Albuquerque. NM. 13 p. + CD.

Milford, E., K. Mann, and E. Muldavin. 2007. River bar biodiversity studies: Aerial insects, vegetation structure, and bird habitat. Natural Heritage New Mexico Publ. No. 07-GTR-323. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 24 p. + appendices.

Milford, E., T. Neville, and E. Muldavin. 2007. Integrated management tools for monitoring invasive species removal, Orilla Verde Recreation Area. Natural Heritage New Mexico Publ.

No.07-GTR-314. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 19 p. + GIS.

Neville, T. and K. Johnson. 2007. Gunnison's prairie dog predictive range model and survey site selection for New Mexico. Natural Heritage New Mexico Publ. No. 07-GTR-320. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 13 p.

Neville, P., T. Neville, and K. Johnson. 2007. Potential sand dune lizard map of a portion of habitat in Southeastern New Mexico. Natural Heritage New Mexico Publ. No. 07-GTR-318. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 71 p.

Romme, W., C. Allen, J. Bailey, W. Baker, B. Bestelmeyer, P. Brown, K. Eisenhart, L. Floyd Hanna, D. Huffman, B. Jacobs, R. Miller, E. Muldavin, T. Swetnam, R. Tausch, and P. Weisberg. 2007. Historical and modern disturbance regimes of piñon juniper vegetation in the western U.S. Report by the Nature Conservancy, Fire Learning Network. 13 p.

Smith, J. and K. Johnson. 2007. Water requirements for Southwestern Willow Flycatcher habitat and nesting at the Pueblo of Isleta. Natural Heritage New Mexico Publ. No. 07-GTR-315. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 30 p.

Tonne, P. 2007 Results of Sacramento prickly poppy surveys and monitoring: Alamo, Caballero, Dog, and Dry Canyons. Natural Heritage New Mexico Publ. No. 07-GTR-316. Natural Heritage New Mexico, University of New Mexico, Albuquerque, NM. 21 p.

Tonne, P. and J. McIntyre. 2007. Habitat surveys of Elk Springs Estates for Sacramento Mountains Checkerspot Butterfly (*Euphydryas anicia cloudcroftii*). Natural Heritage New Mexico Publ. No. 07-GTR-324. 17 p.

E. Theses/Dissertations Completed

F. Work In Progress

William H. Romme, Craig D. Allen, John D. Bailey, William L. Baker, Brandon T. Bestelmeyer, Peter M. Brown, Karen S. Eisenhart, Lisa Floyd Hanna, David W. Huffman, Brian F. Jacobs, Richard F. Miller, Esteban H. Muldavin, Thomas W. Swetnam, Robin J. Tausch, Peter J. Weisberg. Historical and Modern Disturbance Regimes, Stand Structures, and Landscape Dynamics in Piñon--Juniper Vegetation of the Western U.S. Submitted Ecological Applications 9/11/2007.

Yanoff, S. and E. Muldavin. (submitted). Grassland-shrubland transformation and grazing: a century-scale view of a northern Chihuahuan Desert grassland. J. of Arid Environments 11/29/2007.

G. Publications/Reports Based on MSB Specimens/Data by Outside Researchers

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars

B. Contributed Talks/Posters

- C. Attendance at Professional Meetings (List division personnel alphabetically then list meetings attended under each)
- R. McCollough: NatureServe Conservation Conference 2007
- E. Muldavin: Ecological Society of America- National Vegetation Classification Panel; New Mexico Forest Restoration Principles Subcommittee on pinyon-juniper woodland restoration; National NatureServe Team for Ecological Integrity Assessment;

Teri Neville: NatureServe Conservation Conference 2007

D. Service as Editor or on Editorial Board of a Journal None

E. Service as Officer of Professional Society/Organization None

OTHER PROFESSIONAL ACTIVITIES

- A. Presentation to General Audience in a Scholarly Capacity
- P. Tonne: Poster presentation at the Rio Grande Botanic Garden for Earth Day
- B. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.
- C. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc.
- K. Johnson: Gray Vireo State Working Group
- E. Muldavin: Collaborative Forest Restoration Institute Federal Advisory Panel;
- P. Tonne: Rare Plant Technical Council
- E. Milford: New Mexico Wetlands Roundtable

D. Journal Referee

- K. Johnson: Ethology; Journal of Field Ornithology
- E. Muldavin: J. or Arid Environments; Rangeland Ecology & Management

E. Hosting Professional Colloquia and Groups

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc.

B. Public Service

- K. Johnson: Intel International Science Fair Judge 2007 -
- P. Tonne: Docent training in rare plant conservation, Rio Grande Botanic Garden, Albuquerque, NM.

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC.

DONATIONS AND GIFTS RECEIVED

CURRENT STAFF

A. Faculty/Staff

Paul Arbetan, Research Assistant Professor
Yvonne Chauvin, Sr. Research Tech/Life Sciences
Charles Jackson, Research Tech/Life Sciences
Kristine Johnson, Research Associate Professor
Rebecca Keeshen, Office Administrator
Amanda Kennedy, Sr. Research Tech/Life Sciences
Rayo McCollough, Database Administrator
Elizabeth Milford, Research Scientist II
Esteban Muldavin, Research Associate Professor
Teri Neville, GIS Analyst
Sandy Sacher, Research Tech/Life Sciences
Jacqueline Smith, Sr. Research Tech/Life Sciences
Phil Tonne, Sr. Research Scientist I

B. Graduate students

Brandon Lee Drake, M.S. William Dunn, Ph.D. Kevin Wesley, M.F.A.

C. Undergraduate Student Workers and Volunteers

Nicholas Baker
Chelsie Claus
Mitchell Dunaway
Eric Lindahl
Vy Nguyen
Kari Paustian
Jamie Ruiz
Sandy Sacher
Keith Woodell
Mary Alice Root, Volunteer

MUSEUM ASSOCIATES

None

U.S. GEOLOGICAL SURVEY

DIVISION HIGHLIGHTS

Several noteworthy actions occurred in 2007 relating to collections of the USGS. The Memorandum of Understanding (MOU) between USGS and UNM was renewed and signed in July; this agreement continues our long-standing cooperation on museum matters with the University of New Mexico. Additionally, plans for integration of specimens in three divisions, amphibians and reptiles, fishes, and mammals, were discussed with the respective divisions. Plans were revised as needed and approved by the end of the year. The plans included an estimated budget for supplies and labor and a list of tasks and a timeline to accomplish integration of the USGS and MSB specimens and data for each division. The development and approval of these plans is a truly significant accomplishment for both parties. In order to prepare for integration of the USGS and MSB amphibian and reptile collections, which began in earnest in November, the USGS and MSB collection managers met a minimum of 8 times beginning in October. USGS also catalogued 2,906 reptiles that were part of a large significant collection of reptiles from the Nevada Test Site dating from the 1960s.

Within the Division of Mammals, new tags bearing the MSB acronym and number were attached to several thousand USGS mammal specimens, as part of integration and recataloguing efforts. The mammal collection was reaccredited by the American Society of Mammalogists during the annual meeting in Albuquerque in June, thanks to efforts spearheaded by USGS and MSB curators and collection managers.

During 2007 USGS was successful in acquiring funds to hire two full-time museum technicians to help with integration efforts and general museum activities. The USGS Fort Collins Science Center provided funds to hire a museum technician beginning in July 2007, and in November, a Department of Interior internship allowed us to hire a full-time museum intern. Funding for museum supplies came from USGS and DOI.

Ernie Valdez, a USGS wildlife biologist, continued field work on bats at Mesa Verde National Park, together with biologists from the USGS Fort Collins Science Center (FORT), and Colorado State University. The emphasis of this study was to increase information on bat species occurrence and provide better understanding of the bat community utilizing the old-growth piñon-juniper woodlands, other coniferous stands, and rocks and crevices in cliffs as roosting habitat, by using radio-tracking techniques. Ernie also continued his studies on ectoparasites, food habits, and morphology of bats of the region and submitted several chapters from his Dissertation for publication. Ernie is co-chair of the New Mexico Bat Working Group and wrote multiple species accounts for the group's Bat Conservation Plan.

Janet Ruth, a USGS Research Ecologist/Ornithologist, edited the proceedings from a USGS-USFWS interagency workshop on applying radar technology to natural resources issues, which was published as a USGS Open-File Report. The third year of a three-year project using NEXRAD radar data to document bird migration patterns and stopover habitat in the Southwest was initiated in collaboration with a colleague at the University of Southern Mississippi. Ruth co-authored a manuscript for a volume of "Studies in Avian Biology" on US-Mexico

borderlands issues based on data from this project. She also authored a second manuscript for the same volume from her project surveying the breeding distribution and abundance of Arizona Grasshopper Sparrow (Ammodramus savannarum ammolegus). She worked with two colleagues from USFWS and University of Texas Pan American as the Associate Editors for this volume. As the official USGS Coordinator for Partners in Flight (PIF), Ruth attended national meetings of PIF's Implementation and Science committees, and received a national PIF Leadership Award.

TABLE OF COLLECTION USE

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3,056	6	1	See MSB	35	See MSB

COURSES USING THE COLLECTIONS

See MSB Divisions.

COURSES TAUGHT BY MSB/USGS PERSONNEL A. Faculty/Collection Managers None.

B. Graduate Students

A. England

BIOL 202 – Genetics Lab, Spring, 50 students BIOL 324 – Natural History of the Southwest Lab, Fall, 14 students BIOL 112L – Biology for Non-majors Lab, Fall, 20 students.

COLLECTION MANAGEMENT

In 2007 USGS accessioned 3 collections including 12 amphibians and reptiles and 23 mammals from the southwestern U.S. Museum staff catalogued 3,056 specimens, most of which were reptiles that were collected from the Nevada Test Site in the 1960s. USGS evaluated approximately 12 loan requests for mammal vouchers and 7 for mammal tissues; processed 6 loans (1 herp, 2 fish, and 3 mammal) and 1 loan return (mammal). Ramotnik responded to 35 information requests: 13 were specimen-related and 22 were technical. Requests ranged from providing sources for museum supplies such as specimen boxes, skin tags, tape, and archival paper; to providing technical assistance in dealing with the storage of polar bear pelts, properly handling greasy swan skins, and dealing with recrystallizing naphthalene on mammal skins. Online requests for bird and mammal specimen data are reported separately in those divisions' reports. Ramotnik assisted 12 visitors with use of the collection, and conducted 4 collection tours (UNM graduate student orientation; Southwestern Indian Polytechnic Institute class; DOI

museum staff; and NPS regional curators). Visitor use is also tracked by the Divisions of Birds and Mammals and each division reports this information in their respective divisional report.

During the second half of the year, efforts to ramp up integration activities were greatly enhanced by the addition of two full-time museum technicians, Adrienne Raniszewski and Sarah Manor. Under the supervision of Ramotnik, they spent considerable time in the Division of Amphibians and Reptiles working on a variety of integration activities of UNM and USGS amphibian and reptile specimens that included reviewing the draft integration plan, conducting jar inventories, designing specimen labels and jar labels, and learning the intricacies of the thermal printer. Initial costs of integration (museum supplies and labor) came from Patty Stevens, Trust Species and Habitats Program in USGS-FORT in Ft. Collins, CO; and through requests by Ramotnik to the USGS Museum Property Program in Reston, VA and the DOI Museum Property Program, Washington, DC.

Ramotnik completed draft integration plans for amphibians and reptiles, fishes, and mammals, and attended subsequent meetings with all three divisions that resulted in finalizing and approving the plans. She also met at least eight times with the collection manager for the Division of Amphibians and Reptiles between October and the end of December to discuss protocol and procedure. In addition she attended numerous other museum meetings (including the MSB retreat) throughout the year that covered various topics such as fish integration, wet collection space, mammal collection arrangement and integration, mammal vial labels and online database procedures, bugroom design, and ASM accreditation. Ramotnik reviewed the Divisions of Birds and Mammals Biosafety SOP and a wet collection expansion plan; responded to NPS on annual museum property inventories (~15); provided updated museum records to USGS Museum Property Program; and updated the USGS page on the MSB website.

Curator Emeritus Bogan participated in meetings of the MSB Executive Committee, reviewed numerous drafts of integration plans and the MOU, attended meetings to assist in getting the plans and MOU approved, and completed curation of specimens of *Myotis*, in particular, and vespertilionid bats, in general, in the main mammal collection.

AWARDS, GRANTS, AND CONTRACTS

\$1,000. Native Plant Society of New Mexico, 2007 Grants. A.E. England. P.I.

\$3,000. UNM, Department of Biology, Grove Summer Scholarship, Summer 2007. A.E. England. P.I.

\$2,500. Bat Conservation International, Student Research Scholarship, May 2007. A.E. England. P.I.

\$1,500. UNM, Department of Biology and Museum of Southwestern Biology, Joseph A. Gaudin Scholarship, Spring 2007. A.E. England. P.I

\$25,500. USGS, Fort Collins Science Center. Integration of USGS vertebrate collections. C.A. Ramotnik, PI. 7/07-4/08 (\$12,500).

- \$3,000. USGS Museum Property Program, Reston, VA. FY08 funds for museum supplies. C.A. Ramotnik, P.I. (\$3,000).
- \$2,534. Department of Interior Museum Property Program, Washington, DC. FY08 funds for museum supplies. C.A. Ramotnik, P.I (\$2,534).
- \$10,000. Department of Interior Museum Property Program, Washington, DC. Funds for museum internship. C.A. Ramotnik, P.I. 11/07-6/08 (\$1,440).
- \$20,000. USGS Headquarters, Reston, VA. Funds for radar workshop and subsequent publications and activities of the collaborative. J.M. Ruth, P.I. 02/06-09/09 (\$10,000)
- \$12,000. Sonoran Joint Venture. # 201814N766. Bird migration patterns in the arid Southwest, J.M. Ruth, PI [R. Diehl (USM) Co-P.I.]. 03/05-02/08 (\$12,000).
- \$10,000. Lannan Foundation. Bird migration patterns in the arid Southwest, J.M. Ruth, PI (R. Diehl (USM) Co-P.I.). 03/05-02/08 (\$3,000).
- \$15,000. U.S. Fish and Wildlife Service, Region 2, Migratory Bird Office. #201814N766. Bird migration patterns in the arid Southwest, J.M. Ruth, PI (R. Diehl (USM) Co-P.I.). 03/05-02/08 (\$9,100).
- \$89,000. USGS Science Support Program. Bird migration patterns in the arid Southwest, J.M. Ruth, PI (R. Diehl (USM) Co-P.I.). 03/05-02/08 (\$15,200).

PUBLICATIONS

A. Books, Book Chapters, Edited Volumes None.

B. Journal Articles

Frey, J.K., M.A. Bogan, and T.L. Yates. 2007. Mountaintop island age determines species richness of boreal mammals in the American Southwest. Ecography 30:241-240.

C. Web-Based

Blancher, P.J., K.V. Rosenberg, A.O. Panjabi, B. Altman, J. Bart, C.J. Beardmore, G.S. Butcher, D. Demarest, R. Dettmers, E.H. Dunn, W. Easton, W.C. Hunter, E.E. Iñigo-Elias, D.N. Pashley, C.J. Ralph, T.D. Rich, C.M. Rustay, J.M. Ruth, and T.C. Will. 2007. Guide to the Partners in Flight Population Estimates Database. Version: North American Landbird Conservation Plan 2004. Partners in Flight Technical Series No. 5. http://www.partnersinflight.org/pubs/ts/

Bogan, M. A., K. Geluso, S. Haymond, and E. W. Valdez. 2007. Mammal inventories for eight National Parks in the Southern Colorado Plateau Network. Natural Resource Technical Report NPS/SCPN/NRTR-2007/054. National Park Service, Ft. Collins, CO. http://science.nature.nps.gov/im/units/scpn/Documents/8Park_Mammal_Final_2007.pdf

D. Technical Reports

Bogan, M.A., T.R. Mollhagen, and K. Geluso. 2007 [2006]. Inventory for bats (Chiroptera) of Canyonlands National Park. Final Report submitted to National Park Service, Moab, UT. 35 pp.

Cryan, P.M., C. Ramotnik, and M. Bogan. 2007 [2006]. Natural history collections: a scientific treasure trove. Fact Sheet 2006-3079. Fort Collins, CO: U.S. Geological Survey, Fort Collins Science Center. 2 pp.

Felix, R., R. Diehl, and J. M. Ruth. 2007. Bird migration patterns in the arid Southwest: Year II. Administrative report. USGS FORT, Arid Lands Field Station, Albuquerque, NM. 17 pp.

Mollhagen, T. R., and M. A. Bogan. 2007. Inventory for Certain Small Mammals (Bats and Rodents) in San Juan County, Utah. Unpublished final report to Bureau of Land Management, Monticello, Utah. 26 pp.

O'Shea, T. J., P.M. Cryan, L.E. Ellison, and E.W. Valdez. 2007. Bat use of coniferous forests at Mesa Verde National Park: Year 1 Progress Report. Administrative Report submitted to USGS Natural Resources Preservation Program and National Park Service. 168 pp.

Ruth, J.M. 2007. Applying radar technology to migratory bird conservation and management: strengthening and expanding a collaborative. Open-File Report 2007-1361. U.S. Geological Survey. 175 pp.

E. Theses/Dissertations Completed

Weise, C.D. 2007. Community structure, vertical stratification and seasonal patterns of neotropical bats. (Bogan, co-advisor)

F. Work In Progress

Benson, L.V., H.E. Taylor, K.A. Peterson, B.D. Shattuck, C.A. Ramotnik, and J.R. Stein. Development and evaluation of geochemical methods for the sourcing of archaeological maize. Journal of Archaeological Science.

Felix Jr., R. K. R. H. Diehl, and J. M. Ruth. Seasonal passerine migratory movements over the arid Southwest. *In J. M. Ruth*, T. Brush, and D.J. Krueper (editors). Birds of the US-Mexico Borderlands: distribution, ecology, and conservation. Studies in Avian Biology Volume No. 37.

Fitzgerald, J. A., W. E. Thogmartin, R. Dettmers, T. Jones, C. Rustay, J. M. Ruth, F. R. Thompson III, and T. C. Will. Application of models to conservation planning for terrestrial birds in North America, Chapter 22 *In J. J. Millspaugh* and F. R. Thompson III (editors) Models for planning wildlife conservation in large landscapes. Elsevier Press.

Pyle, P., S.L. Jones, and J.M. Ruth. Molt and aging criteria for four North American grassland passerines. U.S. Department of Interior, Fish and Wildlife Service, Biological Technical Publication. Washington, D.C.

Ruth, J.M. Radar technology--a tool for understanding migratory "aerofauna". USGS website.

Ruth, J.M., T. Brush, and D.J. Krueper (editors). Birds of the US-Mexico Borderlands: distribution, ecology, and conservation. Studies in Avian Biology Volume No. 37.

Ruth, J.M. Distribution and abundance of breeding Arizona Grasshopper Sparrow (*Ammodramus savannarum ammolegus*) in the Southwestern United States: Past, Present, and Future. *In J. M. Ruth*, T. Brush, and D.J. Krueper (editors) Birds of the US-Mexico Borderlands: distribution, ecology, and conservation. Studies in Avian Biology Volume No. 37.

Ruth, J.M., T. Brush, and D.J. Krueper. Preface. *In J.M.* Ruth, T. Brush, and D.J. Krueper (editors) Birds of the US-Mexico Borderlands: distribution, ecology, and conservation. Studies in Avian Biology Volume No. 37.

Smith, F.A., D. Crawford, L. Harding, H.M. Lease, I.W. Murray, A. Raniszewski, and K.M. Youberg. In press. A tale of two species: evolution, extirpation and range expansion during the late Quaternary in an extreme environment. Global Ecology and Biogeography.

Valdez, E.W. and P.M. Cryan. In review. Food habits of the hoary bat (*Lasiurus cinereus*) in New Mexico during spring migration. The Southwestern Naturalist.

Valdez, E.V. and K. Geluso. In review. Late seasonal activity and diet of the evening bat (*Nycticeius humeralis*) in Nebraska. Western North American Naturalist.

Valdez, E.W. Species account: *Myotis evotis*. New Mexico Bat Conservation Plan. New Mexico Bat Working Group Website.

Valdez, E.W. Species account: *Myotis volans*. New Mexico Bat Conservation Plan. New Mexico Bat Working Group Website.

Valdez, E.W. Species account: *Myotis occultus*. New Mexico Bat Conservation Plan. New Mexico Bat Working Group Website.

G. Publication's/Reports Based on MSB Specimens/Data by Outside Researchers See MSB results.

ACTIVITIES IN LEARNED SOCIETIES

A. Invited/Plenary Talks and/or Seminars None.

B. Contributed Talks/Posters

England, A.E. Nectar-feeding bat visitation to blooming *Agave palmeri* in New Mexico. Poster presented at 37th Meeting of the American Society of Mammalogists, Albuquerque, NM, June.

England, A.E. 2007. Pollination Ecology of *Agave palmeri* in New Mexico. Oral presentation, Guild of Rocky Mountain Evolutionary and Ecological Biologists, Abiquiu, NM.

Ramotnik, C.A. Effect of wildfire on abundance, detection probability, and arthropod prey base of Sacramento Mountain salamanders (*Aneides hardii*). SW Partners in Amphibians and Reptile Conservation, First Annual Meeting, Albuquerque, NM, May-June 2007.

Ruth, J. M. Abundance and distribution of Arizona Grasshopper Sparrow (*Ammodramus savannarum ammolegus*): current and historical surveys. New Mexico Ornithological Society Annual Meeting, Carlsbad, NM, May 2007.

Ruth, J. M., C. E. Gordon, and T. R. Stanley. Wintering bird-habitat associations and responses to grazing in Arizona semidesert grasslands. American Ornithologists' Union Annual Meeting, Laramie, WY, August 2007 (presented by J.M. Ruth).

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewski, and K.M. Youberg. A tale of two species: extirpation, range expansion and evolution in an extreme environment during the late Quaternary. 37th Meeting of the American Society of Mammalogists, Albuquerque, NM, June 2007 (Presented by F.A. Smith).

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewski, and K.M. Youberg. A tale of two species: extirpation, range expansion and evolution in an extreme environment during the late Quaternary. Ecological Society of America, San Jose, CA, August 2007 (Presented by F.A. Smith).

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewski, and K.M. Youberg. A tale of two species: extirpation, range expansion and evolution in an extreme environment during the late Quaternary. Museum of Vertebrate Zoology Colloquium in Evolutionary Biology, University of California Berkeley, Berkeley, CA, November 2007 (Presented by F.A. Smith).

C. Attendance at Professional Meeting

Bogan, M.A. Annual meeting of the American Society of Mammalogists, Albuquerque, NM, June.

Ramotnik, C.A. Annual meeting of the American Society of Mammalogists, Albuquerque, NM, June.

Ruth, J.M. Annual meetings of the New Mexico Ornithological Society and the American Ornithologists' Union.

Valdez, E.W. Annual meeting of the American Society of Mammalogists, Albuquerque, NM, June.

D. Service as Editor or on Editorial Board of a Journal

Ramotnik, C.A. Associate Editor, Collection Forum (Society for the Preservation of Natural History Collections).

Ruth, J.M., T. Brush, and D.J. Krueper. Associate Editors. Birds of the US-Mexico Borderlands: distribution, ecology, and conservation. Studies in Avian Biology, Volume No. 37.

E. Service as Officer of Professional Society/Organization

Ramotnik, C.A. Society for the Preservation of Natural History Collections (SPNHC): Conservation Committee (Chair, Resources Subcommittee); member of Membership and Publication committees.

Ruth, J.M. New Mexico Ornithological Society, Board Member.

Valdez, E.W. Co-Chair of New Mexico Bat working Group.

OTHER PROFESSIONAL ACTIVITIES

A. Colloquium Presentations

None.

B. Presentation to General Audience in a Scholarly Capacity

C. Presentations in a Scholarly Capacity at Hearings, Workshops, Legislative Committees, etc.

None.

D. Scholarly Service as a Member of a Local/State/Regional/National Committee, Panel, etc.

Ramotnik, C.A. Member, New Mexico Endemic Salamander Team.

Ruth, J.M. USGS Partners in Flight (PIF) Co-Coordinator; Chair of PIF National Research Working Group; Member of PIF Science Committee. Steering Committee Member, New Mexico Avian Conservation Partners.

E. Journal Referee

Bogan, M.A. Journal of Mammalogy (5), Western North American Naturalist (3), Southwestern Naturalist (6).

Ruth, J.M. Journal of Arid Environments (1), Arizona Field Ornithologists' web journal (1), Restoration'Ecology (1).

Valdez, E.W. Western North American Naturalist (2), Northwestern Naturalist (1).

SERVICE

A. Symposia, Workshops, Conferences etc. Sponsored, Organized, Held, etc.

Bogan, M.A. Member of local committee for American Society of Mammalogists, Albuquerque, NM, June.

Ramotnik, C.A. Member of local committee for American Society of Mammalogists, Albuquerque, NM, June.

Ruth, J.M. Participated on the Planning Team for the 4th PIF International Conference to be held in McAllen, TX in February 2008.

Valdez, E.W. Chaired session at annual meeting of the American Society of Mammalogists, Albuquerque, NM, June.

Valdez, E.W. Member of local committee for American Society of Mammalogists, Albuquerque, NM, June.

B. Public Service

Ramotnik, C.A. Participated in the Albuquerque Christmas Bird Count.

Ruth, J.M. Participated in the Albuquerque Christmas Bird Count, Four Points Christmas Bird Count (Sevilleta NWR), Peloncillos Christmas Bird Count, and the Portal (AZ) Christmas Bird Count. Annually conducts/participates in two Breeding Bird Survey routes – Counselors, NM and Fence Lake, NM.

ADVANCED STUDY, HONORS, AWARDS, FELLOWSHIPS, ETC.

Bogan, M.A. Served on committee as Faculty Co-Advisor for two doctoral candidates in the Department of Biology, UNM.

Ruth, J.M. Received a National Partners in Flight Leadership Award.

DONATIONS AND GIFTS RECEIVED

None.

CURRENT STAFF

A. Faculty/Staff

Michael A. Bogan-Curator Emeritus

Cindy A. Ramotnik-Museum Specialist (Zoology)

Adrienne Raniszewski, contractor with Arctic Slope Research Corp., Ft. Collins, CO

Janet M. Ruth—Research Ecologist (Ornithology)

Ernest W. Valdez-Wildlife Biologist

B. Graduate students

Angela England—Wildlife Biologist, Ph.D. candidate Christa D. Weise—Wildlife Biologist, Ph.D. candidate

C. Student Workers and Volunteers

Sarah Manor, intern with DOI National Conservation Education Program

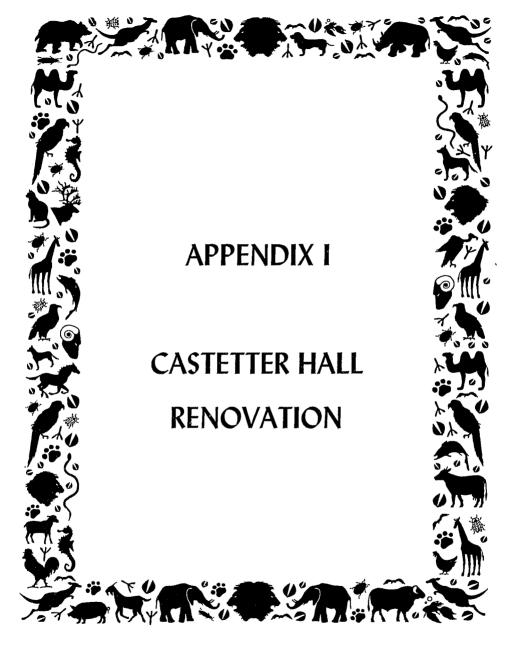
MUSEUM ASSOCIATES

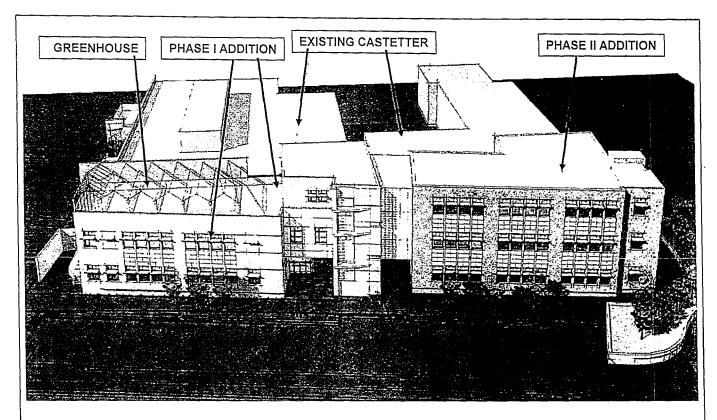
A. Curatorial Associates

B. Research Associates

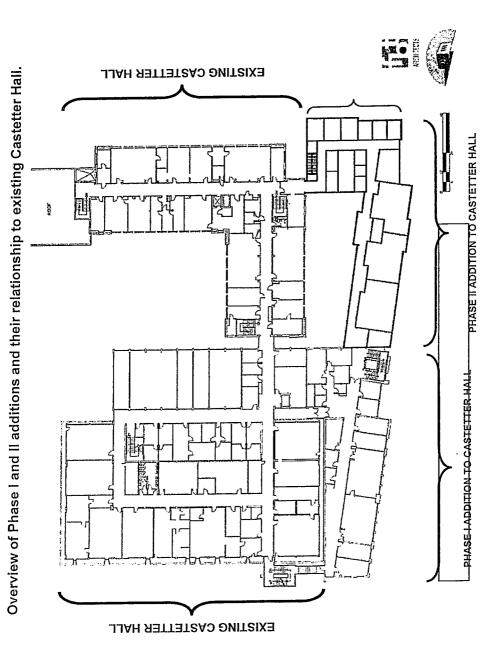
Paul Cryan, Ph.D., USGS research biologist, Ft. Collins, CO. Robert B. Finley, Ph.D., emeritus curator, Boulder, CO.

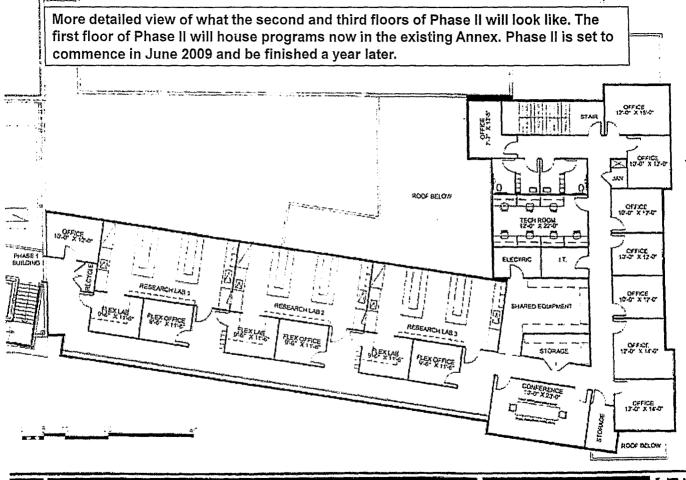
Tony R. Mollhagen, Ph.D., emeritus professor, Texas Tech Univ., Lubbock, TX. Tom O'Shea, Ph.D., USGS research wildlife biologist, Ft. Collins, CO. Ernest Valdez, Ph.D., USGS wildlife biologist, Albuquerque, NM.

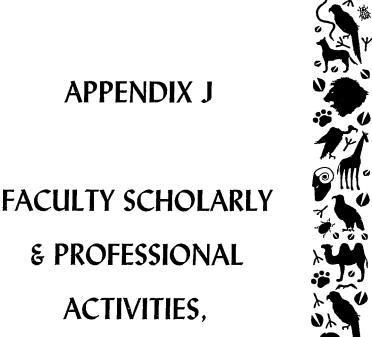




Exterior view of Phase I and Proposed Phase II additions to Castetter Hall. Phase I is under construction and scheduled for completion in early 2009. Phase II is set to commence in mid-2009 and be finished a year later. The exterior representations shown here will be different from the final version, as Phase II is still being planned.







CY 2007

UNM DEPARTMENT OF BIOLOGY FACULTY SCHOLARLY ACTIVITIES & PUBLICATIONS

CY 2007

TEACHING.

A. Graduate Education.

1. Masters degrees awarded.

CRIPPS, R.M.

Lynda Helander, "The Role of Tailup in Cardiac Development in Drosophila," Summer.

LOKER, E.S.

Jonathan J. Olp, Plan II (non-thesis), Summer.

MARSHALL, D.L.

Jennifer Hollis, Plan II (non-thesis), August.

MILLER, K.B.

Danielle Shuryn, "Monitoring and Assessment of Sedimentation in Stream Channels of New Mexico," Water Resources Program, University College, UNM, Spring.

MILNE, B.T.

David A. Dean, "Extremum Principle of Maximum Shannon Diversity: How Energy and Water Partition Richness among Four Taxa of North American Vertebrates," Summer.

2. Doctors degrees awarded.

BROWN, J.H.

Kristina J. Anderson, "Rates of Change in Ecosystem and Community Properties During Succession," Spring.

COLLINS, S.L.

Selene Baez: "Shrub Invasion and Community Stability in Chihuahuan Desert Plant Communities," May.

DAHM, C.N.

Chelsea L. Crenshaw, "Press and Pulse Nutrient Dynamics in Stream Ecosystems," Summer.

HANSON, D.T.

Hugo A. Magaña, "Algae as the Base Supporting Food Webs in the Middle Rio Grande, N.M.," Summer.

KODRIC-BROWN, A.

Pamela Keil: "Decision Making During Fights: Exploring Contest Behavior in the Sierra Dome Spider," Spring.

MARSHALL, D.L.

Jerusha Reynolds, "The Effect of Habitat Fragmentation on Plant Pollinator Mututalisms: An Experimental Approach Using Wild Radish, *Raphanus sativus* L. (Brassicaceae) as a Model Organism," August.

MILLER, R.D.

Ryan Schwarz*, Summer 2007

Dissertation: Evolution "of Innate Immune Systems: Toward Understanding the Immune System of the Cnidarian *Hydractinia symbiolongicarpus*." Exam: July 2 2007.

* Ryan was Luis Cadavid's Ph.D. student; with his departure, I served as dissertation committee chair.

MILNE, B.T.

Matt Luck, "Manifestations of Landscape Pattern Due to the Interactions among Topography, Latitude, Climate, and Drainage Networks," May.

Horacio Samaniego, "Dynamical Partitioning of Spatiotemporal Variation within Species Ranges," May.

SNELL, H.L.

Heather L. Bateman, "Ecological Restoration: Examples from the Middle Rio Grande," July.

3. Bona fide graduate courses and number of students enrolled. Indicate new courses (for you) with an asterisk.

BARTON, L.L.

Spring:

Biol. 460, Microbial Physiology, 37 students

Biol. 502, ST/Agents of Bioterrorism, 2 students

Fall:

Biol. 699, Dissertation, 1 student Biol. 699, Dissertation, 1 student

BERGTHORSSON, U.

Spring:

Biol. 537, Evolutionary Genetics, 4 students

Biol. 502, Genome Evolution, 3 students

BROWN, J.H.

Spring:

*Biol. 503, Biological Complexity Seminar, 10 students

Biol. 511, Community Ecology, 11 students

CHARNOV, E.L.

Spring:

Biol. 502, ST/Evolutionary Ecology, 12 students

COLLINS, S.L.

Spring:

Released from teaching.

Fall:

Biol. 516, Basic Graduate Ecology, 14 students (co-taught with F. Smith and

B.O. Wolf)

COOK, J.A.

Spring:

Biol. 502, ST/Multilocus Approaches to Phylogeny, 6 students Biol. 517, Graduate Core in Evolution (1/4 time), 10 students

Biol. 561L, Introduction to Tropical Biology, 1 student (co-taught with D.W.

Duszynski)

Biol. 699, Dissertation, 1 students

Fall:

Biol. 502, ST/Comparative Phylogeography, 4 students

Biol. 599, Masters Thesis, 1 student Biol. 699, Dissertation, 2 students

CUNNINGHAM, C.

Fall:

Biol. 502, ST/Comparative Immunology, 1 student

Biol. 500, New Graduate Student Seminar, 23 students

DAHM, C.N.

Spring:

Biol. 495, Limnology, 3 students

Biol. 496L, Limnology Lab, 2 students

Fall: On sabbatical leave.

DUSZYNSKI, D.W.

Spring:

Biol. 461L, Introduction to Tropical Biology, 17 students & 4 faculty

FRIDRICK, C.O.

Spring:

Biol. 123-001, Biology for Health Related Sciences and Non-majors,

119 students

Biol. 123-002, Biology for Health Related Sciences and Non-majors,

120 students

Fall:

Biol. 123-001, Biology for Health Related Sciences and Non-majors,

107 students

Biol. 123-002, Biology for Health Related Sciences and Non-majors,

101 students

Biol. 123-658, Biology for Health Related Sciences and Non-majors,

23 students

Biol. 123-660, Biology for Health Related Sciences and Non-majors, 25 students

HANSON, D.T.

Fall: Biol. 546, Laboratory Methods in Molecular Biology, 4 students (co-taught

with Christina Takacs-Vesbach)

Spring: Biol. 478L, Plant Physiology, 3 students

*Biol. 502, ST/Laboratory Methods in Gas Exchange, 4 students

HOFKIN, B.V.

Spring: *Biol. 502, ST/Human Immunology and HIV, 6 students (co-taught with R.D.

Miller)

KODRIC-BROWN, A.

Spring: Biol. 517, Basic Graduate Evolution, 10 students

Fall: On Sabbatical Leave (National Center for Ecological Analysis and Synthesis

[NCEAS], Santa Barbara CA)

LITVAK, M.E.

Spring: * Biol. 502, ST/Topics in Physiological Ecology, 3 students

Fall: * Biol. 502, ST/Global Change Biology, 8 students

LOKER, E.S.

Spring: Biol. 582L, Parasitology, 1 students (taught six lectures in March-April)

LOWREY, T.K.

Spring: *Biol. 502, ST/Plants and People, 4 students

Biol. 699, Dissertation, 2 students

Fall: Biol. 699, Dissertation, 3 students

MARSHALL, D.L.

Spring: Biol. 567, Evolutionary Plant Ecology, 3 students

Fall: Biol. 502, ST/Plant Ecology, 4 students

MILLER, K.B.

Spring: *Biol. 585, Entomology, 1 student

MILLER, R.D.

Spring: * Biol. 502, ST/Human Immunology and HIV/AIDS, 5 students

Fall: Unpaid leave-of-absence

NATVIG. D.O.

Spring: Biol. 517, Basic Graduate Evolution (4 cr.), 10 students

Biol. 551, Research Problems, Christopher Kitchen (8 cr.)

Biol. 699, Dissertation, Andrea Porras (12 cr.)

Summer: Biol. 551, Research Problems, Christopher Kitchen (12 cr.)

Fall: Biol. 502, ST/Advanced Ecological Genomics (2 cr.), 3 students (co-taught with

S.L. Collins)

Biol. 551, Research Problems, Christopher Kitchen (12 cr.)

Biol. 699, Dissertation, Andrea Porras (9 cr.)

NELSON, M.A.

Spring: * Biol. 502, ST/Neurospora Genetics Laboratory, 1 student

Biol. 551, Research Problems, 1 student

Fall: Biol. 551, Research Problems, 2 students

POE, S.

Spring: Biol. 536, Phylogenetics, 11 students (two sections)

Fall: Biol. 502, ST/Philosophy of Biology, 5 students

SINSABAUGH, R.L.

Fall:

Biol. 502, ST/Soil Ecology (3 cr.), 4 students

Biol. 699, Dissertation, Chelsea Crenshaw (6 cr.)

Biol. 516, Basic Graduate Ecology (4 cr.), 1 week, 14 students Biol. 551, Research Problems, Kendra Mitchell (12 cr.)

SMITH, F.A.

Spring:

Biol. 503, Biological Complexity Seminar (Interdisciplinary Biological and Biomedical Science), 10 students from five departments (course was cross-listed in Physics, Anthropology, Computer Science, Mathematics, and Statistics) (co-

taught with J.H. Brown)

Fall: Biol. 502, ST/Perspectives in Human Ecology, 6 students

Biol. 502, ST/Animal Physiological Ecology, 14 students (co-taught with and

J.H. Brown and B.O. Wolf)

Biol. 503, Biological Complexity Seminar (Interdisciplinary Biological and Biomedical Science), 8 students from from five departments (course was cross-listed in Physics, Anthropology, Computer Science, Mathematics, and

Statistics)

Biol. 516, Basic Graduate Ecology, 14 students (co-taught with S.L. Collins

[coordinator] and B.O. Wolf)

SNELL, H.L.

Spring: Bio. 551, Research Problems, 1 student

Biol. 699, Dissertation, 3 students

Summer: Biol. 699, Dissertation, 1 student

Fall: Biol. 551, Research Problems, 1 student

Biol. 699, Dissertation, 2 students

TAKACS-VESBACH, C.D.

Fall:

Biol. 546, Laboratory Methods in Molecular Biology, 4 students (co-taught with D.T. Hanson)

TOOLSON, E.C.

Spring:

* Biol. 502, ST/Intermediate Mathematical Biology, 6 students (also offered as

Math 579)

Biol. 502, ST/Ecology Seminar, 1 student Biol. 545, Biology of Toxins, 3 students

Fall:

Biol. 502, ST/Introductory Mathematical Biology, 22 Students

Biol. 502, Ecology Seminar, 2 students

TURNER, T.F.

Spring:

Biol. 502, ST/Ecology and Evolution of Fishes, 4 students

Biol. 699, Dissertation, 2 students

Fall:

Biol. 699, Dissertation, 2 students

WEARING, H.J.

Fall:

* Biol. 503, Biological Complexity Seminar: Topics in Interdisciplinary Biology and Biological Sciences (TIBBS) (a four-week unit), 8 students. (Taught by F. Smith, also offered as CS 591, Stat. 579, Math 579, Anthro. 560)

WERNER-WASHBURNE, M.

Spring:

*Biol. 502, ST/Biology: Discovery and Innovation, 5 grad students

Each semester I co-teach our Initiatives to Maximize Student Diversity (IMSD) conference class course, 5 grad students

WITT, C.C.

Spring:

*Biol. 502, ST/ Molecular Systematics Discussion (1 cr.), 1 student (with

several, non-enrolled students attending)

Fall:

*Biol. 500, New Graduate Student Seminar, 20 students

*Biol. 502, ST/ Molecular Systematics Discussion (1 cr.), 1 student (with

several, non-enrolled students attending)

WOLF, B.O.

Fall:

Biol. 502, ST/Animal Physiological Ecology, 14 student (taught with J.H.

Brown and F. Smith)

Biol. 516, Basic Graduate Ecology (taught with F. Smith and S.L. Collins), 14 students

Spring: Biol. 502, ST/Animal Physiological Ecology, 1 student

Biol. 515, Research in Field Biology, 9 students (a field ecology course held in

Bahia Kino, Sonora, Mexico; taught with W.T. Pockman)

 Your service on graduate student committees, not as chair, in semester oral exam was given.

BROWN, J.H.

Kristina Anderson, Spring

COLLINS, S.L.

Krista Anderson, Ph.D.

CUNNINGHAM, C.

Spring: Ry

Ryan Schwarz, Department of Biology, UNM

Mara Lennard, Medical University of South Carolina

Fall: Kristy Liddie, Medical University of South Carolina

DAHM, C.N.

Bart Faulkner (M. Campana, Earth & Planetary Sciences, advisor), Ph.D. Final Exam, Spring

Hugo Magaña (D.T. Hanson, advisor), Ph.D. Final Exam, Spring

Dennis Newell, (L.J. Crossey & Z. Sharp, Earth & Planetary Sciences, advisors), Ph.D. Final Exam, Spring

Jessica R. Snider, (D.E. Northup and W.T. Pockman, advisors), Ph.D. Comprehensive Exam, Spring.

HOFKIN, B.V.

Jonathan Olp, Master's, Spring Lynda Hylander, Master's, Spring

LOWREY, T.K.

Spring: Jennifer Hollis, Masters Exam, Plan II (non-thesis)

Julie McIntire, Ph.D. Comprehensive Exam

Fall: Michael Medrano, Ph.D. Comprehensive Exam

MARSHALL, D.L.

Fall:

Sharon Walsh, Ph.D., College of Education, UNM

NATVIG, D.O.

Lynda Helander, master's defense, Summer.

POCKMAN, W.T.

Spring:

Melanie Barnes, Ph.D. student (Diane Marshall, major advisor), passed

qualifying written and oral exams.

SINSABAUGH, R.L.

Dave van Horn, Ph.D. qualifying exam, April 26 Armond Dichosa, Ph.D. qualifying exam, May 10 Chelsea Crenshaw, Ph.D. defense, May 11

SMITH, F.A.

Larisa Harding, Defense (T.L. Yates, advisor), Spring Ian Murray, advancement exam, Spring Cindy C. Mathiasen, advancement exam (B. Wolf, advisor), Spring

TAKACS-VESBACH, C.D.

David Van Horn, Spring Kathryn Ryan, Summer

THORNHILL, R.

Joshua Tybur, Ph.D. exam, Department of Psychology, UNM

 Professional accomplishments and awards of your graduate students, exclusive of those on which you were a co-author or participant (e.g., foreign travel, papers presented, papers published, awards and grants received, etc.).

BROWN, J.H.

Alison Boyer:

Boyer, A.G. 2007. Assembly of Island Communities: Body Size, Morphology, and Coexistence in Prehistoric Avian Guilds. Biannual Meeting of the International Biogeography Society, Tenerife, Canary Islands, Spain, January 9-13. Best Poster Award (Island Biogeography section).

Boyer, A.G. 2007. Selectivity of Holocene Avifaunal Extinctions in the Tropical Pacific. Annual Meeting of the Geological Society of America, Denver CO, October 18-31.

Boyer, A.G. 2007. Ecological Extinction Patterns in the Avifauna of the Tropical Pacific. 'Annual Meeting of the Ecological Society of America, San Jose CA, August 5-10.

- Frank M. Chapman Research Grant, American Museum of Natural History, \$1,000.
- Student Enrichment Opportunity Grant, Program in Interdisciplinary Biological and Biomedical Sciences, UNM; two grants of \$1,000 each.
- Grove Graduate Research Scholarship, Biology, UNM, \$1,000.
- Student Travel Grant, International Biogeography Society, \$2,000.

Meetings Attended:

- Annual Meeting of the Geological Society of America, Denver CO, October 18-31.
- Annual Meeting of the Ecological Society of America annual meeting, San Jose, CA.
- Biannual Meeting of the International Biogeography Society, Tenerife, Canary Islands, Spain, January 9-13.

Working Groups Attended:

- Phanerozoic Body Size Trends in Time and Space: Macroevolution and Macroecology (J. Payne, J. Stempien and M. Kowalewski, PIs).
- NESCent. Research Coordination Network: Integrating Macroecological Pattern and Processes across Scales (E Smith, S.K.M. Ernest and S.K. Lyons, PIs), NSE

Jordan Okie:

Accepted to the Center for Statistics and the Social Sciences CSSS summer school in Beijing, China.

Focus Group Award (deferred to 2008), Program for Interdisciplinary Biological and Biomedical Sciences (PIBBS), UNM.

William Burnside:

Conducted field research on fractal properties of leaf-cutter ant foraging trail networks, Smithsonian Trop Research Institute, Barro Colorado Island, Panama.

Scarborough, V.S. and Burnside, W.R. Complexity and sustainability: Perspectives from the ancient Maya and the modern Balinese. Submitted May 2007 to Current Anthropology.

T.A. Awarded: co-designed and taught a mixed undergraduate/graduate students Biol. 402/502, ST/Perspectives on Human Ecology.

Wenyun Zuo:

Modeling distribution of Rhododendron in China by SVM. Annual Meeting of the Ecological Society of America, San Jose CA, August 5-10.

Complex System Summer School, Santa Fe Institute, Santa Fe NM, June.

Modeling distribution of Rhododendron in China by SVM. 16th Annual Research Day, Department of Biology, UNM, April 13.

Moses, M.E., C. Hou, W.H. Woodruff, G.B. West, J.C. Nekola, W. Zuo and J.H. Brown. In press. Revisiting a Model of Ontogenetic Growth: Estimating Model Parameters from Theory and Data. *American Naturalist*.

Zuo, W., N. Lao, Y. Geng and K. Ma. In press. GeoSVM: An Efficient and Effective Tool to Predict Species' Potential Distributions. *Journal of Plant Ecology*.

COLLINS, S.L.

My students received UNM SRAC and GRAC awards.

COOK, J.A.

Andrew Hope: Sigma Xi Research Award

Natalie Dawson:

Dawson, N.G. 2007. Post Post-Doc: Are new scientists prepared for the real world? BioScience 57:16.

Grand Awards Science Fair Judge for local, regional, and international science fairs, including the INTEL International Science and Engineering Fair and the Native American Indian Science and Engineering Fair.

Wildfriends (a program working with underprivileged youth in New Mexico in the sciences and public policy) volunteer science advisor and co-developer of "Wild Side of Ecology" curriculum for 5th –12th -grade students.

CRIPPS, R.M.

Kathryn Ryan:

Pre-doctoral fellowship from the American Heart Association, January 1, 2007–December 31, 2008; competitive renewal.

DAHM, C.N.

Lydia Zeglin: co-organized a special session at the Fall Annual Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

HANSON, D.T.

Christopher Bickford:

2007 Lynn Hertel Scholarship, Department of Biology, UNM, \$2,500.

KODRIC-BROWN, A.

Daniella Swenton-Olson:

"Behavioral and molecular evidence for hybridization between *Gambusia nobilis* and *G. affinis*. Desert Fishes Council Meeting, Ventura CA, November 15-18.

Diana Andres:

Attended Guild of Rocky Mountain Ecologists and Evolutionary Biologists (GREEB), Abiquiu NM, September 21-23.

Awarded a Grove Summer Research Scholarship.

Andrew Edelman:

Poster, "Extended parental care by kangaroo rat mothers: Does delayed dispersal benefit off-spring?", 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 6-10.

Poster, "Extended parental care by kangaroo rat mothers: Does delayed dispersal benefit offspring?", Joint Symposium on Long-term Ecological Research Programs, Las Cruces NM.

Summer Seminar, "The manner-tailed kangaroo rat: Ecosystem engineer of desert grasslands," Sevilleta Long Term Ecological Research (LTER) Field Station, Socorro NM. Poster (with S.B. Whiteman), "Is anyone home? The effect of banner-tailed kangaroo rat (*Dipodomys spectabilis*) mound occupancy on reptile diversity," International Joint Meeting of the Ecological Society of America & the Society for Ecological Restoration, San Jose CA, August 5-10.

Awarded an National Science Foundation (NSF) Graduate Teaching Fellowship in K-12 Education.

LOWREY, T.K.

Joanna Redfern, Ph.D. student:

Field work in Mexico and seminar presentation at Universidad Autonoma Nacional Mexico, July.

\$1,000 research grant from New Mexico Native Plant Society

MARSHALL, D.L.

All of my students:

Abrahamson, N.J., M.G. Barnes, T.L. Koontz, J.S. Medeiros, M.G.M. Shaner, H.L. Simpson, D.L. Marshall and J. Avritt. 2007. Who's your daddy? Should you care? Effects of paternity on embryo development in wild radish. 16th Annual Research Day, Department of Biology, UNM, April 13.

Melanie Barnes:

Second place for Best, Graduate Oral Presentation, 16^{th} Annual Research Day, Department of Biology, UNM, April 13.

2007 Fellowship in Ecological Restoration, Garden Club of America, \$8,000 for stipend, assistant wages, and supplies.

Angela England:

England, A.E. 2007. Nectar-feeding bat visitation to blooming *Agave palmeri* in New Mexico. Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

England, A.E. 2007. Pollination ecology of *Agave palmeri* in New Mexico. Annual Meeting of the Guild of Rocky-Mountain Ecologists and Evolutionary Biologists, Abiquiu NM, September.

Received a Grove Summer Scholarship and funding from at least one outside agency.

MILNE, B.T.

Dave Dean, Bealmer Scholarship, \$250.

John Delong, Grove Scholarship, \$3,000.

NATVIG. D.O.

Andrea Porras-Alfaro:

2007 Grove Doctoral Scholarship, Department of Biology, UNM, \$9,000. Proposal: "Diversity, Distribution Patterns and Nitrogen Enrichment Effect on Endophytic and Soil Fungal Communities in a Semi-arid Grassland."

2007 Mycological Society of America Graduate Student Fellowship, \$2,000. Proposal: "Study of Endophytic and Soil Fungal Communities in a Semi-arid Grassland."

Sevilleta LTER Graduate Student Summer Fellowships, Summer 2007, \$3,500. Proposal: "Study of an Unknown Dominant Dark Septate Fungus: A Potential Keystone in Semiarid Grasslands."

Butler Student Travel Award, Mycological Society of America. Baton Rouge LA, \$500.

NELSON, M.A.

Diego Martinez: selected by the U.S. Department of Energy to represent the United States as an Outstanding Research Participant at the 57th Lindau Meeting of Nobel Laureates and Students in Lindau, Germany, July 1-6.

SINSABAUGH, R.L.

Marcy Gallo: Congressional Fellowship from the Soil Science Society of America and the American Association for the Advancement of Science.

SMITH, F.A.

Dolly Crawford:

Crawford, D. Life on the Edge: An Assessment of Genetic Connectivity and Persistence in the Ash Meadows and Pahranagat Valley Montane Voles, Nevada Division of Wildlife, \$15,000.

Crawford, D. Life on the Edge: An Assessment of Genetic Connectivity and Persistence, Graduate Research and Development (GRD) Grant, UNM, \$5,000.

Larissa Harding:

Harding. L. 2007. Phylogeographic patterns of mitochondrial differentiation in the longtailed weasel, *Mustela frenata*. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque, NM, June.

Ian Murray:

Murray, I.W. and S. Rix. Reptile and amphibian discussion and demonstration, Adams Middle School, Albuquerque NM, May.

Murray, I.W. and B.O. Wolf. 2007. Tracking the nutritional ecology and dietary history of chelonians via stable isotope analyses. Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July.

Murray, I.W. Modeling the growth and nutritional ecology of desert tortoises. Alvin R. and Caroline G. Grove Research Scholarship, Department of Biology, UNM, \$1,000, May-August.

Murray, I.W. Travel award. Graduate Research and Allocation Committee Travel to Scientific Meetings Award, Department of Biology, UNM, \$100, July.

Murray, I.W. and B.O. Wolf. Desert Tortoises as Tree Rings: Evaluating the Effects of Climate and Resource Variability on Tortoise Growth and Survival Using Stable Isotopes. Arizona Game and Fish Department Heritage Fund (pending).

SNELL, H.L.

Heather L. Bateman:

H. Bateman and A. Chung-MacCoubrey, co-PIs, the Bosque Initiative Group, U.S. Fish and Wildlife Service, U.S. Department of Interior, \$11,000.

Grove Dissertation Scholarship, Department of Biology, UNM, \$9,000.

N.M. Graduate 3% Scholarship Tuition Award, UNM, \$2,500.

Papers Refereed: Journal of Restoration Ecology (1)

Papers Presented (w/o HLS; see HLS listing for others):

Bateman, H.L., M.J. Harner and A. Chung-MacCoubrey. 2007. Toads respond to spring flooding along the Middle Rio Grande, New Mexico. 40th Joint Annual AZ/NM Meeting of The Wildlife Society and AFS; Albuquerque NM, February 6-8, 2007.

I. Tomas Giermakowski:

Papers Presented (w/o HLS; see HLS listing for others):

Giermakowski, J.T., C.A. Wolfe and N. E. Rios. 2007. An Ongoing Online Survey of Ichthyological and Herpetological Collections: Identifying Current Issues in Collections. Poster, Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July 11-16, 2007.

Meetings Attended:

Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July 11-16, 2007.

2007 Meeting of the Southwest Partners in Amphibian and Reptile Conservation, Albuquerque NM, May 31–June 2.

Committee and Other Service:

Member, Collections Committee, American Society of Ichthyologists and Herpetologists.

Chair, Survey Subcommittee, American Society of Ichthyologists and Herpetologists.

Member, Species Recovery Board, N.M. Department of Game and Fish.

Local Organizing Chair, 2007 Meeting of the Southwest Partners in Amphibian and Reptile Conservation, Albuquerque NM, May 31–June 2.

Collections Manager Representative, Executive Board, Museum of Southwestern Biology, UNM.

Collections Manager, Division of Amphibians and Reptiles, Museum of Southwestern Biology, UNM.

R. Brand Phillips:

Teaching:

Biol. 247L, Anatomy & Physiology I Lab, Spring Biol. 248L, Anatomy & Physiology II, Fall

Publications (w/o HLS; see HLS listing for others):

Phillips, R.B., C.S. Winchell and R.H. Schmidt. 2007. Dietary overlap of an alien and native carnivore on San Clemente Island, California. *Journal of Mammalogy* 88:173-180.

Papers Refereed: Folia Zoologica (1).

Public Service: Judge, Intel International Science and Engineering Fair, 2007.

TAKACS-VESBACH, C.D.

Kendra Mitchell:

NASA 2007 New Mexico Space Grant Graduate Research Fellowship.

Mitchell, K.R., A.-L. Reysenbach, C.D. Takacs-Vesbach. 2007. Geochemical controls on microbial community composition from varied hot spring environments. Poster, Annual Meeting of the American Society Limnology Oceanography, Santa Fe NM, February 4-9.

Mitchell, K.R., A.W. Rodman and C.D. Takacs-Vesbach. 2007. Island size drives bacterial species richness in varied terrestrial hot springs. Annual Meeting of the Guild of Rocky-Mountain Ecologists and Evolutionary Biologists, Abiquiu NM, September.

Justine Rebecca Hall:

Robert C. Byrd Honors Scholarship, 2003-2007.

Graduated, Summa cum laude, December.

Hall, J.R., O. Jackson-Weaver, C.N. Dahm, L.J. Crossey, K.E. Karlstrom, T. Fischer, C.D. Takacs-Vesbach. 2007. Geomicrobiology of "Continental Smokers": CO₂-rich springs and travertines of the Western U.S. Poster, Annual Meeting of the American Society Limnology Oceanography, Santa Fe NM, February 4-9.

Gina Ryan:

Graduated, Magna cum laude, May.

Ryan, G.T., J.C. Priscu and C. Takacs-Vesbach. 2007. Extremophilic bacteria from Antarctic Lake Fryxell: Evidence of Phenotypic Convergence. Poster, Annual Meeting of the American

Society Limnology Oceanography, Santa Fe NM, February 4-9. Finalist, student poster award.

Lydia Zeglin:

Graduate Research Development Award, New Mexico State Congress, \$3,000.

Zeglin, L.H., C. N. Dahm, R.L. Sinsabaugh, J.E. Barrett, M. Gooseff and C.D. Takacs-Vesbach. 2007. Microbial taxonomic and functional diversity in parafluvial sediments of cold and hot desert streams. Annual Meeting of the North American Benthological Society, Columbia SC, June 3-9.

Zeglin, L.H., C. L. Crenshaw, C. N. Dahm, R. W. Sheibly and C. D. Vesbach. 2007. Hyporheic zone bacterial community structure and nutrient transformation in southwestern USA streams. Annual Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

THORNHILL, R.

Kenneth Letendre:

Grove Scholarship Award, Department of Biology, UNM.

"An Evolutionary Perspective on the Effect of Terrorist Incidents on Presidential Approval in the Years Following September 11, 2001" (poster) presented at 19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30-June 3.

Christopher Eppig:

"Emotional Self-deception Facilitates Sexually Antagonistic Opimal Mating Strategies" (poster) presented at 19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30–June 3.

TURNER, T.F.

Thomas L. Kennedy, Ph.D. candidate (expected completion Spring 2009):

Predicting future threats to the long-term survival of Gila Trout using a high-resolution simulation of climate change. Climatic Change.

The effects of nitrate loading and *Hydrilla verticillata* in freshwater communities and implications for future management. *Biological Invasions*.

The invasive plant Hydrilla verticillata and the feeding preference of Florida Apple Snails (Pomacea paludosa). Veliger.

Decreasing range size of the Limpkin (Aramus guarauna) in North America.

Crawford Grant for work on the Rio Grande, NM, \$1,500.

EPA STAR Fellowship: \$111,000; NSF DDIG: \$11,200.

"The Role of Abiotic Processes the Temporal Dynamics of Macroinvertebrates in the Rio Grande," poster, 16th Annual Research Day, Department of Biology, UNM, April 13.

"Complex Temporal Patterns in the Macroinvertebrate Community of an Arid River, talk, talk, Annual Meeting of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists (GREBB), Abiquiu NM, September 22.

Trevor Krabbenhoft, Ph.D. student (expected completion Spring 2012): Krabbenhoft, T.J., EC. Rohde and J.M. Quattro. Concordant nuclear and mitochondrial DNA partitions define evolutionarily significant units in the imperiled pinewoods darter, *Etheostoma mariae* (Pisces: Percidae). Accepted pending minor revisions, *Copeia*.

Krabbenhoft, T.J., M.L. Collyer and J.M. Quattro. Comparative morphological divergence across phylogenetically disparate taxa: Convergent evolution of endemic fishes of Lake Waccamaw, North Carolina. Prepared first draft.

Krabbenhoft, T.J., F.C. Rohde and J.M. Quattro. Threatened Fishes of the World: Fundulus waccamensis Hubbs and Raney, 1946 (Fundulidae). Prepared first draft.

Snelson, FF, TJ. Krabbenhoft and J.M. Quattro. Elassoma _____: A new species of pygmy sunfish from Florida. Prepared first draft.

High-priority grant, Graduate Research and Development Fund, UNM, \$4,990.

Research Project and Travel Grant, Office of Graduate Studies, UNM, \$727.

Student Research Allocations Committee Grant, Graduate and Professional Student Association, UNM, \$500.

EPA Science to Achieve Results Fellowship Application, \$111,000.00 (in review).

Ad Hoc Reviewer: Copeia (1), Environmental Biology of Fishes (1), Journal of Freshwater Biology (1).

'Krabbenhoft, T.J., M.L. Collyer and J.M. Quattro. 2007. Convergent evolution of phylogenetically-disparate, endemic fishes of Lake Waccamaw, North Carolina. Poster, Annual Meeting of the American Society of Ichthyologists and Herpetologists, St. Louis MO, July 11-16.

Krabbenhoft, T.J. 2007. Morphological divergence of endemic Lake Waccamaw, North Carolina, fish fauna. Poster, 16th Annual Research Day, Department of Biology, UNM, April 13.

Wade D. Wilson, Ph.D. Candidate, Expected Completion Fall 2008

Representative, Biology Department Graduate Policy Committee, 2007-08.

Wilson, W.D. and T.F. Turner. A phylogenetic analysis of the Pacific salmon and trout (*Oncorhynchus*: Salmonidae) based on partial ND4 sequence: A closer look at the highly fragmented inland species. *Molecular Phylogenetics and Evolution*.

Wilson, W.D. and T.F. Turner. Comparative analysis of the MHC DAB in *Oncorhynchus*: Functional patterns in the peptide binding pockets. *Journal of Heredity*.

Wilson, W.D. and T.F. Turner. Twelve microsatellite markers from the salmonid trematode Crepidostomum farionis (Trematoda: Allocreadiidae). Molecular Ecology Notes.

Wilson, W.D. and T.F. Turner. 2007. Phylogeny of the Pacific salmon and trout (*Onco-rhynchus*) based on partial ND4 sequence. 40th Joint Annual Conference of the Arizona and New Mexico Chapters of the Wildlife and Arizona and New Mexico Chapter of the American Fisheries Society, Albuquerque NM, February.

Wilson, W.D. and T.F. Turner. 2007. Major Histocompatibility Complex (MHC) Patterns in salmonids: A phylogenetic and functional analysis. Annual Meeting of the Society for the Study of Evolution, Christchurch NZ, June.

Wilson, W.D. and T.F. Turner. 2007. Phylogeny of the Pacific salmon and trout (*Onco-rhynchus*) based on partial ND4 sequence: A robust phylogeny compared to MHC patterns. 16th Annual Research Day, Department of Biology, UNM, April 13.

WAIDE, R.B.

Brittany Barker:

Barker, B.S. 2007. Comparative phylogeography of two frogs (*Eleutherodactylus antillensis* and *E. portoricensis*) from Puerto Rico: Preliminary results. Annual Meeting for the Guild of Rocky Mountain Ecologists and Evolutionary Biologists (GREEB), Abiquiu NM, September 21-23. (oral presentation)

Barker, B.S. 2007. Landscape genetics of two frogs from Puerto Rico (*Eleutherodactylus antillensis* and *E. portoricensis*: Preliminary results. Annual Meeting of the American Society of Ichthyologists and Herpetologists (ASIH), St. Louis MO, July 11-16. (oral presentation)

Barker, B.S. 2007. Landscape genetics of two frogs from Puerto Rico (*Eleutherodactylus antillensis* and *E. portoricensis*: Preliminary results. 16th Annual Research Day, Department of Biology, UNM, April 13. (poster presentation)

Torres-Perez, F., B.S. Barker, R.E. Palma and J.A. Cook. 2007. Population genetic structure of a rodent reservoir for Hantavirus, O. longicaudatus, in Chile and its human implications. International Summit on Evolutionary Change in Human-altered Environments, Institute of the Environment, University of California, Los Angeles CA, February 8-10. (poster presentation)

Barker, B.S. 2007. A comparative approach to assessing the impacted of land-use and land-cover change on amphibians in Puerto Rico. The Long Term Ecological Research (LTER) Luquillo Experimental Forest Annual Meeting, San Juan PR. (poster presentation)

2007 GK-12 Graduate Fellowship for 2007-08 academic year, National Science Foundation.

2007 Research Project and Travel (RPT) grant, \$1,000, Office of Graduate Studies, UNM.

2007 Student Research Allocations Committee (SRAC) grant, \$500, Graduate and Professional Student Association, UNM.

2007 Graduate Research Allocations Committee (GRAC) grant, \$300, Department of Biology, UNM.

2007 UCLA Travel grant, \$400, International Summit Meeting on Evolutionary Change in Human Impacted Landscapes.

WERNER-WASHBURNE, M.

Sushmita Roy:

Outstanding Computer Science student poster, Computer Science Conference, UNM, Spring.

Second place, Graduate Student Oral Presentation, Annual Research Day, Department of Biology, UNM, April 13.

Poster, 22nd Artificial Intelligence (AAAI) Conference, Vancouver, Canada, July.

B. Undergraduate Education. Bona fide undergraduate courses taught each semester and number of students enrolled. Indicate new course (for you) with an asterisk.

BARTON, L.L.

Spring:

Biol. 402, ST/Agents of Bioterrorism, 20 students

Biol. 499, Undergraduate Problems, 1 student (Marilyn Wong)

Fall:

Biol. 402, ST/Unique Bacteria, 6 students Biol. 351, General Microbiology, 82 students

Biol. 499, Research Problems, 2 students (Desidaerio Dez, Marilyn Wong)

BERGTHORSSON, U.

Spring:

Biol. 402, Genome Evolution, 3 students

Biol. 437, Evolutionary Genetics, 25 students

Fall:

Biol. 202, Genetics, 111 students (two sections)

CHARNOV, E.L.

Fall:

Biol. 465, Evolutionary Ecology, 18 students

COOK, J.A.

Fall:

Biol. 402, ST/Advanced Field Methods in Tropical Mammalogy, 2 students

Biol. 489, Mammalogy, 15 students

Spring:

Biol. 461L, Introduction to Tropical Biology, 15 students (co-taught with D.W.

Duszynski)

COUCH, L.

Spring:

Biol. 239L, Microbiology for Health Sciences and Non-majors, 172 students in

eight sections

Fall:

Biol. 239L, Microbiology for Health Sciences and Non-majors, 150 students in

eight sections

COUNCIL-GARCIA, C.L.

I don't teach these, but I am in charge of the laboratories and I instruct the TAs:

Biol. 112L, Biology Laboratory for Non-majors, 144 students/semester

Biol. 124L, Biology for Health Related Sciences and Non-majors, 360–400 students/semester; 72 students/summer semester

Biol. 201, Molecular and Cell Biology, 360-380 students/semester; 96 students/summer semester

Biol. 202, Genetics, 220-260 students/semester

Biol. 203L, Ecology and Evolution, 150 students/semester

Biol. 204L, Plant and Animal Form and Function, 175 students/semester

CRIPPS, R.M.

Two teaching releases taken back-to-back with approval from the Department Chair (Sam Loker).

CUNNINGHAM, C.

Fall:

Biol. 201, Molecular Cell Biology (two sections), 390 students (team taught

with Dr. Coen Adema)

DAHM, C.N.

Spring:

Biolp 495, Limnology, 14 students

Biol. 496L, Limnology Lab, 3 students

Fall:

On sabbatical leave.

FARNSWORTH, P.

Fall:

*Biology 110, Biology Non-majors, 161 students (two sections)

HANSON, D.T.

Fall:

Biol. 360, Botany, 15 students

Biol. 446, Laboratory Methods in Molecular Biology, 9 students (co-taught

with Christina Takacs-Vesbach)

Spring:

Biol. 478L, Plant Physiology, 8 students

*Biol. 402, ST/Laboratory Methods in Gas Exchange, 1 student

HOFKIN, B.V.

Spring:

Biol. 201, Molecular and Cell Biology, 331 students (two sections)

*Biol. 402, ST/Human Immunology and HIV, 54 students (team taught with

R.D. Miller)

Fall: Biol. 371, Invertebrate Biology, 7 students

Biol, 450, General Virology, 59 students

HOWE, K.A.

Spring: Biol. 202, Genetics, 244 students (two sections)

Summer: Biol. 123, Biology for Health Related Sciences and Non-majors, 45 students

Biol. 202, Genetics, 48 students

Fall: Biol. 202, Genetics, 130 students

Biol. 429, Molecular Cell Biology I, 37 students

KODRIC-BROWN, A.

Spring: Biol, 455, Ethology: Animal Behavior, 27 students

Fall: On Sabbatical Leave (National Center for Ecological Analysis and Synthesis

[NCEAS], Santa Barbara CA)

LITVAK, M.E.

Spring: * Biol. 204, Structure and Function, 7 students

* Biol. 402, ST/Global Change Biology, 111 students

Fall: * Biol. 402, ST/Global Change Biology, 7 students

LOKER, E.S.

Spring: Biol. 482L, Parasitology, 17 students (taught 6 lectures in March-April)

LOWREY, T.K.

Spring: Biol. 402, ST/Plants and People, 21 students

Summer: NSC (Natural Sciences [Earth and Planetary Sciences]) 400, Geobotany, 15 K-

12 teachers (taught at the Sevilleta LTER Field Station, Socorro NM).

MARSHALL, D.L.

Spring: Biol. 467, Evolutionary Plant Ecology, 3 students

Fall: Biol. 360, General Botany, 16 students

MILLER, K.B.

Spring: *Biol. 485, Entomology, 13 students

MILLER, R.D.

Spring: * Biol. 402, ST/Human Immunology and HIV/AIDS, 50 students

Fall: Unpaid leave-of-absence

MILNE, B.T.

Spring: Biol. 402/502, Introduction to Sustainability (pilot course), 10 students.

Fall: Biol. 310, Principles of Ecology, 16 students

Sust. 134, Introduction to Sustainability, 26 students

Sust. 499, Sustainability Capstone Independent Study Project, 4 students

NELSON, M.A.

Spring:

* Biol, 402, ST/Neurospora Genetics Laboratory, 11 students

Biol. 400, Senior Honors Thesis, 2 students Biol. 499, Undergraduate Problems, 3 students

Fall:

* Biol. 428, Human Heredity, 36 students Biol. 402, ST/Undergraduate Research, 5 students

Biol. 402, ST/Undergraduate Research, 5 students Biol. 402, ST/Eukaryotic Genomics, 2 students

Biol. 402, ST/GRE Prep, 1 student

Biol. 400, Senior Honors Thesis, 1 student Biol. 499, Undergraduate Problems, 3 students

POCKMAN, W.T.

Fall:

Biol. 204, Animal & Plant Form & Function, 125 students (two sections)

POE. S.

Spring:

Biol. 436L, Phylogenetics, 9 students

Fall:

Biol. 203, Ecology and Evolution, 190 students (two sections) (co-taught with

T.F. Turner)

Biol. 402, ST/Philosophy of Biology, 6 students

SHANER, M.G.M.

Spring:

Biol. 123, Biology for Health Related Sciences and Non-majors, 270 students

(two sections)

Summer: Fall: Biol. 239L, Microbiology for the Health Sciences, 14 students (one section) Biol. 123, Biology for Health Related Sciences and Non-majors, 247 students

(two sections)

Biol. 123, Biology for Health Related Sciences and Non-majors, 23 students; section added due to C.O. Fridrick's maternity leave for the last 3.5 weeks of the

Fall semester.

SINSABAUGH, R.L.

Spring:

Biol. 351, General Microbiology. (3 cr.), 75 students Biol. 400, Honor's Thesis, Kylea Odenbach (3 cr.) Biol. 402, ST/Carbon Cycle (1 cr.), 1 student

Fall:

Biol. 402, ST/Soil Ecology (3 cr.), 5 students

SMITH, F.A.

Fall:

Biol. 402, ST/Perspectives in Human Ecology, 1 student

Biol. 402, ST/Animal Physiological Ecology, 3 students (co-taught with and

J.H. Brown and B.O. Wolf)

SNELL, H.L.

Spring:

Biol. 379, Conservation Biology, 38 students.

Fall: Biol, 386, General Vertebrate Zoology, 30 students.

STRICKER, S.A.

Fall: Biol. 416L, History, 36 students

Spring: Biol. 412, Developmental Biology, 70 students

TAKACS-VESBACH, C.D.

Fall: Biol. 446, Laboratory Methods in Molecular Biology, 10 students (co-taught

with D.T. Hanson)

THORNHILL, R.

Spring: Biol. 203L, Ecology and Evolution, 160 students (two sections)

Fall: Biol. 365, Evolution of Human Sexuality, 132 students

TOOLSON, E.C.

Spring: Biol. 204L, Animal and Plant Form and Function, 113 students (two sections)

(co-taught with M. Litvak)

* Biol. 402, ST/Intermediate Mathematical Biology, 2 students (also offered as

Math 439)

Biol. 402, ST/Ecology Seminar, 13 student Biol. 445, Biology of Toxins, 70 students

Fall: Biol. 402, ST/Introductory Mathematical Biology, 4 Students

Biol. 402, Ecology Seminar, 16 students Biol. 435L, Animal Physiology, 17 students

FLC 613, Biology of Toxins, 23 students (FLC = Freshman Learning Com-

munities)

TURNER, T.F.

Spring: Biol. 203L, Ecology and Evolution (two sections of Ecology), 135 students

Biol.402, ST/Ecology and Evolution of Fishes, 4 students

Fall: Biol. 203L, Ecology and Evolution (two sections of Ecology), 165 students

WERNER-WASHBURNE, M.

Spring: *Biol. 402, ST/Biology: Discovery and Innovation, 15 students

WITT, C.C.

Fall: Biol. 486L, Ornithology (3 cr.), 18 students (combined undergraduate and

graduate) (co-taught with B.O. Wolf)

WOLF, B.O.

Spring: Biol. 402, ST/Animal Physiological Ecology, 3 students (taught with J.H.

Brown and F. Smith)

Fall: Biol. 204L, Plant and Animal Form and Function, 138 students (two sections;

taught with W.T. Pockman)

Biol. 486L, Ornithology (taught with C. Witt), 15 students

C. Teaching Awards.

CRIPPS, R.M.

Faculty Recognition Award, Mortar Board Honor Society, May.

HOFKIN, B.V.

Recognized as an outstanding professor by the UNM Women's Basketball team, February.

Faculty Recognition Award from the Mortar Board Maia Chapter, April.

LITVAK, M.E.

UNM Athletic Teacher Appreciation, Spring 2007 (Dionne Marsh, Brandi Kimble, Lady Lobos Basketball Team)

SHANER, M.G.M.

Invited as a favorite teacher to Alphi Chi Omega's Professor Dinner.

SNELL, H.L.

Teaching Evaluations "Rate the Instructor" of 5.8 and 5.8, respectively, for Biol. 386L, General Vertebrate Zoology, and Biol. 379, Conservation Biology.

THORNHILL, R.

Recognition at a Lobo basketball game as Honored Teacher (selected by undergraduates in my classes).

D. Curriculum Development/Production of Teaching Materials.

COUCH, L.

Coordinator of Microbiology Facility and Laboratories

Revision of Biol. 239L (Microbiology for Health Sciences and Non-majors) lab manual written for UNM and CNM.

COUNCIL-GARCIA, C.L.

Continuous curriculum development for all six lab classes.

Wrote the Biol. 204L (Plant and Animal Form and Function) lab manual, to be published in 2008.

FARNSWORTH, P.

Prepared new syllabus, class materials and web site for Biol. 110, Biology Non-majors.

HANSON, D.T.

Assisted with development of Biol. 204L, Animal and Plant Form and Function.

HOFKIN, B.V.

Continued work on a introductory microbiology textbook; anticipated completion in 2008.

LOWREY, T.K.

Laboratory manual for NSC 400, Geobotany.

MILNE, B.T.

Undergraduate minor degree program in Sustainability Studies accepted for Fall 2007 UNM Catalog, May.

SMITH, F.A.

Developed a four-week module on climate change for Biol. 503, ST/Biological Complexity Seminar (Interdisciplinary Biological and Biomedical Science).

In collaboration with faculty from other departments, currently developing a series of three courses and a unified curriculum that will ultimately lead to a cross-departmental concentration in Integrative Biology at UNM.

SNELL, H.L.

Continuous development of online lecture materials, MS Powerpoint® presentations with associated Abode® PDF documents for students, class e-mail listserves, and class-related research and critical thinking training for students. I electronically distributed approximately 50 relevant research and job opportunities to students in my classes.

STRICKER, S.A.

Revised lecture note handouts for Biol. 412L, Histology (323 pages, more than 75% fully new, compared to last year's version)

TOOLSON, E.C.

Lab protocols for both mathematical biology courses.

TURNER, T.F.

Developed MS PowerPoint® lecture notes for Ecology Section of Biology 203L, Ecology and Evolution, posted on Centennial Library's e-reserves page (http://ereserves.unm.edu) and available for colleagues teaching the Ecology section of Biol. 203L.

WEARING, H.J.

Gave input on mathematics and statistics requirements to B.A./M.D. program curriculum committee, Fall.

WERNER-WASHBURNE, M.

Biol. 402/502, ST/Discovery and Innovation was developed in response to the need of our students for classes that increased scientific creativity. As a result of this course, I am developing evaluation materials to determine the effect we are having on increasing our students' ability to

increase their scientific imagination and understand the path of research, active learning, and ability to ask good questions.

WITT, C.C.

Initiated development of new, comprehensive teaching collection comprised of 287 specimens, entitled "Synoptic Collection of the Birds of New Mexico."

E. Museum Curator, Advisor; Assistant Chair, EM Director, etc.

BROWN, J.H.

Director, Programs in Biomedical & Biological Sciences (PiBBS)

CHARNOV, E.L.

Graduate Student Academic Advisor

COLLINS, S.L.

Director, Sevilleta Long Term Ecological Research (LTER) Program

COOK, J.A.

Curator, Division of Mammals, Museum of Southwestern Biology, UNM

Associate Curator, Division of Genomic Resources, Museum of Southwestern Biology, UNM

COUNCIL-GARCIA, C.L.

Undergraduate Student Academic Advisor

CRIPPS, R.M.

Department Associate Chair

Director, Molecular Biology Facility Department of Biology, UNM

DUSZYNSKI, D.W.

Director, Museum of Southwestern Biology, UNM, through June 30.

HANSON, D.T.

Associate Herbarium Curator (Curator of Bryophytes), Museum of Southwestern Biology, UNM, March 2003-present.

HOFKIN, B.V.

Pre-veterinary Academic Advisor

LOKER, E.S.

Department Chair

Director, Center for Evolutionary and Theoretical Immunology (CETI)

LOWREY, T.K.

Curator, UNM Herbaium, Museum of Southwestern Biology, UNM

MARSHALL, D.L.

Undergraduate Academic Advisor, Spring Coordinator, Academic Program Review

MILLER, K.B.

Curator, Division of Arthropods, Museum of Southwestern Biology, UNM. Undergraduate Academic Advisor

MILNE, B.T.

Director, Sustainability Studies Program.

NATVIG, D.O.

Director, Long Term Ecological Research (LTER) Sevilleta Research Station, UNM, Socorro NM.

NELSON, M.A.

Director, Minority Access to Research Careers (MARC) Program, since June 2003.

POE, S.

Associate Curator, Division of Amphibians and Reptiles, Museum of Southwestern Biology, UNM.

SHANER, M.G.M.

Undergraduate Student Academic Advisor (including transfers)

SMITH, F.A.

Co-Director, Program in Integrative Biology and Biomedical Sciences (PIBBS)
Undergraduate Academic Student Advisor, August 2007–present.

SNELL, H.L.

Curator, Division of Amphibians and Reptiles, Museum of Southwestern Biology, UNM Conservation Biology Concentration Advisor President-elect, UNM Faculty Senate

STRICKER, S.A.

Department Associate Chair Director, Confocal and Electron Microscopy Facility

THORNHILL, R.

Graduate Student Academic Advisor

TOOLSON, E.C.

Undergraduate academic advisor

TURNER, T.F.

Director, Museum of Southwestern Biology, UNM (accepted directorship in July).

WAIDE, R.B.

Executive Director, Long Term Ecological Research (LTER) Network Office

WERNER-WASHBURNE, M.

P.I. and director, Initiatives to Maximize Student Diversity (IMSD) program.

WITT, C.C.

Curator, The Division of Birds, The Museum of Southwestern Biology, UNM.

F. Mentoring. Please list names of undergraduates (with or without Biol. 400 or 499 credit) or non-UNM students you mentored this year. Indicate the period of mentoring, program (if any), Honor's thesis, etc.

BARTON, L.L.

Bernette Aragon
Vishal Bhakta
Laura Hall
Brandi Kimble
Dessislava Lanakieva
Veneta Lanakieva
Marie Samples
Pooneih Soltanmohamady
April Vilalpando

BERGTHORSSON, U.

Joseph Kunkel, Biol. 499, Undergraduate Problems, September–December Elisa LaBeau, January–August Madina Nourestani, January–June

COLLINS, S.L.

Tierney Adamson, a senior Biology major Rene Aguilera, a senior Biology major Jolene Trujillo, now a graduate student at Arizona State

Two Research Experience for Undergraduate (REU) students at the Sevilleta LTER last summer, one of whom was funded through an Ecological Society of America's Strategies for Ecology, Education, Development and Sustainability (SEEDS) Fellowship.

COOK, J.A.

Vani Aran, Biol. 400, Senior Honors Thesis, Fall

Ben Edinger, Regents' Scholar

Randle McCain, Undergraduate Nurturing Opportunities (UNO), National Science Foundation Ashley Montoya, Undergraduate Nurturing Opportunities (UNO), National Science Foundation Krista Ortega, Research Experiences for Undergraduates (REU)/ Undergraduate Mentoring in Environmental Biology (UMEB), National Science Foundation

Ben Schaff, U.S.D.A. support

Elisha Song, Undergraduate Nurturing Opportunities (UNO), National Science Foundation; Research Experiences for Undergraduates (REU), National Science Foundation

Kelly Speer, Regents' Scholar

Scarlett Swanson, Research Experiences for Undergraduates (REU), National Science Foundation

CRIPPS, R.M.

Melanie Adams, MARC, Summer and Fall
Alicia Arguelles, Spring and Summer
Maryann Jaramillo, Fall
Thai Lee, IMSD ,Summer and Fall
Candice Lovato, Spring, Summer, Fall
Jared Najjar, Fall
Phuong Nguyen, Spring (IMSD) and Fall
Cheryl Sensibaugh, summa cum laude in Biochemistry Honors, Spring

CUNNINGHAM, C.

Vint R. Blackburn, June 1, 2007-present

DAHM, C.N.

Outside committee member and mentor for doctoral students Joe Chandler, Jay Hodgson, Stephanie Parker and Lori Tolley-Jordan, the University of Alabama, as part of the Freshwater Science Integrative Graduate Education and Research Traineeship (IGERT) Program between UNM and the University of Alabama.

HANSON, D.T.

Susan Mirabal (formerly Monzon), independent research and Honors thesis, all year.

Lenna Peterson, independent research on algal biofuels, Mount Holyoke College, Summer.

Philip Fujihara, independent research on algal biofuels, Summer.

Stephanie Moquin, independent research on symbiosis, all year (jointly with Ursula Shepherd)

Jessica Martin, independent research on symbiosis, Spring & Summer (jointly w/ Ursula Shepherd)

HOFKIN, B.V.

Michelle Archuletta, Summer Lindsay Livingstone, Spring (Biol. 499) and Summer Jesse Van Westrienen (Biol. 499), Spring

KODRIC-BROWN, A.

Biol. 400, Senior Honor's Thesis: Beth Belding (3 cn.), Carrie Wright (3 cn.), Fall Biol. 499, Undergraduate Problems: Michelle Forys (3 cn.), Fall

LITVAK, M.E.

Andrew Hawk, Biol. 499, Undergraduate Problems, Summer Alexandra Reinwald, REU Sevilleta, Summer

LOWREY, T.K.

Margaret Garcia, Minority Access to Research Careers (MARC) Program research student, Fall.

MARSHALL, D.L.

Andrea Chavez, New Mexico Alliance for Minority Participation (NMAMP) Program, Summer and Fall Katreena Diamond, Spring and Fall

MILLER, K.B.

William Edelman, IMSD, August-present Alicia Hodson, January-present Emily Hodson, August-present Nicole Telles, August-present

MILLER, R.D.

Jennifer Rice Elena Sharp

MILNE, B.T.

Nate Campbell, Sustainability Capstone Project, 2006– Rose Chavez, Sustainability Capstone Project, 2006– Ashleigh Abbot, Sustainability Capstone Project, 2007 Amy Coplen, Sustainability Capstone Project, 2007

NATVIG, D.O.

Biol. 499, Undergraduate Problems: Theresa Nguyen (3 cr), Spring Biol. 499, Undergraduate Problems: Chelsea Mowrer (3 cr), Fall

NELSON, M.A.

Katie Liberatore, Senior Honors Thesis, Spring Anna Hermes, Senior Honors Thesis, Spring and Fall Christine Chee, MARC student, Spring, Summer and Fall Joseph Kunkel, Spring, Summer and Fal Charles Sanchez, Summer and Fall

Co-advisor (with Stephanie W. Ruby, Dept. of Molecular Genetics and Microbiology, HSC, UNM) on Katie Liberatore's Senior Honors Thesis: "Identifying and Characterizing the N-

terminal RNA Binding Region of the DEAD-box Protein Prp5p" (graduated Spring 2007, summa cum laude).

Co-advisor (with Stephanie W. Ruby, Dept. of Molecular Genetics and Microbiology, HSC, UNM) on Anna Hermes' Senior Honors Thesis: "Mapping regions influencing ATPase activity of the DEAD-box protein Prp5p" (graduated Fall 2007, summa cum laude).

POCKMAN, W.T.

NSF REU: Julie Glaser, Nicole Davidson, Sam Markwell, Ben Gutzler

POE, S.

Julian Davis, Fall

SINSABAUGH, R.L.

Biol. 400, Honor's Thesis: Kylea Odenbach (3 cr.), Spring

Reader for Justine Hall's Honors thesis: "Molecular Characterization of the Diversity and Distribution of a Thermal Spring Microbial Community using rRNA and Functional Genes."

SMITH, F.A.

Jessica Martin, Honor's thesis, May 2007–present Adrienne Raniszewski, May 2006–May 2007 Kristin Youberg, May 2006–August 2007

SNELL, H.L.

Greg Hurley (out-of-program mentoring).

TAKACS-VESBACH, C.D.

Gina Ryan, Honors thesis completed, January–August.
Justine Hall, Honors thesis completed, January–December
Stephanie Moquin, Honors with Ursula Sheperd, March–December
Jaqueline Hill, volunteer from Rochester Institute of Technology, Summer

THORNHILL, R.

Biol. 499, Undergraduate Problems, 8 students, Fall Biol. 499, Undergraduate Problems, 6 students, Spring

TOOLSON, E.C.

Ashley Schafer, Long Term Ecological Research (LTER) Research Experiences for Undergraduates (REU), Summer.

TURNER, T.F.

Nedra Iwerks, Undergraduate Research Student, "Life History of the Flathead Chub, *Platygobio gracilis*, in the Rio Grande," Summer 2006 (graduated Spring 2007).

Tracy Diver; Undergraduate Research Assistant, "Evolutionary Genetics of Hybridizing Minnows in the Pecos River, New Mexico: Development of Species-specific Markers for Studying Early Life History of Pecos River Minnows. Pecos Bluntnose Shiner Genetics," Fall 2006, Fall 2007–present.

Monica Tellez, "Food Web Ecology of the Rio Grande"; REU, Summer 2007; Undergraduate Research, UNO Study, Fall.

Nathan Daves-Brody, REU, "Dynamics and Community Assembly of Algae in the Rio Grande," Summer 2007–present.

Alana Sharp, "Comparative Immunogenetics of Cyprinid Fishes," Fall 2007-present.

WERNER-WASHBURNE, M.

A table of the last 10 years of students mentored is available upon request. The following students were met with weekly in 2007:

- · Andrew Ah Young, Molecular Genetics & Microbiology (J. Nickoloff)
- · Ivy Brown, Pathology (G. Ebel), SOM
- Juan Carlos Pena-Philippides, Biology (M. Werner-Washburne)
- Pablo De la Iglesia, Chemical & Nuclear Engineering (E. Dirk)
- Anne Dodson, Biol. 499
- William Edelman, Biology (T. Turner)
- Isaac Franco, Psychology (D. Hamilton)
- Kristen Gonzales, Biochemistry & Molecular Biology (K. Parra)
- Adrienne Greene, Biol. 400
- · Brenee Hayden (A. Wandinger-Ness)
- Anne Hellebust, Chemical & Nuclear Engineering (E. Dirk)
- Amelia Hilgart, Cell Biology & Physiology (O. Bizzozero)
- Thai Lee, Biology (R. Cripps)
- Leeanne Lovato
- Ari Munoz, Neurosciences (X. Zhao)
- Kelechi Okoro
- · Mabel Padilla
- Anita Quintana, Molecular Genetics and Microbiology (S. Ness)
- Jennifer Plaut, Ph.D.
- Daniel Breecker, Ph.D.
- Mel Strong, Ph.D.
- Sandra White, Masters
- Charles Sanchez, Biology (M.A. Nelson)
- · Phillip Tapia
- Marco Terrazas, Biology (D. Northup)
- Jenny Wilkerson, Biomedical Sciences (A. Wandinger-Ness)
- Melissa Wilson
- Victoria Youngblood, Biol. 400

WITT, C.C.

Faculty mentor to UNM Birding Club, a new club in 2007, 18 members, Sarah Guillinger, organizer.

Non-UNM Undergraduates Mentored:

Jessica A. Castillo, Zachary R. Hanna, University of California-Berkeley, NSF REU participants, June 1-August 5.

Ben Cook, Carrie McAtee, University of Missouri-Columbia, field assistant in Peru, June 1-22.

Christopher L. Merkord, University of Missouri-Columbia, field trip to Peru, June 1-22.

Dora Susanibar, Univ. Nacional Mayor de San Marcos, Lima, Peru

Daniel Echecopar, Jano Nuñez, Univ. Nacional Mayor de San Marcos, Lima, Peru, March 25-April 20.

WOLF, B.O.

Aylissa Corbet, Research Experiences for Undergraduates (REU), National Science Foundation, Summer

Hagit Salomon, Honors thesis, 2007-present

David Adrian Garcia, Undergraduate Nurturing Opportunities (UNO), National Science Foundation, Fall 2007

G. Other Teaching Activities.

CRIPPS, R.M.

Mentor for Post-baccalaureate student (Chrisna Thomas), all year, supported by PREP training program.

DAHM, C.N.

Water Resources 598, Professional Project, one graduate student mentored (Eric Scherff).

FRIDRICK, C.O.

Assessment Coordinator, Department of Biology, UNM, Spring–Fall: As an assessment coordinator, I facilitated the development of assessment plans for each of the UNM General Education Core Curriculum Courses taught in the Department of Biology: Biol. 110, Biol. 112L, Biol.123 and Biol.124L. Assessment plans were developed during spring and summer semesters, with pilot assessments conducted in two sections of Biol.123 during the spring and one section of Biol. 123 during the summer. In Fall 2007, assessments were conducted in all sections of all of the above courses within our department. Assessment plans and results of the assessments conducted were reported by me to the Department Chair, Eric S. Loker, as well as to Tom Root, the Outcomes Manager within the Provost's Office.

HOWE, K.A.

Outside exam reviews (two/exams for each course exam)

LITVAK, M.E.

Member, Committee of Studies:

- · Jennifer Plaut, Ph.D.
- Daniel Breecker, Ph.D.
- Mel Strong, Ph.D.
- · Sandra White, Masters

LOKER, E.S.

Mentored seven post-docs or research faculty working in my laboratory.

MILNE, B.T.

Supported transportation needs of the Acequia Culture and Landscapes of New Mexico course, CHMS (Chicano Hispano Mexicano ST) 393.

Supported Ecovillage Design Education Continuing Education course, Fall.

POCKMAN, W.T.

Participation (via video link) in a graduate course on plant physiological ecology and stress tolerance, Universidad de Buenos Aires, Argentina, June. This course was created in 2005 when I was a Fulbright Senior Specialist in Argentina.

SMITH, F.A.

Developed and taught one-week module on Paleoclimate for M. Litvak's Biol. 402/502, ST/Global Climate Change, Fall.

POE, S.

Advisor for Erik Hulebak (M.S.), Eric Schaad (Ph.D.), Mason Ryan (Ph.D.), Ian Latella (co-advising, with primary advisor Howard Snell).

TURNER, T.F.

Guest Lecturer, "Reef Fishes of the Carribean," Biol. 461L, Introduction to Tropical Biology, Department of Biology, UNM, March.

Guest Lecturer, "The Ichthyofauna of New Mexico," UNM Biology Honors Program, Natural History of the Southwest, October.

WERNER-WASHBURNE, M.

I co-teach the Initiatives to Maximize Student Diversity (IMSD) conference class that meets weekly, requires research proposals and presentations, has invited speakers (three or four), and contains a significant bioethics component (¼ of the class), 23 students each semester

II. PUBLICATIONS.

A. Books Authored.

COOK, J.A.

MacDonald, S.O. and J.A. Cook. 2007. The Mammals and Amphibians of Southeast Alaska. Special Publication, Museum of Southwestern Biology, 191 pp.

B. Books Edited.

BARTON, L.L.

Barton, L.L. and W.A. Hamilton, eds. 2007. Sulphate-reducing Bacteria: Environmental and Engineered Systems. Cambridge University Press, Cambridge, UK. 532 pp.

BROWN, J.H.

Storch, D., P. Marquet and J.H. Brown, eds. Scaling Biodiversity. Cambridge University Press, Cambridge.

C. Chapters in Books or Major Synthetic Reviews.

BARTON, L.L.

Bruschi, M., L.L. Barton, F. Goulhen and R.M. Plunkett. 2007. Enzymatic and genomic studies on the reduction of mercury and selected metallic oxyanions by sulphate-reducing bacteria. Pp. 435-458 in *Sulphate-reducing Bacteria: Environmental and Engineered Systems*, L.L. Barton and W.A. Hamilton, eds. Cambridge University Press, Cambridge, UK.

BROWN, J.H.

Allen, A.P., J.F. Gillooly and J.H. Brown. 2007. Scaling species richness and distribution: Uniting the speacies-area and species-richness relationships. In *Scaling Biodiversity*, D. Storch, P. Marquet and J.H. Brown, eds. Cambridge University Press, Cambridge, U.K.

Brown, J.H., A.P. Allen and J.F. Gillooly. 2007. The metabolic theory of ecology and the role of body size in marine and freshwater ecology. In *Body Size: The Structure and Function of Aquatic Ecosystems*, A. Hildrew, D. Raffaelli and R. Edmonds-Brown, eds. Cambridge University Press, Cambridge, U.K.

DUSZYNSKI, D.W.

Duszynski, D.W., S.J. Upton and M. Bolek. 2007. Coccidia (Apicomplexa: Eimeriidae) of the Amphibians of the World. *Zootaxa* (Magnolia Press) 1667:1-77.

SINSABAUGH, R.L.

Allison, S.D., T. Gartner, K. Holland, M. Weintraub and R.L Sinsabaugh. 2007. Soil enzymes: Linking proteomics and ecological process. Pp. 704-711 in *Manual of Environmental Microbiology*, American Society for Microbiology (ASM) Press.

THORNHILL, R.

Thornhill, R. 2007. Comprehensive knowledge of human evolutionary history requires both adaptationism and phylogenetics. Pp. 31-37 in *The Evolution of Mind: Fundamental Questions and Controversies*, S.W. Gangestad and J. A. Simpson, eds. Guilford Publications, Inc., New York, NY.

Thornhill, R. 2007. The importance of developmental biology to evolutionary biology and vice versa. Pp. 203-209 in *The Evolution of Mind: Fundamental Questions and Controversies*, S.W. Gangestad and J. A. Simpson, eds. Guilford Publications, Inc., New York, NY.

Thornhill, R. 2007. The evolution of woman's estrus, extended sexuality and concealed ovulation and their implications for human sexuality research. Pp. 391-396 in *The Evolution of Mind: Fundamental Questions and Controversies*, S.W. Gangestad and J. A. Simpson, eds. Guilford Publications, Inc., New York, NY.

Gangestad, S.W. and R. Thornhill. 2007. The evolution of social inference processes: The importance of signaling theory. Pp. 33-48 in *Evolution and the Social Mind*, J.P. Forgas, M.G. Haselton and W. von Hippell, eds. Psychology Press, New York, NY.

WAIDE, R.B.

Waide, R.B. 2007. The need to standardize ecological data. In *Principles and Standards for Measuring Primary Production*, T.J. Fahey and A.K. Knapp, eds. Oxford University Press.

WERNER-WASHBURNE, M.

Davidson, G.S., S. Martin, K.W. Boyack, B.N. Wylie, J. Martinez, A. Aragon, M. Werner-Washburne, M. Mosquera-Caro and C. Willman. 2007. Robust methods for microarray analysis. Pp. 99-130 in *Genomics and Proteomics Engineering in Medicine and Biology*, M. Akay, ed., Wiley-IEEE Press, 297 pp.

D. Articles in Refereed Journals.

BARTON, L.L.

Barton, L.L., F. Goulhen, M. Bruschi, N.A. Woodards, R.M. Plunkett and F.J.M. Rietmeijer. 2007. The bacterial metallome: Composition and stability with specific reference to the anaerobic bacterium *Desulforibrio desulfuricans*. *Biometals* 20:291-302.

BERGTHORSSON, U.

Bergthorsson, U., D.I. Andersson and J.R. Roth. 2007. Ohno's dilemma: Evolution of new genes under continuous selection. *Proceedings of the National Academy of Sciences, USA* 104:17004-17009.

BROWN, J.H.

Enquist, B.J., A.P. Allen, J.H. Brown, J.E. Gillooly, A.J. Kerkhoff, K.J. Niklas, C.A. Price and G.B. West. 2007. Does the exception prove the rule? *Nature* 445:E9-E10.

Hamilton, M.J., B.T. Milne, R.S. Walker and J.H. Brown. 2007. Nonlinear scaling of space use in human hunter-gatherers. *Proceedings of the National Academy of Sciences* 104:4765-4769.

Hamilton, M.J., B.T. Milne, R.S. Walker, O. Burger and J.H. Brown. 2007. The complex structure of hunter-gatherer social networks. *Proceedings of the Royal Society of Britain* 274:2195-2202.

Kodric-Brown, A. and J.H. Brown. 2007. Native fishes, exotic mammals, and the conservation of desert springs. Frontiers in Ecology and the Environment 5:549-553.

Kodric-Brown, A., C. Wilcox, J.G. Bragg and J.H. Brown. 2007. Dynamics of fish in Australian desert springs: Role of large-mammal disturbance. *Diversity and Distributions* 13:789-798.

Savage V.M., A.P. Allen, J.H. Brown, J.F. Gillooly, A.B. Herman, W.H. Woodruff and G.B. West. 2007. Scaling of number, size, and metabolic rate of cells with body size in mammals. *Proceedings of the National Academy of Sciences* 104:4718-4723

Sax, D.F., J.J. Stachowicz, J.H. Brown et al. 2007. Ecological and evolutionary insights from species invasion. *Trends in Ecology and Evolution* 22:465-471.

Sibly R.M. and J.H. Brown. 2007. Effects of body size and lifestyle on evolution of mammal life histories. *Proceedings of the National Academy of Sciences* 104:17707-17712.

Nekola, J.C. and J.H. Brown. 2007. The wealth of species: ecological communities, complex systems and the legacy of Frank Preston. *Ecology Letters* 10(3):188-196.

CHARNOV, E.L.

Charnov, E.L., R. Warne and M. Moses. 2007. Lifetime reproductive effort. *American Naturalist* 170:E129-142.

COLLINS, S.L.

Heatherly, T., M.R. Whiles, D.J. Gibson, S.L. Collins, A.D. Huryn, J.K. Jackson and M.A. Palmer. 2007. Stream insect distributional patterns and metapopulation models: Effects of taxonomic resolution, spatial scale and sampling intensities. *Oecologia* 151:313-321.

Baez, S., J. Fargione, D.I. Moore, S.L. Collins and J.R. Gosz. 2007. Atmospheric nitrogen deposition in the northern Chihuahuan desert: Temporal trends and potential consequences. *Journal of Arid Environments* 68:640-651.

Pennington, D. and S.L. Collins. 2007. Remotely-sensed response of an aridland ecosystem to pervasive drought. *Landscape Ecology* 22:897-910.

Clark, C.M., E.E. Cleland, S.L. Collins, J.E. Fargione, L. Gough, K.L. Gross, S.C. Pennings, K.N. Suding and J.B. Grace. 2007. Environmental and plant community determinants of species loss following nitrogen enrichment. *Ecology Letters* 10:596-607.

Zeglin, L.H., M. Stursova, R.L. Sinsabaugh and S.L. Collins. 2007. Microbial responses to nitrogen addition in three contrasting grassland ecosystems. *Oecologia* 154:349-359.

Ravi, S., P. D'Odorico, T.M. Zobeck, T.M. Over and S.L. Collins. 2007. Feedbacks between fires and wind erosion in heterogeneous arid lands. *Journal of Geophysical Research* 112: G04007, doi:10.1029/2007JG000474.

COOK, J.A.

Arai, S., J.-W. Song, L. Sumibcay, V.R. Nerurkar, S.N. Bennett, C. Parmenter, J.A. Cook, T.L. Yates, R. Yanagihara. 2007. Hantavirus in the short-tailed shrew, North America. *Emerging Infectious Diseases* 13:1420-1423.

Lucid, M.K. and J.A. Cook. 2007. Cytochrome b haplotypes suggest an undescribed *Peromyscus* species from the Yukon. *Canadian Journal of Zoology* 85:916-919.

Kochler, A.V.A., E.P. Hoberg, N.E. Dokuchaev and J.A. Cook. 2007. Geographic and host range of the nematode *Soboliphyme baturini* across Beringia. *Journal of Parasitology* 93:1070-1083.

Duszynski, D.W., A.J. Lynch and J.A. Cook. 2007. Coccidia (Apicomplexa: Eimeriidae) infecting cricetid rodents from Alaska, U.S.A., and Northeastern Siberia, Russia, and description of a new *Eimeria* species from *Myodes rutilus*, the northern red-backed vole. *Comparative Parasitology* 74:294-311.

Lynch, A.J., D.W. Duszynski and J.A. Cook. 2007. Species of Coccidia (Apicomplexa: Eimeriidae) infecting pikas from Alaska, U.S.A. and Northeastern Siberia, Russia. *Journal of Parasitology* 93(5):1230–1234.

Dalerum, F., J. Loxterman, B. Shults, K. Kunkel and J. A. Cook. 2007. Microsatellite markers suggest delayed female dispersal in a solitary carnivore, the wolverine. *Journal of Mammalogy* 88:793-800.

Waltari, E., E.P. Hoberg, E.P. Lessa and J.A. Cook. 2007. Eastward ho: Phylogeographic perspectives on colonization across the Beringian nexus. *Journal of Biogeography* 34:561-574.

CRIPPS, R.M.

Ryan, K.M., J.D. Hendren, L.A. Helander and R.M. Cripps. 2007. The NK homeodomain transcription factor Tinman is a direct activator of seven-up in the *Drosophila* dorsal vessel. *Developmental Biology* 302:694-702.

Hendren, J.D., A.P. Shah, A.M. Arguelles and R.M. Cripps. 2007. Cardiac expression of the Drosophila sulphonylurea receptor gene is regulated by an intron enhancer dependent upon the NK homeodomain transcription factor Tinman. Mechanisms of Development 124: 416-426.

CUNNINGHAM, C.

Herpin, A. and C. Cunningham. 2007. Cross-talk between the Bone Morphogenetic Protein pathway and other major signaling pathways results in tightly regulated cell-specific out-comes. *FEBS J.* 274:2977-2985.

Herpin, A., C. Lelong, T. Becker, P. Favrel and C. Cunningham. 2007. A tolloid homologue from the Pacific oyster, Crassostrea gigas. Gene Expression Patterns 7:700-708.

Jenny, M.J., R.W. Chapman, A. Mancia, A.Y. Chen, D. McKillen, H. Trent, P. Lang, J.-M. Escoubas, E. Bachere, V. Boulo, J.Z. Liu, P.S. Gross, C. Cunningham, P.M. Cupit, A. Tanguy, X. Guo, D. Moraga, I. Boutet, A. Huvet, S. De Guise, J.S. Almeida and G.W. Warr. 2007. A cDNA microarray for *Crassostrea virginica* and *C. gigas. Marine Biotechnology* 9:577-91.

DAHM, C.N.

Vinson, D.S., S.E. Block, L.J. Crossey and C.N. Dahm. 2007. Biogeochemistry at the zone of intermittent saturation: Field-based study of the shallow alluvial aquifer, Rio Grande, New Mexico. *Geosphere* 3:366-380.

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E. Book Reviews.

BARTON, L.L.

Willey, J.M., L.M. Scerwook and C. Woolverton. 2007. Prescott's Principles of Microbiology. McGraw-Hill Publishers, New York, NY.

COUCH, L.

Tortora, G.J., B.R. Funke and C.L. Case. 2006. *Microbiology*, 9th ed., Benjamin Cummings, 960 pp.

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Essential Biology. 2006. N.A. Campbell, J.B. Reece and E. Simon. Pearson Education.

TURNER, T.F.

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F. Articles in Non-scholarly Journals.

COOK, J.A.

Dawson, N.G., S.O. MacDonald and J.A. Cook. 2007. Endemic mammals of the Alexander Archipelago. In *Wildlife Management on the Tingass National Forest*, J. Schoen, Ed. Audubon Special Publication.

G. Quasi-public Reports for Internal/external Circulation.

COLLINS, S.L.

Collins, S.L., S.M. Swinton, C.W. Anderson, B.J. Benson, J. Brunt, T. Gragson, N.B. Grimm, M. Grove, D. Henshaw, A.K. Knapp, G. Kofinas, J.J. Magnuson, W. McDowell, J. Melack, J.C. Moore, L. Ogden, J.H. Porter, O.J. Reichman, G.P. Robertson, M.D. Smith, J. Vande Castle and A.C Whitmer. 2007. Integrated Science for Society and the Environment: A Strategic Research Initiative. Publication #23 of the U.S. LTER Network. LTER Network Office, Albuquerque NM. 35 pp.; http://www.lternet.edu/planning

COOK, J.A.

Annual Report of the Division of Mammals, Museum of Southwestern Biology, UNM.

HANSON, D.T.

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TURNER, T.F.

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WAIDE, R.B.

2007-08 Annual Report on the Long-Term Ecological Research (LTER) Network Office, submitted to the National Science Foundation for DEB-0236154.

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2007 Annual Report to the Luquillo Long Term Ecological Research (LTER) Program for a subcontract with the University of Puerto Rico.

Report on Post-All Scientists Meeting Working Groups; LTER Network News 20 (1), Spring 2007.

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WITT, C.C.

Johnson, A.B. and C.C. Witt. 2007. A Survey of Birds of the Western Andean Cordillera above Incahuasi, Lambayeque, Peru, 28 June–13 July, 2007. Technical Report to the Cento de Ornitología y Biodiversidad, Lima, Peru. 16 pp.

Witt, C.C. 2007. Informe final a INRENA (Lima-Peru) del proyecto con título: "Evolución de los picaflores y otras aves en la Cordillera de los Andes". Authorización No 76-2005-INRENA-IFFS-DCB. Submitted July 4, 2007.

H. Abstracts (Refereed or Invited).

BERGTHORSSON, U.

Bergthorsson, U. 2007. Variation in the Patterns and Features of Young Gene Duplicates in Saccharomyces cerevisiae Relative to Caenorhabditis elegans: Diversity of the Duplication Process or Differing Selective Regimes? American Genetic Association Annual Symposium "Mechanisms of Genome Evolution," Indiana University, Bloomington IN, July.

Bergthorsson, U., K.A. Fitzpatrick, K.J. Lipinski, M. Werner-Washburne, M. Lynch and V. Katju. 2007. High Spontaneous Rate of Gene Duplication in *Caenorhabditis elegans*. American Genetic Association Annual Symposium "Mechanisms of Genome Evolution," Indiana University, Bloomington IN, July.

La Beau, E.M., V. Katju and U. Bergthorsson. 2007. Sex Change by Spontaneous Gene Conversion in a *C. elegans* fog-2 Mutant. American Genetic Association Annual Symposium "Mechanisms of Genome Evolution," Indiana University, Bloomington IN, July.

DAHM, C.N.

Zeglin, L.H., C.L. Crenshaw, C.N. Dahm and C. Takacs-Vesbach. 2007. Bacterial community structure and nitrogen transformation in hyporheic zones of arid-land streams. Annual Fall Meeting, American Geophysical Union, San Francisco CA, December 10-14.

Cleverly, J.R., J.R. Thibault and C.N. Dahm. 2007. Ecohydrology of the Middle Rio Grande riparian zone in New Mexico. Annual Meeting of the Geological Society of America, Denver CO, October 18-31.

Crossey, L.J., K.E. Karlstrom, C. Takacs-Vesbach, C.N. Dahm, D.R. Hilton, D.L. Newell and T.P. Fischer. 2007. CO₂-rich mound springs of the Western U.S.: 'Continental smokers' and their influence on geomicrobiology and water quality. Annual Meeting of the Geological Society of America, Denver CO, October 18-31.

Follstad Shah, J., C.N. Dahm and R.L. Sinsabaugh. 2007. Native *Populus deltoides* ssp. *wislizenii* and non-native *Tumarix chinensis* are functionally similar regarding soil nitrogen resource acquisition and allocation. Joint Meeting of the Ecological Society of America (ESA) and Society for Ecological Restoration (SER) International, San Jose CA, August 5-10.

Dahm, C.N. 2007. Climate change and water budgets of river and riparian ecosystems. Third International Symposium on Riverine Landscapes (TISORL), South Stradbroke Island, Queensland, Australia, August 27–September 1.

HANSON, D.T.

Invited seminar speaker, "Leaf Level Control of Water Use Efficiency: New Insights Using High Frequency Isotopic Analyses," Western Cotton Research Station, U.S. Department of Agriculture, Maricopa AZ, February.

Invited seminar speaker, "New Discoveries after Two Centuries of Debate in Plant Biology on How Gasses Move Through Leaves, "The Interdisciplinary Plant Group, University of Missouri, Columbia MO, April.

Symposium co-chair (with L. Waters, San Diego State University) and speaker, "Early Land Plant Adaptations to Limitation of Photosynthesis by CO₂ Diffusion," Plant Biology and Botany 2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

Invited seminar speaker, "The Evolution of Resistance to Photosynthetic CO₂ Exchange, The Interdisciplinary Plant Group, San Diego State University, San Diego CA, October.

KATJU, V.

Katju, V., J.C. Farslow and U. Bergthorsson. 2007. Variation in the patterns and features of young gene duplicates in *Saccharomyces cerevisiae* relative to *Caenorhabditis elegans*: Diversity of the duplication process or differing selective regimes? Annual Symposium: Mechanisms of Genome Evolution, American Genetic Association, Bloomington IN, July.

Bergthorsson, U., K.A. Fitzpatrick, K.J. Lipinski, M. Werner-Washburne, M. Lynch and V. Katju. 2007. High spontaneous rate of gene duplication in *Caenorhabditis elegans*. Annual Symposium: Mechanisms of Genome Evolution, American Genetic Association, Bloomington IN, July.

La Beau, E.M., V. Katju and U. Bergthorsson. 2007. Sex change by spontaneous gene conversion in a *C. elegans* fog-2 mutant. Annual Symposium: Mechanisms of Genome Evolution, American Genetic Association, Bloomington IN, July.

LITVAK, M.E.

Litvak, M.E., J. Heilman, K. McInnes, A. Thijs, K. Owens and J. Kjelgaard. 2007. Influence of vegetation cover on rain pulse responses in semi-arid savannas in central Texas. Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

Thijs, A., C.T. Lai and M. Litvak. 2007. Insights from tower-flux, physiological and stable isotope measurements to elucidate climatic and structural controls on CO₂ exchange in an encroaching savanna. Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

Molotch, N.P., J.R. McConnell, M. Litvak and P.D. Brooks. 2007. Ecohydrological controls on snowmelt partitioning in a mixed-conifer sub-alpine forest, Valles Caldera, New Mexico. Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

LOKER, E.S.

Loker, E.S. 2007. Parasites as elicitors and modulators of invertebrate immune responses: Trematodes and snails as a model system. European Science Foundation Innate Immunity, Obergurgl, Austria, April 20-28.

Loker, E.S. 2007. Innate immunity in invertebrates: Is pattern recognition enough? American Society of Parasitologists, Mérida, México, June 21-25.

LOWREY, T.K.

T. Lowrey, T.K. 2007. Herbarium Networking: United We Stand. Keynote Address, Joint Meeting of the Texas-Oklahoma Regional Consortium of Herbaria and the Southwest Association of Naturalists, Stephensville TX, April.

MILNE, B.T.

Milne, B.T. 2007. Proactive Landscape Research and the Descent from Fossil Fuels. Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology, Tucson AZ, April 9-13.

SMITH, F.A.

Smith, F.A. 2007. A tale of two species: Extirpation, range expansion and evolution in an extreme environment during the late Quaternary. Organized oral session on "Stepping Back in Time: The Application of Historical and Fossil Records to Recovering Ecological Baselines," Annual Meeting of the Ecological Society of America, San Jose CA, July.

TURNER, T.F.

Osborne, M.J. and T.F. Turner. 2007. Conservation genetics of the Rio Grande silvery minnow (*Hybognathus amarus*): Genetic monitoring program, 2007. Invited Symposium: Middle Rio Grande Endangered Species Act Collaborative Program, UNM, April 16-17.

I. Abstracts (Contributed) (including Research Day abstracts of your students).

BERGTHORSSON, U.

Lipinski, K.J., V. Katju and U. Bergthorsson. 2007. Gene Duplication and Deletion During Mutational Decline and Recovery Fitness in *Caenorhabditis elegans*. Annual Meeting of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists (GREEB), Abiquiu NM, September.

La Beau, E.M., V. Katju and U. Bergthorsson. 2007. Sex Change by Spontaneous Gene Conversion in a *C. elegans* fog-2 Mutant. 16th Annual Research Day, Department of Biology, UNM, April 13.

Nourestani, M., V. Katju and U. Bergthorsson. 2007. Are Partial and Chimeric Gene Duplications Functional? 16th Annual Research Day, Department of Biology, UNM, April 13.

Lovato, L. and U. Bergthorsson. 2007. Molecular Evolution of Paternally and Maternally Inherited Plant Mitochondrial DNA. 16th Annual Research Day, Department of Biology, UNM, April 13.

La Beau, E.M., V. Katju and U. Bergthorsson. 2007. Sex Change by Spontaneous Gene Conversion in a *C. elegans* fog-2 Mutant. Western IDeA States' Symposium on Evolutionary Medicine, Albuquerque NM, March.

COLLINS, S.L.

Nine abstracts, the 2007 Joint Meeting of the Ecological Society of America & The Society for Ecological Restoration (SER) International, San Jose CA, August 5-10.

One abstract, the Annual Kruger National Park Science Symposium, Kruger National Park, Mpumalanga, South Africa, April.

COOK, J.A.

Torres-Perez, F., B.S. Barker, R.E. Palma and J.A. Cook. 2007. Population structure of a rodent reservoir for Hantavirus, O. longicaudatus, in Chile and its human implications. Evolutionary Change in Human-altered Environments: An International Summit. Institute of the Environment University of California, Los Angeles CA, February.

Dawson, N., A. Hope, S. MacDonald and J. A. Cook. 2007. Endemic mammals highlight conservation hotspots in the Alexander Archipelago. Poster, Evolutionary Change in Humanaltered Environments: An International Summit. Institute of the Environment University of California, Los Angeles CA, February.

Koehler, A.V.A., E.P. Hoberg, N.E. Dokuchaev, N.A. Tranbenkova, J.S. Whitman, D.W. Nagorsen and J.A. Cook. 2007. Phylogeography of *Soboliphyme baturini*, a transBeringian nematode of mustelids. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Arai, S., L. Sumibcay, T.L. Yates, S. Ohdachi, N.U. Truong, C. Parmenter, J.A. Cook, V.R. Nerurkar, J.-W. Song and R. Yanagihara. 2007. Search for novel insectivore-borne hantaviruses.

VII International Hemorrhagic Fever with Renal Syndrome (HFRS) Meeting, Buenos Aires, Argentina, June.

Arai, S., L. Sumibcay, J.-W. Song, T.L. Yates, V.R. Nerurkar, S.N. Bennett, C. Parmenter, J.A. Cook and R. Yanagihara. 2007. A phylogenetically distinct Hantavirus in the Short-Tailed Shrew (*Blarina brevicauda*) in the United States. VII International Hemorrhagic Fever with Renal Syndrome (HFRS) Meeting, Buenos Aires, Argentina, June.

Arai, S., L. Sumibcay, J.-W. Song, T.L. Yates, V.R. Nerurkar, S.N. Bennett, C. Parmenter, J.A. Cook and R. Yanagihara. 2007. A phylogenetically distinct Hantavirus in the Short-Tailed Shrew (Blarina brevicauda) in the United States. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Torres-Perez, F., R.A. Medina, R.E. Palma, B. Hjelle and J.A. Cook. 2007. Population and ecogeographic genetic structure of *O. longicaudatus* and Andes virus in three major Chilean ecoregions. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Esteva, M., F. Cervantes, S, Brant and J. A. Cook. 2007. Phylogenetic relationships of Saussure's shrew from Mexico. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Tsvetkova A., J.A. Cook, E. Hoberg, H. Henttonen, S. MacDonald, J. Laakkonen and D. Goade. 2007. The Beringian Coevolution Project: Model archives provide baselines for research and management. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

MacDonald, S.O. and J.A. Cook. 2007. Alaska land mammals of conservation concern. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Dawson, N., M. Small, K. Stone and J. A. Cook. 2007. Islands, introductions, and endemism, Martes in the Alexander Archipelago. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Beringian Coevolution Project. PolarPalooza, New Mexico Museum of Natural History, Albuquerque NM, October-December.

Matsumoto, K., J.A. Cook, H.K. Goethert and S.R. Telford. 2007. Bartonella sp. infection of red-backed voles trapped from an interior Alskan sire where ticks are absent. Annual Meeting of the American Society of Tropical Medicine and Hygiene, Philadelphia PA, November.

Nofchissey, R.A., J.A. Cook, D. Goade, A. Tsvetkova and G. Ebel. 2007. Serological evidence of Powassan virus transmission in small mammals collected in Russia, Alaska and the Southwest U.S. Annual Meeting of the American Society of Tropical Medicine and Hygiene, Philadelphia PA, November.

Yanagihara, R., J.-W. Song, S. Arai, S.N. Bennett and J. A. Cook. 2007. Evolutionary insights from newly identified soricid-borne hantaviruses. Fifth International Conference on Emerging Zoonoses, Limassol, Cyprus, November.

CUNNINGHAM, C.

Melman S.D., A. Aragon, M. Steinauer, E. Hatton, G. Mkoji, C. Cunningham and E.S. Loker. 2007. Apparent emergence of Praziquantel resistance in a Kenyan isolate of *Schistosoma mansoni*. Western IDeA State's Symposium on Evolutionary Medicine, Albuquerque NM, March 14-16.

Imani, R., A. Aragon and C. Cunningham. 2007. Gene expression analysis of heat shocked *Schistosoma mansoni*. Western IDeA State's Symposium on Evolutionary Medicine, Albuquerque NM, March 14-16.

Imani, R, A. Aragon and C. Cunningham. 2007. Gene expression analysis of heat shocked *Schistosoma mansoni* and its application in the development of assays to monitor praziquantel resistance. Annual Research Day, Department of Biology, UNM, April 13.

Cunningham, C., A. Mancia, G.W. Warr, A. Veloso and R.W. Chapman. 2007. Transcriptomal responses to bacterin injection in the American oyster, *Crassostrea virginica*. Oceans and Human Health Annual Meeting, Muskegon MI, October 22-24.

Jenny, M.J., J.S. Almeida, C. Cunningham, A.L. Mancia, M. Beal, G.W. Warr, A. Veloso, B. Macey, E. Burge, K.G. Burnett, L. Burnett, A.F. Holland, P.S. Gross, P. Cupit-Cunningham, S. Hikima, M. Peck, D. McKillen, H.F. Trent III and R.W. Chapman. Transcript profiles of American oysters, *Crassostrea virginica*, exposed to metal contaminants. Oceans and Human Health Annual Meeting, Muskegon MI, October 22-24.

DAHM, C.N.

Thibault, J.R., J.R. Cleverly and C.N. Dahm. 2007. An Examination of water table hydrographs and water use by phreatophytes. Annual Fall Meeting, American Geophysical Union, San Francisco CA, December 10-14.

Cleverly, J.R., S.B. Teet, J.R. Thibault and C.N. Dahm. 2007. Evapotranspiration and river discharge interactions with fire, partial success restoration, and climate change. Annual Fall Meeting, American Geophysical Union, San Francisco CA, December 10-14.

Zeglin, L.H., C.D. Takacs-Vesbach, C.N. Dahm, R.L. Sinsabaugh, J.E. Barrett and M. Gooseff. 2007. Microbial taxonomic and functional diversity in parafluvial sediments of cold and hot desert streams. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Crenshaw, C.L., L.H. Zeglin and C.N. Dahm. 2007. Nitrate dynamics and microbial diversity in stream hyporheic zones. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Mulholland, P.J., L.R. Ashkenas, L.W. Cooper, C.N. Dahm, W.K. Dodds, S. Findlay, S.V. Gregory, N.B. Grimm, R.O. Hall, S.K. Hamilton, S.L. Johnson, W.H. McDowell, J.L. Meyer, B.J. Peterson, G.C. Poole, J.L. Tank, H.M. Valett, J.R. Webster, C. Arango, M.J. Bernot, J.J. Beaulieu, A.J. Burgin, C. Crenshaw, A.M. Helton, L. Johnson, J. Merriam, B.R. Niederlehner, J.M. O'Brien, J. Potter, R.W. Sheibley, D.J. Sobota and S.M. Thomas. 2007. Nitrate uptake and

denitrification rates in streams determined during the LINX II 15N addition experiments. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Helton, A.M., G.C. Poole, J.L. Meyer, P.J. Mulholland, L.R. Ashkenas, L.W. Cooper, C.N. Dahm, W.K. Dodds, S. Findlay, S.V. Gregory, N.B. Grimm, R.O. Hall, S.K. Hamilton, S.L. Johnson, W.H. McDowell, B.J. Peterson, J.L. Tank, H.M. Valett, J.R. Webster, C. Arango, M.J. Bernot, J.J. Beaulieu, C. Crenshaw, J. Merriam, B. Niederlehner, J.M. O'Brien, J. Potter, R.W. Sheibley, D.J. Sobota, S.M. Thomas and L.H. Zeglin. 2007. Implications of the LINX-II 15N addition experiments for patterns of biotic nitrate uptake across stream networks. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Findlay, S., P.J. Mulholland, R.O. Hall, S.K. Hamilton, B.J. Peterson, J.L. Tank, C.N. Dahm, W.K. Dodds, N.B. Grimm, W.H. McDowell, H.M. Valett, J.R. Webster, C. Crenshaw, J. Potter, M.J. Bernot and D.J. Sobota. 2007. Stream denitrification potential: Where and how much? 55th Annual Meeting of the North American Benthological Society, Columbia, South Carolina.

Dahm, C.N. 2007. Riparian zone evapotranspiration, ground water/surface water interactions, and climate change. 2007 Joint Conference of the New Zealand Freshwater Sciences Society and Australian Society for Limnology, Queenstown, New Zealand, December 3-7.

HANSON, D.T.

Powers, H.H., J. Hunt, D.T. Hanson and N.G. McDowell. 2007. Measurement of stable CO₂ isotopes with a laser: Tunable diode laser spectroscopy applications for ecosystem measurements. 16th Annual Research Day, Department of Biology, UNM, April 13.

Bickford, C.P., N.G. McDowell, H.H. Powers, K.M. Brown and D.T. Hanson. 2007. Using tunable diode laser spectroscopy to determine carbon isotope discrimination and internal leaf conductance in field-grown juniper. 16th Annual Research Day, Department of Biology, UNM, April 13.

Bickford, C. P., N.G. McDowell, H.H. Powers, K.M. Brown and D. T. Hanson. 2007. Using tunable diode laser spectroscopy to determine carbon isotope discrimination and internal transfer conductance in field-grown juniper. Plant Biology and Botany 2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

Barbour, M., G. Tcherkez, N.G. McDowell and D.T. Hanson. 2007. On-line stable carbon isotope analysis of leaf-respired CO₂. EcoFizz–2007, Ecological Physiology Meeting, Sydney, Australia, September 27-28.

KATJU, V.

Lipinski, K. J., V. Katju and U. Bergthorsson. 2007. Gene Duplication and Deletion During Mutational Decline and Recovery Fitness in *Caenorhabditis elegans*. Annual Meeting of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists (GREEB), Abiquiu NM, September.

La Beau, E.M., V. Katju and U. Bergthorsson. 2007. Sex Change by Spontaneous Gene Conversion in a C. elegans fog-2 Mutant. 16th Annual Research Day, Department of Biology, UNM, April 13.

Nourestani, M., V. Katju and U. Bergthorsson. 2007. Are Partial and Chimeric Gene Duplications Functional? 16th Annual Research Day, Department of Biology, UNM, April 13.

La Beau, E.M., V. Katju and U. Bergthorsson. 2007. Sex Change by Spontaneous Gene Conversion in a C. elegans fog-2 Mutant. Western IDeA States' Symposium on Evolutionary Medicine, Albuquerque NM, March.

KODRIC-BROWN, A.

Kodric-Brown, A. 2007. Breeding behavior, hybridization and conservation of desert fish. Joint Meeting of the Ecological Society of America and the Society for Ecological Restoration International, San Jose CA, August 5-10.

LOKER, E.S.

Zhang, S.-M.N., Y. Zeng and Loker, E.S. 2007. Expression profiling and binding properties of fibrinogen-related proteins (FREPs), plasma lectins from the snail *Biomphalaria glabrata*, the intermediate host of the human blood fluke *Schistosoma mansoni*. American Society of Parasitologists, Mérida, México, June 21-25.

Lotfy, W.M., S.V. Brant, T.H. Le, A. Demiaszkiewicz, J.M. Kinsella, J. Rajapakse and E.S. Loker. 2007. Evolution of the Family *Fasciolidae* Railliet, 1895. American Society of Parasitologists, Merida, Mérida, México, June 21-25.

Steinauer, M.L., I.N. Mwangi, J.M. Kinuthia, G.M. Mania, G.M. Mkoji and E.S. Loker. 2007. Epidemiology and chronobiology of schistosomes from Lake Victoria, Kenya. American Society of Parasitologists, Mérida, México, June 21-25.

Melman, S.D., M.L. Steinauer, E.S. Hatton, G.M. Mkoji, A. Aragon, A., C. Cunningham, and E.S. Loker. 2007. Apparent emergence of praziquantel resistance in a Kenyan isolate of *Schistosoma mansoni*. American Society of Parasitologists, Mérida, México, June 21-25.

Stout, B.A., S.-M. Zhang, C.M. Adema and E.S. Loker. 2007. Relationship of FREPs to acquired resistance in the snail *Biomphalaria glabrata*. American Society of Parasitologists, Mérida, México, June 21-25.

Steinauer, M.L., I.J. Wilson, G.M. Mkoji, E.L. Agola, I. Ndugu, G. Maina, D. Karanja, and E.S. Loker. 2007. Molecular and evolutionary epidemiology of *Schistosoma mansoni* in the human host. American Society of Tropical Medicine and Hygiene, Philadelphia PA, November 4-7.

Stout, B.A., S.M. Zhang, C.M. Adema and E.S. Loker. 2007. Relationship of specific fibrinogen-related proteins to acquired resistance in the snail *Biomphalaria glabrata*. American Society of Tropical Medicine and Hygiene, Philadelphia PA, November 4-7.

LOWREY, T.K.

Brouillet, L., T. Lowrey, L. Urbatsch, V. Karaman and G. Sancho. 2007. Phylogeny and evolution of the Tribe Astereae. Botany 2007 National Meetings, Chicago II, July.

Redfern, J., D. Hafner and T. Lowrey. 2007. Phylogeography of *Fouquieria splendens* and related *Fouquieria* species: Evolutionary history of North American warm deserts from a botanical perspective. Ecological Society of America, San Jose CA, July.

MARSHALL, D.L.

Barnes, M.G. and D.L. Marshall. 2007. The effect of plant source location on revegetation success: A reciprocal transplant experiment with winterfat (*Krascheninnikovia lanata*). Annual Meeting of the Ecological Society of America, San Jose CA, August. Published online by the society (no volume or page number available): http://eco.confex.com/eco/2007/techprogram/D1004.htm

Koontz, T.L., D.L. Marshall and B.T. Milne. 2007. The effect of herbivores on seedbanks in a grassland and a shrubland. Annual Meeting of the Ecological Society of America, San Jose CA, August. Published online by the society (no volume or page number available): http://eco.confex.com/eco/2007/techprogram/D1004.htm

Simpson, H.L. and D.L. Marhsall. 2007. Patterns of genotypic and phenotypic variation in an invasive mustard (*Isatis tinctoria*) across its introduced range. Annual Meeting of the Ecological Society of America, San Jose CA, August. Published online by the society (no volume or page number available): http://eco.confex.com/eco/2007/techprogram/D1004.htm

Abrahamson, N.J., M.G. Barnes, T.L. Koontz, J.S. Medeiros, M.G.M. Shaner, H.L. Simpson, D.L. Marshall and J. Avritt. 2007. Who's your daddy? Should you care? Effects of paternity on embryo development in wild radish. 16th Annual Research Day, Department of Biology, UNM, April 13.

MILNE, B.T.

Milne, B.T. and D.A. Dean. 2007. Maximization of Shannon Diversity under Constraints Explains the Partitioning of Species Richness among Vertebrate Taxa in North America. Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

Koontz, T.L., D.L. Marshall and B.T. Milne. 2007. The Effects of Herbivores on Seed Banks in a Grassland and Shrubland. Ecological Society of America/Society for Ecological Restoration International (ESA/SER) Joint Meeting, San Jose CA, August 5-10.

Luck, M. and B.T. Milne. 2007. Spatial Gradients Reveal Universality Classes in the Relation Between Precipitation and Landscape Structure. Annual Symposium of the U.S. Regional Association of International Association Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

Milne, B.T. 2007. Tree Ringlets: Time- and Space-dependent Tree Growth in Strahler Stream Networks. Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

NATVIG. D.O.

Porras-Alfaro, A., J. Herrera, R.L. Sinsabaugh and D.O. Natvig. 2007. Effect of long term nitrogen fertilization on fungal communities in a semiarid grassland. Oral presentation, Annual Meeting of the Mycological Society of America, Baton Rouge LA, August 5-9.

Porras-Alfaro, A., J. Herrera, R.L. Sinsabaugh and D.O. Natvig. 2007. Effect of long term nitrogen fertilization on endophytic fungal community associated with *B. gracilis* roots. Poster presentation, Jornada–Sevilleta Long Term Ecological Research Joint Meeting, Las Cruces NM, July.

NELSON, M.A.

Chee, C., D. Martinez and M.A. Nelson., 2007. Computational predictions of gene structure in the filamentous fungus *Aspergillus niger*. 16th Annual Research Day, Department of Biology, UNM, April 13.

Chee, C., J. Kunkel, C. Sanchez and M.A. Nelson. 2007. Functional genomic analysis of sexual development in *Neurospora crassa*. 2007 SACNAS 34th Annual Conference, Kansas City MO, October 11-14.

Kunkel, J. and M.A. Nelson. 2007. Sexual development in Neurospora crassa: A functional genomics approach. 2007 SACNAS 34th Annual Conference, Kansas City MO, October 11-14.

POCKMAN, W.T.

Glaser, J.C., N.A. Davision, J.E. Johnson, E.A. Yepez and W.T. Pockman. 2007. Water sources and carbon isotope discrimination in piñon-juniper woodlands at the Sevilleta LTER. Annual Research Day, Department of Biology, UNM, April 13.

White, S.A., W.T. Pockman, N.G. McDowell, M. Ryan and E. Yepez. 2007. Soil respiration in a piñon-juniper ecosystem. Annual Research Day, Department of Biology, UNM, April 13.

Yepez, E.A., J. Elliot, S.A. White, J. Plaut, N. McDowell and W.T. Pockman. 2007. Hydraulic mechanisms related to tree mortality and survival during drought in Piñon (*Pinus edulis*) and Juniper (*Juniperus monosperma*) woodlands. Joint Assembly with the American Geophysical Union, Acalpulco, Mexico, May.

McDowell, N. and W.T. Pockman. 2007. Hydraulic framework for understanding mechanisms of woody plant survival and mortality during drought. Annual Meeting of the DOE Program for Ecosystem Research, Rhinelander WI, June.

White, S.A., W.T. Pockman and N.G. McDowell. 2007. Comparison of water flux patterns across disparate species located along a steep climate transect in the Rio Grande Basin. Valles Caldera Ecohydrology Meeting (sponsored by NSF Sustainability of semi-Arid Hydrology and Riparian Areas [SAHRA]), Tucson AZ, August.

Fargione, J.E., S.L. Collins, W.T. Pockman, J.R. Elliott, C.L. Crenshaw and E. Nonaka. 2007. Rapid plant community responses to nighttime warming in a desert grassland. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Johnson, J., S.L. Collins, S. Baez, W.T. Pockman and E.E. Small. 2007. Effects of experimental drought and water addition on community dynamics in three aridland plant communities. Annual Meeting of the Ecological Society of America, San Jose CA, August.

McDowell, N.G. and W.T. Pockman. 2007. Hydraulic framework for understanding mechanisms of woody plant survival and mortality during drought. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Medeiros, J.S., D.T. Hanson and W.T. Pockman. 2007. Freezing tolerance in high and low latitude populations of *Larrea tridentata*: Evidence for local adaptation to long-term minimum temperature. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Plaut, J., E. Yepez, W.T. Pockman and N.G. McDowell. 2007. Precipitation pulse responses in piñon-juniper woodland in central New Mexico. Annual Meeting of the Ecological Society of America, San Jose CA, August.

White, S.A., W.T. Pockman, N. McDowell, M. Ryan and E. Yepez. 2007. Soil respiration responses to precipitation pulse-dynamics in a piñon-juniper ecosystem. Annual Meeting of the Ecological Society of America, San Jose CA, August.

White, S.A., W.T. Pockman, M.G. Ryan, N.G. McDowell and E. Yepez. 2007. Soil respiration seasonal patterns and responses to precipitation in a piñon-juniper woodland ecosystem in the southwest. TERRAC (Terrestrial Ecosystem Responses to Atmospheric and Climate Change) Workshop on Automated Measurements of Soil Respiration, Durham NH, September.

Yepez, E.A., J. Elliot, S.A. White, J. Plaut, N. McDowell and W.T. Pockman. 2007. Causes and consequences of tree mortality in piñon-juniper woodlands: Introducing an ecosystem scale rainfall manipulation. Annual Meeting of the Ecological Society of America, San Jose CA, August.

SINSABAUGH, R.L.

Moorhead, D.L. and R.L. Sinsabaugh. 2007. Modeling C dynamics with measurable biological and SOM parameters. Annual Meeting of the Soil Science Society of America, November 4-8.

Brandt, L.A, J.Y. King, D.G. Milchunas, R.L. Sinsabaugh, S.E. Hobbie and W.J. Parton. 2007. Effects of ultraviolet radiation on the early stages of litter decomposition in three contrasting grassland ecosystems. Annual Meeting of the Ecological Society of America, San Jose CA, August 5-10.

Porras-Alfaro, A., J. Herrera, R.L. Sinsabaugh and D.O. Natvig. 2007. Effect of nitrogen fertilization on fungal communities in a semiarid grassland. Mycological Society of America, Baton Rouge LA, August 6-9.

Sinsabaugh, R.L., C. Crenshaw, L.E. Green, K. Lipinski, K.J. Odenbach, A. Porras-Alfaro, M. Stursova and L. Zeglin. 2007. Fungal loop model for the N cycle of semiarid grassland. Soil Ecology Society, Moab UT, April 29–May 3.

Zeglin, L.H., C.D. Vesbach, C.N. Dahm, R. L. Sinsabaugh, J.E. Barrett and M.N. Gooseff. 2007. Microbial taxonomic and functional diversity in parafluvial sediments of cold and hot desert streams. 55th Annual Meeting of North American Benthological Society, Columbia SC, June.

Hamaoui G.S., L. Tuhela, M.N. Spilde, R.L. Sinsabaugh and D.E. Northup. 2007. Identification of microbial signatures in biogenic cave ferromanganese deposits (FMD). American Society for Microbiology, Toronto, Canada, May 21-25.

SMITH, F.A.

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewki and K.M. Youberg. 2007. A tale of two species: Extirpation, range expansion and evolution in an extreme environment. International Biogeography Society, Tenerife, Spain, January.

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewki, and K.M. Youberg. 2007. A tale of two species: Extirpation, range expansion and evolution in an extreme environment during the late Quaternary. American Association of Mammalogists, Albuquerque NM, June.

Youberg, K.M., F.A. Smith, and S.K. Lyons. 2007. What drives the similarity of mammalian body size across continents? American Association of Mammalogists, Albuquerque NM, June.

Mathiasen, C., I.W. Murray, B.O. Wolf, and F.A. Smith. 2007. Portable ultrasonography: Developing non-destructive techniques for quantifying reproductive effort under field conditions. American Association of Mammalogists, Albuquerque NM, June.

SNELL, H.L.

Bateman, H.L., A. Chung-MacCoubrey and H.L. Snell. 2007. Effects of non-native plant removal on lizard abundance along the Middle Rio Grande in New Mexico. Joint Meeting of the Ecological Society of America and Society of Ecological Restoration, San Jose CA, August 5-10.

Giermakowski, J.T. and H.L. Snell. 2007. Covariation of size and vegetative productivity in Galápagos tortoises. Oral presentation, Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July 11-16.

THORNHILL, R.

Gangestad, S.W., R. Thornhill and C.E. Garver-Apgar. 2007. Estrus, pair-bonding, and the costs of extra-pair sex. 19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30-June 3.

Garver-Apgar, C.E., S.W. Gangestad and R. Thornhill. 2007. Intrasexual conflict experienced by women and their romantic partners as a function of women's fertility status. 19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30–June 3.

TURNER, T.F.

Wilson, W.D. and T.F. Turner. 2007. Phylogeny of the Pacific salmon and trout (*Oncorhynchus*) based on partial ND4 sequence. 40th Joint Annual Conference of the Arizona and New Mexico

Chapters of the Wildlife and Arizona and New Mexico Chapter of the American Fisheries Society, Albuquerque NM, February.

Turner, T.F., M.J. Osborne, G.R. Moyer, M.A. Benavides and D. Alo. 2007. Life history and environmental variation interact to determine effective size to census size ratio. Symposium on Evolution in Human-altered Environments, University of California, Los Angeles CA, February 8-10.

Wilson, W.D. and T.F. Turner. 2007. Phylogeny of the Pacific salmon and trout (*Oncorhynchus*) based on partial ND4 sequence: A robust phylogeny compared to MHC patterns. Oral, 16th Annual Research Day, Department of Biology, UNM, April 13.

Burdett, A.S. and T.F. Turner. 2007. River food webs during summer dry-down in the Middle Rio Grande: A study using stable isotope analysis. Annual Meeting of the North American Benthological Society, Columbia SC, June 3.

Osborne, M.J. and T.E.Turner. 2007. Multi-locus MHC and parasite diversity in an endangered non-model cyprinid. Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand, June 12-16.

Turner, T.F. and M. J. Osborne. 2007. Lessons from multigenerational genetic monitoring in an endangered species. Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand, June 12-16.

Wilson, W.D. and T.F. Turner. 2007. Major Histocompatibility Complex (MHC) Patterns in salmonids: A phylogenetic and functional analysis. Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand. June 12-16.

WAIDE, R.B.

Barker, B.S. 2007. Landscape genetics of two frogs from Puerto Rico (*Eleutherodactylus antillensis* and *E. portoricensis*: Preliminary results. 16th Annual Research Day, Department of Biology, UNM, April 13.

WERNER-WASHBURNE, M.

Tapia, P., R. Joe and M Werner-Washburne. 2007. Regulation of reproduction/aging in quiescent cells from *Saccharomyces cerevisiae* stationary-phase cultures. Society for Advancement of Chicanos and Native Americans in Science (SACNAS), Kansas City MO, October.

Joe, R. and M. Werner-Washburne. 2007. Studies on the role of p-body formation in the development of *Saccharomyces cerevisiae* quiescent cells. Society for Advancement of Chicanos and Native Americans in Science (SACNAS), Kansas City MO, October.

WOLF, B.O.

Pershall, A.D., R. Warne and B.O. Wolf. 2007. Small mammal utilization of pulsed resources quantified through stable isotope analysis. Annual Meeting of the Society for Integrative and Comparative Biology, Phoenix AZ, January.

Pershall, A.D., R. Warne, C. Mathiasen and B.O. Wolf. 2007. Quantifying the importance of seasonal resource pulses to a small mammal community and influence of these pulses on consumer population dynamics through stable isotope analysis. 16th Annual Research Day, Department of Biology, UNM, April 13.

Pershall, A., R. Warne and B. O. Wolf. 2007. Small mammal utilization of pulsed resources quantified through stable isotope analysis. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 6-10.

Mathiasen, C.C., I. Murray, B.O. Wolf and F.A. Smith. 2007. Portable ultrasonography: Developing non-destructive techniques for quantifying reproductive effort under field conditions. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 6-10.

Murray, I. and B.O. Wolf. 2007. Nutritional ecology of chelonians via stable isotope analysis. 2007 Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July 11-16.

Pershall, A.D., R. Warne, C. Mathiasen and B.O. Wolf. 2007. Quantifying the importance of seasonal resource pulses to a small mammal community and influence of these pulses on consumer population dynamics through stable isotope analysis. Jornada–Sevilleta Long Term Ecological Research (LTER) Joint Meeting, Las Cruces NM, July.

J. Other.

HOWE, K.A.

Chapters 12-19 reviewed, *Biological Science*, 3rd ed., 2007, by Scott Freeman, Benjamin Cummings.

SHANER, M.G.M.

Reviewing chapters for an introductory biology text by a publisher, which will be completed in 2008.

III. RESEARCH PROJECTS OR OTHER CREATIVE WORK IN PROGRESS OR COMPLETED DURING PERIOD.

A. Grants and Contracts, Extramural and Intramural.

Submitted to all agencies in 2007.

BERGTHORSSON, U.

"The Spontaneous Rate of Gene Duplication and Deletion in a Model Organism, Caenorhabditis elegans"; U. Bergthorsson, PI; National Institutes of Health; \$1,120,000, January 1, 2008–December 31, 2010.

"The Spontaneous Rate of Gene Duplication and Deletion in a Model Organism, Caenorhabditis elegans"; U. Bergthorsson, PI; National Science Foundation; \$627,746, July 1, 2008– June 30, 2011.

BROWN, J.H.

"OPUS: The Portal Project: Synthesizing 30 Years of Ecological Research"; J.H Brown, Thomas J. Valone and S.K. Morgan Ernest, co-PIs; \$223,646, June 1, 2007–June 1, 2008, \$107,500/year.

"Dynamics of Coupled Natural and Human Systems"; J.H. Brown, H. Kaplan, W. Woodruff and S. Forrest, PIs; NSF 06-587; \$1,499,998, August 15, 2007-August 14, 2012.

COLLINS, S.L.

"Renovations to Increase Residence Capacity at the UNM Sevilleta Field Research Station"; S.L. Collins, PI, D.O. Natvig, W.T. Pockman, T.K. Lowery, M. Friggens, co-PIs; National Science Foundation; \$250,000, October 15, 2007–October 14, 2010. (Recommended for funding.)

"Collaborative Research (UNM and UVa): Do Vegetation-microclimate Feedbacks Promote Shrub Encroachment in the Southwestern United States?"; M. Litvak, UNM PI, W.T. Pockman and S.L. Collins, UNM co-PIs, P. D'Odorico, UVa PI, J. Fuentes, S. De Wekker, UVa co-PIs; National Science Foundation; \$553,989 (UNM's portion \$289,008), February 1, 2008–January 31, 2011. (Recommended for funding.)

"Sevilleta LTER REU Sites Program"; S.L. Collins, PI, L. McFadden, co-PI; National Science Foundation; \$246,705, March 1, 2008–February 28, 2011. (Recommended for funding.)

"Ecosystem Consequences of Precipitation Extremes in Semiarid Grassland and Shrubland"; W.T. Pockman, PI, S.L Collins, E. Small-Tilden, co-PIs; U.S. Department of Energy National Institute of Climate Change Research (NICCR); \$374,829, April 1, 2008–March 31, 2011. (Recommended for funding.)

"Fungal Loop Model for the Nitrogen Cycle of Semiarid Grassland"; R.L. Sinsabaugh, S. Collins, D. Hanson and M. Allen, PIs; National Science Foundation Ecosystem Science; \$660,000. (Not funded.)

COOK, J.A.

"Tracking Pathogens Across the Crossroads of the Northern Continents"; J.A. Cook, PI; National Institutes of Health, submitted January 2007 (declined).

"Collaborative Research: Isolation, Postglacial Expansion, and Hybridization"; J.A. Cook, PI; Research in Undergraduate Institutions (RUI), National Science Foundation, submitted June 6, 2007 (declined).

"A Test of Landscape Connectivity across the Sky Islands Region Using Large Carnivores as Model Organisms"; G. Roemer, NMSU, PI, J.A. Cook, co-PI; Wilburforce Foundation; \$25,000 (funded).

"Curation, Databasing and Integration of the Orphaned Illinois Mammal Collection"; J.A. Cook, PI; Division of Environmental Biology (DEB) 0744025, National Science Foundation; \$259,285, February 1, 2008–February 1, 2010, \$130,000/year (funded).

CRIPPS, R.M.

"Specification of Adult Muscle Precursors in *Drosophila*"; R.M. Cripps, PI; Muscular Dystrophy Association; ~\$270,000 total award, three years (not funded).

"Genetic Control of Cardiac Remodeling in *Drosophila*"; R.M. Cripps, PI; American Heart Association Pacific Mountain Affiliate; \$198,000 total award, January 1, 2008–December 31, 2010, \$66,000 per year (funded).

"Axial Control of Heart Fat and Function in *Drosophila*"; R.M. Cripps, PI; March of Dimes Birth Defects Foundation; ~\$270,000 total award, three years (in review).

"Axial Control of Heart Fate and Function in *Drosophila*"; R.M. Cripps, PI; National Institutes of Health; ~\$1,500,000 total award, five years (not funded).

CUNNINGHAM, C.

"Defense Response Genes in *Schistosoma mansoni* and Their Exploitation as Therapeutic Agents"; Charles Cunningham, PI; National Institutes of Health; \$1,500,000; 2008–2013; \$300K/year.

DAHM, C.N.

"Evapotranspiration, Water Tables, Diel Fluctuations, Flow Fields, and Riparian Zone (Bosque) Restoration"; C.N. Dahm and J. Coonrod, PIs; U.S. Army Corps of Engineers; \$61,114, May 19, 2007—August 31, 2008.

DUSZYNSKI, D.W.

"Taxonomic, Monographic and Phylogenetic Research and Training on the Coccidia (Apicomplexa: Eimeriidae)"; D.W. Duszynski, PI, R.S. Seville and D. Smith (University of Wyoming), co-PIs; National Science Foundation, Div. of Environ. Biol.—Systematic Biology; \$748.094, 2007–12. Not funded.

HANSON, D.T.

"Towards an Isotopic Early Warning System of Climate Change Impacts"; N.G. McDowell, D.T. Hanson, M. Barbour, W.T. Pockman, J. Randerson, W. Riley, T. Ringler and C. Still, PIs; Complex Dynamical Climate and Environmental Systems, Institute of Geophysics and Planetary Physics, Los Alamos National Labortory; period to be determined if funded, \$100,000 per year (\$30,000 for UNM per year + student support).

"Biochemical Characterization of Poplar Phosphoenol-Pyruvate Carboxylase (Pepc): Exploring an Enzymatic Bridge Between Primary and Secondary Metabolism"; T. Rosenstiel (Portland State University) and D.T. Hanson, PIs; U.S. Department of Agriculture; \$390,000 (\$50,000 to UNM), October 1, 2007–September 30, 2010.

"Pre-proposal: Production of Energy, Microbial-Feedstock-based Biodiesel Fuel, and Coproducts from Dairy Wastes"; R. Pate, K. Hoodenpyle, D.T. Hanson, S. Lombardi, V. Cabrera, S. Deng, Q. Hu and T. French, PIs; Biomass Research and Development Initiative Solicitation RD-RBP-Biomass-2007, U.S. Dept. of Agriculture-Dept. of Energy; \$1,000,000, period to be determined.

"Testing Oxygen Isotope Models of Carbon and Water Cycles"; N.G. McDowell, M. Barbour, D.T. Hanson and W. Riley, PIs; Exploratory Research, Los Alamos National Laboratory; \$290,000/year, January 1, 2008–December 31, 2010.

Re-submission: "How Do Land Plants Manage Water over Physiological, Ecological and Phylogenetic Time Scales?"; B. Mishler (University of California-Berkeley), PI, D.T. Hanson (physiology section), plus seven other institutions, co-PI; Frontiers in Integrative Biological Research Program, National Science Foundation; \$4,000,000 (\$475,500 to UNM), July 1, 2007–June 30, 2012.

Re-submission: "Collaborative Research: Interaction of Photosynthetic and Hydraulic Responses to Freezing and Drought Stress of Larrea Spp. from North and South America"; W.T. Pockman, D.T. Hanson and B. Logan, PIs; Integrative Organismal Biology Environmental and Structural Systems Cluster, National Science Foundation; \$341,812 to UNM, July 01, 2007–June 30, 2010.

Re-submission: "Collaborative Research: Ecophysiological Traits and Carbon Cycle Impacts of Earliest Land Plants"; D.T. Hanson, PI, L. Graham, E. Waters and M. Cook, co-PIs; Integrative Organismal Biology Environmental and Structural Systems Cluster, National Science Foundation; \$169,494 to UNM, July 1, 2007–June 30, 2010.

Re-submission: "Fungal Loop Model for the N Cycle of Semiarid Grasslands"; R.L. Sinsabaugh, PI, S.L. Collins, D.T. Hanson and M. Allen, co-PIs; Ecosystem Science, National Science Foundation; \$666,723, July 1, 2007–June 30, 2010.

HOFKIN, B.V.

"The Impact of Bosque Restoration on the Abundance of Mosquitoes and Mollusks of Veterinary and Medical Importance; Implications for Changing Patterns of Disease Transmission," B.V. Hofkin, PI; Bosque Initiative, N.M. Department of Game & Fish.

KODRIC-BROWN, A.

"Behavioral and Ecological Factors Mediating the Co-occurrence of Two Gambusia Species"; A. Kodric-Brown and D. Swenton-Olson, co-PIs; National Science Foundation Doctoral Dissertation Improvement Grants (DDIG); \$11,830, June 2008–July 2009.

"Delayed Dispersal in the Banner-tailed Kangaroo Rat"; A. Kodric-Brown and A. Edelman, co-PIs; National Science Foundation Doctoral Dissertation Improvement Grants (DDIG); \$12,000, June 2008–July 2009.

LITVAK, M.E.

"Do Vegetation-Microclimate Feedbacks Promote Shrub Encroachment in the Southwestern United States?"; M. Litvak, PI, S.L. Collins and W.T. Pockman, co-PIs; Ecosystems, National Science Foundation; \$289,008, March 1, 2008-February 31, 2011.

"Woody Plant Encroachment into Karst Terrain: Implications for Regional Cycles of Carbon, Water and Energy"; M.E. Litvak, PI, J. Heilman, K. McInnes and K. Owens, co-PIs; U.S. Department of Energy, National Institute for Climate Change Research; \$395,000, August 2007–July 2010.

"Linking Ecosystem Scale Vegetation Change to Shifts in Carbon and Water Cycling: The Consequences of Piñon Mortality in the Southwest"; M.E. Litvak, PI, R.L. Sinsabaugh, N. McDowell, T. Rahn and M. Ryan, co-PIs; Experimental Program to Stimulate Competitive Research (EPSCOR), U.S. Department of Energy; \$495,000, June 1, 2008–May 31, 2011.

"Climatic and Structural Controls on Carbon Exchange in a Key Savanna Ecosystem of the U.S."; A. Thijs, PI, C. Hawkes and M.E. Litvak, co-PIs; Doctoral Dissertation Improvement Award Research, National Science Foundation; \$11,997, June 1, 2007–May 31, 2009.

"Bothriochloa Ischaemum Invasion Impacts on Belowground Carbon Inputs in Texas Savanna Ecosystems"; T. Basham, PI, C. Hawkes and M.E. Litvak, co-PIs; Doctoral Dissertation Improvement Award Research, National Science Foundation; \$11,7000, June 1, 2007–May 31, 2009.

LOKER, E.S.

"Center of Biomedical Research Excellence (COBRE): Center for Evolutionary and Theoretical Immunology"; E.S. Loker, PI; National Center for Research Resources, P20 RR018754, National Institutes of Health; \$8,622,683 (direct costs), July 1, 2008–June 30, 2013.

"Framework Program in Global Health"; D.J. Perkins, PI, E.S. Loker, Senior Personnel; Fogarty Center, National Institutes of Health; \$404,777, July 1, 2008–June 30, 2011.

"Evo-epidemiology of Schistosoma mansoni in children in Kenya"; E.S. Loker, PI; NIH Fogarty Firca, National Institutes of Health; \$110,910, July 1, 2008-June 30, 2011.

LOWREY, T.K.

"Renovations to Increase Residence Capacity at the Unm Sevilleta Field Station"; Scott Collins, PI, T.K. Lowrey, M. Friggens and D. O.Natvig, co-PIs; National Science Foundation; \$250,000, August 1, 2007–July 31, 2010.

"Development of a Wildlife Conservation Plan for the City of Albuquerque"; H.L. Snell and T.K. Lowrey, co-PIs; City of Albuquerque; \$41,892, October 1, 2007–June 30, 2008.

MILLER, K.B.

"Systematics and Evolution of Band-wing Grasshoppers (Orthoptera: Acrididae: Oedipodinae)"; K.B. Miller, D.C. Lightfoot and D.B. Weissman, PIs; National Science Foundation; \$364,776, January 1, 2008–December 31, 2010.

"Survey of the Aquatic Insects of Venezuela"; K.B. Miller, PI; National Science Foundation; \$456,397, October 1, 2007—September 30, 2010.

"Survey of the Aquatic Insects of Northern Venezuela with an emphasis on Coleoptera"; A. Short and K.B. Miller, PIs; National Science Foundation; \$475,882, May 1, 2008–April 30, 2011.

"CAREER: Phylogenetic Revisions of South American Water Beetles (Coleoptera: Adephaga: Hydradephaga): A Model for Teaching Systematic Biology"; K.B. Miller, PI; National Science Foundation; \$541,725, January 1, 2008–December 31, 2012.

REU Supplement: "Collaborative Research: Phylogeny, Behavior, and Silk Evolution of Webspinners (Embioptera), A Little-known Insect Order"; K.B. Miller, PI; National Science Foundation; \$10,700, September 1, 2006–August 31, 2008.

MILLER, R.D.

"COBRE Center for Evolutionary and Theoretical Immunology"; E.S. Loker, PI, R.D. Miller, co-PI; National Institutes of Health; \$11,507,703, July 1, 2008–June 30, 2013.

MILNE, B.T.

"Biodiesel Cooperative for Mora Valley"; F. Sinclair, PI; McCune Foundation; \$35,000; Rejected.

"Community Food Project"; Letter of Interest, South Valley Economic Development Corporation; Rejected.

NATVIG, D.O.

"Renovations to Increase Residence Capacity at the UNM Sevilleta Field Station"; S.L. Collins, PI, M. Friggens, W.T. Pockman, T.K. Lowrey and D.O. Natvig, co-PIs; National Science Foundation; \$250,000, December 1, 2007–November 30, 2010.

NELSON, M.A.

"Presidential Awards for Excellence in Science, Mathematics & Engineering Mentoring"; M.A Nelson, PI; National Science Foundation; Pending.

POCKMAN, W.T.

"Collaborative Research: Do Vegetation-Microclimate Feedbacks Promote Shrub Encroachment in the Southwestern United States?"; M. Litvak, S.L. Collins and W.T. Pockman, PIs (with P. D'Odorico, J. Fuentes and S. de Wekker, University of Virginia); NSF Div. of Env. Biol. (DEB); \$289,008; March 1, 2008-February 28, 2011.

"Towards an Isotopic Early Warning System of Climate Change Impacts"; D.T. Hanson, N.G. McDowell, M. Barbour, W.T. Pockman, J.T. Randerson, W.J. Riley, T. Ringler and C. Still, PIs; Los Alamos National Laboratory Institute of Geophysics and Planetary Physics (IGPP); \$294,688.

"Ecosystem Consequences of Precipitation Variability and Extremes in Semiarid Grassland and Shrubland"; W.T. Pockman, PI, S.L. Collins, E.E. Small, co-PIs; DOE National Institute for Climate Change Research (NICCR); \$374,829; April 1, 2008–March 31, 2011.

POE, S.

"CAREER: Systematics of *Anolis* Lizards: Taxonomy, Phylogeny, Solitary Evolution, and Taxonomic Training"; S. Poe, PI; National Science Foundation; \$730,000 (declined).

SINSABAUGH, R.L.

"Fungal Loop Model for the Nitrogen Cycle of Semiarid Grassland"; R.L. Sinsabaugh, S. Collins, D. Hanson and M. Allen, PIs; National Science Foundation Ecosystem Science; \$660.000.

"Microbial Control of Litter Decay at the Cellulose-Lignin Interface"; M. Weintraub, D.L. Moorhead, C. Blackwood and R.L. Sinsabaugh, PIs; National Science Foundation Ecosystem Science; \$572,000.

"Effects of Pulse Versus Chronic N Enrichment on Biogeochemical Processes in Grassland Soils"; A. Jumponen, D. Myrold, K. Jones and R.L. Sinsabaugh, PIs; National Science Foundation Ecosystem Science; \$580,000.

"Plant and Microbial Contribution to Resilience in a Changing Environment"; K. Suding and R.L. Sinsabaugh, PIs; National Science Foundation Long Term Research in Environmental Biology Program; \$450,000.

"Linking Ecosystem Scale Vegetation Change to Shifts in Carbon and Water Cycling: The Consequences of Widespread Piñon Mortality in the Southwest"; M. Litvak and R.L. Sinsabaugh, PIs; U.S. Department of Energy Experimental Program to Stimulate Competitive Research (EPSCoR) Program; \$335,000.

SNELL, H.L.

"Distribution of New Mexico's Amphibians and Reptiles"; H.L. Snell and J.T. Giermakowski, PIs; Share with Wildlife Program, N.M. Department of Game and Fish; \$15,000, May 2007—June 2008, Year 1: \$2,700, Year 2: \$12,300.

"Development of a Wildlife Conservation Plan for the City of Albuquerque"; H.L. Snell and T.K. Lowrey, PIs; City of Albuquerque, NM; \$41,892, August 2007–July 2008. (Note: this proposal was accepted for funding, but contract problems delayed the start until 2008, thus it isn't listed below for 2007.)

TAKACS-VESBACH, C.D.

Renewal: "Application of Molecular Techniques to the Study of Microbial Biofilms"; UNM and Sandia National Laboratories; \$40,000 (one-month summer salary), October 1, 2007–September 30, 2008.

"Microbial Phylogeography: An Interdisciplinary Research and Educational Program": CAREER, National Science Foundation; one-month summer salary/year, February 1, 2008–January 31, 2013 (pending).

"Integration of Training and Research in Environmental Metagenomics for Underrepresented Groups"; Career Advancement Awards (CAA), National Science Foundation; 0.5-month summer salary/year, May 2008–2010 (pending).

TURNER, T.F.

"Undergraduate Research Mentoring: University of New Mexico Undergraduate Nurturing Opportunities (UNO)"; J.A. Cook, W.T. Gannon, T.F. Turner and seven others, co-PIs; National Science Foundation; \$1,000,000, May 1, 2007—April 30, 2012, \$250,000/year.

"REU Supplement: CAREER: Museum-based Approaches to Ecology and Evolution of Aquatic Systems: An Integrated Research and Educational Program"; T.F Turner, PI; National Science Foundation; \$12,000, May 15, 2007–April 30, 2008.

"Community Responses to River Drying in an Arid-land Ecosystem: A Field and Experimental Study"; T.F. Turner, PI; National Science Foundation; \$345,000; August 15, 2007-August 1, 2010, \$115,000/year.

"Dissertation Research: River Modification and the Interface of Aquatic and Terrestrial Systems in an Arid River Ecosystem"; T.F. Turner, PI, T.L. Kennedy, co-PI; National Science Foundation; \$11,980, submitted November 16, 2007 (pending).

WAIDE, R.B.

"Support for the Ecotrends Project," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$100,000, April 20, 2007–February 29, 2009.

"Administrative Support for the LTER Network Office," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$200,000, April 20, 2007–February 29, 2009.

"Support for LTER Synthesis Activities," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$99,380, September 25, 2007–February 29, 2009.

WEARING, H.J.

"Population Biology and Dynamics of Multi-pathogen Interactions"; P. Rohani, PI, H.J. Wearing, co-PI; National Institutes of Health; \$1,125,000 (direct costs), May 1, 2008–April 30, 2013.

WERNER-WASHBURNE, M.

"Engineering Research Center: Center for Discovery and Innovation in Bioengineered Systems"; M. Werner-Washburne, PI; National Science Foundation; pre-proposal submitted August 2007, not selected for full proposal.

WITT, C.C.

"Physiological Specialization on Oxygen Partial Pressure by Andean Birds of the Cerro Huicsacunga, Amazonas, Peru"; C.C. Witt, PI; National Geographic Society; \$30,000, proposed start date: June, 2008.

"REU Supplement: The Phylogenetic and Biogeographic History of High Altitude Adaptation in Hummingbirds: Selection on Hemoglobin Proteins as a Function of Oxygen Supply and Demand"; J.A. McGuire, PI, written and carried out by C.C. Witt, co-PI; National Science Foundation; \$15,940.

WOLF, B.O.

"Collaborative Research: Ecological and Genomic Perspectives in Host-Pathogen Interactions"; B.O. Wolf (UNM), M. Matocq (ISU), G. Roemer (NMSU), co-PIs; Population and Evolutionary Processes Cluster, National Science Foundation; \$921,168 (Wolf \$308,045), February 1, 2008–January 28, 2011 (declined).

Awarded with 2007 initial start date.

COLLINS, S.L.

"Renovations to Increase Residence Capacity at the UNM Sevilleta Field Research Station"; S.L. Collins, PI, D.O. Natvig, W.T. Pockman, T.K. Lowery, M. Friggens, co-PIs; National Science Foundation; \$250,000, October 15, 2007–October 14, 2010.

"Sevilleta Long-term Ecological Research (LTER) Program"; S.L. Collins, PI, W.T. Pockman, B.O. Wolf, J.R. Gosz, D. Peters and R.R. Parmenter, co-PIs; NSF; 2007 supplement, \$54,000.

COOK, J.A.

"URM: Undergraduate Nurturing Opportunities (UNO)"; JA Cook, PI; Division of Environmental Biology (DEB) 0731350, National Science Foundation; \$1,010,000, August 1, 2007–August 1, 2012, \$116,155/year (OH \$15,000).

"Mongolia Vertebrate Parasite Project"; S. Gardner, PI, J.A. Cook, co-PI; Division of Environmental Biology (DEB) 0717214, National Science Foundation; \$466,000, September 11, 2007–September 1, 2009, \$ 210,000/year (grant and OH to University of Nebraska).

"Training in Hantavirus Ecology, Virology and Clinical Investigation in the Americas"; G. Mertz (School of Medicine, UNM), PI, J.A. Cook, co-PI; Fogarty International Training Grant, 2 D43 TW001133-06A1, National Institutes of Health; \$510,000, July 1, 1999–March 31, 2011, \$132,133/year.

"Transfer of BCP and Rausch Helminth Collections to the Museum of Southwestern Biology"; J.A. Cook, PI; Division of Environmental Biology (DEB) 0726625, Amendment No. 6 to DEB-0415668, National Science Foundation; \$9,997 (OH 3,000).

"Molecular Genetics of Endemics"; J.A. Cook, PI; U.S. Fish and Wildlife Service, Juneau; supplement ongoing to December 2008, one-year: \$75,000 (OH \$25,000).

"Mammals of Alaska"; J.A. Cook, PI; U.S. National Park Service, Department of the Interior; \$14,100, September 1, 2007–September 1, 2008.

CRIPPS, R.M.

"Hox Genes and the Patterning of the Dorsal Vessel"; Kathryn M. Ryan, PI, R.M. Cripps, co-PI; Pacific Mountain Affiliate, American Heart Association; \$24,000, January 1-December 31, 2007.

DAHM, C.N.

"Sevilleta LTER IV: Abiotic Pulses and Constraints: Effects on Dynamics and Stability in an Aridland Ecosystem"; S.C. Collins, K. Vanderbilt, M. Litvak, W. Pockman and C.N. Dahm, PIs; National Science Foundation; \$4,920,000, January 15, 2007–January 14, 2013.

"Evapotranspiration, Water Tables, Diel Fluctuations, Flow Fields, and Riparian Zone (Bosque) Restoration"; C.N. Dahm and J. Coonrod, PIs; U.S. Army Corps of Engineers; \$61,114, May 19, 2007–August 31, 2008.

HANSON, D.T.

"Integrated Bioenergy Processing System for Productive Use of N.M. Dairy Industry Waste Streams"; R. Pate, P. Pohl, K. Hoodenpyle, D.T. Hanson, V. Cabrera, S. Deng, PIs; New Mexico Technology Research Collaborative; \$350,000 (\$64,000 to UNM), February 15, 2007–June 31, 2008.

"Light Enhanced ¹³C Enrichment of Dark Respired CO₂: Implications for Leaf Internal CO₂ Conductance and Leaf Respiration in the Light"; D.T. Hanson, N.G. McDowell, and T. Rosenstiel (Portland State University), co-PIs; Integrative Organismal Biology Environmental and Structural Systems Cluster, National Science Foundation; \$480,000 (\$360,000 to UNM), July 1, 2007–June 30, 2010.

LITVAK, M.E.

"Woody Plant Encroachment into Karst Terrain: Implications for Regional Cycles of Carbon, Water and Energy"; M.E Litvak, PI, J. Heilman, K. McInnes and K. Owens, co-PIs; U.S. Department of Energy, National Institute for Climate Change Research; \$395,000, August 2007–July 2010.

LOWREY, T.K.

"Renovations to Increase Residence Capacity at the Unm Sevilleta Field Station"; S.L. Collins, PI, T.K. Lowrey, M. Friggens and D. O.Natvig, co-PIs; National Science Foundation; \$250,000, August 1, 2007–July 31, 2010.

MILLER, K.B.

REU Supplement: "Collaborative Research: Phylogeny, Behavior, and Silk Evolution of Webspinners (Embioptera), A Little-known Insect Order"; K.B. Miller, PI; National Science Foundation; \$10,700, September 1, 2006–August 31, 2008.

MILLER, R.D.

"Marsupial Immunobiology"; R.D. Miller, PI; National Science Foundation; \$600,000; May 1, 2007–April 30, 2011, \$150,000.

NATVIG, D.O.

"Renovations to Increase Residence Capacity at the UNM Sevilleta Field Station"; S.L. Collins, PI, M. Friggens, W.T. Pockman, T.K. Lowrey and D.O. Natvig, co-PIs; National Science Foundation; \$250,000, December 1, 2007–November 30, 2010.

POCKMAN, W.T.

"Renovations to Increase Residence Capacity at the UNM Sevilleta Field Station"; S.L. Collins PI, M. Friggens, D.O. Natvig, T.K. Lowrey and W.T. Pockman, co-PIs; NSF Division of Biological Infrastructure (DBI) Field Stations and Marine Labs; \$250,000; September 1, 2007–August 30, 2010.

"Hydraulic Mechanisms of Survival and Mortality During Drought in Piñon-Juniper Woodlands of Southwestern USA"; W.T. Pockman, PI; DOE Program of Ecosystem Research (PER); \$713,183; March 15, 2007–March 14, 2009.

SMITH, F.A.

"The Impact of Late Quaternary Climate Change on Mammals along an Elevational Gradient"; EA. Smith, PI; Research Experience for Undergraduate (REU) supplement to Division of Environmental Biology 0344620, National Science Foundation; \$6,000, 2007.

SNELL, H.L.

"Distribution of New Mexico's Amphibians and Reptiles"; H.L. Snell and J.T. Giermakowski, PIs; Share with Wildlife Program, N.M. Department of Game and Fish; \$15,000, May 2007—June 2008, Year 1: \$2,700, Year 2: \$12,300.

TAKACS-VESBACH, C.D.

Renewal: "Application of Molecular Techniques to the Study of Microbial Biofilms"; UNM and Sandia National Laboratories; \$40,000 (one-month summer salary), October 1, 2007—September 30, 2008.

TURNER, T.F.

"Undergraduate Research Mentoring: University of New Mexico Undergraduate Nurturing Opportunities (UNO)"; J.A. Cook, W.T. Gannon, T.F. Turner and seven others, co-PIs; National Science Foundation; \$1,000,000, May 1, 2007–April 30, 2012, \$250,000/year.

"REU Supplement: CAREER: Museum-based Approaches to Ecology and Evolution of Aquatic Systems: An Integrated Research and Educational Program"; T.F Turner, PI; National Science Foundation; \$12,000, May 15, 2007–April 30, 2008.

"Community Responses to River Drying in an Arid-land Ecosystem: A Field and Experimental Study"; T.F. Turner, PI; National Science Foundation; \$345,000; August 15, 2007–August 1, 2010, \$115,000/year.

"Assessment and Monitoring of Rio Grande Silvery Minnow Genetics"; T.F. Turner, PI, M.J. Osborne, co-PI; Middle Rio Grande ESA Collaborative Program, Bureau of Reclamation, Department of the Interior; \$144,544, July 15, 2007—September 30, 2008.

WAIDE, R.B.

"Support for the Ecotrends Project," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$100,000, April 20, 2007–February 29, 2009.

"Administrative Support for the LTER Network Office," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$200,000, April 20, 2007–February 29, 2009.

"Support for LTER Synthesis Activities," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$99,380, September 25, 2007–February 29, 2009.

WERNER-WASHBURNE, M.

"The Biogenesis and Survival of Vegetative Quiescent Cells in Yeast"; M. Werner-Washburne, PI; National Science Foundation Division of Molecular and Cellular Biosciences (MCB) 0645854; \$560,000 + supplements, March 1, 2007—February 28, 2010.

WITT, C.C.

"REU Supplement: The Phylogenetic and Biogeographic History of High Altitude Adaptation in Hummingbirds: Selection on Hemoglobin Proteins as a Function of Oxygen Supply and Demand"; J.A. McGuire, PI, written and carried out by C.C. Witt, co-PI; National Science Foundation; \$15,940.

WOLF, B.O.

"Linking Nutrient Flux in a Desert Food Web to the Allocation Dynamics in Lizards: Combining Stable Isotopes and Ecological Stoichiometry"; R. Warne and B.O. Wolf, co-PIs; Doctoral Dissertation Improvement Grant, Division of Environmental Biology 0710128, National Science Foundation; \$11,987, June 15, 2007–May 31, 2009.

"A Preliminary Investigation of the Use of Wildlife Water Developments by the Bird and Bat Community on the Kofa National Wildlife Refuge"; Arizona Game and Fish Department; \$55,900, June 1, 2007–February 1, 2008.

In force from previous years.

BARTON, L.L.

"Algal Growth of Selected Streams and Rivers in New Mexico"; L.L. Barton, PI; N.M. Environment Department; \$20,000, September 15, 2005–December 31, 2008.

BROWN, J.H.

"Program in Interdisciplinary Biological and Biomedical Sciences"; J.H. Brown, PI, F.A. Smith, co-PI; Howard Hughes Medical Institute 56005678; \$1,000,000, January 1, 2006—December 31, 2008.

"A Biologically Motivated Scaling Theory"; J.H. Brown, PI, S. Forrest, co-PI; Collaborative Research, NSF; \$80,000, September 1, 2006–June 30, 2008.

"Long-term Manipulation and Monitoring of a Desert Ecosystem"; J.H. Brown and T.J. Valone, co-PIs; NSF Grant DEB-0348896; \$187,497, March 1, 2004—February 28, 2009.

CHARNOV, E.L.

NSF grant; E.L. Charnov and F. Smith, co-PIs; \$285,000 total funding.

COLLINS, S.L.

"Sevilleta Long-term Ecological Research Program"; S.L. Collins, PI, W.T. Pockman, B.O. Wolf, J.R. Gosz, D. Peters, R.R. Parmenter, co-PIs; National Science Foundation; \$2,800,000 plus several supplements, November 1, 2002–October 31, 2007.

"The Sevilleta Field Research Station: Infrastructure Enhancements for High-quality Water Resources and Wireless Data Transmission"; D.O. Natvig, PI, S.L. Collins, W.T. Pockman, R.R. Parmenter, C.N. Dahm, co-PIs; National Science Foundation; \$76,270 + \$25,424 UNM Match, March 1, 2004–February 28, 2007.

"Preparing the LTER Network for Collaborative Science, Education and Synthesis: A Planning Proposal";); S.L. Collins, PI, B. Benson, D. Childers, A. Whitmer, co-PIs; National Science Foundation; \$985,461, September 1, 2004–August 30, 2007.

"Global Change Effects on Grass-Shrub Interactions in an Arid Ecosystem"; J. Fargione, PI, S.L. Collins and W.T. Pockman, co-PIs; National Science Foundation; \$297,494 + REU supplements, July 15, 2005-July 14, 2008.

"Long Term Research in Environmental Biology (LTREB): Long-term Ecosystem Responses to More Extreme Precipitation Patterns and Warming"; J. Blair, PI, A. Knapp, P. Fay, S.L. Collins and M. Smith, co-PIs; National Science Foundation; \$300,000, May 1, 2005—April 30, 2010.

"Collaborative Research (UNM, CSU, KSU, Yale): Convergence and Contingencies in Savanna Grasslands"; A. Knapp, J. Blair, M. Smith and S.L. Collins, PIs; National Science Foundation; \$830,000 (UNM portion \$60,000), September 1, 2005-August 31, 2008.

"Track 1, GK-12: E-MRGE: Ecohydrogeology in the Middle Rio Grande Environment"; S.L. Collins, PI, L. Crossey, D. Earick, co-PIs; National Science Foundation; \$1,663,165, May 1, 2006-April 30, 2009.

"Enabling Distributed Network Sensing of Arid Ecosystem Adaptation Resulting from Global Climate Change"; S.L. Collins, L. Bettencourt, PIs, A. Hagberg, A. Aceves, G. Huerta, co-PIs; UNM–Los Alamos National Laboratory; \$90,000, June 1, 2006–August 31, 2007.

"Sevilleta LTER IV: Abiotic Pulses and Constraints: Effects on Dynamics and Stability in an Aridland Ecosystem"; S.L. Collins, PI, C.N. Dahm, M. Litvak, W.T. Pockman, K. Vanderbilt, co-PIs; National Science Foundation; \$4,920,000, November 1, 2006–October 31, 2012.

COOK, J.A.

"ICIDR, Hantavirus Ecology and Disease in Chile and Panama" (2nd year); G. Mertz (School of Medicine, UNM), PI; National Institutes of Health 2 U19 AI045452-06; \$800,000, August 31, 2005–April 30, 2010.

"Beringia Coevolution Project II" (3rd year); National Science Foundation 0415668; 2004–2007, \$165,00/year.

"Mammal Inventory of Tongass"; J.A. Cook, PI; USDA Forest Service Pacific Northwest Lab; \$49,983, May 2005–July 2010, \$24,000/year.

"Molecular Genetics of Endemics II"; J.A. Cook, PI; U.S. Fish and Wildlife Service, Juneau; \$49,500, September 2005–September 2007, \$24,000/year.

"Beringia Coevolution Project II"; J.A. Cook, PI; National Science Foundation 0415668; \$502,713, January 2005–January 2008, \$165,000/year.

"Molecular Genetics of Coastal and Insular Mammals"; J.A. Cook, PI; U.S. Fish and Wildlife Service; \$39,000, December 2004—September 2007, \$20,000/year.

CRIPPS, R.M.

"Genetic Regulation of Cell Fate in the *Drosophila* Heart"; R.M. Cripps, PI; National Heart, Lung, and Blood Institute (NHLBI), National Institutes of Health; \$1,300,564, April 1, 2005–March 31, 2010, \$260,000/year.

"Genetic Regulation of Muscle Fiber Diversity"; R.M. Cripps, PI; National Institute of General Medical Sciences (NIGMS), National Institutes of Health; \$1,361,667, May 1, 2006–April 30, 2011, \$267,233/year.

DAHM, C.N.

"Integrative Graduate Education and Research Traineeship (IGERT): Freshwater Graduate Studies Link Fundamental Science with Applications through Integration of Ecology, Hydrology, and Geochemistry in Regions with Contrasting Climates"; C.N. Dahm, PI; University of Alabama (subcontract on award from the National Science Foundation); \$1,331,615, August 1, 1999–July 31, 2008.

"Collaborative Research: Identification of Microbial Signatures in Biogenic Cave Ferromanganese Deposits"; D.E. Northup, L.J. Crossey, C.N. Dahm and M.N. Spilde, PIs; National Science Foundation; \$291,644, August 15, 2003–July 31, 2007.

"Sevilleta LTER: Long Term Research in a Biome Transition Zone"; S.C. Collins, C.N. Dahm, W.T. Pockman, B.O Wolf and R.L. Sinsabaugh, PIs; National Science Foundation; \$2,100,000, November 1, 2003–January 15, 2007.

"Hyporheic Metabolism and Processing of Salmon-derived Organic Matter"; C.N. Dahm and C.L. Crenshaw, PIs; U.S. Forest Service; \$20,310, July 19, 2004–July 16, 2008.

"New Mexico Nanotechnology, Education, and Water (NEW);" C.N. Dahm, PI; Experimental Program to Stimulate Competitive Research (EPSCoR) proposal from New Mexico to the National Science Foundation; \$6,750,000, May 1, 2005–May 30, 2008. (I direct the ET measurement portion at UNM, which receives \$464,677 from the NSF and \$408,795 of cost-share from the State of New Mexico and UNM; I also serve as one of the three overall directors of the "Water" portion of this statewide project.)

"Surface Water Quality Study and Continuous Water Quality Monitoring Network for the Middle Rio Grande"; C.N. Dahm, PI; U.S. Fish and Wildlife Service; \$102,760, August 8, 2005–August 7, 2007.

"Evapotranspiration, Water Tables, Diel Fluctuations, Flow Fields, and Riparian Zone (Bosque) Restoration"; C.N. Dahm, PI; U.S. Army Corps of Engineers Urban Flood Demonstration Program; \$61,714, August 1, 2006–July 31, 2007.

HANSON, D.T.

"PEPC Activity in C₃ Plants"; D.T. Hanson, PI; Research Allocation Committee, UNM; \$4,000, September 1, 2006-August 31, 2007.

"Biosphere-atmosphere CO₂ Exchange of Terrestrial Ecosystems: Combining High Resolution Measurements and Models to Understand the Global Atmospheric Carbon Budget"; N. McDowell, W.T. Pockman, D.T. Hanson, J. Randerson, PIs; Institute of Geophysics and Planetary Physics, Los Alamos National Laboratories; \$160,000, (\$85,000 UNM), October 1, 2004–September 30, 2007.

HOFKIN, B.V.

"Mosquito Feeding Patterns in Bernalillo County, NM: Implications for the Transmission of West Nile Virus to Horses"; B.V. Hofkin, PI; New Mexico Horse Council; \$4,400, awarded in 2006.

"Mosquito Feeding Patterns in Bernalillo County, NM: Implications for the Transmission of West Nile Virus to Humans and Horses"; B.V. Hofkin, PI; Research Allocation Committee, UNM; \$4,000, awarded in 2006.

KATJU, V.

"A Comparative Genomic Approach to Characterize the Early Evolution of Gene Duplicates with Emphasis on the Origin of Novel Genes"; V. Katju, PI; Postdoctoral Research Fellowship in Biological Informatics, National Science Foundation; \$120,000, November 1, 2005–July 31, 2007.

KODRIC-BROWN, A.

"Evolution of Reproductive Isolation in *Cyprinodon*"; A. Kodric-Brown, PI; NSF; \$300,000, June 1, 2004–June 30, 2007, \$88,725; no-cost extension, July 2007–June 2008.

"Coexistence Between Two Species of Gambusia" (Daniella Swenton's research); A. Kodric-Brown, PI; N.M. Game and Fish; \$12,000, July 1, 2004—June 30, 2007.

"Isotopic Signatures of Two Species of Gambusia; A. Kodric-Brown, PI, D. Swenton, co-PI; Share with Wildlife, N.M. Game and Fish, \$4,000, 2006–07.

LITVAK, M.E.

"Juniper Encroachment on the Edwards Plateau—Changes in Carbon Dynamics in a Key Savanna Ecosystem of the U.S."; M.E Litvak, PI; NASA Globel Change Fellowship to Ann Thijs; \$54,000, September 2005–August 2008.

"Quantifying the Role of Summer Vs. Winter Precipitation on Carbon Uptake of Montane Forests"; M.E. Litvak, PI; Sustainability of semi-Arid Hydrology and Riparian Areas (SAHRA), National Science Foundation; \$135,000, June 2006–December 2008.

"Carbon and Water Fluxes in Burned and Unburned Piñon-Juniper Woodland"; M.E. Litvak, W.T. Pockman, S.L. Collins, R. Pendleton and B. Pendleton, co-PIs; U.S. Forest Service; \$67,000, July 2006—September 2008.

"Sevilleta Long Term Ecological Research IV: Long Term Ecological Research in a Biome Transition Zone"; S.L. Collins, PI, C.N. Dahm, W.T. Pockman, K. Vanderbilt and M.E. Litvak, co-PIs (+ 17 non-signatory co-PIs); Long Term Ecological Research (LTER) Program, Division of Environmental Biology, National Science Foundation; \$5,040,000, October 1, 2006–September 30, 2011.

LOKER, E.S.

"Center of Biomedical Research Excellence (COBRE): Center for Evolutionary and Theoretical Immunology"; E.S. Loker, PI; National Center for Research Resources P20 RR018754, National Institutes of Health; \$10,141,000, September 30, 2003–June 30, 2008.

"Evo-epidemiology of Schistosoma mansoni in Western Kenya"; E.S. Loker, PI; National Institutes of Health; \$1,497,748, April 1, 2004–March 31, 2009.

"Praziquantel Resistance in Egypt: Testing and Use of an *in vitro* Assay"; E.S. Loker, U.S. PI, Dr. Wael Lotfy, Egypt PI; U.S.-Egypt Joint Science and Technology Board, Cairo, Egypt; \$60,000, August 1, 2005-July 31, 2007.

"Biology of Trematode-Snail Associations"; E.S. Loker, PI; National Institutes of Health; \$1,125,000, March 1, 2006-February 28, 2011.

LOWREY, T.K.

"A Field Guide to the Flora and Fauna of the Middle Rio Grande Bosque"; J.-L. Cartron, PI, D. Lightfoot, S. Brantley, J. Mygatt and T.K. Lowrey, co-PIs; U.S. Fish and Wildlife Service; \$80,000, September 15, 2006–September 14, 2008.

MARSHALL, D.L.

"Demography, Genetics and Mating System Structure of an Invasive Mustard, *Isatis tinctoria*"; D.L. Marshall, PI and H. Simpson, co-PI; USDA; \$75,000, August 1, 2005–July 31, 2008.

"Improved Mentoring, Professional Development, and Recruitment of Secondary Science and Math Instructors in New Mexico"; D.L. Marshall, PI, D.L. Earick, K. Watkins and M. Ondrias, co-PIs; National Science Foundation; \$500,000, January 1, 2005–December 31, 2008.

MILLER, K.B.

"Collaborative Research: Phylogeny, Behavior, and Silk Evolution of Webspinners (Embioptera), A Little-known Insect Order"; K.B. Miller, M.F. Whiting, PIs; Division of Environmental Biology, National Science Foundation; \$260,001, July 1, 2005—June 30, 2008.

"Building Taxonomic Expertise in Cucujoidea: Monographic and Phylogenetic Studies of the Cerylonid Series"; J.V. McHugh, K.B. Miller and M.F. Whiting, co-PIs; Division of Environmental Biology, National Science Foundation; \$749,388, January 1, 2004—December 31, 2008.

MILLER, R.D.

"Structure and Evolution of the MHC in a Model Marsupial"; R.D. Miller, PI; NSF; \$420,000, May 1, 2003–April 30, 2007.

"COBRE Center for Evolutionary and Theoretical Immunology"; E.S. Loker, PI, and R.D. Miller, co-PI; NIH; \$10,572,012, September 30, 2003–June 30, 2008.

NATVIG, D.O.

"The Sevilleta Research Field Station: Infrastructure Enhancements for High-quality Water Resources and Wireless Data Transmission"; W.T. Pockman, PI, S.L. Collins, C.N. Dahm,

R.R. Parmenter and D.O. Natvig, co-PIs; National Science Foundation; \$76,270, December 1, 2003–February 28, 2008.

"Does Drought Exacerbate Damage Caused by Bark-Beetle-associated Fungi in Piñon-Juniper Woodland Ecosystems?"; D.O. Natvig, PI; U.S. Forest Service; \$27,000, April 30, 2006-May 1, 2008.

MILNE, B.T.

"Sustainability Studies Program"; B.T. Milne, PI; N.M. Legislature; \$270,000, FY 2007–2008.

"Biodiesel Processor and Vehicle"; B.T. Milne, PI; N.M. Legislature; \$35,000, FY 2006–2007.

"Collaborative Research: Testing Dynamical Predictions of a Hortonian Scaling Theory for Flood Events on Whitewater Basin, Kansas"; V.K. Gupta and B.T. Milne, co-PIs; National Science Foundation; \$63,359, expires 2007.

NELSON, M.A.

"Functional Analysis of a Model Filamentous Fungus: ESTs"; J. Dunlap (Dartmouth Medical School), PI, M.A. Nelson, co-PI, and PI on Project 4; National Institute of General Medical Sciences (NIGMS) Program Project Grants, National Institutes of Health; Year 3: UNM portion ~\$90,000 (direct plus indirect costs), April 1, 2004–March 31, 2009.

"Undergraduate Biomedical Research Training at UNM: Minority Access to Research Careers (MARC) Program"; M.A. Nelson, PI; National Institutes of Health; \$1,625,000, June 1, 2006–May 31, 2011; \$325,000/year.

POCKMAN, W.T.

"The Sevilleta Research Field Station: Infrastructure Enhancements for High-quality Water Resources and Wireless Data Transmission"; W.T. Pockman, PI, S.L. Collins, C.N. Dahm, R.R. Parmenter and D.O. Natvig, co-PIs; NSF DBI Field Stations and Marine Labs; \$76,270; December 1, 2003–October 31, 2008 (includes a one-year, no-cost extension).

"Biosphere-Atmosphere CO₂ Exchange of Terrestrial Ecosystems: Combining High Resolution Measurements and Models to Understand the Global Atmospheric Carbon Budget"; N. McDowell, W.T. Pockman, D.T. Hanson and J. Randerson, co-PIs; LANL IGPP; \$84,924, October 1, 2004–September 30, 2007.

"Global Change Effects on Grass-Shrub Interaction in an Arid Ecosystem"; J.E. Fargione, S.L. Collins and W.T. Pockman, co-PIs; NSF DEB-Ecology; \$297,494, July 15, 2005-July 14, 2008.

"Causes and Consequences of Drought-induced Mortality in Piñon-Juniper Woodland"; N.G. McDowell and W.T. Pockman, PIs; DOE Program of Ecosystem Research; \$1,754,993, UNM subcontract \$225,000; January 1, 2006-December 31, 2007.

"Sevilleta Long Term Ecological Research IV: Long Term Ecological Research in a Biome Transition Zone"; S.L. Collins, PI, C.N. Dahm, R.R. Parmenter, W.T. Pockman, B.O. Wolf and T.L. Yates, co-PIs (+ 17 non-signatory co-PIs); NSF-DEB, LTER Program; \$5,040,000, October 1, 2006–September 30, 2012.

SINSABAUGH, R.L.

"Photodegradation of Plant Litter in Grassland Ecosystems: A Mechanism for Uncoupling C and N Biogeochemistry"; J.Y. King, S.E, Hobbie, D. Milchunas, W. Parton and R.L. Sinsabaugh, Pls; NSF Ecosystem Science; \$570,359, July 2006–July 2009.

SMITH, F.A.

"The Impact of Late Quaternary Climate Change on Mammals along an Elevational Gradient"; F.A. Smith, PI, E.L. Charnov, co-PI; Division of Environmental Biology 0344620, National Science Foundation; \$315,000, April 2004—March 2008.

"Interdisciplinary Biomedical Sciences (PIBS): Applications of Mathematics, Physics and Computer Science for Investigating the Structure and Dymanics of Complex Biological Systems"; J.H. Brown, PI, F.A. Smith, S. Forrest and V.M. Kenkre, co-PIs; Howard Hughes Medical Institute; \$1,000,000, January 2006–December 2008.

"Integrating Macroecological Pattern and Processes Across Scales"; EA. Smith, PI, S.K.M. Ernest and S.K. Lyons, co-PIs; Research Coordination Network, National Science Foundation; \$490,000, July 2006—June 2011.

TAKACS-VESBACH, C.D.

"Collaborative Research: Hydrologic Controls on Near-stream and Near-lake Subsurface Biogeochemical Conditions and Microbial Community Structure and Function in Dry Valleys"; C.D. Takacs-Vesbach, PI; NSF OPP 0338267; \$160,747, July 1, 2003–June 30, 2007.

"Collaborative Research: Hydrologic Controls over Biogeochemistry and Microbial Community"; C. Takacs-Vesbach, PI, M. Gooseff (Colorado School of Mines) and J. Barret (Dartmouth) have collaborative grants; Office of Polar Programs, National Science Foundation; \$160,747, July 2004–July 2007.

Renewal: "Application of Molecular Techniques to the Study of Microbial Biofilms"; UNM and Sandia National Laboratories; \$40,000 (one-month summer salary), October 1, 2006–September 30, 2007.

"RCN: Geothermal Biology and Geochemistry in Yellowstone National Park"; W. Inskeep (Montana State University), PI, C. Takacs-Vesbach, co-PI; Research Coordination Networks, National Science Foundation; \$0 (no funds for UNM), September 2004—September 2009.

THORNHILL, R.

"Genetic Conflicts of Interest, Fluctuating Asymmetry and MHC"; S. Gangestad, PI, R. Thornhill, co-PI; National Science Foundation; \$325,000, August 2002–August 2008; \$40,000/year.

TURNER, T.F.

"CAREER: Museum-based Approaches to Ecology and Evolution of Aquatic Systems: An Integrated Research and Educational Program"; T.F. Turner, PI; National Science Foundation; \$500,000, May 1, 2002–April 30, 2008, \$100,000/year.

"Conservation Genetics of the Rio Grande Silvery Minnow (RGSM): Baseline Population Genetics of Wild Stocks and Monitoring Genetic Effects of Captive-propagated Stocks"; T.F. Turner, PI; U.S. Bureau of Reclamation, Department of the Interior; \$550,000, July 1, 2002–September 30, 2007, \$114,000/year.

"New Mexico Share-with-Wildlife Program: Baseline Genetic Data for the Threatened Pecos Bluntnose Shiner (Notropis simus pecosensis)"; T.E. Turner, PI, and M. Osborne, co-PI; New Mexico Department of Game and Fish, \$24,000, January 1, 2006–June 30, 2009, \$8,000/year.

"Dissertation Research: Local Adaptation and Gene Flow in a Fragmented Host System: Crepidostomum farionis (Digenea) and Oncorbynchus clarki virginalis (Salmonidae) in New Mexico"; T.F. Turner, PI, W. Wilson, co-PI; National Science Foundation; \$11,958, May 30, 2006–April 30, 2008; \$6,000/year.

"Assessment of Diversity at the Major Histocompatability Complex in the Rio Grande Silvery Minnow (Hybognathus amarus)"; M.J. Osborne, PI, T.F. Turner, co-PI; U.S. Fish and Wildlife Service, Department of the Interior; \$96,000, September 21, 2006–August 30, 2009, \$48,000/year.

WAIDE, R.B.

"Promoting Synthesis in the LTER Network," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$150,000, October 1, 2006–February 29, 2009.

"A Proposal for Travel Support to the 2006 LTER All Scientists Meeting," supplement to the Long Term Ecological Research (LTER) Network Cooperative Agreement; R.B. Waide, PI; National Science Foundation; \$293,755, May 1, 2006–February 29, 2009.

"Cooperative Agreement for the Network Office of the Long-Term Ecological Research Network"; R.B. Waide, J. Brunt, W.K. Michener and J. Vande Castle, PIs; National Science Foundation; \$8,100,000, March 1, 2003–February 28, 2009, \$1,450,000/year.

"Long-Term Ecological Research in the Luquillo Experimental Forest IV"; R.B. Waide, PI; sub-award from the University of Puerto Rico-Rio Piedras, National Science Foundation; \$150,000, December 1, 2006-November 30, 2012; \$25,000/year.

"Science Environment for Ecological Knowledge (SEEK)"; W.K. Michener, PI; National Science Foundation; \$13,400,000, 2002–2007, \$2,700,000/year.

"Characterizing Forest Structure for Assessments of Carbon Cycling and Biodiversity"; R.B. Waide, PI; sub-award from the University of Maryland, NASA; \$1,221,000; May 2005—April 2007, \$46,495/year.

WERNER-WASHBURNE, M.

"SACNAS Genomics Program" (for graduate student and faculty fellowships in genomics); L. Haro, PI, M. Werner-Washburne, co-PI; T-32, Society for Advancement of Chicanos and Native Americans in Science (SACNAS); \$1,000,000; September 1, 2004-August 31, 2008, \$250,000/year (direct costs).

"UNM-Initiatives to Maximize Student Diversity (IMSD)"; M. Werner-Washburne, Co-PI; National Institute of General Medical Sciences (NIGMS), National Institutes of Health; \$2,000,000, February 1, 2005-January 31, 2009, \$535,000 per year (direct + indirect costs).

"Genomic Analyses of Quiescent and Non-quiescnt Cells in Yeast Stationary-phase Cultures"; M. Werner-Washburne, PI; National Science Foundation Division of Molecular and Cellular Biosciences (MCB) 0445631; \$130,000, June 1, 2005–May 31, 2008.

"UNM-IMSD 5R25GM060201"; M. Werner-Washburne, PI; Division of Minority Opportunities in Research (MORE), National Institutes of Health; January 1, 2005–December 31, 2008,~\$550,000/year direct.

"Compendium of Gene Expression in Stationary-Phase Yeast"; M. Werner-Washburne, PI; National Institute of General Medical Sciences (NIGMS), National Institutes of Health, RO1 GM67593; July 1, 2002–June 30, 2008, a no-cost extension.

WITT, C.C.

"The Phylogenetic and Biogeographic History of High Altitude Adaptation in Hummingbirds: Selection on Hemoglobin Proteins as a Function of Oxygen Supply and Demand"; 'J.A. McGuire, PI, written and carried out by C.C. Witt, co-PI; National Science Foundation;\$100,340 awarded in 2007 to University of California–Berkeley.

B. Other.

COUCH, L.

Coccidia research and continued work with Coccidia of the World database and web page (http://biology.unm.edu/biology/coccidia/home.html).

DUSZYNSKI, D.W.

Continued scholarly work on the Coccidia of the World, both publishing in print and on web site (http://biology.unm.edu/biology/coccidia/home.html).

NATVIG. D.O.

Served as Principal Investigator and coordinator for the \$6,000,000 award from the U.S. Fish and Wildlife Service to construct the Sevilleta Education and Research Facility.

Joint Genome Institute sequencing of Neurospora discreta and Neurospora tetrasperma. PIs: J.W. Taylor and N.L. Glass (University of California-Berkeley), D.J. Jacobson (Stanford University), and D.O. Natvig (UNM).

TAKACS-VESBACH, C.D.

"The Yellowstone Metagenome Project: Biological Metagenomics and Bio-inspired Energy and Technology Development from Extreme Microbial Habitats across the Yellowstone Geothermal Ecosystem"; Community Sequencing Project, U.S. Department of Energy. Funded, but no money, just 1 Gb of sequence data (40 Mb of metagenomic data for my lab, worth approximately \$27,000).

IV. ACTIVITIES IN LEARNED AND PROFESSIONAL SOCIETIES.

A. Invited or Plenary Talks at Professional Meetings, Workshops, Etc.

BERGTHORSSON, U.

"Gene Duplications: Genomic and Experimental Approaches," Western IDeA States' Symposium on Evolutionary Medicine, Albuquerque NM, March.

BROWN, J.H.

87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 10.

Symposium, Joint Meeting of the Ecology Society of America and Society for Ecological Restoration International, San Jose CA, August 7.

COLLINS, S.L.

Three invited talks/presentations at workshops, 2007 Joint Meeting of the Ecological Society of America & The Society for Ecological Restoration (SER) International, San Jose CA, August 5-10.

An invited talk, LTER Mini-symposium, National Science Foundation, Washington DC, March.

An invited talk about the LTER research plan, NASA, Washington DC, June.

An invited talk about collaborative research, Arctic Integrated System Science Workshop, National Science Foundation, Washington DC, June.

An invited talk, George H.W. Bush U.S.-China Relations Conference, Washington DC, October.

COOK, J.A.

Cook, J.A. 2007. Natural History Collections: Critical Research Infrastructure in the United States. Congressional National Science Foundation Exhibition, Washington DC, June.

Cook, J.A.. 2007. High Latitude Science: The Beringian Coevolution Project. Congressional National Science Foundation Exhibition, Washington DC, June.

DAHM, C.N.

Invited talk, "Ground Water/Surface Water and Riparian Zone/Atmosphere Interactions in River Ecosystems," River Terrace and Floodplain Hydrology Symposium, Las Cruces NM, February 28.

Invited talk, "Reflections Upon the Science of Water in the New Mexico Year of Water," 52nd Annual Research Lecturer, UNM, Albuquerque NM, April 19.

Invited talk, "Reviving Our Most Endangered River: How Science Can Help," Santa Fe Watershed Association, Santa Fe NM, May 24.

Invited talk, "Climate Change and Water Budgets of River and Riparian Ecosystems," Third International Symposium on Riverine Landscapes, South Stradbroke Island, Queensland, Australia, August 30.

Invited talk, "Reflections on the Science of Water in the Southwestern United States," Australian Rivers Institute, Griffith University, Nathan, Queensland, Australia, October 25.

Invited talk, "Rivers and Floodplains: Linking Science and Society in New Mexico, Florida, and Australia," CALFED Bay-Delta Program, Sacramento CA, November 2.

Invited talk, "Riparian Zone Evapotranspiration (ET), Ground Water/Surface Water Interactions and Climate Change," Commonwealth Scientific and Industrial Research Organisation (CSIRO), Black Mountain, Canberra, Australia, November 26.

FARNSWORTH, P.

Invited Speaker, "Biotechnology in the Brewing Industry," Annual Meeting of the American Society of Microbiology, Albuquerque NM, February 15-16.

HANSON, D.T.

Invited seminar speaker, "Leaf Level Control of Water Use Efficiency: New Insights Using High Frequency Isotopic Analyses," Western Cotton Research Station, U.S. Department of Agriculture, Maricopa AZ, February.

Invited seminar speaker, "New Discoveries after Two Centuries of Debate in Plant Biology on How Gasses Move Through Leaves," The Interdisciplinary Plant Group, University of Missouri, Columbia MO, April.

Symposium co-chair (with L. Waters, San Diego State University) and speaker, "Early Land Plant Adaptations to Limitation of Photosynthesis by CO₂ Diffusion," Plant Biology and Botany

2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

Invited seminar speaker, "The Evolution of Resistance to Photosynthetic CO₂ Exchange, The Interdisciplinary Plant Group, San Diego State University, San Diego CA, October.

KODRIC-BROWN, A.

"Breeding Behavior, hybridization and conservation of desert fish," Symposium "The Role of Animal Behavior in Invasions: From Mechanism to Synthesis," International Joint Meeting of the Ecological Society of America and the International Society for Ecological Restoration, San Jose CA, August 5-10.

LITVAK, M.E.

2007 Meeting of the Guild of Rocky Mountain Ecology and Evolutionary Biologists, Ghost Ranch NM, September 22.

"Ecological Disturbance in the Southwest," Biosphere-atmosphere Exchange of Aerosols within Cloud, Carbon and Hydrologic cycles, including Organics and Nitrogen (BEACHON) Workshop, National Center for Atmospheric Research (NCAR), Boulder CO, November 14-16.

LOKER, E.S.

"Parasites as Elicitors and Modulators of Invertebrate Immune Responses: Trematodes and Snails as a Model System," European Science Foundation Innate Immunity, Obergurgl, Austria, April 20-28.

"Innate Immunity in Invertebrates: Is Pattern Recognition Enough?", American Society of Parasitologists, Mérida, México, June 21-25.

LOWREY, T.K.

"Herbarium Networking: United We Stand." Keynote Address, Joint Meeting of the Texas— Oklahoma Regional Consortium of Herbaria and the Southwest Association of Naturalists, Stephensville TX, April.

MILNE, B.T.

"Proactive Landscape Research and the Descent from Fossil Fuels," Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

"Extremum Theory in Ecology," Ecological Theory Workshop, University of Connecticut, September 17-18.

SMITH, F.A.

"The Program in Integrative Biological and Biomedical Sciences at UNM: an Experiment in Progress," Assistance Strategies for Centers Development-Integrated Graduate Education and Research Trainceships (ASCEND-IGERT) Assistance Workshop: Developing Competitive

Integrative Graduate Program and Research Training Programs at the PI and University Level, Washington DC, February.

"A Tale of Two Species: Extirpation, Range Expansion and Evolution in an Extreme Environment During the Late Quaternary," organized oral session on "Stepping Back in Time: The Application of Historical and Fossil Records to Recovering Ecological Baselines," Annual Meeting of the Ecological Society of America, San Jose CA, July.

"Integrating Pattern and Process Across Macroecological Scales: A Report from Year 1," Research Coordination Directors Meeting, National Science Foundation, Washington DC, September.

"A Tale of Two Species: Extirpation, Range Expansion & Evolution in an Extreme Environment During the Late Quaternary," Museum of Vertebrate Zoology Colloquium in Evolutionary Biology, University of California Berkeley, Berkeley CA, November.

TAKACS-VESBACH, C.D.

"Spatial and Temporal Variation of Microbial Diversity Across Antarctic Dry Valley Hydrological Margins," Annual Meeting of the McMurdo LTER, Boulder CO, August.

"The Biology of the Antarctic McMurdo Dry Valleys: Misconceptions, Surprises, and Unsolved Mysteries," Distinguished Lecture, Annual Meeting of the N.M. Academy of Sciences, N.M. Museum Natural History and Science, Albuquerque NM, November 10.

THORNHILL, R.

Plenary Lecture, Summer Conference of the Association for the Study of Animal Behaviour, Newcastle upon Tyne, U.K., September 5-7.

TURNER, T.F.

Osborne, M.J. and T. F. Turner. 2007. Conservation genetics of the Rio Grande silvery minnow (*Hybognathus amarus*): Genetic monitoring program, 2007. Invited Symposium: Middle Rio Grande Endangered Species Act Collaborative Program, UNM, April 16-17.

WERNER-WASHBURNE, M.

"Changing Your Road to Success to a Path with Heart," Andreoli-Woods Lecture, California State University-LA, Los Angeles CA, May.

B. Contributed Talks at Professional Meetings, Workshops, Etc.

COLLINS, S.L.

Six research presentations/posters, 2007 Joint Meeting of the Ecological Society of America & The Society for Ecological Restoration (SER) International, San Jose CA, August 5-10.

COOK, J.A.

Torres-Perez, F., B.S. Barker, R.E. Palma and J.A. Cook. 2007. Population structure of a rodent reservoir for Hantavirus, O. longicaudatus, in Chile and its human implications. Evolutionary

Change in Human-altered Environments: An International Summit. Institute of the Environment University of California, Los Angeles CA, February.

Dawson, N., A. Hope, S. MacDonald and J. A. Cook. 2007. Endemic mammals highlight conservation hotspots in the Alexander Archipelago. Poster, Evolutionary Change in Humanaltered Environments: An International Summit. Institute of the Environment University of California, Los Angeles CA, February.

Cook, J.A. 2007. Beringian Coevolution Project. Departmental Display, INTEL International Science Fair, Albuquerque NM, May.

Koehler, A.V.A., E.P. Hoberg, N.E. Dokuchaev, N.A. Tranbenkova, J.S. Whitman, D.W. Nagorsen and J.A. Cook. 2007. Phylogeography of *Soboliphyme baturini*, a transBeringian nematode of mustelids. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Arai, S., L. Sumibcay, T.L. Yates, S. Ohdachi, N.U. Truong, C. Parmenter, J.A. Cook, V.R. Nerurkar, J.-W. Song and R. Yanagihara. 2007. Search for novel insectivore-borne hantaviruses. VII International Hemorrhagic Fever with Renal Syndrome (HFRS) Meeting, Buenos Aires, Argentina, June.

Arai, S., L. Sumibcay, J.-W. Song, T.L. Yates, V.R. Nerurkar, S.N. Bennett, C. Parmenter, J.A. Cook and R. Yanagihara. 2007. A phylogenetically distinct Hantavirus in the Short-Tailed Shrew (*Blarina brevicauda*) in the United States. VII International Hemorrhagic Fever with Renal Syndrome (HFRS) Meeting, Buenos Aires, Argentina, June.

Arai, S., L. Sumibcay, J.-W. Song, T.L. Yates, V.R. Nerurkar, S.N. Bennett, C. Parmenter, J.A. Cook and R. Yanagihara. 2007. A phylogenetically distinct Hantavirus in the Short-Tailed Shrew (*Blarina brevicauda*) in the United States. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Torres-Perez, F, R.A. Medina, R.E. Palma, B. Hjelle and J.A. Cook. 2007. Population and ecogeographic genetic structure of *O. longicaudatus* and Andes virus in three major Chilean ecoregions. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Esteva, M., F. Cervantes, S Brant and J. A. Cook. 2007. Phylogenetic relationships of Saussure's shrew from Mexico. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Tsvetkova A., J.A. Cook, E. Hoberg, H. Henttonen, S. MacDonald, J. Laakkonen and D. Goade. 2007. The Beringian Coevolution Project: Model archives provide baselines for research and management. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

MacDonald, S.O. and J.A. Cook. 2007. Alaska land mammals of conservation concern. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June. Dawson, N., M. Small, K. Stone and J. A. Cook. 2007. Islands, introductions, and endemism, Martes in the Alexander Archipelago. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

Beringian Coevolution Project. PolarPalooza, New Mexico Museum of Natural History, Albuquerque NM, October-December.

Matsumoto, K., J.A. Cook, H.K. Goethert and S.R. Telford. 2007. Bartonella sp. infection of red-backed voles trapped from an interior Alskan sire where ticks are absent. Annual Meeting of the American Society of Tropical Medicine and Hygiene, Philadelphia PA, November.

Nofchissey, R.A., J.A. Cook, D. Goade, A. Tsvetkova and G. Ebel. 2007. Serological evidence of Powassan virus transmission in small mammals collected in Russia, Alaska and the Southwest U.S. Annual Meeting of the American Society of Tropical Medicine and Hygiene, Philadelphia PA, November.

Yanagihara, R., J.-W. Song, S. Arai, S.N. Bennett and J. A. Cook. 2007. Evolutionary insights from newly identified soricid-borne hantaviruses. Fifth International Conference on Emerging Zoonoses, Limassol, Cyprus, November.

DAHM, C.N.

Thibault, J.R., J.R. Cleverly and C.N. Dahm. 2007. An Examination of water table hydrographs and water use by phreatophytes. Annual Fall Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

Cleverly, J.R., S.B. Teet, J.R. Thibault and C.N. Dahm. 2007. Evapotranspiration and river discharge interactions with fire, partial success restoration, and climate change. Annual Fall Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

Zeglin, L.H., C.D. Takacs-Vesbach, C.N. Dahm, R.L. Sinsabaugh, J.E. Barrett and M. Gooseff. 2007. Microbial taxonomic and functional diversity in parafluvial sediments of cold and hot desert streams. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Crenshaw, C.L., L.H. Zeglin and C.N. Dahm. 2007. Nitrate dynamics and microbial diversity in stream hyporheic zones. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Mulholland, P.J., L.R. Ashkenas, L.W. Cooper, C.N. Dahm, W.K. Dodds, S. Findlay, S.V. Gregory, N.B. Grimm, R.O. Hall, S.K. Hamilton, S.L. Johnson, W.H. McDowell, J.L. Meyer, B.J. Peterson, G.C. Poole, J.L. Tank, H.M. Valett, J.R. Webster, C. Arango, M.J. Bernot, J.J. Beaulieu, A.J. Burgin, C. Crenshaw, A.M. Helton, L. Johnson, J. Merriam, B.R. Niederlehner, J.M. O'Brien, J. Potter, R.W. Sheibley, D.J. Sobota and S.M. Thomas. 2007. Nitrate uptake and denitrification rates in streams determined during the LINX II 15N addition experiments. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Helton, A.M., G.C. Poole, J.L. Meyer, P.J. Mulholland, L.R. Ashkenas, L.W. Cooper, C.N. Dahm, W.K. Dodds, S. Findlay, S.V. Gregory, N.B. Grimm, R.O. Hall, S.K. Hamilton, S.L.

Johnson, W.H. McDowell, B.J. Peterson, J.L. Tank, H.M. Valett, J.R. Webster, C. Arango, M.J. Bernot, J.J. Beaulieu, C. Grenshaw, J. Merriam, B. Niederlehner, J.M. O'Brien, J. Potter, R.W. Sheibley, D.J. Sobota, S.M. Thomas and L.H. Zeglin. 2007. Implications of the LINX-II 15N addition experiments for patterns of biotic nitrate uptake across stream networks. 55th Annual Meeting of the North American Benthological Society, Columbia SC, June 3-8.

Findlay, S., P.J. Mulholland, R.O. Hall, S.K. Hamilton, B.J. Peterson, J.L. Tank, C.N. Dahm, W.K. Dodds, N.B. Grimm, W.H. McDowell, H.M. Valett, J.R. Webster, C. Crenshaw, J. Potter, M.J. Bernot and D.J. Sobota. 2007. Stream denitrification potential: Where and how much? 55th Annual Meeting of the North American Benthological Society, Columbia, South Carolina.

Dahm, C.N. 2007. Riparian zone evapotranspiration, ground water/surface water interactions, and climate change. 2007 Joint Conference of the New Zealand Freshwater Sciences Society and Australian Society for Limnology, Queenstown, New Zealand, December 3-7.

HANSON, D.T.

Powers, H.H., J. Hunt, D.T. Hanson and N.G. McDowell. 2007. Measurement of stable CO₂ isotopes with a laser: Tunable diode laser spectroscopy applications for ecosystem measurements. 16th Annual Research Day, Department of Biology, UNM, April 13.

Bickford, C.P., N.G. McDowell, H.H. Powers, K.M. Brown and D.T. Hanson. 2007. Using tunable diode laser spectroscopy to determine carbon isotope discrimination and internal leaf conductance in field-grown juniper. 16th Annual Research Day, Department of Biology, UNM, April 13.

Bickford, C. P., N.G. McDowell, H.H. Powers, K.M. Brown and D. T. Hanson. 2007. Using tunable diode laser spectroscopy to determine carbon isotope discrimination and internal transfer conductance in field-grown juniper. Plant Biology and Botany 2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

Barbour, M., G. Tcherkez, N.G. McDowell and D.T. Hanson. 2007. On-line stable carbon isotope analysis of leaf-respired CO₂. EcoFizz-2007, Ecological Physiology Meeting, Sydney, Australia, September 27-28.

LITVAK, M.E.

Litvak, M.E., J. Heilman, K. McInnes, A. Thijs, K. Owens and J. Kjelgaard. 2007. Influence of vegetation cover on rain pulse responses in semi-arid savannas in central Texas. Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

Thijs, A., C.T. Lai and M. Litvak. 2007. Insights from tower-flux, physiological and stable isotope measurements to elucidate climatic and structural controls on CO₂ exchange in an encroaching savanna. Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

Molotch, N.P., J.R. McConnell, M. Litvak and P.D. Brooks. 2007. Ecohydrological controls on snowmelt partitioning in a mixed-conifer sub-alpine forest, Valles Caldera, New Mexico. Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

LOKER, E.S.

Zhang, S.-M.N., Y. Zeng and Loker, E.S. 2007. Expression profiling and binding properties of fibrinogen-related proteins (FREPs), plasma lectins from the snail *Biomphalaria glabrata*, the intermediate host of the human blood fluke *Schistosoma mansoni*. American Society of Parasitologists, Mérida, México, June 21-25.

Lotfy, W.M., S.V. Brant, T.H. Le, A. Demiaszkiewicz, J.M. Kinsella, J. Rajapakse and E.S. Loker. 2007. Evolution of the Family Fasciolidae Railliet, 1895. American Society of Parasitologists, Merida, Mérida, México, June 21-25.

Steinauer, M.L., I.N. Mwangi, J.M. Kinuthia, G.M. Mania, G.M. Mkoji and E.S. Loker. 2007. Epidemiology and chronobiology of schistosomes from Lake Victoria, Kenya. American Society of Parasitologists, Mérida, México, June 21-25.

Melman, S.D., M.L. Steinauer, E.S. Hatton, G.M. Mkoji, A. Aragon, A., C. Cunningham, and E.S. Loker. 2007. Apparent emergence of praziquantel resistance in a Kenyan isolate of *Schistosoma mansoni*. American Society of Parasitologists, Mérida, México, June 21-25.

Stout, B.A., S.-M. Zhang, C.M. Adema and E.S. Loker. 2007. Relationship of FREPs to acquired resistance in the snail *Biomphalaria glabrata*. American Society of Parasitologists, Mérida, México, June 21-25.

Steinauer, M.L., I.J. Wilson, G.M. Mkoji, E.L. Agola, I. Ndugu, G. Maina, D. Karanja, and E.S. Loker. 2007. Molecular and evolutionary epidemiology of *Schistosoma mansoni* in the human host. American Society of Tropical Medicine and Hygiene, Philadelphia PA, November 4-7.

Stout, B.A., S.M. Zhang, C.M. Adema and E.S. Loker. 2007. Relationship of specific fibrinogen-related proteins to acquired resistance in the snail *Biomphalaria glabrata*. American Society of Tropical Medicine and Hygiene, Philadelphia PA, November 4-7.

MARSHALL, D.L.

Barnes, M.G. and D.L. Marshall. 2007. The effect of plant source location on revegetation success: A reciprocal transplant experiment with winterfat (*Krascheninnikovia lanata*). Annual Meeting of the Ecological Society of America, San Jose CA, August. Published online by the society (no volume or page number available): http://eco.confex.com/eco/2007/techprogram/D1004.htm

Barnes, M.G. and D.L. Marshall. 2007. The effect of plant source location on revegetation success: A reciprocal transplant experiment with winterfat (*Krascheninnikovia lanata*). Annual Meeting of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Abiquiu NM, September.

Koontz, T.L., D.L. Marshall and B.T. Milne. 2007. The effect of herbivores on seedbanks in a grassland and a shrubland. Annual Meeting of the Ecological Society of America, San Jose CA, August. Published online by the society (no volume or page number available): http://eco.confex.com/eco/2007/techprogram/D1004.htm

Simpson, H.L. and D.L. Marhsall. 2007. Patterns of genotypic and phenotypic variation in an invasive mustard (*Isatis tinctoria*) across its introduced range. Annual Meeting of the Ecological Society of America, San Jose CA, August. Published online by the society (no volume or page number available): http://eco.confex.com/eco/2007/techprogram/D1004.htm

MILLER, K.B.

"The phylogeny of whirligig beetles (Coleoptera: Gyrinidae): Stopping the spin," Entomological Society of America, San Diego CA, December 11.

MILNE, B.T.

Milne, B.T. and D.A. Dean. 2007. Maximization of Shannon Diversity under Constraints Explains the Partitioning of Species Richness among Vertebrate Taxa in North America. Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

Milne, B.T. 2007. Tree Ringlets: Time- and Space-dependent Tree Growth in Strahler Stream Networks. Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

POCKMAN, W.T.

Yepez, E.A., J. Elliot, S.A. White, J. Plaut, N. McDowell and W.T. Pockman. 2007. Hydraulic mechanisms related to tree mortality and survival during drought in Piñon (*Pinus edulis*) and Juniper (*Juniperus monosperma*) woodlands. Joint Assembly with the American Geophysical Union, Acalpulco, Mexico, May.

Fargione, J.E., S.L. Collins, W.T. Pockman, J.R. Elliott, C.L. Crenshaw and E. Nonaka. 2007. Rapid plant community responses to nighttime warming in a desert grassland. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Johnson, J., S.L. Collins, S. Baez, W.T. Pockman and E.E. Small. 2007. Effects of experimental drought and water addition on community dynamics in three aridland plant communities. Annual Meeting of the Ecological Society of America, San Jose CA, August.

McDowell, N.G. and W.T. Pockman. 2007. Hydraulic framework for understanding mechanisms of woody plant survival and mortality during drought. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Medeiros, J.S., D.T. Hanson and W.T. Pockman. 2007. Freezing tolerance in high and low latitude populations of *Larrea tridentata*: Evidence for local adaptation to long-term minimum temperature. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Plaut, J., E. Yepez, W.T. Pockman and N.G. McDowell. 2007. Precipitation pulse responses in piñon-juniper woodland in central New Mexico. Annual Meeting of the Ecological Society of America, San Jose CA, August.

White, S.A., W.T. Pockman, N. McDowell, M. Ryan and E. Yepez. 2007. Soil respiration responses to precipitation pulse-dynamics in a piñon-juniper ecosystem. Annual Meeting of the Ecological Society of America, San Jose CA, August.

Yepez, E.A., J. Elliot, S.A. White, J. Plaut, N. McDowell and W.T. Pockman. 2007. Causes and consequences of tree mortality in piñon-juniper woodlands: Introducing an ecosystem scale rainfall manipulation. Annual Meeting of the Ecological Society of America, San Jose CA, August.

SINSABAUGH, R.L.

Sinsabaugh, R.L., C. Crenshaw, L.E. Green, K. Lipinski, K.J. Odenbach, A. Porras-Alfaro, M. Stursova and L. Zeglin. 2007. Fungal loop model for the N cycle of semiarid grassland. Soil Ecology Society, Moab UT, April 29– May 3.

Hamaoui G.S., L. Tuhela, M.N. Spilde, R.L. Sinsabaugh and D.E. Northup. 2007. Identification of microbial signatures in biogenic cave ferromanganese deposits (FMD). American Society for Microbiology, Toronto, Canada, May 21-25.

Zeglin, L.H., C.D. Vesbach, C.N. Dahm, R. L. Sinsabaugh, J.E. Barrett and M.N. Gooseff. 2007. Microbial taxonomic and functional diversity in parafluvial sediments of cold and hot desert streams. Annual Meeting of North American Benthological Society, Columbia SC, June 4-8.

Brandt, L.A., J.Y. King, D.G. Milchunas, R.L. Sinsabaugh, S.E. Hobbie and W.J. Parton. 2007. Effects of ultraviolet radiation on the early stages of litter decomposition in three contrasting grassland ecosystems. Annual Meeting of the Ecological Society of America, San Jose CA, August 5-10.

Porras-Alfaro, A., J. Herrera, R.L. Sinsabaugh and D.O. Natvig. 2007. Effect of nitrogen fertilization on fungal communities in a semiarid grassland. Mycological Society of America, Baton Rouge LA, August 6-9.

Moorhead, D.L. and R.L. Sinsabaugh. 2007. Modeling C dynamics with measurable biological and SOM parameters. Annual Meeting of the Soil Science Society of America, New Orleans LA, November 4-8.

SMITH, F.A.

"Size Matters," National Evolutionary Synthesis Center, Raleigh, NC, February.

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewki and K.M. Youberg. 2007. A tale of two species: Extirpation, range expansion and evolution in an extreme environment. Biannual Meeting of the International Biogeography Society, Tenerife, Spain, January.

Smith, F.A., L. Harding, H.M. Lease, I.W. Murray, A. Raniszewki and K.M. Youberg. 2007. A tale of two species: Extirpation, range expansion and evolution in an extreme environment. American Society of Mammalogists, Albuquerque NM, June.

SNELL, H.L.

Bateman, H.L., A. Chung-MacCoubrey and H.L. Snell. 2007. Effects of non-native plant removal on lizard abundance along the Middle Rio Grande in New Mexico. Joint Meeting of the Ecological Society of America and Society of Ecological Restoration, San Jose CA, August 5-10.

Giermakowski, J.T. and H.L. Snell. 2007. Covariation of size and vegetative productivity in Galápagos tortoises. Oral presentation, Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July 11-16, 2007.

Giermakowski, J.T. and H.L. Snell. 2007. Where to look? Maps of likely occurrence and absence for the herps of New Mexico. Poster presentation, 2007 Meeting of the Southwest Partners in Amphibian and Reptile Conservation, Albuquerque NM, May 31–June 2.

TAKACS-VESBACH, C.D.

Takacs-Vesbach, C., M. Gooseff, J. Barrett and K. Mitchell. 2007. Microbial Diversity and Temperature: Differing Processes at the Two Extremes. American Society of Limnology and Oceanography, Santa Fe NM, February.

THORNHILL, R.

Gangestad, S.W., R. Thornhill and C.E. Garver-Apgar. 2007. Estrus, pair-bonding, and the costs of extra-pair sex. 19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30-June 3.

Garver-Apgar, C.E., S.W. Gangestad and R. Thornhill. 2007. Intrasexual conflict experienced by women and their romantic partners as a function of women's fertility status. 19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30–June 3.

TURNER, T.F.

Wilson, W.D. and T.F. Turner. 2007. Phylogeny of the Pacific salmon and trout (*Oncorhynchus*) based on partial ND4 sequence. 40th Joint Annual Conference of the Arizona and New Mexico Chapters of the Wildlife and Arizona and New Mexico Chapter of the American Fisheries Society, Albuquerque NM, February.

Turner, T.F., M.J. Osborne, G.R. Moyer, M.A. Benavides and D. Alo. 2007. Life history and environmental variation interact to determine effective size to census size ratio. Symposium on Evolution in Human-altered Environments, University of California, Los Angeles CA, February 8-10.

Burdett, A.S. and T.E Turner. 2007. River food webs during summer dry-down in the Middle Rio Grande: A study using stable isotope analysis. Annual Meeting of the North American Benthological Society, Columbia SC, June 3.

Osborne, M.J. and T.E.Turner. 2007. Multi-locus MHC and parasite diversity in an endangered non-model cyprinid. Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand, June 12-16.

Turner, T.F. and M. J. Osborne. 2007. Lessons from multigenerational genetic monitoring in an endangered species. Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand, June 12-16.

Wilson, W.D. and T.F. Turner. 2007. Major Histocompatibility Complex (MHC) Patterns in salmonids: A phylogenetic and functional analysis. Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand. June 12-16.

WITT, C.C.

Witt, C.C. 2007. Resistance to environmental hypoxia by Andean hummingbirds. Annual Meeting of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists, (GREEB), Abiquiu NM, September 22.

WOLF, B.O.

Murray, I. and B.O. Wolf. 2007. Nutritional ecology of chelonians via stable isotope analysis. 2007 Joint Meeting of Ichthyologists and Herpetologists, St. Louis MO, July 11-16.

Pershall, A., R. Warne and B. O. Wolf. 2007. Small mammal utilization of pulsed resources quantified through stable isotope analysis. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 6-10.

Mathiasen, C.C., I. Murray, B.O. Wolf and E.A. Smith. 2007. Portable ultrasonography: Developing non-destructive techniques for quantifying reproductive effort under field conditions. 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 6-10.

Wolf, B.O., R. Warne, S. Engel and I. Murray. 2007. Using stable isotope approaches to trace pathways of carbon flow through a food web; responses to short and long-term climate variability. Joint Symposium on Long Term Ecological Research Programs in New Mexico, New Mexico State University, Las Cruces NM, July 12.

Wolf, B.O. 2007. The use of stable isotope approaches to answer questions about avian movements, physiology, behavior and ecology. 77th Annual meeting of the Cooper Ornithological Society, Moscow ID, June 20-23.

C. Attendance at Professional Meetings, Workshops, Etc.

BARTON, L.L.

107th General Meeting of American Society for Microbiology, Toronto CA, May 21-25.

BERGTHORSSON, U.

Western IDeA States' Symposium on Evolutionary Medicine, Albuquerque NM, March.

American Genetic Association Annual Symposium "Mechanisms of Genome Evolution," Indiana University, Bloomington IN, July.

COLLINS, S.L.

2007 Joint Meeting of the Ecological Society of America & The Society for Ecological Restoration (SER) International, San Jose CA, August 5-10.

LTER Science Council Meeting, Portland OR, May 17-19.

COOK, J.A.

Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June.

COUCH, L.

Annual Meeting of the Southwest Association of Parasitologists, Lake Texoma OK, April.

First North American Parasitology Congress, Mérida, Yucatán, México, June.

CRIPPS, R.M.

Keystone Meeting on Cardiovascular Development and Disease, Beaver Creek Co, January.

Weinstein Cardiovascular Research Conference, Indianapolis IN, May.

DAHM, C.N.

H.J. Andrews Long Term Ecological Research (LTER) Annual Symposium, Corvallis OR, February 6-7. (I serve as an external advisory panel member to the H.J. Andrews LTER Program.)

Peer Review on Setting Minimum Flows and Levels for the Hillsborough River, Southwest Florida Water Management District (SWFWMD), Tampa Bay FL, March 12-13.

Student Water Forum, UNM, Albuquerque NM, March 23.

Coordinating Committee Meeting, Long Term Ecological Research (LTER), Portland OR, May 17-19.

Annual Meeting of the North American Benthological Society (NABS), Columbia SC, June 3-7.

Grant Planning Workshop, New Mexico Experimental Program to Stimulate Competitive Research (EPSCoR), Las Cruces NM, June 21-22.

Planning Workshop, Tropical Rivers and Coastal Knowledge (TRACK), Nathan, Australia, July 23.

Third International Symposium on Riverine Landscapes, South Stradbroke Island, Queensland, Australia, August 28–September 1.

10th International River Symposium and Environmental Flows Conference, Brisbane, Australia, September 3-6.

Australian Rivers Institute Annual Workshop, Purlingbrook Falls, Australia, November 12-13.

Australian Society for Limnology and the New Zealand Freshwater Sciences Society Conference, Queenstown, New Zealand, December 3-7.

Planning Meeting, Goulburn Broken Basin Workshop, Melbourne, Australia, December 17-18.

DUSZYNSKI, D.W.

Annual Meeting of the Southwestern Association of Parasitologists, Lake Texoma OK, April.

First North American Parasitology Congress, Mérida, Yucatán, México, June.

FARNSWORTH, P.

Workshop, "Designing Effective Courses," Office of Effective Teaching, UNM, September 20.

Workshop, "Using Electronic Classroom Response Systems," Office of Effective Teaching, UNM, November 1.

Workshop, "Teaching and Diversity," Office of Effective Teaching, UNM, November 7.

FRIDRICK, C.O.

New Mexico Higher Education Assessment and Retention Conference, Albuquerque NM, February 22.

"Writing Measurable Student Learning Outcomes" workshop, sponsored by UNM Office of Support for Effective Teaching (OSET), UNM, Albuquerque NM, March 20.

"Teaching with Clickers" workshop, sponsored by UNM sponsored by UNM Office of Support for Effective Teaching (OSET), UNM, Albuquerque NM, April 19.

HANSON, D.T.

Plant Biology and Botany 2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

KATJU, V.

Annual Symposium: Mechanisms of Genome Evolution, American Genetic Association, Bloomington IN, July.

KODRIC-BROWN, A.

Joint Meeting of the Ecological Society of America and the Society for Ecological Restoration International, San Jose CA, August 5-10.

LITVAK, M.E.

Biosphere-atmosphere Exchange of Aerosols within Cloud, Carbon and Hydrologic cycles, including Organics and Nitrogen (BEACHON) Workshop, National Center for Atmospheric Research (NCAR), Boulder CO, November 14-16.

U.S.-France Young Engineering Scientists Symposium on Environmental Sensors, Washington DC, October 22-24.

Global Change Experiment Design Team, National Ecological Observatory Network (NEON), Boulder CO, August 13-14.

FLUXNET Synthesis Workshop, LaThuile, Italy February 19-22. (Selected as one of 50 participants in the workshop to synthesize data sets from flux towers around the world.)

Fall 2007 Meeting of the American Geophysical Union, San Francisco CA, December 10-14.

LOKER, E.S.

European Science Foundation Innate Immunity, Obergurgl, Austria, April 20-28.

American Society of Parasitologists, Mérida, México, June, 21-25.

American Society of Tropical Medicine and Hygiene, Philadelphia PA, November 4-7.

LOWREY, T.K.

Joint Meeting of the Texas-Oklahoma Regional Consortium of Herbaria and the Southwest Association of Naturalists, Stephensville TX, April.

Botany 2007 National Meetings, Chicago II, July.

MARSHALL, D.L.

Annual Meeting of the Guild of Rocky-mountain Ecologists and Evolutionary Biologists, Abiquiu NM, September.

MILLER, K.B.

Entomological Collections Network, San Diego CA, December 7-9.

Entomological Society of America, San Diego CA, December 9-12.

MILNE, B.T.

Rocky Mountain Sustainability Summit, University of Colorado, Boulder CO, February.

Tree Ring Analysis Training Workshop, Tree Ring Laboratory, University of Arizona, April.

Annual Symposium of the U.S. Regional Association of International Association of Landscape Ecology (US-IALE), Tucson AZ, April 9-13.

Ecological Theory Workshop, University of Connecticut, September 17-18.

NATVIG, D.O.

Annual Meeting of the Mycological Society of America, Baton Rouge LA, August 5-9.

2007 Annual Sevilleta Research Symposium, Las Cruces NM, July.

5th Annual Ecological Genomics Symposium, Kansas City MO, November 9-11.

NELSON, M.A.

Alliance for Faculty Diversity Training Workshop, Albuquerque NM, March 30-31.

Minority Opportunities in Research (MORE, NIH) Program Directors' Meeting, Atlanta GA, June 2-4.

New Mexico Nanoscience Education Initiative (NMNEI), First NMNEI Workshop, Las Cruces NM, July 11-13.

2007 Society for Advancement of Chicanos and Native Americans in Science (SACNAS) 34th Annual Conference, Kansas City MO, October 11-14.

POCKMAN, W.T.

Meeting of Network Information Systems Advisory Committee, Long Term Ecological Research (LTER) Network, Portland OR, May.

Annual Meeting of the DOE Program for Ecosystem Research (PER), Rhinelander WI, June.

Annual Meeting of the Ecological Society of America, San Jose CA, August.

SINSABAUGH, R.L.

Microscale Approaches to Macroscale Issues in Ecology Workshop, National Science Foundation, Washington DC, April 16-18.

Soil Ecology Society Biennial Meeting, Moab UT, April 29-May 3.

Integrating Resource Utilization into the Metabolic Theory of Ecology Workshop, National Science Foundation, Sevilleta LTER Field Station, Socorro NM, May 14-15.

SMITH, F.A.

Biannual Meeting of the International Biogeography Society, Tenerife, Spain, January.

Assistance Strategies for Centers Development–Integrated Graduate Education and Research Traineeships–Experimental Program to Stimulate Competitive Research (ASCEND–IGERT–EPSCOR) workshop, Directorate for Biological Science, National Science Foundation, Washington DC, February.

Working Group on Phanerozoic Body Size Trends in Time and Space: Macroevolution and Macroecology, National Evolutionary Synthesis Center (NESCent), Raleigh NC, February and September.

Integrating Macroecological Pattern and Process Across Scales (IMPPS), Research Coordination Network, Santa Fe NM, April and October.

87th Annual Meeting of the American Society of Mammalogist, Albuquerque NM, June.

Joint Meeting of the Paleontological Society and the Geological Society of America, Denver CO, October.

SNELL, H.L.

2007 Meeting of the Southwest Partners in Amphibian and Reptile Conservation, Albuquerque NM, May 31-June 2.

TAKACS-VESBACH, C.D.

American Society Limnology Oceanography Conference, Santa Fe NM, February 4-9.

Annual Meeting of the McMurdo LTER, Boulder CO, August.

THORNHILL, R.

19th Annual Meeting of the Human Behavior and Evolution Society (HBES), Williamsburg VA, May 30-June 3.

Summer Conference of the Association for the Study of Animal Behaviour, Newcastle upon Tyne, U.K., September 5-7.

TURNER, T.F.

Annual Meeting of the Society for the Study of Evolution, Christchurch, New Zealand, June 12-16.

Middle Rio Grande Endangered Species Act Collaborative Program, UNM, April 16-17.

Symposium on Evolution in Human-altered Environments, University of California, Los Angeles CA, February 8-10.

WAIDE, R.B.

Association for Tropical Biology and Conservation, Morelia, México, July 15-22.

Society for Ecological Economics, New York NY, June 25-28.

Organization of Biological Field Stations, Junction TX, September 13-16.

WEARING, H.J.

Inference For Mechanistic Models Working Group, National Center for Ecological Analysis and Synthesis (NCEAS), Santa Barbara CA, March 19-23, 2007 and December 3-7.

WERNER-WASHBURNE, M.

American Society of Cell Biology, Washington DC, December.

Annual Meeting of Society for Advancement of Chicanos and Native Americans in Science (SACNAS), Kansas City KS, October.

WITT, C.C.

Annual Meeting of the Guild of Rocky Mountain Ecologists and Evolutionary Biologists, (GREEB), Abiquiu NM, September 22.

WOLF, B.O.

77th Annual meeting of the Cooper Ornithological Society, Moscow ID, June 20-23.

Joint Symposium on Long Term Ecological Research Programs in New Mexico, New Mexico State University, Las Cruces NM, July 12.

D. Service as Editor of Scholarly Journal.

BROWN, J.H.

Proceedings of the National Academy of Sciences (PNAS)

COUCH, L.

Acting Editor, UNM Museum of Southwest Biology Publication Series until August.

KODRIC-BROWN, A.

Animal Behaviour

MILLER, R.D.

Associate Editor, Immunogenetics

NATVIG, D.O.

Editor in Chief, Mycologia (the journal of the Mycological Society of America)

NELSON, M.A.

Associate Editor, Fungal Genetics and Biology, since 1998.

THORNHILL, R.

Zoology: Analysis of Complex Systems



WOLF, B.O.

Associate Editor, Oecologia

E. Service on Editorial Board of Scholarly Journal.

BARTON, L.L.

Biometals (an international journal) Environmental Engineering

COLLINS, S.L.

BioScience Journal of Ecology Oecologia

CUNNINGHAM, C.

Developmental and Comparative Immunology.

KODRIC-BROWN, A.

Ecology Ethology and Evolution of Fishes

NATVIG, D.O.

Mycologia (the journal of the Mycological Society of America)

NELSON, M.A.

Functional and Integrative Genomics, since 1999.

Applied Mycology and Biotechnology, since 2002.

POCKMAN, W.T.

Editorial Review Board, Tree Physiology

SINSABAUGH, R.L.

Soil Biology and Biochemistry

SNELL, H.L.

Chair, Publications Committee, Museum of Southwestern Biology, UNM.

THORNHILL, R.

Proceedings of the Royal Society of London Biological Sciences

F. Service as Officer of Professional Organization (indicate whether Elected or Appointed).

COUCH, L.

Chair, Education Committee, American Society of Parasitologists (appointed)

Co-chair, Auction Committee, American Society of Parasitologists (appointed)

COLLINS, S.L.

Chair, Long-term Studies Section, Ecological Society of America (appointed)

Chair, Publications Committee, Ecological Society of America (appointed)

COOK, J.A.

Member, Board of Directors, American Society of Mammalogists, 2007-10 (elected).

DUSZYNSKI, D.W.

Scientific Program Officer of the American Society of Parasitology (ASP, 20th year of this service); worked with colleagues in Mérida and Mexico City to plan the "First North American Parasitology Congress" between the ASP and the Society of Mexican Parasitologists (SMP), which was held June 21-25, 2007.

Council Member-at-Large, American Society of Parasitologists, August, 2006–July, 2010 (elected).

HANSON, D.T.

Symposium "Comparative Algal and Bryophyte Physiology" co-Chair (and co-creator), Plant Biology and Botany 2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

Co-head, Southwestern Sub-sectional Region, The Western Sectional Society, The American Society of Plant Biologists, September 2002–present.

LOWREY, T.K.

Past President, International Organization of Plant Biosystematists (elected).

Chair, Collections Committee, American Society of Plant Taxonomists, 2006-07 (appointed).

NATVIG, D.O.

Ex-Officio member, Executive Council, Mycological Society of America (appointed)

NELSON, M.A.

Member, N.M. Computational Biology Committee, 1994-present (appointed).

Member, Fungal Genome Initiative Advisory Board, 2001-present (appointed).

Network member, N.M. Nanoscience Education Initiative (NEI), since 2007 (appointed).

POCKMAN, W.T.

Local Host for 2009 Annual Meeting of the Ecological Society of America, to be held in Albuquerque in August (appointed).

Member, Ecological Society of America, Meetings Committee (appointed).

Member and Chair-elect, Network Information Systems Advisory Committee for Long Term Ecological Research Network (elected).

SMITH, F.A.

Ombudsperson, American Society of Mammalogists, 2002-present (appointed).

Board of Directors, American Society of Mammalogists, serving third term (1999, 2002, 2004 (elected).

Chair, Alfred Russel Wallace Award Committee, International Biogeography Society, 2006–present (appointed).

TURNER, T.F.

Board of Governors, American Society of Ichthyologists and Herpetologists (elected).

V. OTHER PROFESSIONAL ACTIVITIES.

A. Seminar Presentations, UNM and Elsewhere.

BERGTHORSSON, U.

Gene Duplication and the Evolution of Novel Functions. Department of Biology, UNM, December.

BROWN, J.H.

Southern Illinois University, April 5.

CUNNINGHAM, C.

"The Eastern and Pacific Oysters: From Transcript to Transcriptome," Fort Johnson Marine Science Seminar Series, Charleston SC, March.

"Surviving Adversity? Defense Genes in Schistosoma mansoni," Department of Biology, UNM November.

CRIPPS, R.M.

Department of Pharmacy, UNM.

Department of Molecular Genetics, Johns Hopkins University School of Medicine.

DAHM. C.N.

"Reflections Upon the Science of Water in the New Mexico Year of Water," 52nd Annual Research Lecturer, UNM, Albuquerque NM, April 19.

"Reflections on the Science of Water in the Southwestern United States," Australian Rivers Institute, Griffith University, Nathan, Queensland, Australia, October 25.

HANSON, D.T.

"Leaf Level Control of Water Use Efficiency: New Insights Using High Frequency Isotopic Analyses," Western Cotton Research Station, U.S.. Department of Agriculture, Maricopa AZ, February.

"New Discoveries after Two Centuries of Debate in Plant Biology on How Gasses Move Through Leaves, "The Interdisciplinary Plant Group, University of Missouri, Columbia MO, April.

"The Evolution of Resistance to Photosynthetic CO₂ Exchange, The Interdisciplinary Plant Group, San Diego State University, San Diego CA, October.

"From Plastid to Planet: How Leaf-level Diffusion Impacts Global Productivity," Department of Biology, UNM, November 1.

KATJU. V.

"Experimental Evolution and Early Evolutionary Dynamics of Gene Duplicates in *Caenorhabditis elegans*," Department of Ecology and Evolution, State University of New York–Stony Brook, Stony Brook NY, January.

"Genome-wide Analysis of Evolutionarily Young Gene Duplicates in Caenorhabditis elegans," Bioinformatics Research Center, University of North Carolina-Charlotte, Charlotte NC, January.

"Genome-wide Analysis of Evolutionarily Young Gene Duplicates in Caenorhabditis elegans," Department of Biology and Biochemistry, University of Houston, Houston TX, January.

"Experimental Evolution and Early Evolutionary Dynamics of Gene Duplicates in *Caenorhabditis elegans*," Department of Genetics, North Carolina State University, Raleigh NC, February.

"Experimental Evolution and Early Evolutionary Dynamics of Gene Duplicates in Caenorhabditis elegans," Department of Biology, Georgetown University, Washington DC, February.

KODRIC-BROWN, A.

"Disturbance Is Essential for the Conservation of Desert Spring Communities," National Center for Ecological Analysis and Synthesis, University of California, Santa Barbara CA, Fall.

LOWREY, T.K.

"Herbarium Curation," Video Conference, Commonwealth Scientific and Industrial Research Organisation (CSIRO), Canberra, Australia, November.

MILLER, K.B.

"Females Who Play Hard-to-get Are for Suckers: Mating Systems in Diving Beetles," Arizona State University, Tempe AZ, October.

"Females Who Play Hard-to-get Are for Suckers: Mating Systems in Diving Beetles," Syracuse University, Syracuse NY, September.

MILNE, B.T.

"Development of the Carbon-neutral Food-shed in New Mexico," Agribusiness Collaborative, Mid-Region Council of Governments, Albuquerque NM, October 10.

"Environment and Sustainability in a Global Context," International Studies Institute, UNM, September 11.

Development of the Carbon-neutral Food-shed in New Mexico, La Montanita Cooperative, Albuquerque NM, Oct. 16.

Biodiversity lecture, Howard Snell's class, UNM, March 22.

Biodiversity lecture, Bill Flemming's class, Architecture and Planning, UNM.

Food-shed lecture, Ric Richardson's class, Architecture and Planning, UNM.

Food-shed lecture, Bill Gilbert's class. Fine Arts Department, UNM.

NELSON, M.A.

"Scientific Research Ethics," Institute for Ethics, Health Science Center, UNM, February 28.

POE, S.

Tenure seminar, "Evolution in Solitary Island Lizards," Department of Biology, UNM.

SMITH, F.A.

"A Tale of Two Species: Extirpation, Range Expansion and Evolution in an Extreme Environment During the Late Quaternary," Museum of Vertebrate Zoology Colloquium in Evolutionary Biology, University of California, Berkeley CA, November.

"Size Matters: From Individual to Global Scale Patterns of Body Size over Time," Department of Biology, UNM, November.

STRICKER, S.A.

"Multiple Signaling Pathways Regulating Egg Maturation," Pharmacology, UNM April.

THORNHILL, R.

"Infectious Diseases and Human Values," Department of Biology, UNM, Fall.

TURNER, T.F.

Oklahoma State University, Stillwater OK Texas A&M University, Corpus Christi TX

WEARING, H.J.

Division of Integrative Biology, University of South Florida, February.
Department of Biology, Emory University, Atlanta GA, February.
Department of Biology, UNM, March.
Department of Mathematics and Statistics, UNM, August.
Theoretical Division, Los Alamos National Laboratories, Los Alamos NM, August.

WERNER-WASHBURNE, M.

Genomics of the Quiescent State in Yeast," Genome Center, University of Washington, Seattle WA, March.

"Mentoring," Department of Biology, University of Washington, Seattle WA, March.

"Genomics of the Quiescent State in Yeast," University of Montana, Missoula MT, April.

"Quiescence: How Yeast Cells Plan to Live Forever!", New Mexico Tech, Socorro NM, November.

Several mentoring presentations for Peer Mentoring for Graduate Students of Color, Office of Graduate Studies, UNM.

WITT, C.C.

Witt, C.C. 2007. Hummingbird evolution into the Andes: History revealed by the integration of molecular systematics and physiology. Institute of Arctic Biology, University of Alaska, Fairbanks AK, March.

Witt, C.C. 2007. Hummingbird evolution into the Andes: History revealed by the integration of molecular systematics and physiology. Museum of Natural Science, Louisiana State University, October 19.

Guest Lecturer, "Biology of Tropical Birds," Biol. 461L, Introduction to Tropical Biology, February.

WOLF. B.O.

"Are Saguaros a 'Keystone' Resource for Consumers? An Isotopic View of a Plant-Animal Interaction," Department of Biology, University of California-Riverside.

"Seasonal and Annual Shifts in Pathways of Carbon Flow Through an Arid Grassland-Shrubland Food Web," Department of Biology, University of California, Riverside.

B. Testimony in a Scholarly Capacity at Hearings of Commissions, Legislative Committees, Etc.

COOK, J.A.

On behalf of American Institute of Biological Sciences (AIBS), I met with Senator Bingaman's staff and then Rep. Tom Udall's staff regarding amendment (expansion) of Bingaman's Competitive Science Initiative (Senate Bill that was passed and signed into law- America COMPETES Act of 2007) to include biological sciences, Washington DC, June.

DUSZYNSKI, D.W.

Testimony and MS PowerPoint® presentation to Phyllis Johnson, Regional Director, Agricultural Research Service, U.S. Dept. of Agriculture, Beltsville, MD to present and discuss the concept of moving the U.S. National Parasite Collection to the Museum of Southwestern Biology at UNM, February.

MILLER, R.D.

Directors' Review, National Science Foundation, November 14, 2007.

C. Presentation to General Audience in a Scholarly Capacity.

COLLINS, S.L.

An overview of the Sevilleta LTER program for incoming REU students, Department of Biology, UNM, June.

COOK, J.A.

Cook, J.A. 2007. Beringian Coevolution Project. Departmental Display, INTEL International Science Fair, Albuquerque NM, May.

Beringian Coevolution Project. PolarPalooza, New Mexico Museum of Natural History, Albuquerque NM, October-December.

DAHM, C.N.

"Climate Change," Mountain View Middle School, Rio Rancho NM, May 22.

"Reflections Upon the Science of Water in the New Mexico Year of Water," Science Teacher Symposium, Sandia National Laboratories, Albuquerque NM, June 11.

"Hydrothermal Vents," Holland Park State High School, Holland Park, Queensland, Australia, October 23.

LOWREY, T.K.

"Ice Plants in South Africa," Albuquerque Cactus and Succulent Society, Albuquerque NM, August.

MILNE, B.T.

"Concepts for a Carbon-neutral Food-shed in New Mexico," Boulder Relocalization Event, Boulder CO, February 24.

Osborne, E., B.T. Milne and B. Gilbert. Bough (bou), n. Invited gallery wall installation displayed at the Boulder Museum of Art, Boulder CO, Fall.

Film Screening, Farmer John, Old Town Plaza, Albuquerque NM, July 29.

Sustainability Coaching Kit Presentation, Great Chain of Being Simplicity Conference, Albuquerque NM, Aug. 4.

Press conference, Environment New Mexico, July 2007.

Radio interview, Arcely Chapa's Call-in Show, KUNM, Octobter 11.

Radio interview, Sage Health, KUNM, Oct. 14.

SMITH, F.A.

Live studio interview on global warming, KUNM, April 13.

"What Happened to Horse's Toes? A Brief History of Equine Evolution," Northern New Mexico Horseman's Association, Santa Fe NM, September.

TAKACS-VESBACH, C.D.

The McMurdo Dry Valleys of Antarctica: Harshest place on Earth or a polar oasis? Polarpolooza, International Polar Year, 2007, N.M. Museum Natural History and Science, Albuquerque NM, October 9.

THORNHILL, R.

"The Biology of Values," New Mexicans for Science and Reason.

WAIDE, R.B.

"Forerunners of the LTER Program: The Terrestrial Ecology Division and the Rain Forest Cycling and Transport Project," Fiftieth Anniversary of the Institute for Tropical Ecosystems Studies of the University of Puerto Rico, San Juan PR, November.

WITT, C.C.

Johnson, A.B. and C.C. Witt, 2007. Hummingbirds of the High Andes: Can hummingbirds fly higher than Mt. Everest? Invited lecture to the Central New Mexico Audubon Society, Albuquerque NM.

D. Service in a Scholarly Capacity as Member of Local, State or National Panel, Committee, or Commission, for Purpose of Reviews of Public Policy Issues, Scientific Evaluations, Awards of Grants or Fellowships or Prizes, Etc.

BARTON, L.L.

Czech National Science Foundation

U.S. Department of Education

Georgia National Science Foundation (GNSF) grant review for Cooperative Grants Program of U.S. Civilian Research and Development Foundation (CRDF) for former Russian states and U.S. partners,

Moldavia National Science Foundation (MFSF) grant review for Cooperative Grants Program of U.S. Civilian Research and Development Foundation (CRDF) for former Russian states and U.S. partners.

BROWN, J.H.

Science Steering Committee, Santa Fe Institute

Scientific Advisory Board, Malpais Borderlands Group

Board of Trustees, Nature Conservancy of New Mexico

COLLINS, S.L.

I was the lead PI and organizer of the National Science Foundation (NSF)-funded three-year strategic planning effort that led to the development of a funding initiative submitted to NSF in spring 2007 on behalf of the ecological research community. This initiative, "Integrated Science for Society and the Environment," involved more than 200 scientists as participants in workshops, advisory committees, writing committees, etc. Thus, this initiative is broadly based with strong community support and endorsements from several scientific societies. The ultimate goal is to generate the scientific basis for a substantial budget request by NSF to the U.S. Congress for competitive, peer-reviewed research opportunities distributed across several directorates including BIO, GEO and SBE. This document was followed by submission to NSF of the Long Term Ecological Research (LTER) DECADAL PLAN (co-chaired with Phil Robertson at Michigan State University), which lays the ground work for a network-scale, integrated, long-term socio-ecological research program for LTER.

COOK, J.A.

One-hour presentation on Wildlife Management Issues to Interagency Working Group (Alaska Dept. of Fish and Game, U.S.D.A. Forest Service, U.S. Fish and Wildlife Service, U.S. National Park Service) in Juneau, AK, July.

Ad hoc proposal reviewer, National Science Foundation (2)

Proposal Panel Member, National Science Foundation, November (12)

CRIPPS, R.M.

Standing member, Skeletal Muscle Biology and Exercise Physiology study section, NIH Center for Scientific Review.

Mail reviewer, Human Frontiers Science Program.

Ad hoc member, Cardiac Ischemia review panel.

CUNNINGHAM, C.

Panel member for European Commission Aquaculture Panel FP7-KBBE-2007-2A. Food, agriculture and fisheries, and biotechnology: Sustainable production and management of biological resources from land, forest and aquatic environments.

Expert reviewer and panel member for the European Community Research Directorate: FP6 Marine Genomics Network of Excellence: Third Annual Review.

Ad hoc reviewer for NSF
Ad hoc reviewer for California Sea Grant
Ad hoc reviewer for The Wellcome Trust
Ad hoc reviewer for Agence Nationale de la Recherche, France

DAHM, C.N.

Setting Minimum Flows and Levels for the Hillsborough River, Southwest Florida Water Management District (SWFWMD), Tampa Bay FL, March 12-13.

Advisory Panel Member, H.J. Andrews Long Term Ecological Research (LTER) Annual Symposium, Corvallis OR, February 6-7.

KATJU. V.

Proposal Reviewer, Division of Environmental Biology, Population and Evolutionary Processes Cluster, NSF, 2007.

KODRIC-BROWN, A.

Reviewer for a proposal for National Science Foundation's Population Biology and Animal Behavior panels, Fall and Spring.

LOWREY, T.K.

Proposal review for Netherlands Council for Earth and Life Sciences.

Proposal review for National Science Foundation.

MILLER, R.D.

NSF Symbiosis, Defense and Self-recognition Panel, May 14-16.

USDA Animal Protection and Biosafety Panel, June 5-7.

Program Director, Physiological and Structural Systems Cluster, Division of Integrative Organismal Systems, Directorate for Biological Sciences, National Science Foundation, August 6, 2007–August 4, 2008.

MILNE, B.T.

Founded the "Alliance for the Carbon-neutral Food-shed in New Mexico"; held meetings in July and September.

Member, Organizing Committee, Aldo Leopold Centennial Celebration 2009.

Board member, New Mexico Food and Agriculture Policy Council.

NELSON, M.A.

National Science Foundation (2 research proposals)

POCKMAN, W.T.

Ad hoc proposal review of four proposals:

NSF International Programs Postdoctoral Fellowship Review (1)

NSF, Environmental and Structural Systems Cluster (2)

Department of Energy, National Institute for Climate Change Research (1)

SINSABAUGH, R.L.

Member, grant review panel, The National Institute for Climatic Change Research (NICCR) Program, NE Region, U.S. Department of Energy, Pennsylvania State University, University Park PA, October 23-25.

Proposals Reviewed: The National Institute for Climatic Change Research (NICCR) Program, U.S. Department of Energy (5)

SMITH, F.A.

Outside reviewer, Howard Hughes Medical Institute funded programs at the University of California—San Diego, San Francisco and Irvine.

Panel Member, Special Panel on Phylobiogeography (joint panel from programs in Ecology/Ecosystems, Division of Environmental Biology, National Science Foundation, 2007.

Member, Grants-in-Aid Committee, American Society of Mammalogists, 2000-07.

National Science Foundation, reviewed ~18-20 grants

SNELL, H.L.

Member, Species Recovery Board, N.M. Department of Game and Fish

Conservation Fellow, Saint Louis Zoo, St. Louis MO.

Service with the City of Albuquerque councilors and city administrators on Urban Biological Diversity initiatives.

Reviewed National Science Foundation proposals (2).

STRICKER, S.A.

Ad hoc reviewer for NSF proposals (2)

TURNER, T.F.

Advisor, Genetics Issues, Rio Grande Fishes Recovery Team

Member, Gila Trout (Oncorhynchus gilae) Recovery Team (since 2002), attended annual recovery team meeting December 12, 2007, U.S. Fish and Wildlife Service.

Member, Rio Grande Silvery Minnow, *Hybognathus amarus*, Propagation and Genetics Workgroup (since 2003).

Invited Panelist, Ecological Biology Cluster, National Science Foundation, October 16-22. (18 proposals)

Invited Panelist, Rio Grande Silvery Minnow Monitoring Plan Development.

Invited participant, Population Viability Analysis of Rio Grande Silvery Minnow.

Invited Reviewer, Apache Trout Broodstock Management Plan, U.S. Fish and Wildlife Service

Invited Reviewer, Apache Trout Recovery Plan Update, U.S. Fish and Wildlife Service

Ad Hoc NSF Proposal Reviews (2)

WAIDE, R.B.

Editorial Committee for the Trends Volume Examining Long Term Ecological Patterns at Long-Term Ecological Research (LTER), U.S. Department of Agriculture (USDA), and Agriculture Research Service (ARS) sites in the United States, 2006–07.

Science Task Force of the Long Term Ecological Research (LTER) Planning Grant, 2005-07.

Governance Committee of the Long Term Ecological Research (LTER) Planning Grant, 2005-07.

Long Term Ecological Research (LTER) Executive Board, 2007.

Organizing Committee for the National Phenological Network, 2006-07.

International Committee of the Long Term Ecological Research (LTER) Network, 2003-2007.

Network Information System Advisory Committee of the Long Term Ecological Research (LTER) Network, 2005–07.

Science Council of the LTER Network, 2005–07.

Executive Advisory Board, Earth and Sky Radio and Online, 2006-07

External Advisory Committee, Mexican LTER Network, 2005-07.

WERNER-WASHBURNE, M.

Minority Oversight Panel, American Society for Microbiology

Evaluation Committee, Division of Minority Opportunities in Research (MORE), National Institute of General Medical Sciences (NIGMS), National Institutes of Health

Keystone Meetings Diversity Effort

WITT, C.C.

Reviewed one major grant proposal for NSF panel on Population and Evolutionary Processes.

E. List Journals and the Number of Papers You Refereed for Each in 2007.

BARTON, L.L.

Biometals (4)

Journal of Proteomics: American Chemical Society (1)

BERGTHORSSON, U.

Future Microbiology

Genetics

Molecular Biology and Evolution

COLLINS, S.L.

Biological Conservation (1)

BioScience (1)

Community Ecology (1)

Ecological Complexity (1)

Ecology and Society (1)

Ecology/Ecological Monographs (3)

Ecosystems (1)

Geophysical Research Letters (1)

Global Change Biology (1)

Journal of Vegetation Science (1)

Nature (1)

Oecologia (1)

Oikos (2)

Rangeland and Forage Science (1)

Water Resources Research (1)

COOK, J.A.

Interciencia (1)

Journal of Zoology (1)

Molecular Ecology (2)

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COUCH, L.
 Journal of Parasitology (1)
  CRIPPS, R.M.
 BMC Molecular Biology (1)
 Current Biology (1)
 Development (3)
 Genome Biology -(1)
 Insect Molecular Biology (1)
 Journal of Experimental Biology (3)
 Proceedings of the National Academy of Sciences (PNAS) (3)
 CUNNINGHAM, C.
 American Journal of Physiology: Regulatory, Integrative, and Comparative Physiology (2)
 Developmental and Comparative Immunology (18)
 FEBS Journal (1)
 Fish and Shellfish Immunology (1)
 Gene (2)
 Journal of Fish Biology (2)
 Marine Biology (1)
 Marine Biotechnology (2)
 DAHM, C.N.
Ecological Applications (1)
 Frontiers in Ecology and the Environment (1)
Journal of Geophysical Research (1)
Journal of the American Water Resources Association (1)
Proceedings of the National Academy of Sciences (1)
 Water Resources Research (4)
DUSZYNSKI, D.W.
Acta Parasitologica (1)
Tournal of Parasitology (2)
Systematic Parasitology (1)
HANSON, D.T.
American Journal of Botany (1)
New Phytologist (1)
KATJU, V.
Journal of Molecular Evolution (1)
KODRIC-BROWN, A.
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American Naturalist (2) Animal Behaviour (12)

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Behavioral Ecology and Sociobiology (1)
  Evolution (1)
  Journal of Evolutionary Biology (1)
  Molecular Ecology (1)
  Proceeding of the Royal Society of London, Series B (2)
  LITVAK, M.E.
  Biogeochemistry (1)
  Canadian Journal of Forestry (1)
  Ecosystems (1)
 Journal of Geophysical Research-Biogeosciences (2)
 Journal of Geophysical Research-Atmospheres (1)
 Plant, Cell and Environment (1)
 LOWREY, T.K.
 Annals of Botany (1)
 Canadian Journal of Botany (3)
 International Journal of Plant Science (1)
 Journal of Biogeography (1)
 Lundelliana (1)
 Madrono (1)
 Sida (2)
 Systematic Botany (2)
 Taxon (1)
 MARSHALL, D.L.
American Journal of Botany (2)
Bioscience (1)
New Phytologist (1)
Proceedings of the National Academy of Sciences (PNAS) (1)
MILLER, K.B.
Cladistics (2)
Georgia Journal of Science (3)
Molecular Phylogenetics and Evoltuion (1)
MILLER, R.D.
Comparative Biochemistry and Physiology (1)
Developmental and Comparative Immunology (2)
Genome Biology (2)
Genome Research (2)
Immunogenetics (4)
Journal of Immunology (1)
PLoS Genetics (1)
Veterinary Immunology and Immunopathology (1)
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NATVIG, D.O.

Fungal Genetics and Biology (2)

Mycologia (3)

NELSON, M.A.

Eukaryotic Cell (1)

Fungal Genetics and Biology (6)

POCKMAN, W.T.

Ecological Applications (1)

Functional Ecology (1)

Geophysical Research Letters (1)

Global Change Biology (2)

Journal of Arid Environments (1)

Journal of Climate (1)

New Phytologist (2)

Oecologia (1)

Plant Cell and Environment (2)

Tree Physiology (1)

Vadose Zone Journal (1)

POE, S.

American Naturalist (1)

Copeia (1)

Herpetologica (2)

Proceedings of the Royal Society of London (1)

Zoologica Scripta (1)

SINSABAUGH, R.L.

Biogeochemistry (1)

Ecology (2)

Freshwater Biology (1)

Journal of North American Benthological Society (2)

Limnology and Oceanography (2)

Microbial Ecology (1)

Oecologia (1)

Pedobiologia (1)

Plant and Soil (1)

Soil Biology and Biochemistry (4)

Wetlands (1)

SMITH, F.A.

Bioscience

Ecography

Global Ecology and Biogeography

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Israel Science Foundation
  Journal of Biogeography
  Proceedings of the National Academy of Science
  Quaternary Research
  SNELL, H.L.
  Frontiers in Ecology and the Environment (1)
 Journal of Wildlife Management (1)
  STRICKER, S.A.
  Development (2)
  Developmental Biology (2)
 Molecular Reproduction and Development (1)
  THORNHILL, R.
 Several journals, perhaps 45 papers.
 TURNER, T.F.
 Freshwater Biology (1)
 Journal of Applied Ecology (1)
 Journal of Heredity (1)
 Journal of Fish Biology (1)
 Limnology and Oceanography (1)
 Molecular Ecology Notes (1)
 Molecular Ecology (2)
 Proceedings of the Royal Society of London, Series B (1)
 WEARING, H.J.
 Climate Research (1)
Journal of Animal Ecology (1)
Tournal of Theoretical Biology (1)
Proceedings of the National Academy of Sciences USA (1)
Theoretical Population Biology (1)
WERNER-WASHBURNE, M.
Journal of Aging (1)
Proceedings of the National Academy of Sciences (PNAS) (1)
WITT, C.C.
Ecography (4)
Molecular Ecology (1)
WOLF, B.O.
Auk (1)
Condor (1)
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VI. NON-TEACHING UNIVERSITY, COLLEGE AND DEPARTMENT SERVICE.

A. Symposia, Workshops, Conferences, Etc., Sponsored, Hosted, Organized.

BROWN, J.H.

Santa Fe Institute Workshops: Toward a Global Sustainable Energy Future, Santa Fe NM, January 9-11.

COOK, J.A.

Co-chair, Local Committee, 87th Annual Meeting of the American Society of Mammalogists, Albuquerque NM, June 6-19.

HANSON, D.T.

Symposium "Comparative Algal and Bryophyte Physiology" co-Chair (and co-creator), Plant Biology and Botany 2007 Joint Congress, the American Society of Plant Biologists and the Botanical Society of America, Chicago IL, July 7-11.

LITVAK, M.E.

Co-organizer, Biosphere-atmosphere Exchange of Aerosols within Cloud, Carbon and Hydrologic cycles, including Organics and Nitrogen (BEACHON) Workshop, National Center for Atmospheric Research (NCAR), Boulder CO, November 14-16.

LOKER, E.S.

Organized CETI meeting on Evolutionary Medicine, March 15-17.

MARSHALL, D.L.

Organizer and co-host, Annual Meeting of the Guild of Rocky-mountain Ecologists and Evolutionary Biologist, Abiquiu NM, September.

MILLER, R.D.

Co-organizer and co-host, Western IDeA States Symposium on Evolutionary Medicine, Albuquerque NM, March 14-16.

MILNE, B.T.

Founded the "Alliance for the Carbon-neutral Food-shed in New Mexico"; held meetings in July and September.

Co-organizer, UNM Peace and Sustainability Fair, UNM, April 6.

Organizer and host, Food-shed Panel Discussion, UNM Peace and Sustainability Fair, UNM, April 6.

Co-organizer, The 2010 Imperative, Global Emergency Teach-In, Santa Fe NM, February 20.

Sustainability Studies Green Bag Lunch Series, UNM, Spring.

Advisory Planning Committee, Bioneers New Mexico Event, Santa Fe NM, Spring.

SMITH, F.A.

Hosted and organized two meetings of the Research Coordination Network: Integrating Macro-ecological Pattern and Process Across Scales (IMPPS), Santa Fe NM, April and October.

Co-organized and moderated oral session on "Stepping Back in Time: the Application of Historical and Fossil Records to Recovering Ecological Baselines," Annual Meeting of the Ecological Society of America, San Jose CA, July.

SNELL, H.L.

The Division of Amphibians and Reptiles, Museum of Southwestern Biology hosted the 2007 Meeting of the Southwestern Partners in Amphibian and Reptile Conservation, May 31–June 2. Much of the work associated with this was done by Tom Giermakowski.

TAKACS-VESBACH, C.D.

"Water on Earth, Analogues for Life on Mars and Other Planets," Special Session, Annual Meeting of the American Society Limnology and Oceanography, Santa Fe NM, February 4-9.

WERNER-WASHBURNE, M.

The Model Organism Database Workshop, March

Initiatives to Maximize Student Diversity (IMSD)Summer Research Symposium, August

WOLF, B.O.

Workshop organizer and speaker, "The Use of Stable Isotope Approaches to Answer Questions about Avian Movements, Physiology, Behavior and Ecology," 77th Annual meeting of the Cooper Ornithological Society, Moscow ID, June 20-23.

B. Distinguished Departmental Visitors You Hosted.

COOK, J.A.

Dr. Eric Hoberg, Zoologist, Curator, U.S. National Parasite Collection, Washington DC.

Dr. Enrique Lessa, Professor of Evolution, Universidad de la Republica, Montevideo, Uruguay.

Dr. Marjorie Matocq, Associate Professor of Genetics and Evolution, Idaho State University, Pocatello ID.

Hosted Dr. Ed Galindo, EPSCOR Program, NSF Program Officer, June (three days).

DAHM, C.N.

Dr. Vicenc Acuña Salazar, a visiting postdoctoral Fulbright Scholar/researcher from Barcelona, Spain, through 2007.

HANSON, D.T.

Brandon Celaya, Division of Biological Sciences, University of Missouri, Columbia MO, two research visits, Fall.

Juan Carlos Villareal, Ecology & Evolutionary Biology, University of Connecticut, Storrs CT, Dept. Seminar Speaker, May 3.

Elizabeth Waters, Assistant Professor, Department of Biology, San Diego State University, Dept. Seminar Speaker, November 29.

LITVAK, M.E.

Thomas Whitham, Northern Arizona University, Flagstaff AZ, 16th Annual Research Day Keynote Speaker, Department of Biology, UNM, April 13.

LOKER, E.S.

Dr. George Dimopoulos, Associate Professor, Molecular Microbiology and Immunology, Johns Hopkins, departmental seminar, September 6.

Dr. Michael S. Blouin, Associate Professor, Department of Zoology, Oregon State University, departmental seminar, October 18.

Dr. Patrick Skelly, Assistant Professor, Tufts Cummings School of Veterinary Medicine, Brown Bag Seminar.

Dr. Jayantha Rajapakse, Sri Lanka, December 1.

LOWREY, T.K.

Dr. C.J. Quinn, Royal Botanic Gardens, Sydney, Australia, November.

MILNE, B.T.

Rosanna Alvarez

Teff Bader

Gerald Chacon

Tack Mizner

Phil Pohl

Joe Quintana

Alan Reed

Ann Simon

SINSABAUGH, R.L.

Deborah A. Neher, Associate Professor and Chair, Plant & Soil Science Department, University of Vermont, January 7-9.

Brian Hill, The Mid-Continent Ecology Division, National Health and Environmental Effects Research Laboratory, U.S. EPA, February 2-4.

Mark O. Gessner, Senior Scientist and Adjunct Professor, Department of Aquatic Ecology, Eawag: Swiss Federal Institute of Aquatic Science & Technology and Institute of Integrative Biology, Zurich, Switzerland, February 12-14.

Bony Ahmed, Arizona State University, Tempe AZ, July 6-11.

Matthew D. Whiteside, Department of Ecology and Evolutionary Biology, University of California-Irvine, August 21-30.

SMITH, F.A.

Dr. Peter Wilf, Associate Professor of Geosciences, and John T. Ryan, Jr., Faculty Fellow, Pennsylvania State University, University Park, PA.

Dr. Tim Blackburn, Director, Institute of Zoology, Zoological Society of London, Regents Park, London, U.K.

TURNER, T.F.

Dr. Henry L. Bart, Jr., Professor of Biology, and Director, Tulane Museum of Natural History, Tulane University, New Orleans LA.

WERNER-WASHBURNE, M.

Thom Kaufman, Professor, Department of Biology, University of Indiana,

William M. Gelbart, Professor, Department of Molecular and Cellular Biology, Harvard University

John P. Phillips, Professor, Department of Molecular and Cellular Biology, University of Guelph, Canada

C. Committee Service.

1. Departmental committees served on in 2007 (indicate chair with asterisk).

BARTON, L.L.

* Scholarship Committee

BERGTHORSSON, U.

Graduate Student Selection Committee

COLLINS, S.L.

Cell Biology Faculty Search Committee Tenure and Promotions Committee

COOK, J.A.

*Tenure and Promotion Committee

Member, Executive Committee, Museum of Southwestern Biology

Editorial Board, Publications Series, Museum of Southwestern Biology (one manuscript managed/edited)

COUCH, L.

Display Case Committee Publicity Committee

CRIPPS, R.M.

Associate Chair Committee Cell Biology Faculty Search Committee

CUNNINGHAM, C.

Molecular and Cell Biologist Faculty Search Committee

DAHM, C.N.

* Graduate Policy Committee

DUSZYNSKI, D.W.

*Biological Society of New Mexico (BSNM)

FARNSWORTH, P.

Graduation Celebration Committee

FRIDRICK, C.O.

Biology Graduation Committee, Spring Departmental Review/Outcomes Assessment Committee, Fall Undergraduate Policy Committee, Spring

HANSON, D.T.

*Biology Department Seminars Committee (sole member) Core Curriculum Technician Search Committee, Spring Greenhouse Committee

HOFKIN, B.V.

*Graduation Committee (co-chair)

HOWE, K.A.

Graduation Committee

* Research Day Committee

KODRIC-BROWN, A.

Salary committee Graduate Policy Committee

LITVAK, M.E.

* Annual Research Day Committee

LOKER, E.S.

Departmental Building Committee (to oversee construction of basement renovation and planning for addition to Castetter Hall, and to contact UNM Legislative Liaisons and State Legislative Representatives in Santa Fe during the legislative session).

MARSHALL, D.L.

- *Greenhouse Committee
- *Academic Program Review Committee

MILLER, K.B.

Undergraduate Academic Advising Committee

MILLER, R.D.

Joint Biology/Pharmacy Faculty Search Committee

MILNE, B.T.

Graduate Student Selection Committee

NATVIG, D.O.

Graduate Student Selection Committee Tenure and Promotion Committee

NELSON, M.A.

Cell Biologist Faculty Search Committee

POCKMAN, W.T.

Greenhouse Committee, Fall Promotion and Tenure Committee, Fall

POE. S.

Graduate Student Selection Committee Graduate Policy Committee

SHANER, M.G.M.

Lecturer/Lab Coordinator Search Committee (hired Jack Miles) Lecturer/Lab Coordinator Search Committee (hired Yvonne Bishop)

* Graduation Committee

SINSABAUGH, R.L.

Department Vehicle Committee, Spring and Fall Graduate Student Admissions Committee, Spring Grove Fellowship Selection Committee, Spring.

SMITH, F.A.

Joint Mathematics/Biology Faculty Search Committee, January-June.

Undergraduate Academic Student Advisor Committee, August 2007-present.

SNELL, H.L.

Executive Committee, Museum of Southwestern Biology

- * Publications Committee, Museum of Southwestern Biology Salary Committee (assigned in August 2007, but Committee inactive until 2008).
- * Undergraduate Policy Committee

STRICKER, S.A.

* Space Committe Undergraduate Policy Committee Scholarships Committee Museum of Southwestern Biology Executive Committee

TAKACS-VESBACH, C.D.

Graduate Student Selection Committee Ad Hoc Reviewer, Scholarship Committee Cell Biology Faculty Search Committee

THORNHILL, R.

* Graduate Student Selection Committee Salary Committee

TOOLSON, E.C.

* Computer Committee

TURNER, T.F.

*Executive Committee, Museum of Southwestern Biology, UNM Editoral Board, Occasional Papers of the Museum of Southwestern Biology, UNM

WEARING, H.J.

Cell Biology Faculty Search Committee Computational Applied Mathematics Hiring Committee Colloquium Committee, Mathematics and Statistics Department

WERNER-WASHBURNE, M.

- *Cell Biology Faculty Search Committee
 Initiatives to Maximize Student Diversity (IMSD)
- 2. College/University committees served on in 2007 (indicate chair with asterisk).

BARTON, L.L.

UNM Admissions and Registration Committee

The Student Conference Award Program (S-CAP), UNM Career Services (a review program for students traveling to out-of-state meetings)

BERGTHORSSON, U.

Radiation Control Committee

BROWN, J.H.

Presidential Search Committee

The Consortium of the Americas for Interdisciplinary Science, College of Arts & Sciences, UNM.

CRIPPS, R.M.

Research Study Group, A&S Sub-committee

DAHM, C.N.

UNM alternate (to Dr. Julie Coonrod, Civil Engineering) to the Consortium of Universities for the Advancement of Hydrologic Sciences, Inc. (CUAHSI), as appointed by the UNM Vice-Provost for Research.

Member, University Committee, Center for Rapid Environmental Assessment & Terrain Evaluation (CREATE) Advisory Committee

FARNSWORTH, P.

 * 'Small Group Instructional Diagnostics' (SGID) Program (a novel class evaluation system to help faculty improve their teaching)

HANSON, D.T.

External Advisory Board, Mass Spectrometry Facility, UNM

LOKER, E.S.

* Institutional Biosafety Committee (co-chair)

Presidential Task Force on Animal Research Policy

Advisory Committee, Programs in Biomedical & Biological Sciences (PIBBS)

Campus Committee to Assemble NIH Frameworks in Global Health Program

Campus Review of Center of Biomedical Research Excellence (COBRE) proposals

Internal Advisory Committee, Dr. Okada's Center of Biomedical Research Excellence (COBRE) program

LOWREY, T.K.

*Academic Freedom and Tenure Committee
Faculty Senate Library Committee

Director of Maxwell Museum of Anthropology Faculty Search Committee

MARSHALL, D.L.

A&S Scholarship Committee
*Noyce Scholarship Committee
Phi Beta Kappa Selection Committee

MILLER, R.D.

A&S Senior Promotion Committee

MILNE, B.T.

Provost's Sustainability Task Force

* Policy Drafting Subcommittee

'Consulting panel member, Community and Regional Planning Advanced Planning Studio,

NELSON, M.A.

Charter member, Albuquerque High Performance Computing Center (AHPCC) Associated Faculty Group

Dean of the College of Arts and Sciences Search Committee

Member, Steering Committee, Southwest Graduate Coalition Bridges to the Doctorate Program

Genomics Facility User Group, School of Medicine, UNM

Member, Action Team for Science, Technology, Engineering and Mathematics (STEM)

SEC Program Committee

UNM Advance Committee for Faculty Diversity in STEM

SNELL, H.L.

Operations Committee, Faculty Senate President-elect, Faculty Senate

TURNER, T.F.

College of Arts and Sciences Representative, Faculty Senate, UNM, 2005–07 Council of Chairs, College of Arts and Sciences, UNM

WAIDE, R.B.

Research Allocation Committee UNM International Task Force

WERNER-WASHBURNE, M.

Participated in the Chemistry and Nuclear Engineering faculty search by helping to interview candidates and provide reviews.

WOLF, B.O.

Institutional Animal Care and Use Committee

D. Other.

BROWN, J.H.

Working group on "Body Size in Time and Space," National Evolution Synthesis Center, February 2-5.

"Body Size in Mammals," Research Collaboration Network, February 23-26.

Working group on "Saturation in Ecological Systems," National Center for Ecological Analysis and Synthesis, September 10-12.

"Body Size in Mammals," Research Collaboration Network, October 12-15.

Working group on "Unified Theory in Ecology," National Center for Ecological Analysis and Synthesis, October 22-24.

COLLINS, S.L.

Wrote tenure and promotion letters for three individuals at other universities.

COOK, J.A.

To recruit Navajo students to the UNM Biology program and establish collaborative ties, visited Diné Tribal College in Tsalie, AZ and Shiprock, NM.

Judge, National American Indian Science and Engineering Fair, May.

Special Awards Judge and Grand Awards Judge, Departmental Display, INTEL International Science Fair, Albuquerque NM, May.

Peer Evaluation of Promotion File for Dr. Jesus Maldonado, Curator, Smithsonian Institution, Washington DC, March.

Peer Evaluation of Distinguished Researcher File for Dr. Marjorie Matocq, Associate Professor of Genetics and Evolution, Idaho State University, Pocatello ID, January.

Member, Resolutions Committee, American Society of Mammalogists

Member, Latin American Scholarship Committee, American Society of Mammalogist

DUSZYNSKI, D.W.

Relieved of my duties as Director of the Museum of Southwestern Biology (MSB), effective June 30, 2007, without a list of grievances, without due warning, and without being given the opportunity to correct any perceived deficiencies, none of which were presented to me either before or since my dismissal. The only justification I was provided in my dismissal was that the MSB "needed to move in a new direction."

Relieved of my teaching duty for Biol. 461L, Introduction to Tropical Biology, a course I started and had taught in one form or another for more than 25 years. Again, the decision was made that this class "needed a new direction" (i.e., it should no longer be open to non-majors and have no prerequisites); the decision to relieve me of teaching it in the future was made final before I was informed that such a decision was even being discussed (by whom?) or considered.

LOKER, E.S.

Role in departmental functions, as chair, representing department, or supporting department personnel:

- Helped to secure \$2.78M from New Mexico legislature as part of the funding for Phase II
 of the Castetter Hall addition.
- Secured \$100K in Minor Capital Improvement Funds for the Department of Biology.
- Submit Presidential Awards for Excellence in Science, (PAESMEM) National Science Foundation nomination for Dr. Mary Anne Nelson.
- Attended Biomedical Engineering Workshop, January 20.
- Submission of NCR Dept report in late January.
- Attended New Mexico Bioinformatics Symposium, Santa Fe NM, March 8-9.
- Met with Engineering Research Center about their program, March 8.
- National Science Foundation Career site visit with Deepika Schawla, March 5.
- Participated in Dean's search.

- · Participated in hiring of D.J. Perkins at School of Medicine, UNM.
- Met with Biology lecturers over lunch, April 5.
- · Prepare for Biology exhibit at International Science Fair.
- Pushed for approval for maternity leave for lecturers, approved by Council of Chairs.
- · Selection of architect for Math Science Building, April 10.
- 16th Research Day (opening comments, closing awards, judging), April 13.
- Met with Provost to discuss building addition and CETI renewal plans, April 13.
- Dr. Clifford N. Dahm Research Lecture presented (chair nominated Dr. Dahm for this honor), April 19.
- Participated in National Center for Research Resources (NCRR, NIH) animal facility improvement grant.
- · Held luncheon with staff, May 3.
- · Prepared legislative focus initiative on water, early May.
- · Graduation Ceremony, May 12.
- · Judge, Intel Science Fair, May 16-19.
- · Attended New Mexico Alliance for Faculty Diversity, May 17-18.
- · Discussion held about collaboration with Pharmacy, June 4.
- Animal Research Review Task force, June 27.
- Initiatives to Maximize Student Diversity (IMSD) Symposium, July 9.
- · Chairs Retreat, August 15.
- · National Parasite Collection Meeting with UNM President Schmidly, August 17.
- Helped to host Dr. Phylis Johnson, USDA, regarding National Parasite Collection, August 23.
- Met with UNM President and Provost to discuss the Research Office's budget shortfall, September 4.
- Attended Seniors Day, early October.
- Attended UNM's University Master Plan session, October 8.
- Began to plan for Departmental Program Review, October 16.
- Assisted in preparation of EWEN document, late October.
- Requested support from A&S for Honor Program/Research Day, October 24.
- Met with departmental graduate students, October 29.
- Ribbon-cutting Ceremony for Castetter Hall basement renovation, November 9.
- Meeting with Pharmacy on mass spectrometer equipment, November 21.
- Met with Marc Saavadra re: legislative strategy, November 28.
- · Production of annual departmental newsletter, December 10.
- · Departmental winter holiday party, December 12.
- Visit from Cliff Poodrey from NIH, MARC and IMSD, December 13.
- Met with Dr. Alok Bohara about Nepalese Study Center, December 14.

MILNE, B.T.

Chair, Provost's Areas of Public Engagement: Sustainability for the Southwest, UNM.

NATVIG, D.O.

Supervised students from Bosque Prep in the construction of a wireless web cam at the Sevilleta National Wildlife Refuge (Socorro NM) during Bosque Winterim week, March.

NELSON, M.A.

Mentored one undergraduate student (Christine Chee) in the Minority Access to Research Careers (MARC) NIH Program.

Mentored two undergraduate students, Charles Sanchez and Joseph Kunkel, in undergraduate research.

SNELL. H.L.

Curator, Division of Amphibians and Reptiles, Museum of Southwestern Biology (MSB), UNM.

Additional faculty mentor for Dr. Steve Poe; activity consists of some advisement and reporting regarding teaching.

STRICKER, S.A.

Advisory Board, Friday Harbor Laboratories, University of Washington, San Juan Island, WA.

WITT, C.C.

Established a five-year Convenio between the Museum of Southwestern Biology and the Centro de Ornitología y Biodiversidad, Lima-Peru: "Convenio De Cooperacion Inter-institucional Entre "El Centro De Ornitología Y Biodiversidad" (Corbidi) Lima, Peru, Y "The Museum of Southwestern Biology, University of New Mexico" – Albuquerque, Nuevo Mexico, E.E.U.U., Para Desarrollar La Investigación En Las Adaptaciones De Las Aves Silvestres a Las Condiciones De Los Altos Andes."

VII. ADVANCED STUDY AND NEW SCHOLASTIC HONORS, FELLOWSHIPS, ETC.

BROWN, J.H.

Research featured in two articles in The Scientist, March.

CHARNOV, E.L.

Publications cited 740 times in 2007 (Source: ISI).

DAHM, C.N.

52nd Annual Research Lecturer, UNM, April 19.

DUSZYNSKI, D.W.

Selected to receive the Clark P. Read Mentor Award of the American Society of Parasitologists (ASP). The award is given to "honor an individual who, during his or her career, has demonstrated extraordinary leadership in the training of young scientists who have successfully pursued the independent study of parasites or aspects of the host-parasite relationship. Further, the individual shall have influenced the research and/or graduate education of a department, college, or institution to significantly increase the number of students completing graduate level training in the various disciplines of parasitology." This award will be presented on June 30th at the 2008 Annual Meeting of the ASP, Arlington, TX.

WERNER-WASHBURNE, M.

Andreoli-Woods Lecturer, California State University-LA, Los Angeles CA, May.

VIII. SABBATICALS, LEAVES OF ABSENCE, SUMMER TEACHING ELSEWHERE, TRAVEL, ETC., DURING THE PERIOD.

BROWN, J.H.

Sabbatical Leave, National Center for Ecological Analysis and Synthesis (NCEAS), Fall.

COOK, J.A.

Fieldwork in Alaska, June-July.

COUNCIL-GARCIA, C.L.

Fall: Maternity Leave

DAHM. C.N.

Sabbatical Leave: Australian Rivers Institute, Griffith University, Brisbane, Queensland, Australia, July 2, 2007–January 11, 2008.

DUSZYNSKI, D.W.

Traveled to Anchorage AK, Knoxville TN and Charleston SC to evaluate as potential meeting sites and/or plan upcoming meetings for the American Society of Parasitologists (ASP).

Traveled to Belize with my Spring 2007 Biol. 461L, Introduction to Tropical Biology class.

Traveled to Lake Texoma, OK (April) and Mérida, México (June) to attend national and international, respectively, parasitology meetings.

Traveled to Beltsville, MD to meet with Phyllis Johnson, Regional Director, Agricultural Research Service, U.S. Dept. of Agriculture to discuss the concept of moving the U.S. National Parasite Collection to the Museum of Southwestern Biology at UNM.

HOFKIN, B.V.

In my capacity as the department pre-veterinary advisor, visited Ross University School of Veterinary Medicine, Edison NJ, March.

KODRIC-BROWN, A.

Sabbatical Leave, National Center for Ecological Analysis and Synthesis (NCEAS), Santa Barbara CA, Fall.

LOKER, E.S.

Two-week research trip, Kenya, February. Two-week research trip, Nepal, September. MILLER, K.B.

Field work, Bolivia, two weeks, September

Field work, Zambia, two weeks, October.

MILNE, B.T.

Traveled to the Rocky Mountain Sustainability Summit, University of Colorado, February.

Family Medical Leave, October-December.

POCKMAN, W.T.

Spring: Sabbatical Leave

POE. S.

Field trips to Costa Rica and Panama resulted in (1) more than 100 herpetological specimens to be deposited in the Museum of Southwestern Biology, and (2) discovery of new species of lizards. I was accompanied by three graduate students in my lab on these trips.

SNELL, H.L.

Extensive field travel in New Mexico, Arizona, Colorado, Nevada, and California during summer of 2007.

STRICKER, S.A.

Summer research conducted at Friday Harbor Laboratories, University of Washington, San Juan Island, WA.

TAKACS-VESBACH, C.D.

Research Semester, Spring

Maternity Leave

WAIDE, R.B.

Research sabbatical: January 1-February 28, 2007 and December 15-31, 2007.

WEARING, H.J.

Postdoctoral research associate, University of Georgia, January-July.

Joined UNM as an assistant professor with a joint position in Biology (50%) and Mathematics and Statistics (50%) in August.

IX. PUBLIC SERVICE.

CHARNOV, E.L.

Summer: Many talks with Oregon State University and State of Oregon about salmon/trout and the impact of hatchery rearing on life histories—contributed freely so as to better understand how we ought to manage salmon on the U.S. West Coast.

COUCH, L.

Treasurer, Placitas (NM) Homesteads Homeowners Association

DAHM, C.N.

Regional Science Fair Judge, UNM, March 16.

New Mexico State Science Fair Judge, New Mexico Tech, Socorro NM, April 14.

International Science and Engineering Fair (ISEF) Judge, Albuquerque NM, May 15-16.

DUSZYNSKI, D.W.

Member, Architectural Control Committee, Placitas (N.M.) Homesteads Homeowners Association

HOFKIN, B.V.

Writing, producing, and broadcasting of "The BioCast" on radio station KANW, 89.1 FM, which is underwritten by the Department of Biology, UNM.

HOWE, K.A.

Co-Chair, Board of Directors, La Puerta de los Ninos Childcare Center (non-profit).

MARSHALL, D.L.

Judge, International Science and Engineering Fair, May.

MILNE, B.T.

Sustainability Studies Program tabling event, La Montanita Coop Earth-day Festival, Albuquerque NM, April 22.

Organizing Session, Forest City Covington Growers Cooperative Meeting, Albuquerque NM, May 9.

Sustainability Studies Program tabling event, Albuquerque Q-jam, Albuquerque NM, May 26.

NATVIG, D.O.

Attended U.S. Fish and Wildlife Service course, "Working with Friends Groups," National Conservation Training Center, Shepherdstown WV, March.

Helped establish new, non-profit friends group, Amigos de la Sevilleta, in collaboration with the staff at the Sevilleta National Wildlife Refuge, Socorro NM.

NELSON, M.A.

Judge, 2007 Society for Advancement of Chicanos and Native Americans in Science (SACNAS) 34th Annual Conference, Kansas City MO, October 11-14.

SMITH, F.A.

Occasionally provide scientific background to local newspapers (e.g., Albuquerque Journal staff science writer, John Fleck, Los Alamos Monitor, etc.)

Periodically answer other queries from news media (e.g., BBC Natural History Radio, *Plenty Magazine*, *Wired Magazine*, History Channel, and other radio, television, newspapers and popular periodicals).

SNELL, H.L.

Member, Species Recovery Board, N.M. Department of Game & Fish

Conservation Fellow, The Saint Louis Zoo, St. Louis MO

Service with the City of Albuquerque councilors and city administrators on Urban Biological Diversity initiatives.

Public education and access to information within the Division of Amphibians and Reptiles, Museum of Southwestern Biology, UNM.

THORNHILL, R.

Advisor, New Mexicans for Science and Reason

Expert assistance with two documentaries on human behavior and sexual selection.

Expert assistance with Albuquerque Channel 13 News (TV) series on aspects of my research.

TURNER, T.F.

Guest Lecturer, "The Ichthyofauna of New Mexico," Biology Honors Program, Natural History of the Southwest, UNM, October.

Guest Lecturer, "Reef Fishes of the Carribean," Biol. 461L, Introduction to Tropical Biology, Department of Biology, March.

WAIDE, R.B.

Field Station and Marine Laboratories Panel, National Science Foundation.

WERNER-WASHBURNE, M.

Mentoring students and their parents outside of UNM. Done on a regular basis with families met outside of Albuquerque, at various events where my musical band plays, and with random people who are told to call me for help.

WITT, C.C.

Organized and carried out First Annual Hummingbird Science Day at Truman Middle School, Albuquerque, on May 14, 2007. This new outreach program is focused on hummingbird-based middle-school science education with the Albuquerque Public School District (APS). Using research results, methods, and equipment from my research program, I designed a dynamic, interactive set of presentations. I presented live hummingbirds for demonstrations of hummingbird biology and experimental techniques. I analyzed high-speed videos of hummingbird flight in collaboration with groups of 7th and 8th graders. We received 63 "thank you" letters from the students at Truman Middle School, and Hummingbird Science Day was named as a "Favorite Activity of the Year."

Worked to establish the Dharm Vireo Pellegrini Memorial Scholarship via a \$25,000+ donation from Nancy Rinebold and Laura and William Pellegrini, and established a website dedicated to the award.



PROPOSED GUIDELINES

TO SUPPORT THE

CAREER PATHS

OF LECTURERS

TO THE

Proposed Guidelines to Support the Career Paths of Lecturers

Prepared by the UNM Biology Department, Spring 2008

Relayed to the College of Arts & Sciences for Further Consideration

Lecturers play a vital role and increasingly prominent role in the Biology Department. They teach courses that cover the fundamentals of biology upon which students will build their knowledge as they progress through other programs within the university. They also teach upper-level undergraduate and graduate courses and develop new courses for the department. They teach non-major courses that are required of other disciplines within the University that are composed of a large number of students. In addition to their teaching duties, lecturers are active and involved members of the Biology community as evidenced by service on various committees, research participation, and service to the greater university and to the larger community.

Unlike tenure-track faculty positions, there is no clearly established career path for lecturers. When an individual is hired as a lecturer, he or she will remain in that position with no opportunity for advancement or promotion. In addition to retaining the same title for the duration of their careers, lecturers do not receive financial rewards or other compensation for years of service other than standard cost of living raises. Lecturers also can not expect a commitment of more than one year from the Biology department in terms of duration of contract. Collectively, lack of opportunity for advancement, lack of merit-based increased compensation, and a lack of long term job security are issues of great concern to lecturers and it is of the utmost importance that a well defined, equitable career path with opportunity for advancement and financial and other compensations become policy.

In order to provide a career-track for full-time lecturers and to recognize individuals who perform at or above the level expected by the university and the Department of Biology, we are suggesting the following proposed guidelines for a clearly defined career path for full-time lecturers. Since it also must be incumbent upon the individual lecturer to apply for promotion, we outline both the requirements of the lecturer applying for promotion (see Appendix One, Professional Portfolio) as well as suggestions for the compensation that will be received should the promotion be approved. Additionally, we include provisions resolving problems with a lecturer who may not meet the expectations of the university and the Department of Biology. We also provide suggestions for other departments within the College of Arts & Sciences as well as a suggested new position for an Associate Chair for Non-Tenured Faculty. Finally, since the Biology Department currently has eight lecturers at various levels in terms of years of service, we define the promotion process for those lecturers who are are employed in the department.

Possible Adoption By Other Departments Within the College of Arts & Sciences

This proposal may be used as a model for evaluation of lecturers in other departments. While we recognize the need for uniform policies regarding promotion, we also acknowledge that the situation in each department is unique in terms of the number of lectures as well as their specific duties. For example, in the next section of this document, we suggest that a new associate chair be appointed in the Biology Department, specifically to oversee lecturer related issues; such an appointment may not be appropriate in other departments. Therefore, we recommend that each

department develop its own specific plan for evaluation that best meets the needs of that department,

Associate Chair for Non-Tenure Track Faculty

The policy for the evaluation, promotion or termination of lecturers proposed in this document necessarily imposes additional work and responsibilities on the Biology faculty and staff. Consequently, to facilitate this process, and to ensure its ongoing success, we propose that a new "Associate Chair for Non-Tenure Track Faculty" be appointed by the Chair to coordinate all lecturer-related issues, including issues of performance review, promotion and termination. This position also might oversee issues with research faculty who are teaching, as well as with other issues involving part-time instructors. Because such issues would be the primary responsibility of this new associate chair, lecturer or other non-tenure faculty concerns would receive immediate attention in a coordinated fashion, without unduly adding to the workload of the Chair or other departmental committees, such as the Tenure and Promotion Committee.

Year One:

This should be considered a probationary period for the lecturer and the department. A newly hired lecturer will have the title of <u>Associate Lecturer II or III</u> (M.S. or PhD., respectively). At the end of one year (two semesters), the lecturer will be responsible for producing the following:

- arranging faculty visits (by two senior faculty members) to the classroom for each semester taught;
- · teaching evaluations;
- filling out the standard annual report for the Biology department; and
- preparation of a Personal Statement letter from the lecturer that can be, but is not limited to, a
 discussion of his or her teaching philosophy, plans for teaching future courses, response to
 negative evaluations or student complaints, awards or other recognition received, etc.

These materials will be given to the Biology Chair and/or the Associate Chair for Non-Tenure Track Faculty no later than the end of the spring semester. The packet will be evaluated by the Biology Chair and/or the Associate Chair for Non-Tenure Track Faculty (should this new associate chair be adopted). The Associate Lecturer's performance will be evaluated and they will receive one of three possible ratings: 1. does not meet expectations, 2. meets expectations, or 3. exceeds expectations. If the Associate Lecturer receives either "meets" or "exceeds" expectations, the probationary period will end and the individual will retain a formal title of Associate Lecturer II or III. In addition, the lecturer will no longer be required to schedule regular faculty visits to the classroom to observe their lectures. The Biology Chair or the Associate Chair for Non-Tenure Track Faculty will communicate with the lecturer in writing the decision of the appropriate review committee (should such a committee be deemed necessary by the Chair) no later than October 1 of the following academic year.

Negative Evaluation:

It is possible for any number of reasons that a lecturer may receive a negative evaluation. In this case, the lecturer will meet with the Biology chair as well as the Associate Chair for Non-Tenure Track Faculty to discuss the specific areas for improvement. A document summarizing this

discussion should be drawn up and a copy given to the lecturer and a copy placed in the lecturer's file. The lecturer will then have one year (two regular semesters) upon which to improve. If, at the end of this one-year period, the lecturer shows significant improvement where needed, he or she should then be able to progress through the promotion process. If the lecturer does not demonstrate improvement during this one-year time period, his or her employment with the Biology Department will be terminated. Obviously, it is the case that there may be external factors that affect a lecturer's performance, and whether or not exceptions should be made to this policy will be determined by the Biology Chair and/or the Associate Chair for Non-Tenure Track Faculty.

Year Six:

At the end of the Associate Lecturer's sixth year of service (including the probationary period), he or she will be eligible to apply for promotion. The Associate Lecturer will generate a Promotion Package with the following materials:

- · Annual Faculty Report;
- an updated CV;
- a Professional Portfolio, as outlined in Appendix One;
- · teaching evaluations;
- two letters of support from senior faculty members (senior lecturers and/or tenure-track faculty); and
- a Personal Statement, as described in Year One.

This Promotion Package will be given to the Biology Chair and/or the Associate Chair for Non-Tenure Track Faculty within the same time frame as described in Year One. This packet will be evaluated by the Biology Chair and/or the Associate Chair for Non-Tenure Track Faculty, who will coordinate promotion assessments. The Associate Lecturer will be evaluated and given a rating, as described above in Year One. If he or she receives either "meets" or "exceeds" expectation in the "Teaching" category and one additional category (see Appendix one), the associate lecturer will receive a promotion. The decision by the Biology Chair and/or the Associate Chair for Non-Tenure Track Faculty will be communicated to the Associate Lecturer in writing. When the promotion is approved, the Associate Lecturer may expect the following:

- A new formal title of Lecturer II or III;
- the new lecturer will be offered a multiyear contract (length to be determined) with the Biology Department; and
- a percentage salary increase deemed appropriate by the Biology Chair and/or Associate Chair for Non-Tenure Track Faculty.

Years of service at other institutions of higher learning may be used to meet the six years needed to apply for promotion, at the discretion of the Biology Dept. Chair and/or Assoc. Chair.

Year Eleven:

Upon the completion of a minimum of eleven years of service in the Biology Department (or another institution of higher learning, at the discretion of the Chair or Associate Chair), the lecturer will be qualified to apply again for promotion. The lecturer will provide the following materials to the Biology chair and/or the Associate Chair for Non-Tenure Track Faculty no later than the end of the spring semester:

- · Annual Faculty Report;
- an updated CV;
- an updated Professional Portfolio;
- teaching evaluations;
- two new or updated letters of support from two senior faculty members (senior lecturers and/or tenure-track faculty members); and
- a Personal Statement as described in Year One.

This Promotion Package will be given to the Biology Chair and/or the Associate Chair within the time frame described in Year One. The information contained in the package will be reviewed by the Biology Chair and/or the Associate Chair. The lecturer will be evaluated and given a rating as described above in Year One. If the lecturer receives either "meets" or "exceeds" expectation in the "Teaching" category and one additional category (see Appendix one), he or she will receive a promotion. The decision by the appropriate committee and the Biology Chair will be communicated to the lecturer in writing. When the promotion is approved, the lecturer may expect the following:

- · the lecturer's title will become Senior Lecturer II or III;
- the Senior Lecturer will receive an increase in job security in the form of a multiyear contract (length to be determined) with the Biology Department;
- a percentage salary increase deemed appropriate by the Biology Chair and/or Associate Chair for Non-Tenure Track Faculty; and
- the Senior Lecturer will be able to apply for a one-semester course release with pay to pursue other academic activities or professional development.

Negative Evaluation:

In the event of a negative promotion decision, the Associate Lecturer or Lecturer will retain his or her former title and benefits. A document summarizing this discussion should be drawn up and a copy given to the lecturer and a copy placed in the lecturer's file. After a two-year period, the Associate Lecturer or Lecturer may reapply for promotion. Should, however, the lecturer be denied promotion because of a serious derelicttion of duty or infraction of University policy, the lecturer's contract, at the discretion of the Chair, will not be renewed once it has expired. It is furthermore understood that if such problems arise at any time, irrespective of whether or not a lecturer is applying for promotion, the Chair may choose not to renew a lecturer's contract.

Current Lecturers:

Currently, the Biology Department employs eight lecturers who have been with the department for varying years of service. We suggest that all eight existing lecturers should be classified at the "Lecturer" status. For those lecturers who have served the Biology Department for six years or more, a one-time ad hoc decision by the Department Chair or Tenure & Promotion Committee can be made based solely upon that individual's current employment file for "Year Six Promotion." Although a positive performance review would not change the lecturer's title, he or she would receive the increased financial compensation as well as the multiyear contact, as previously described.

Lecturers who have taught at institutions of higher education other than UNM may use these years of service (at the discretion of the Biology Dept. Chair) to qualify for this "year six review."

Likewise, if a lecturer has been employed by the UNM Biology Department (or another equivalent institution of higher learning at the chair's discretion) for eleven years or more, a one-time ad hoc decision for promotion to "Senior Lecturer" status can be made by the Department Chair or Tenure & Promotion Committee based solely upon that individual's current employment file. If approved, the benefits detailed in both "Year Six" and "Year Eleven" promotion will be applied to that lecturer. For all new hires, the promotion path will start at the "Associate Lecturer" status and exceptions to this will be determined by the hiring committee..

APPENDIX ONE: PROFESSIONAL PORTFOLIO GUIDELINES

Block One: Teaching

- Student Evaluations, Testimonials
- Senior Lecturer/Tenure-track Faculty Observation
- Innovation in Teaching such as developing new software, developing hybrid courses, using new electronic devices, using novel teaching techniques
- Local and National Awards for Teaching
- Development of New Courses
- Professional Development
- Supervision, training and/or instruction of TAs
- Other

Block Two: Community Service

- Participation in Biology Department Committees
- Participation in additional committees and/or other service to the department (example: Welcome Back Days)
- Participation in University Projects such as assessment of minors courses
- Participation in the larger community (example: science fair judge, mentoring students, tutoring students)
- Reviewing textbooks, review articles, journal articles
- Participation in programs that improve teaching
- Non-University Community Outreach
 - Other

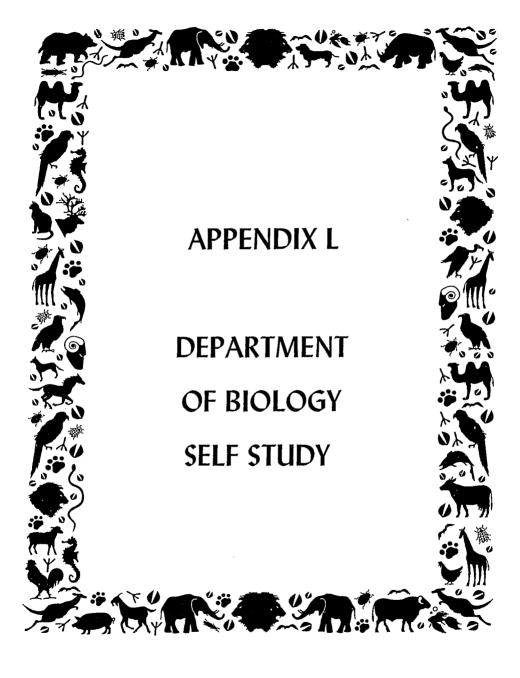
Block Three: Research

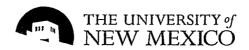
- Publications
- Obtaining Grants
- Presentation of Research at regional, national or international meetings
- Supervision of Graduate Students and/or Undergraduate Students conducting research
- Other

Block Four: Other Scholarly Activities

- Publication of Textbooks
- Publication of Lab Manuals
 Invitation to Present at a national or
- international meeting
 Referee a Journal Article
- Write a Review for a scientific publication
- Other

The lecturer should provide updates on at least two of the four categories listed above. It is mandatory that one of these categories be teaching, and he or she must receive an evaluation of "meets" or "exceeds" expectations in the Teaching category and one other category to be considered for any advancement.





Department of Biology

Self Study for Academic Program Review

February, 2008

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Biology Department Annual Report, 2006-2007

Appendix P



DEPARTMENT OF BIOLOGY DEPARTMENTAL REVIEW 2008

EXECUTIVE SUMMARY

Department Overview: The Department of Biology at the University of New Mexico is one of the biggest academic units in the state, with several components of our operation exceeding in size entire UNM colleges. It has remained remarkably successful despite decades of limited resources. The department is comprised of 35.5 tenure track faculty (plus two full-time administrators with biology appointments and a faculty member on long-term leave), 8.5 faculty lecturers, more than 1,300 majors, more than 100 graduate students, and 89 staff and research support positions. Our non-majors courses are heavily subscribed and serve as key entry points for the allied health sciences. Investment in these non-majors courses has increased substantially in the last decade. The Biology major has never been more popular, yet, despite this excruciating demand, many of our majors seek and obtain personalized research experiences in faculty labs. Collectively, our research activities generate more than \$13 million per year, and the department is home to some of UNM's most prestigious academic programs and faculty. Our faculty are productive, publishing more than 100 papers per year, including a high fraction of the state's output in prestigious journals such as Science and Nature (from 2000-2004, 36% of all publications in Science and Nature from the state of New Mexico came from our department). Unlike many universities of comparable size, on our Main Campus, there are no ancillary, biologyoriented departments other than ours. Whereas in times past it was easier to dichotomize our department into the general realms of ecology/evolution and cell/molecular biology, it is more difficult to do so today. Ecology/evolution embraces diverse programs in ecosystems ecology, plant population biology, behavioral ecology, metabolic ecology and collections-based studies in the Museum of Southwestern Biology. Lying in intermediate positions are integrative programs in parasitology and comparative immunology that cut across traditional disciplines, and at the cell/molecular end of the spectrum are programs in genomics, fungal biology and *Drosophila* development that also are not without interest in evolutionary processes. We have deliberately fostered the concept of a single, large, interactive department covering the spectrum of modern biology, one that blurs traditional boundaries and favors collaborative and multidisciplinary approaches.

Concerns: Several factors conspire to limit our potential. Some of these concerns continue from previous reviews, but others are new. *Continuing Concerns*—Foremost among these is an aging physical plant that limits our growth and recruiting potential and that increasingly is inadequate for modern teaching and research. Efforts are underway to rectify the most immediate of these problems in the form of renovated teaching space and a proposed research addition, but more effort will be required once the first two phases of the proposed addition are complete. Faculty salaries are also a continuing and a general concern, in particular avoiding accumulating com-

pression issues. Continued recruitment of top-notch faculty, including provision of competitive space and start-up offers remains a concern. The recent research budget crisis at UNM highlights the point that there are precious few reserves, as in foundation funds, to fall back on: UNM is a soft-money-driven institution and it is imperative that Biology continue to receive its fair share of such incomes. Another continuing concern is how to deal with the ever-increasing demand for undergraduate biology education. On the one hand, we are encouraged in any numbers-driven resource allocation process to continue to accept students, but, of course, this comes at the peril of the quality of education. New Concerns—We have in recent years been hampered by a higher administration that has lacked stability, leading to policy reversals that are hard to track, and that, unlike some of our neighboring states, has not provided a cohesive vision and plan (and higher level fund-raising) for the biological sciences. Faculty turnover has been high since the last review, leading to unpredictable needs for replacement faculty and increased costs for start-up and renovation funds. Seizing special hiring opportunities has allowed us to maintain faculty numbers, but has hampered long-term planning for new faculty. We continue to seek additional faculty lines, but we are already at a size where issues of some type of departmental fission are frequently considered. Another new concern is the decline in graduate applications. Along with the university and with other departments nationwide, we are experiencing an unprecedented decline in applications to our graduate program. These concerns are condensed into a series of five questions we pose below to assist our research team in focusing their review.

Questions for the Review Team

1. Should the Biology Department encourage additional growth, and if so, how much, and will this imply that it is time for the department to split into one or more units, to assume some kind of division status, or to retain the status quo?

Given particularly that a modicum of growth will be allowed when the Biology addition is completed, should we increase faculty size? If a fission were to occur, the specter of two or more, lesser departments competing with one another for funds is not an appealing one, but if we retain the status quo, the department is already of a size and complexity not easily managed, a trend that would be exacerbated by expansion.

2. How do'we ensure maintenance of quality of departmental programs?

Much of the strength in our ecology/evolution programs is embodied in our three distinguished professors, all of whom are approaching retirement. Also, there is a general concern about the productivity and competitiveness of our junior faculty. A sub-question is how to fit the needs of large, funded programs into our department? Whereas it would be counter-productive to deny the innovation and resources such programs bring, they also can leave a large footprint that creates extra pressures.

3. Do we continue to accrue majors, and the impact and societal favor that goes along with them, or do we choose to circumscribe our growth and push for higher standards with an emphasis on higher quality and more personalized instruction?

This is an issue that has long bedeviled UNM: continue to have an open-door policy that favors access for all of New Mexico's citizens, or to raise standards and in the process increase retention and improve quality education?

4. To what extent should the Biology Department reach out to the many programs on campus that regularly seek some kind of collaborative program with Biology, and when is it a good deal for Biology?

On a regular basis, programs from engineering or the medical school seek to establish collaborative programs with Biology that could offer the possibility of joint hires or development of new programs and courses. Reaching out to any and all of these programs would further increase campus visibility and our impact, but the risk is a dissipation of critical mass. Clearly, our faculty has split opinions about this.

5. Given your perspective as outsiders, what are the obvious things we need to do to improve our program that we are altogether missing, or not doing well enough?

Here in New Mexico, it is relatively easy to acquire a provincial point of view. Within the spirit that we want to offer something distinctive and special from what everyone else does, what are we missing and what do we need to do differently or better?

General Characteristics of the Unit

Institutional Context

The University of New Mexico is the state's flagship research university. With more than 25,000 students on the Main Campus alone, it is also the state's largest university. The university has 12 colleges and schools, including a School of Medicine and a School of Law. It also has four branch campuses. With 40 doctoral programs, UNM is classified as a Carnegie Research University with Very High Research Activity. Unlike any other university in that category, UNM is an institution with High Hispanic Enrollment and 34.5% of Main Campus students are Hispanic. UNM is defined as a Hispanic Serving Institution by the Hispanic Association of Colleges and Universities. UNM is an urban university with a large-number of non-traditional students. The average age of UNM students is 27 years.

Brief History

The study of biology is fundamental to any university, and biology has been a part of the curriculum at the University of New Mexico since the late 19th century. Early programs focused on organismal level biology of plants and animals. However, courses in ecology were taught from early in the 20th century when this discipline was just beginning to become important in the United States. As the focus on organismal biology waned, the department built, starting the late 1970s, an internationally recognized program in ecology and evolution. Programs in cell and molecular biology were added more slowly, mostly due to lack of funds and space. However, we have excellent individual programs that are gaining recognition in some areas of integrative and

cell/molecular biology at present. Recent additions of programs and faculty have continued to build in these areas.

The biology department grew slowly during the university's first half century, having only two or three faculty until the late 1940s, and less than 10 faculty until the early 1960s. Enrollment grew rapidly starting in the late 1950s, but growth in faculty numbers did not occur until the late 1960s. By 1977, there were 27 biology faculty members, and by 1984 there were 30. Numbers of tenure-track faculty reached the mid-30s by 1990 and, despite more than doubling the number of biology majors since that time, tenure-track faculty numbers have never increased significantly since that time. However, the number of lecturers has increased from two in 2000 to more than eight full-time equivalents, with their function largely to accommodate the substantial increase in non-majors students and entry level majors courses.

Mission

The department has a threefold mission: (1) to train undergraduate and graduate students, (2) to conduct high-quality, nationally and internationally recognized research, and (3) to serve the community, the University and our disciplines. This aligns perfectly with the university's mission of education, scholarship and service.

Goals

The department's goals are to:

- Maintain its nationally and internationally recognized programs in ecology and evolutionary biology.
- Continue to build national and international prominence in integrative fields such as comparative immunology, and in areas of cell and molecular biology.
- 3) Have the flexibility in space and resources to allow modest expansion of the faculty to facilitate coalescence and strengthening of particular research groups representing areas of departmental strength and visibility. Part of our strategy is to enhance areas that are distinctive from, and not mere repetitions of, research emphases in other regional universities.
- 4) Partner with the Museum of Southwestern Biology by working with our faculty who are museum curators so it can attain a higher level of international recognition for its programs in systematics, phylogenetics and conservation biology.
- 5) Develop high-quality research programs among its faculty, an endeavor that currently is limited by suitable space.
- 6) Work closely with the UNM administration to ensure that equitable distributions of overhead funds generated by our activities continue to flow back to the department. Without such funds, our ability to offer competitive start-up packages, to provide transitional funding, and to favor new innovations would be severely impacted.
- 7) Attract top-notch graduate students and to work with the UNM administration to provide them competitive stipends, health benefits, and more options for research assistantships.
- 8) Continue to work to improve the overall quality of our undergraduate curriculum, particularly at the upper level, by providing more meaningful lab experiences featuring more state-of-the-art equipment and techniques.
- 9) Involve a substantial number of undergraduates in research in faculty labs or working on faculty-directed projects.

- 10) Continue to increase faculty diversity.
- 11) Increase the number of minority students who choose careers in science.
- 12) Provide an undergraduate education that emphasizes the processes and skills of science in addition to providing content knowledge. To accompany this, we also encourage UNM to increase admissions standards as a way to increase the university's national ranking.
- 13) Provide effective advising that allows students to progress through the curriculum smoothly, and to enhance our overall retention and graduation rates.
- 14) Improve its faculty salaries to be competitive with its peers.
- 15) Improve both the amount and quality of teaching and research space to meet the needs of our growing student population and our many well-funded research programs.
- 16) Develop partnerships with the community that increase science literacy and improve K-12 education.
- 17) Devise ways to interface effectively with the many components of UNM (engineering, pharmacy, medicine, to name some) that want to partner with the Biology Department to develop academic or research programs. This must be done in a way to favor innovation without risking loss of focus or identity of the department.
- 18) Continue to work to improve career development and future prospects for our lecturers, research faculty and post-doctoral associates.
- 19) Acquire more staff to assist in important activities like outcome assessment, and to do all we can to encourage staff career development and high staff morale.
- 20) At least from the perspective of the present chair, to continue to function as one large, strong, highly interactive department without barriers, rather than to split into multiple, smaller independent units that would soon be competing for university resources and lose overall cohesion.

Our goals align nicely with goals of the 2001 UNM Strategic Plan, including those of: providing high-quality education for undergraduates, raising the effectiveness and stature of our graduate programs, supporting research, providing NM citizens with access to a quality higher education, improving K-12 education, providing access to our expertise, increasing diversity of faculty staff and students, creating structures and processes to effectively support and provide resources to distinguished programs, improving UNM's competitiveness in obtaining grants and contracts, and aligning physical resources with priorities.

Overview of Faculty, Staff and Students

Faculty

Category	Number
Tenure-track faculty:	
Professors	21 (plus two full-time administrators
Associate Professors	5 (plus one on long-term leave)
Assistant Professors	9.5
Non-tenure-track faculty:	
Lecturers	8.5
Research Faculty	
Research Professors	16

Research Associate Professors	10
Research Assistant Professors	11
Post-doctoral Associates	~12

Tenure-track Faculty: Currently, the Biology Department has 35.5 tenure-track faculty with one other faculty member on leave and two additional faculty members who have full-time administrative positions that allow no teaching or service within the department. (See Appendix A for a list of faculty and their brief CVs.)

Over the last 12 years, there has been more turnover in faculty than at any time in the department's history. Of the 32 faculty present for our last program review, only 16 remain on the active faculty. Twelve faculty retired, one left academia, and another became a full-time administrator. Turnover has been even greater than these numbers indicate as another four faculty members were hired and left the university during this interval. Thus, more than half of the faculty present for this review were not part of the last program review.

Of the 35.5 tenure-track faculty currently occupied with departmental activities, 21 are professors, five are associate professors and 9.5 are assistant professors. Although it is increasingly difficult to categorize the faculty along conventional lines, approximately 21 of the faculty are in the general realm of ecology and evolution if physiological ecologists and molecular evolutionary biologists are included, while another nine are in the cell/molecular realm, including immunologists and microbiologists, and another six are museum curators.

Non-tenure-track Faculty: In addition to the tenure-track faculty, the department now includes 8.5 full-time lecturers. These faculty handle the entire non-majors curriculum, part of our undergraduate majors core and occasional upper-division courses. Most of these lecturers also have significant participation in the research and/or service missions of the department. This represents a substantial change since our last review. It also creates an obligation for the department to provide better long-term career tracks for Lecturers. Towards this end, our department is leading the way for the College of Arts and Sciences to implement new promotion and hiring policies for our Lecturers.

Research Faculty: Another constituency in our department that deserves mention is faculty on a research track, of which we have approximately 30. These faculty are usually funded on research grants, often their own. Not only do these individuals play an instrumental role in bringing research expertise, international visibility and dollars to our program, they also serve as a considerable reservoir of specialized expertise, including both for mentoring students and potentially for teaching classes. These faculty brought in 36% of the departments grant dollars in Fiscal Year 2006–2007.

Postdoctoral Associates: In a similar category to our Research Faculty are our ~12 Postdoctoral Associates who play both major roles in enhancing our research visibility and productivity, but who also are part of the essential "glue" that holds departments together. They frequently interact with one another, crossing disciplinary boundaries in the process, and thus dramatically invigorate and enrich our intellectual climate.

Staff

Currently, the department has 89 staff members, 26 of whom are paid in full or in part by state I & G funds (Appendix B). The remainder are paid through grants, overhead funds and foundation funds. These staff include core departmental staff that run the Main Office, keep track of department finances, advise students, and manage our buildings. State-funded staff lines have always been a limiting resource for the department.

Students

Graduate students: Currently, the department has 103 graduate students, 85 Ph.D. students and 18 Master's students. The graduate students can be roughly divided into 81 working in ecology, evolution and organismal biology and 22 working in cell and molecular biology.

Undergraduate Students: The department has a very large number of undergraduate majors, currently more than 1,300. These numbers have nearly doubled since our last program review. We also are training at least 300 minors, and we have a large non-majors program that supports core requirements in natural science, the nursing and pharmacy programs, and pre-medical students who are not biology majors.

We offer two undergraduate degrees, a B.S. and a B.A. In both, it is possible to earn a formal concentration in Conservation Biology.

Leadership, Governance and Organizational Structure

The department is led by a chair and two associate chairs. Typically, one of the associate chairs handles primarily graduate issues and the other primarily undergraduate issues. Oversight of our construction projects also has become an important duty of the associate chairs. Faculty meet regularly and a number of faculty committees handle departmental responsibilities (see Appendix C).

Major Research and/or Creative Endeavors

All of the faculty engage in individual research programs in their areas of expertise. In any given year, the majority hold externally funded grants. In addition, the department hosts large research endeavors, including the Sevilleta Long Term Ecological Research (LTER) Program, the LTER Network Office and the Center for Evolutionary and Theoretical Immunology.

Public Service

In addition to individual efforts in public service, frequent tours are provided, the museums answer innumerable questions about identification of organisms, the LTER program hosts teachers and K-12 student programs, we involved graduate students in K-12 outreach through an NSF-funded G K-12 program, and minority high school students are invited to our annual Research Day. In addition, the department hosts the Bosque Ecological Monitoring Program, which involves K-12 students in ecological research in the Rio Grande Bosque.

Other Major Initiatives

The department has been involved in a virtually continuous program of renovation and expansion of space since the last program review. In 1995, we were granted permission to renovate space in the old bookstore building in order to create new space for the Museum of Southwestern Biology and the LTER program. After years of planning and construction delay, that project was completed in 2004–05. This fall we are just completing a spectacular renovation of basement space freed up by the move of the museum collections. This space is entirely for the use of our teaching programs. We are just beginning to occupy 20,000 sq. ft. of completely renovated teaching space. Construction will begin in Feburary/March 2008 on the first phase of what is currently envinsioned as a 35,000 sq. ft. addition to Castetter Hall. The addition will include a new research greenhouse and faculty research labs.

Previous Program Review

Based on our history of program reviews, the faculty view this process with considerable skepticism. A review in the early 1970s resulted in a recommendation to seek excellence in one area of biology. In 1974, the then Dean of the College of Arts and Sciences made a decision to build an excellent program in Ecology and Evolution, because of resource constraints (at that time ecologists needed smaller setup packages), our location that made field work attractive, and the availability of qualified faculty. That decision has affected the composition of the faculty until the present.

Subsequent reviews, however, although initially viewed optimistically by the faculty, resulted only in change that could be accomplished internally by the department. Change that required resources from the university did not occur.

In 1985, outside reviewers recommended some internal changes in curriculum and availability of computers. The department heeded these recommendations. However, the outside reviewers also recommended doubling the faculty size, increasing salaries, decreasing graduate student teaching loads, and increasing TA stipends. These were areas that required commitment from the university and nothing was done about them in the following decade. (See details in Appendix D.)

In 1995, a new team of reviewers recommended both internal improvements and changes requiring university support. For the department, they recommended revising the graduate curriculum, reducing TA workloads and split teaching assistantships, and more strategic planning. They recommended that the university provided improved salary support. They were particularly concerned about a group of mid-career faculty that engaged in significant administrative work to improve their salaries. They were also concerned about the amount of space available for teaching and research, lack of university support for facilities, and poor support for teaching assistants.

The department acted on the recommendations that could be handed internally. We experimented with changes in the graduate curriculum and reduced TA workloads in our new core curriculum. In addition, TA stipends are somewhat better (now \$16,600/year for Ph.D. students) and health insurance is now included in their compensation. However, attempts to plan have all been foiled by unexpected losses of faculty.

Additional support from the university has been difficult to obtain. Although numbers of undergraduate majors now exceed 1.300, the number of tenure-track faculty has not increased significantly. Our space situation is improving somewhat. After more than a decade, new space for the museums and LTER staff was completed. At present, we have just finished a renovation of former museum space in the basement that substantially improves teaching space, and construction of a new addition will begin later this semester. However, funds are still not available to renovate the old teaching labs into new research space. Much of the funding for the new addition is in place, but more state support is needed. Until that addition is complete, we have very little space for new faculty. Maintenance of existing space also remains a struggle. Faculty have lost books, journals and equipment to leaking water pipes that were repaired only after substantial damage had already occurred. Average salaries are somewhat higher due to an increasing number of faculty seeking outside job offers and due to leveraging grant funds to accommodate raises. Faculty with special raises have been exempted from the state-funded raise pool in that year, so it has been possible to give somewhat larger raises to the remaining faculty. However, the state-funded raises are rather small, so, while the mean salary increases, the potential for inequities also has increased. The concern about mid-career faculty engaging in administrative activities to improve salaries is still valid. The same faculty who were of concern before are still doing administrative work to improve their salaries. The recommended presidential initiative to provide a substantial investment in biology never occurred.

It is important to note that the entire upper administration has changed since we started preparing our self study. Initially, we were told to expect no input of resources based on the review process. However, the current administration promises to make more use of the review process. We hope that is the case.

DEGREE PROGRAMS AND CURRICULA

Undergraduate Degrees

Overview: The Biology Department offers two undergraduate degree programs, the B.S. and the B.A. (See Appendix E for the complete degree requirements). In addition to these programs, we offer a minor in Biology and a substantial non-majors program that serves both the university core curriculum requirements and a variety of health sciences programs.

The primary mission of the undergraduate curriculum in biology is to provide an education that teaches the fundamental information of biology while providing students with the skills needed to appreciate the complexity and beauty of living systems, as well as to understand the methods and evidence upon which science is based. It is recognized that many students enter this curriculum with specific career goals, and therefore the special missions of the department include:

- Preparation of biology majors for successful entry into graduate education programs in biology and related disciplines.
- (2) Preparation of students for successful application to medical school, veterinary school, and dental school.

(3) Preparation of students for employment in positions in industry or governmental agencies (biotechnology, conservation policy), as laboratory research technicians and field biology workers and, in part, as teachers in secondary schools.

The B.S. is a traditional degree and the one sought by most of our majors. A number of years ago, a group of faculty thought that we were missing a chance to serve a population of students who had more interdisciplinary interests. These students, it was argued, would be well served by a less intense biology degree so that they would have time to pursue substantial work in another discipline. Therefore, the B.A. program was created. This degree requires four hours less biology, less math and less rigorous training in physics. While many faculty still believe that the B.A. program serves the original purpose, those who do undergraduate advising have another opinion. Students who are unable to complete the more rigorous parts of the B.S. degree, often at the last minute, opt for the B.A. Alternatively, some students seeking preparation for graduate programs in Physical or Occupational Therapy find the B.A. a useful option. Advisors virtually never see students use the B.A. to pursue an interdisciplinary program. Given the enormous number of biology majors, the department should reconsider the wisdom of offering the less rigorous degree.

Curriculum and Assessment: In the mid-1990s, the department developed an assessment instrument to test the learning objectives of the four-course core curriculum required of all majors and minors. That curriculum consisted of a two-semester introduction to biology (Biol. 121 and 122), cell biology (Biol. 219) and genetics (Biol. 221). The assessment instrument was a multiple-choice test using questions submitted by the faculty who taught in the core series of courses. The test was given after the completion of Genetics. Students were required to take the test, but there was no performance incentive. Generally, faculty were dissatisfied with the scores on the tests. For example, in Spring 2000, the test was administered to 257 students. The mean score was 57% correct. In some areas, students performed even more poorly. For example, if plants were mentioned in a question, students scored very low, even if no particular knowledge of plants was required to answer the question. The results of this test caused the department to reevaluate introductory sequence of courses.

At the same time we used the assessment test, we did some program evaluation. We discovered that students who took chemistry earlier in their degree program were more likely to pass Cell Biology, and that students who took the optional problems sessions in Cell Biology and Genetics performed better in those courses. We also noted the substantial resources invested in labs for Biol. 121 and 122 for students who often failed these courses or did not become Biology majors. Furthermore, we determined that students who were not our majors (either non-science majors or health sciences majors) often took Biol. 121 and 122 rather than the courses that were designed specifically for them, Biol. 110 and 123, respectively.

As a direct result of our outcomes assessment and program assessment, the department proposed a new four-course introductory sequence (for a complete rationale and description, see Appendix F, the department's proposal to the university for a new curriculum). The new sequence of courses—Cell Biology, Genetics, Ecology and Evolution, and Plant and Animal Form and Function (Biol. 201–204)—covers the breadth of biology. The first two courses include lectures and discussion/problem sessions. The discussion/problem sessions focus on homework directly related to the lectures and a few demonstrations/labs. Biol. 203 and 204 have full labs. The Biol. 204 lab, in particular, focuses on using inquiry so that students develop skills in making hypoth-

eses, designing experiments, and using the primary literature. Thus, the goals of this new core curriculum include broad content knowledge and skills in the practice of science. Students who take this curriculum are required to take two semesters of general chemistry before or concurrently with Biology 201 and 202. Students are required to start their calculus sequence before or during Biology 203.

As part of the implementation of the core, we held many conversations with University College advisors and advisors and faculty in the health sciences. Our intention was to direct students to the appropriate introductory biology course.

The new undergraduate core was fully implemented in 2005–2006. Once the work of implementing the core was completed, we began to think about assessment. Because our original estimates of enrollment proved incorrect (Biol. 201 and 202 had much higher enrollments than expected, while Biol. 203 and 204 had somewhat lower enrollments than expected), our first task was a program assessment to discover who was taking our courses. A T.A. was assigned to develop and implement a survey of students in Biol. 201 and 202 during the 2006–2007 academic year. The T.A. consulted with relevant faculty and staff to create the online survey that was administered in Spring 2007. The complete survey and report are provided in Appendix G.

The survey of Biol. 201 students (42% response, no incentive from instructor) revealed a number of useful points. Thirty-point-one percent (30.1%) intended to take only Biol. 201 and 202; thirty-seven-point-two percent (37.2%) were not Biology majors. This was interesting as the series was designed primarily for our majors. Also, 92% of the students reported that they attended all or nearly all of the lectures. Instructors would not make the same estimate.

A higher proportion of students responded to the survey of Biol. 202 (86.8%), probably because the instructor offered homework credit for responding. Thirty-four-point-four percent (34.4%) intended to take only Biol. 201 and 202, and 43.5 % were not Biology majors. These were surprising numbers. Of the non-biology majors, some were in related fields such as chemistry and biochemistry. A substantial percentage, 37%, were in health sciences, especially pharmacy. In prior years, pre-pharmacy students were advised to take Biol. 123, but now they are required to take Biol. 201 and 202. This has a significant impact on enrollment in those courses.

As expected, many of the students in Biol. 202 plan to attend medical school (32%) or pursue another health-related profession (33%). At the end of Biol. 202, only 9.5% plan to attend graduate programs in biology.

As a result of this program assessment, we have continued to work to add seats in Biol. 201 and 202. We also know that the unexpected students are coming from outside our program and, in some cases, from outside our college. Thus, when programs in the health sciences increase in size, it is important that funding be included for support courses in the biology department.

The numbers of students planning to take Biol. 203 in Fall 2007 provided a reasonable estimate of the numbers who actually enrolled. Thus, this survey was helpful in planning the number of lab sections needed. By Fall 2007, the numbers of students enrolling in Biol. 203 and 204 had reached our predicted enrollment.

Because the survey of Biol. 201 and 202 was funded as a one-time T.A. assignment, it was finished at the end of a semester when there were no further faculty meetings held. Since no one was funded the following semester to work on this, no further discussion on the study has occur-

red. This points to the need for more staff help in advisement and assessment, so that we can revise and continue the program assessment.

We are still considering how to assess learning outcomes for our majors core sequence. Our first idea was to use the Major Field Achievement test as it is nationally normed. However, it costs about \$25 per student. Using this test provides two challenges. First, we would have to find funds to purchase the test: testing the 200 or so majors that graduate each year would cost at least \$5,000. We requested funds from the College of Arts and Sciences and were turned down. An alternative would be to use a course fee. The second challenge would be getting students to make an honest effort on the test. We can imagine this happening only if the test was part of an existing or new course. Thus, we would need to test all majors, not a random sample. If we add a new, capstone course, where the assessment test would be required, we would have to find faculty to teach it.

We next considered developing a local assessment instrument and using that in conjunction with a continuation of our program assessment survey. Our new core intends both to provide wide content knowledge and to develop skills in hypothesis testing, experimental design and scientific writing. We could assess content by developing our own test of content. We could test skills in scientific writing by doing an item analysis of the grading rubric for papers in the Biology 204 labs (Appendix H). The grading rubric was developed by faculty and TA's associated with Biol 204. It is already being used to grade papers for the skills we intend to teach. Taking a sample of these grading sheets for analysis would be an excellent assessment project. We asked for PTI funds to collect and score these data. However, we were once again turned down. Given the constraints of our budget (see section 4) and our high student to faculty ratio, we cannot simply add an assessment program to the department. It will require additional resources.

Upper-Division Curriculum

All of our majors take one organismal biology course and at least two 400-level courses as part of their major. Four-hundred-level courses are arranged in four categories and students must take a course from two different categories. Because of a concern that some courses are interdisciplinary and that many students take the minimum number of upper-division courses, the faculty voted last spring to change the requirements somewhat. Five categories of 400-level courses will be provided and students will take courses from three of these categories. These changes still have to be worked through college and university curriculum committees.

Overall, many faculty feel that the upper-division curriculum needs an evaluation. Although new courses have to be approved, most new faculty add one or two new courses such that we have a very diverse array of offerings that can be offered only infrequently. There has been no evaluation in more than two decades of how the upper-division curriculum fits together and how many courses are really needed. Having recently overhauled our lower-division offerings, this is the next curricular item that needs serious attention. One particular concern is that more of our students may benefit from upper division lab and field courses.

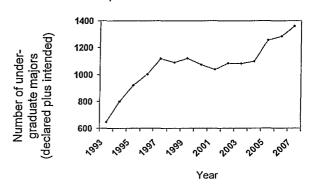
Assessment of the upper-division curriculum also is difficult as the courses are so diverse. A program-wide assessment does not make sense until we have revised the upper-division curriculum and have programmatic goals. However, using classroom assessment techniques in these

courses can provide valuable feedback to individual instructors. In fact, some instructors already use these methods to get student feedback on the most difficult aspects of the courses.

Data on the Undergraduate Program

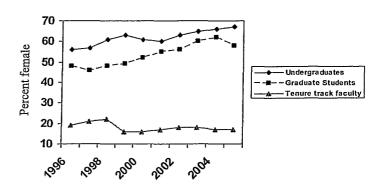
The number of undergraduate majors in biology has more than doubled since 1993 (Fig. 1). There were dramatic increases from 1993 to 1997, followed by a plateau until 2004. Over the last three years, substantial increases in number of majors have resumed. These large numbers of students drive many aspects of our undergraduate program as neither faculty numbers nor materials and supplies budgets have kept pace with these increases. We have dealt with the need for instructional funds by adding course fees to all biology courses (See section 4). By 2001, the Biology Department included more than 20% of the majors in the College of Arts and Sciences. This fraction has not declined, although the department does not garner 20% of the College's resources.

Figure 1. Number of undergraduate majors from 1993-2007. Includes declared majors in the College of Arts and Sciences and students who are not yet able to declare a major, but intend to declare a biology major.



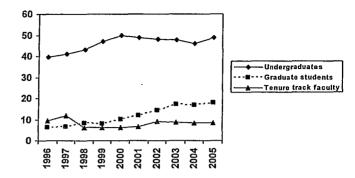
The percent of undergraduates who are female has increased rather steadily and by 2006, % of the undergraduate majors were female (Fig. 2).

Figure 2. The percentage of undergraduate biology majors, graduate students and faculty who are female.



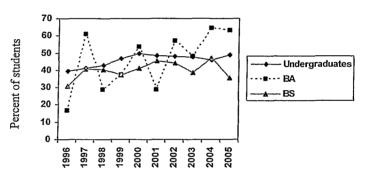
The percentage of minorities among undergraduate majors has also increased over time and by 2006, 48.9% of undergraduates were from minority groups (Fig.3).

Figure 3. Percentage of minorities among undergraduates, graduate students and faculty in the Biology Department from 1996 to 2006.



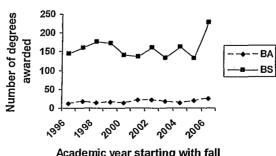
Interestingly, the percentage of minority students often is higher among those seeking the B.A. than those seeking the B.S. (Fig. 4). This is important because the B.A. degree is not meant to lead to graduate school and provides a less intense exposure to biology.

Figure 4. Percentage of minorities among all students, among those seeking the B.S. and among those seeking the B.A.



The Number of Degrees Awarded: The number of B.A. degrees awarded has always been very small, usually less than 20 per year. The number B.S. degrees awarded annually is much higher, ranging from 132 to 229 in recent years (Fig. 5)

Figure 5. The number of undergraduate B.A. and B.S. degrees awarded in each academic year.



Academic year starting with fall 17 semester shown

Curiously, although the number of Biology Majors continues to increase, the number of degrees awarded has only begun to show the same pattern. This concerns us and we are searching for explanations, of which there are several possibilities. First, this may be a temporary problem, because some students were confused by the change to a different undergraduate core curriculum (they waited for the old curriculum to reappear). Second, there is a lag time between entering the university intending to be a biology major, declaring a major, and graduating. So, the number of degrees awarded should increase more slowly than the number of intended and declared majors. Third, some of the students categorized as biology majors do not intend to graduate as biology majors. That is, some students awaiting admission to nursing or pharmacy school declare a biology major, take our courses, and use our resources (faculty time and space), but do not graduate as biology majors. Other students who originally intended to go into nursing or pharmacy school become biology majors late in their undergraduate careers, only to discover that most of the courses they have taken do not apply to a biology major, and so take extra years to graduate.

We have no way of telling how many of our majors really intend to be biology majors and how many are waiting for other programs to open up. This is, in part, an institutional problem determined by the requirement that all students declare a major after a certain number of hours. We do know, however, that all of these students use our classes, our space, our faculty time, and, especially, our advisors' time.

Besides these institutional problems that can only be addressed at the college or university level, we are considering whether there are problems within the department that slow the time to graduation. Maggie Werner-Washburne has asked the university to provide data so that she can evaluate how students progress through our core curriculum. Recent lecturers in Biol. 201 report a 15–20% failure rate, which is far less than in the first course in our previous curriculum.

Support for Undergraduate Students

Financial: Most financial support for undergraduates is administered through the University of New Mexico Financial Aid and Scholarships Offices. The department has no input into the function of these departments and no control over these awards. Thus, we will not discuss data about these types of awards.

The department offers a small number of scholarships funded by donations to the Biology Department. The department has five scholarships available that may award from \$500-\$1,500 per year (details available on the Biology web site, http://biology.unm.edu). In recent years, we have had trouble attracting qualified applicants for the scholarships. These scholarships, if awarded, are figured into a student's existing financial aid award, and thus obtaining a scholarship results in the deduction of some other part of the award. Thus, the awards are only attractive to students who cannot obtain financial aid through the usual means.

Advisement: The Biology Department employs a full-time staff member whose duties include undergraduate advising and recruitment. She handles the bulk of the advising, but obviously one advisor is not enough for the more than 1,300 majors in biology. Additional advising is provided by faculty and staff who offer a few hours of advising time each week. This is supplemented by information on our web site and by handouts that explain the required coursework.

The full time advisor position became a regular, state funded position only in Summer 2006. Previously, it was funded by a variety of soft-money sources. The staff advisor has a number of duties in addition to working directly with students. She is involved in catalog revision, curriculum development/implementation through curriculum form tracking, registration issues, recruitment events, training of faculty advisors, scholarship and honors programs, publications and data acquisition. She is on three main committees: Scholarships, Undergraduate Policy Committee, and Advisement.

Because of the large number of majors to advise and the additional duties required, this single staff member is unable to get to know students or keep records on them. A second part- or full-time staff advisor would help with that endeavor.

Students are required to seek advice only twice: when they declare a major and when they do a degree check after 90 hours of work. The department's advisement workload has increased due to the complications of a new university database system. Advisors do additional work in evaluating transfer credit, in helping student obtain overrides in the new system, and in communicating to the administration about problems with the new system.

Undergraduate Research Opportunities: Undergraduates may participate in labs in a variety of ways, including volunteering, work-study jobs, regular student employment, independent study, and the Biology honors program. There are also special, funded programs (IMSD, MARC, NSF Site REU programs) described below.

Because of the number of ways that students can be involved in research, it is difficult to get a complete count. In a survey in the late 90s, 30% of graduating seniors said that they had been involved in research in some way. This semester, however, only 36 students are registered for independent study (Biol. 499). One problem for faculty is that independent study students do not count toward the regular teaching load.

The honors program is meant for students with a serious interest in research. Students conduct research over one–two years, write a thesis and present the work in some public format. A very small number of students participate in the honors program. From 2003–2007, a total of 33 students completed the honors program.

Graduate Degrees

Our graduate program is based on breadth and diversity rather than on specialization and concentration. We have tried consciously to maintain a faculty whose research interests span much of the breadth of modern biology. This enables us to recruit graduate students with diverse backgrounds, and to encourage them to pursue a wide variety of individualistic, interdisciplinary research and training programs.

Ph.D. Degree: The majority of our doctoral students still aspire to obtain jobs in academia that require some combination of teaching and research; these range from primarily teaching positions at community colleges and small private colleges, to research and teaching positions at major state and private universities, to curatorial positions at museums. Increasingly, however, our students are seeking and obtaining positions in industry (e.g., biomedical, environmental consulting, risk assessment, bioremediation, genetic engineering), government agencies (e.g., forensics, environmental health, and environmental management with Albuquerque Police

Department, New Mexico Departments of Health and Environment, and U.S. Environmental Protection Agency, Bureau of Indian Affairs, Fish and Wildlife Service, Forest Service, and Bureau of Land Management), and non-government organizations (e.g., Nature Conservancy, World Wildlife Fund, Audubon Society).

Master's Degree: Most students in the Master's degree program aspire to obtain additional training to prepare themselves for further graduate study, either in professional areas, such as medicine, dentistry and law, or in the natural, social and engineering sciences. Some M.S. students seek employment in secondary education, with government agencies, and in the private sector.

Graduate Student Training: Students are required to complete a specified number of hours of coursework, depending on the degree. The details are listed in our graduate handbook (Appendix I). Required coursework includes both lecture courses and problems courses and must be completed with more than one faculty member. The department has experimented with various requirements for coursework across disciplines. At the time of the last review, students were required to take at least one course in three of nine categories. The review team recommended a different approach so that student would take some coursework across the major divisions in the department (Ecology and Evolution or Cell and Molecular Biology). At that time, three categories of courses were created and students were required to take coursework in at least two. That system failed. We were able to offer coursework in either of the two major areas, but we could seldom offer courses in the third, more interdisciplinary category. At present, there is no distribution requirement for graduate courses. Rather, students with interests in Ecology and Evolution are strongly encouraged to take our two graduate core courses in this area (Biol. 516, Basic Graduate Ecology, and Biol. 517, Basic Graduate Evolution). No similar courses exist for students interested in Cell and Molecular Biology.

Courses available to graduate students fall into three categories: (1) courses that were originally developed at the 400-level (senior undergraduate), but are available for graduate credit if some extra work is done; (2) courses originally developed at the 500-level (graduate student only) that may or may not allow advanced undergraduates to enroll; and (3) special topics courses that usually focus on reading the literature; some of these also allow undergraduate enrollment.

While faculty in ecology and evolution have been able to routinely offer formal courses that were developed specifically for graduate students, faculty in cell and molecular biology rarely have been able to do so. This is because so many undergraduates wish to take upper-division courses in cell and molecular biology, and because fewer graduate students specialize in cell and molecular biology. This has been a continuing source of frustration to faculty in cell and molecular biology.

The ecology and evolution faculty proposed graduate core courses in ecology and evolution so that students in these areas would have a common intellectual framework to foster discussion and collaboration. Thus, Basic Graduate Ecology and Basic Graduate Evolution were created. However, the faculty are having difficulty sustaining these courses, as they have been taught mostly as an overload and not counted as part of regular faculty teaching loads. Because of the smaller number of graduate students in cell and molecular biology, there has been no opportunity to develop similar core courses for the graduate students in these areas.

Graduate Student Demographics: For a number of years, the total number of graduate students in the program has remained at slightly more than 100. Numbers of female graduate students have increased over time, and now the percentage of our students who are female hovers around 60% (Fig. 2). Likewise, the percentage of minority students has increased over time and we now have 17–18% minorities among our graduate students (Fig. 3).

Graduate Student Financial Support: The department has a policy of not admitting Ph.D. students unless financial support can be guaranteed. We guarantee five years of support that may be in the form of teaching assistantships (T.A.), research assistantships (R.A.) or fellowships. Occasionally, Ph.D. students are admitted who have guaranteed outside support from another agency, such as a national laboratory. M.S. students may be admitted with or without guaranteed support. If support is guaranteed, it is for two years. Students without guaranteed support—usually because they have exceeded the time limit for completion of their dissertations or theses—may ask to be in the T.A. pool. These students may be offered T.A. support, on a semester-by-semester basis, if T.A. slots are available after all students on guaranteed support have been accommodated. In recent semesters, most students who wish to have T.A. support have been accommodated. In fact, we often hire a few T.A.s from outside the department.

The workload for T.A.s was a concern of the last graduate review. Typically, students taught each week three lab sections of 24 students each. Some T.A.s had lab sections split between two courses, requiring additional prep time. We have made some progress in reducing the T.A. workload in our new undergraduate core courses. T.A.s for Biol. 201 and 202 run three, 75-minute problems sessions a week (rather than three 3-hour lab sections). However, these T.A.s also are expected to attend lectures so that they can answer student questions. T.A.s for Biol. 203 and 204 teach two 3-hour lab sections a week and also are expected to attend lectures. We work each semester to limit the number of split T.A. assignments; only two students have split assignments this semester. Further reductions in the T.A. workload are limited by available funding.

The size of the T.A. stipend has increased over time (see data in Appendix M), making our financial support more competitive with other schools. At the time of our last review, no support for health insurance was available to T.A.s, which was a major concern for graduate students. Currently, the stipend for Ph.D. students is \$16,660 for the academic year for 0.5 FTE. The T.A. contract also includes tuition, fees and the supplemental student health insurance.

Fellowship Support: Our limited ability to offer graduate research fellowships has been a continuing source of concern. This is particularly a problem because many students teach every semester, limiting their ability to conduct research and write manuscripts. The other important aspect of this problem is the need for summer support. While a few summer T.A. positions are always available, graduate students need time free from teaching to conduct their research. A dramatic improvement in summer support was achieved through the Grove Endowment. This gift to the university in 1998 allows the department to offer summer fellowships to several students per year, a one-semester dissertation fellowship each year, and research support to additional students each year. Several other endowments have been made so that each year we now have \$40,000-\$45,000 for a dissertation fellowship, several summer fellowships, and a number of research awards.

Applications: One area of concern for our graduate program has been a decline in the number of applications received (Fig. 6a). After peaking at nearly 160 applications per year, numbers have

declined into the 60s and 70s. We don't fully understand the reason for this decline. UNM graduate programs in general have experienced a decline in applications (Fig. 6b), and other programs, such as the program in Ecology and Evolution at the University of Colorado, have seen a 50% decline in applications in recent years (Jeff Mittion, pers. comm.), so this may reflect a nationwide phenomenon. National data suggest that jobs for Ph.D.s in biology may be scarce, reducing the incentive to apply for graduate programs.

Figure 6a. Number of graduate applications to the Biology Department from 1990–2007.

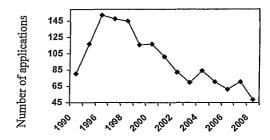
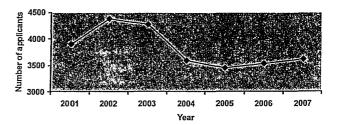


Figure 6b. Number of applicants to all UNM graduate programs from 2001–2007.



The faculty are very worried about the decline in graduate applications and discussed this problem extensively at a faculty meeting on February 19, 2008. Suggestions to reverse the trend include: (1) an earlier decision date to compete with the many schools that make earlier offers, (2) an interview program that brings in a number of prospective graduate students at one time, (3) higher stipends, (4) lower teaching loads, (5) a continuous admissions process, (6) a better web site, and (7) advertising research themes. The department intends to allocate funds to work on this process this year.

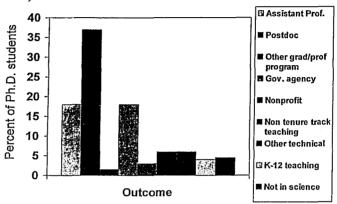
Graduate Student Outcomes: By and large, the faculty view an appropriate measure of graduate student outcomes as gathering information on the fates of our students. Because of the individual nature of graduate student programs, short-term measures of outcomes during the training process have not generated much enthusiasm among the faculty.

Just after the last program review, the university, as part of its preparation for an accredittation review, pushed to develop outcomes assessment plans. To comply with university goals, the department developed questionnaires to be filled out by faculty after comprehensive exams, dissertation defense seminars and reading of theses and dissertations. Although faculty filled out these forms for a few years, no compilations or analyses of the data were ever undertaken and the faculty did not have a plan to use this information.

Most faculty, however, do keep track of the employment information for their former students. Therefore, for this review, we compiled information on the current status of 108 graduate students who completed a Master's or Ph.D. program between 2002 and 2006. We were able to get information for 107 of the 108 students.

For the 67 students who completed the Ph.D. program between 2002 and 2006, the average time to complete the degree was six years (calculation of the mean, mode and median give the same result).

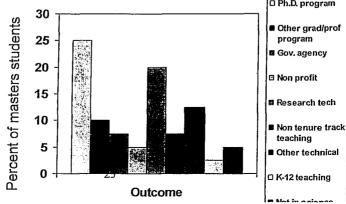




The most frequent outcomes for our recent Ph.D. positions are employment in post-doctoral positions (37%), assistant professorships (18%) or governmental agencies (18%) (Fig. 7). Some also are employed by non-governmental agencies or are in non-tenure track teaching positions. Thus, most of our students are finding exactly the kinds of positions we thought we were training them to occupy. Only three of the 67 are not involved in science in any way.

Typically, our master's students take three years to complete the degree (mean, mode and median are the same). Their fates are more diverse than those of the Ph.D. students (Fig. 8). For the 40 students we tracked, 25% are now in Ph.D. programs and another 20% are working as research technicians. Almost all are involved in science in some way.

Figure 8.
Current positions of master's students who completed their degrees in biology from 2002–2006.



Special Programs for Training Graduate and Undergraduate Students:

Since the last program review, the Biology Department has hosted a number of externally funded programs that aid in training graduate and undergraduate students.

- 1. The Biocomplexity Program, 2002-2006, funded by a \$2.5 million NSF grant.
- (a) Project Summary: Underlying the diversity of life and the complexity of ecology is order that reflects the operation of fundamental physical and biological processes. Scaling relationships are emergent quantitative features of biodiversity. Some of them appear to be universal, occurring in virtually all taxa of organisms and kinds of environments. They are patterns of structure or dynamics that are self-similar or fractal-like over many orders of magnitude. They can be described mathematically by power functions. They allow extrapolation and prediction over a wide range of scales. They offer clues to underlying mechanisms that powerfully constrain biodiversity. We use the interplay of mathematical models and empirical measurements to elucidate the physical and biological principles that determine how the life history, abundance, distribution, and species richness of organisms scale with body size, space, and time. Our program of research and education involves: (i) collaborations among physicists, mathematicians, geologists/hydrologists, biologists, and ecologists; (ii) interactions among scientists from seven institutions; (iii) cooperation between the University of New Mexico, the Santa Fe Institute, and Los Alamos National Laboratory; and (iv) interdisciplinary training for graduate students and postdocs.
- (b) Program Statistics: The program supported one undergraduate, 16 graduate students, and nine post-doctoral fellows.
- (c) Program Impacts: The program offered collaboration with other researchers and organizations to look at how scaling relationships offer clues to underlying mechanisms that powerfully constrain biodiversity. It offered interdisciplinary training for graduate students and post-docs. Additionally, a course in biocomplexity was developed that is still offered in the department.
- 2. Integrative Graduate Education and Research Traineeship (IGERT) Interdisciplinary Program In Freshwater Sciences, 2002-2005, funded by NSF.
- (a) Project Summary: This program was a collaboration with the University of Alabama designed to train students to address emerging problems in maintaining a supply of fresh water. Students were able to compare freshwater ecosystems across regions using both arid and humid environments. The program included interdisciplinary research, an interdisciplinary core curriculum, externships with state and federal agencies and exchange programs between universities.
- (b) Program Impacts: Collaborations continue with the University of Alabama and among departments at the University of New Mexico. It offered interdisciplinary training for both students and postdocs. Coursework in freshwater ecosystems is still offered.
- 3. Integrative Graduate Education and Research Traineeship (IGERT) Interdisciplinary Program in Imaging.
- (a) This IGERT program at the University of New Mexico (UNM) was in cross-disciplinary optics research and education (CORE). Five different departments (Physics, Biology, Chemistry, Electrical Engineering, and Chemical Engineering) with six different Ph.D.

programs (programs of the former departments and PhD in Optical Science and Engineering) participated. In line with our initially proposed efforts we see two major educational accomplishments: "added value" to our graduate programs in general, and broadening formal optics education to departments and degree programs that use optics in interdisciplinary research.

(b) Added value to existing degree programs: One of the deficiencies of our graduate programs that we identified when submitting the IGERT proposal was inadequate training and education beyond the discipline specific expert knowledge. While this expert knowledge is absolutely necessary, graduates entering the workforce are challenged in many other areas in which they have not received formal training. The lack of leadership and mentoring skills, insufficient ability to talk in front of an interdisciplinary audience, poor technical writing skills, and the lack of an international perspective are reasons why many of our graduates are falling short of the expectations of our leading research, educational and industrial institutions. We addressed these problems by implementing a blend of interconnected formal and informal education and training components into our IGERT program, which turned out to be very successful overall. The following describes these interrelated activities and the observed outcomes.

All IGERT trainees took a technical writing class during the summer, which was taught by a professor from UNM's English Department. The goal of this course was to expose students to the established rules of technical writing and speaking. Another concrete outcome of the technical writing class was a research proposal. Students had to identify a research problem, typically derived from their own thesis research, which an undergraduate student could perform.

Another program component addressed the development of an international perspective. This was not part of a formal international IGERT component, which did not exist when we applied in 2001. IGERT trainees were expected to participate in two to three internships during their (typically) three years in the program. For two-thirds of the students, one of these internships was a four-week course with practical exercises and research at the University for Applied Science in Jena, Germany.

- (c) Program Statistics: One graduate student in the Biology Department was funded by this program.
- 4. Initiatives to Maximize Student Diversity (IMSD), Dr. Margaret Werner-Washburne, Project Director
- (a) Project Summary: This program is funded at UNM through the National Institutes of Health (NIH) National Institute of General Medical Sciences. The long-term goal of the UNM— IMSD program is to increase the numbers of competitive, under-represented minority students entering careers in biomedical research by enhancing undergraduate research, facilitating the transition to graduate school for these students, and increasing the number of successful, minority Ph.D. students at UNM and elsewhere.

Currently, the program at UNM funds 18 undergraduates and five graduate students to pursue research in biomedical sciences in 19 departments at UNM in the Colleges of Arts & Sciences and Engineering and the Biomedical Sciences. IMSD has 60 qualified mentors with whom students can work. The program includes a one-credit conference class each semester that includes bioethics, lab practices, career and scientific development, and research pre-

sentations. Students attend SACNAS (the Society for the Advancement of Chicanos/Latinos and Native Americans in the Sciences) meetings their first year, another national meeting their second year, and present their research at UNM spring symposia, and an IMSD-sponsored summer symposium. IMSD provides individual help with assembling graduate applications and provides GRE workshops for IMSD and non-IMSD students. IMSD and Minority Access to Research Careers (MARC) work closely together in these activities. UNM-IMSD has been at UNM for 31 years, formerly known as MBRS. In that time, we have provided research opportunities to more than 800 students.

Dr. Margaret Werner-Washburne, who has been nationally recognized for both her research and mentoring, took over the program, which was faltering, in 2003. Funding from UNM allowed the program to continue for one year prior to renewal of the long-term grant. In the past three years since the renewal was funded, 48 undergraduates (87% minority) and 20 graduate students (all minorities) have participated in IMSD. Of the undergraduates who have completed the program (28), 19 have graduated, seven have gone to graduate school, and six will apply for graduate school in the next year. This is an astounding success rate of 68%. We also have been extremely successful with Ph.D. students. We fund the first two years of a Ph.D. program for incoming minority students and have been able to fund the last semester of the Ph.D. program for some students. In the past three years, IMSD has funded 20 graduate students. Of the 15 who have completed the program, six have graduated with Ph.D.s, four will graduate next year, and four have received pre-doctoral fellowships from NSF, NIH, and DOE. Although, because of lack of funding, we have not been able to affect the percentage of minority graduate students in these departments, we have increased the success of these students.

Over the past three years of this grant, we have identified specific challenges with respect to creative, scientific thinking and have developed courses that we believe can increase the preparation of all of our students for graduate school. The goals of this program are consistent with these needs: to continue to improve the IMSD graduate and undergraduate programs at UNM by significantly increasing the number of UNM undergraduates who enter Ph.D. programs and under-represented minority Ph.D. candidates at UNM. Toward these goals, we propose the following specific aims:

(1) To increase numbers of undergraduates who understand and are prepared for research careers. For IMSD-sponsored students, this will include: (a) participation of all IMSD-funded students in a one-credit conference course that involves preparation of a research proposal each year, a bioethics component, research presentations, and other career and scientific development activities; (b) participation in summer and academic-year research symposiums at UNM; and (c) participation in workshops dealing with graduate school applications and the Graduate Record Exam (GRE) as well as taking the GRE. To double applications to IMSD, we will develop workshops and materials for students, faculty, staff, and university advisors to educate them about career options and research opportunities in the sciences. To prepare a larger number of UNM undergraduates for graduate school, we will support the development of one-semester Discovery and Innovation courses in Chemical Engineering and broadening of this course in the Biology Department. The effectiveness of all of these activities will be determined by evaluation. Through these efforts, we will increase the number of students entering graduate school immediately upon graduation to 60%. (The current class of IMSD seniors will reach this goal.)

- (2) To broaden the opportunities for minority students at UNM in areas of research funded by NIH. This will be done by increasing the research opportunities in areas such as Physics, Mathematics, Computer Sciences, etc., through (a) increasing the number of mentors in these areas and (b) increasing outreach to students in these areas. To increase awareness of opportunities outside UNM, we will establish exchanges with T32 and summer programs at the University of Washington that will be available to all UNM students. We will continue our Model Organism Database workshops and support the development of at least one crosslisted Discovery and Innovation courses, e.g., Computational Biology: Discovery and Innovation, to increase students' awareness of interdisciplinary research.
- (3) To significantly increase the success of under-represented minority graduate students at UNM, IMSD will continue to support the success of minority graduate students by: (a) supporting and mentoring five new, current graduate students; (b) increasing the number of minority graduate students through education of admissions committees and cooperative recruiting and informational activities with the Office of Graduate Studies (OGS), the organization Peer Mentoring for Graduate Students of Color, Deans, and Department Chairs; (c) providing career seminars and workshops for current graduate students; and (d) decreasing the time to graduation for enrolled graduate students by providing support, as available, for students for whom one semester of support, including access to help from IMSD staff and faculty, will help them finish their dissertations and graduate. As a result of these efforts, 90% of the IMSD Ph.D. students will complete their terminal degree in biomedical fields.
- 5. Program in Interdisciplinary Biological & Biomedical Science (PIBBS), 2005–2008.

 The newly created Program in Interdisciplinary Biological & Biomedical Science (PIBBS) is a collaboration between the departments of Biology, Computer Science, Physics, Math and Statistics at UNM, Los Alamos National Laboratory LANL), and the Santa Fe Institute(SFI). PIBBS is funded by the Howard Hughes Medical Institute (HHMI) and the National Institute of Biomedical Imaging and Bioengineering (NIBIB) at the National Institutes of Health (NIH). The close linkages with SFI and LANL allow us to offer educational and research opportunities not available in most traditional curricula. The impetus for this program is the increasing recognition that research on fundamental problems in biology and biomedical science will benefit from the input of new ideas, methodologies, and investigative strategies from the physical sciences, engineering, and mathematics. Yet, few scientists are trained or possess the necessary skills to conduct effective interdisciplinary work.

The primary goal of PIBBS is to develop new training opportunities for Ph.D. students that will provide them with the skills and knowledge needed to conduct leading edge interdisciplinary research. Building on successful initiatives ongoing at UNM over the past few years that highlight the importance of small intensively focused research teams, we will work towards: (a) developing a common baseline of mathematical, computational and biological knowledge and skills necessary for successful interdisciplinary collaborations, (b) exposing students to the disparate ways in which various scientific disciplines tackle and solve scientific problems; (c) exposing students to the language, culture, technology, literature and different perspectives/approaches used by various disciplines; and (d) learning the communication, scientific and social skills necessary to work effectively in small interdisciplinary research teams.

Currently, PIBBS is developing three additional courses for graduate training.

- CiT: Course in Teacher Training. The primary goal of this course is train graduate student teachers in developing and teaching interdisciplinary science courses. The course is supervised by a PIBBS faculty member. The course is developed and team taught by students who are supported by PIBBS. This first class, Human Ecology was developed and is being taught by Jordan Okie (Biology), a 2nd-year HHMI interface scholar at UNM, PIBBS; William Burnside (Biology); and Oscar Burgar (Anthropology). Both Bill and Oskar were supported by Dr. Brown's biocomplexity grant and have been pursuing academic research that is interdisciplinary in nature. The class has 17 students enrolled in it.
- Ethics 101. Being developed, possibly in collaboration with Professor Joe Cook.
- Survival 101. A "how to succeed in graduate school' course still being developed.

Opportunities for Students and Program Overview: Our initial funding will provide fellowship support for six Ph.D. students per year, beginning Fall Semester 2006. It is expected that these fellows will be admitted and enrolled as doctoral students in good standing in one of the participating departments (Biology, Computer Science, Mathematics and Statistics, Physics and Astronomy, or some other appropriate department). As members of the PIBBS, they will be expected to participate in all program activities. Specific requirements include:

- Students will enroll in a Fall Topics in Integrative Biological & Biomedical Science (TIBBS) Course and Spring PIBBS Seminar each year for their first two years; attendance is encouraged, but not mandatory after this time.
- Students will attend/participate in summer school/internships during their first two years in program. Specifically students will attend programs that offer skills, techniques or perspectives not represented at UNM or affiliated institutions.

Number of fellows supported to date: 9

HHMI Interfaces Scholars at the University of New Mexico, PIBBS:

2006-2007: six fellows; 2007-2008: 8 fellows.

Program Impacts: (1) Biology Department—This program offered collaboration with other researchers and organizations to look at how scaling relationships offer clues to underlying mechanisms that powerfully contain biodiversity. (2) Students—the primary goal of PIBBS is to develop new training opportunities for Ph.D. students that will provide them with the skills and knowledge needed to conduct leading edge interdisciplinary research. Building on successful initiatives ongoing at UNM over the past few years that highlight the importance of small, intensive focused research teams, we will work toward: (a) developing a common baseline of mathematical, computational and biological knowledge and skills necessary for successful interdisciplinary collaborations, (b) exposing students to the disparate ways in which various scientific disciplines tackle and solve scientific problems; (c) exposing students to the language, culture, technology, literature and different perspectives/approaches used by various disciplines; and (d) learning the communication, scientific and social skills necessary to work effectively in small interdisciplinary research teams. Course participation: 87 students taught between Fall 2006–Fall 2007.

6. Minority Access to Research Careers (MARC) Program, Mary Anne Nelson, PI
The current NIH-funded UNM MARC U-STAR Program, "Undergraduate Biomedical
Research Training," is funded from June 1, 2006—May 31, 2011. Mary Anne Nelson is the
PI and Program Director. The program receives approximately \$320,000 in direct costs and
\$25,000 for indirect costs (8% F&A) per year. Each year, five new MARC scholars are
admitted to the two-year program, so that, at any given time, there are 10 MARC scholars.
The 10 MARC students are juniors and seniors who conduct laboratory research with a
faculty mentor in some area of biomedical sciences. About half of the MARC scholars work
with professors on Main Campus, and half in various departments at the UNM Medical
School.

In the first summer, students do research full-time in their UNM laboratory, and at the end of summer, they present talks in the student research symposium supported by Initiatives to Maximize Student Diversity (IMSD) and MARC. During the academic year, students continue their research 15 hours per week and participate in regular MARC meetings. MARC students also take a 3-credit Research Ethics course and a one-credit GRE Preparation course, both of which are fully supported by the MARC Program; a limited number of other UNM students are admitted to these classes. In the fall, all MARC scholars attend a national meeting such as the SACNAS (Society for the Advancement of Chicanos and Native Americans in the Sciences) Conference, and in the spring, they present a poster or talk at the annual Department of Biology Research Day or similar venue.

During their second summer, MARC scholars work for 12 weeks in a laboratory at another university or research institute. In fall they return to their UNM laboratory and conduct research for 15 hours per week. In year two, MARC students take the GRE and apply to graduate schools. They complete their projects and write up their results. Most second-year students also present their research at a national scientific meeting in their area of specialty, and many publish their results in peer-reviewed journals. Most MARC scholars, after graduation, have gone on to graduate school in the biomedical sciences.

- Research Experiences for Undergraduates (REU) Program at the Sevilleta Long Term Ecological Research (LTER) site, funded by the National Science Foundation, \$246,705, Scott Collins, PI.
 - (a) Program Summary: Three years of support for an interdisciplinary REU Site Program at the Sevilleta LTER. Our goals are to (1) recruit 30 undergraduates from across the nation, targeting under-represented students at partner institutions and the ESA SEEDS program. Our REU students will (2) be immersed for 10 weeks in research under the guidance of faculty in the Departments of Biology and Earth and Planetary Sciences; (3) gain hands-on training through conducting their own research; (4) attend weekly seminars and informal workshops in the responsible conduct of research and professional development; (5) participate in field trips throughout the region, and (6) maintain a collaborative relationship with their mentor after the field season to complete the research and publish results.
 - (b) Intellectual Merit of the Program: Two fundamental experiences characterize our REU Site Program—interdisciplinarity and the research setting. Our program includes faculty in ecology, the geosciences, and meteorology. Students, as well as participating faculty, postdocs, and graduate students, will have numerous opportunities to share ideas and explore issues within and across these disciplines. This will enhance the excitement of the setting for

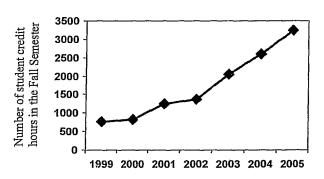
all participants as results are shared both informally and during symposia and workshops. The LTER is a perfect location: it invites close interactions among students and faculty, and graduate student peer mentors, during field data collection and laboratory research. This' setting and learning with "hands on" activities will promote greater interest in and understanding of the research process. Comprehension of hypothesis testing, data analysis and interpretation all increase as students become engaged in scientific study. Their confidence and self-identity as scientists will grow under the guidance of faculty advisors, especially because with the advisor's assistance, each student will design and implement their research study, and gain additional experience in reporting scientific results and making real contributions to research.

Institutional Contributions

The Biology Department teaches both a non-majors course (Biol. 110 lecture plus Biol.112 lab) that fulfills a core science requirement for any student and a series of courses for students planning on entering nursing, medical technology or pharmacy programs, among others. The courses for the health sciences students include Introductory Biology for Health Sciences (Biol. 123 and 124L), Microbiology for Health Sciences (Biol. 239L), and two semesters of Human Anatomy and Physiology (Biol. 237 plus Biol. 247L and Biol. 238 plus 248L).

These courses use substantial resources—instructors, teaching assistants, lab and lecture space, and supplies—and represent a high proportion of the department's teaching effort; demand for these courses often seems to be insatiable. For example, Biology 123 now enrolls about 500 students every semester and classes are always full. The increasing demand for some of these courses is illustrated in Fig. 9.

Figure 9. Number of student credit hours in Biol. 110, 123 and 239 in each fall semester, 1999–2006.



At the time of our last review, enrollment in these non-majors courses was considerably lower for three reasons. First, we were not as clear about the roles of these courses versus our majors series. Many students who simply needed a laboratory science course enrolled in our first major's course rather than the non-majors course; often these students performed poorly. Through a combination of work with University College advisors, better advertising, and required prerequisites for the majors series, students are better placed into the appropriate courses. Second, we now have a staff of full-time lecturers devoted to these courses. Formerly, many of

these classes were taught by part-time instructors. This change has allowed more consistency in the courses and the opportunity for faculty to invest in course development. Third, the demand for pre-nursing and pre-pharmacy courses has increased as the size of the nursing and pharmacy programs have increased at UNM.

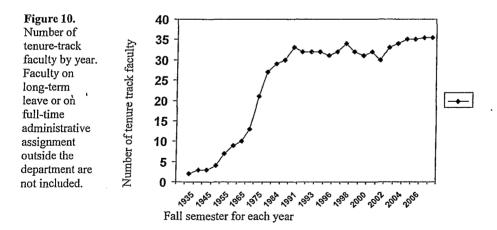
Assessment of the Non-Majors Curriculum: One of the full-time lecturers for the non-majors curriculum, Christina Fridrick, developed an assessment program for Biol.110 and 123. She has produced assessment instruments for Biol. 110, 112L, 123 and 124L. These instruments were first tested in Spring 2007 (See Appendix J). The plan is to continue with these assessments each semester; however, some funding for grading is needed.

Although Ms. Fridrick is currently on maternity leave, most of the rest of the lecturers are engaged in ongoing development of the non-majors assessment program this spring. They have been holding meetings to refine the assessment instruments and will apply the revised instruments during Spring, 2008.

FACULTY

Brief CV's for all faculty are in Appendix A.

Faculty Demographics: As of January 2007, our faculty includes three Distinguished Professors, 18 Professors (UNM's President and Dean also hold Professorships in Biology, but have no assignments in the department), five Associate Professors (plus one who is on long-term leave), and 8.5 Assistant Professors.



During the period from 1993 to 2007, when numbers of undergraduate majors more than doubled, numbers of tenure-track faculty were virtually unchanged (Fig. 10). There has been considerable turnover in the faculty and almost half of the faculty currently in the department were not present for the last program review.

Although the number of tenure-track faculty has not changed, the number of full-time lecturers has increased from two at the time of the last review to 8.5 at present. These lectures teach all of the non-majors courses, 25–50% of the sections of Biol. 201 and 202, and some upper-division coursework.

Table 1. The Frequency and Percentage of Male and Female Faculty by Rank in January 2007.

Rank	Number of Female Faculty	Number of Male Faculty	% Female Faculty
Distinguished			
Professor	0	3	0
Professor	4	14	22%
Associate	1	5	20%
Professor	1	3	. 2070
Assistant Professor	4.5	5	44%
All tenure track	8.5	27	24%
Lecturers	5	3.5	59%

For the period from 1996–2006, the percentage of women on the faculty stayed below 20% (Fig. 2). Recent hires have changed this pattern so that 44% of our assistant professors are women, while 24% of the tenure-track faculty are women. The majority of the lecturers are women.

Table 2. The Number and Percentage of Minority Faculty by Rank.

Rank	Number of Minority Faculty	Number of Non- Minority Faculty	% Minority Faculty
Distinguished Professor	0	3	0
Professor '	1	17	5.5 %
Associate Professor	1	. 5	20%
Assistant Professor	2	8.5	21.5%
All tenure track	4	33.5	10.9%
Lecturers	0	8.5	0%

The number of minority faculty in the department has always been low (Fig. 3). In recent years, one minority faculty member retired and two addition minority faculty members were hired, both as special hires. This year is the first time that the percent minority faculty has gone above 10%. This is in sharp contrast to the percentage of minority undergraduate students (Fig. 3).

The faculty also includes approximately 60 adjunct faculty (whose primary work is not on campus) and 30 research faculty (who work on campus and are usually paid from grant funds).

Typically, adjunct and research faculty are nominated by one or more tenure-track faculty, their CVs are reviewed, and the tenure-track faculty vote on their appointment. Names of research and adjunct faculty and the policy for research faculty promotion are in Appendix K.

Faculty Areas of Expertise: As shown in the attached CVs, faculty expertise spans most of the range of modern biology. Although it is increasingly difficult to categorize the faculty along conventional lines, approximately 21 of the faculty are in the general realm of ecology and evolution if physiological ecologists and molecular evolutionary biologists are included, another nine are in the cell/molecular realm including immunologists and microbiologists, and another six are curators. Many faculty do research that spans more than one of these areas.

Teaching Assignment Patterns: The standard teaching load for tenure-track faculty is one lecture course each semester and one additional assignment. The additional assignment is often a small readings course or lab group. Occasionally, this teaching load is modified by allowing a doubling-up in one semester to free the other semester for field work, reducing to accommodate large administrative assignments, or reducing to buy out from grants. The latter is actually quite rare with only 2–4 faculty per year buying time.

Lecturers teach two, usually large classes per semester. Occasionally, lecturers take on an additional assignment and receive additional compensation.

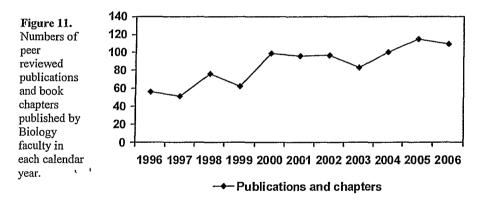
Although the teaching load is meant to be the same, the experience can be quite different for faculty in the two broad areas in the department. These differences arise from the discrepancy in undergraduate interests and faculty interests, differences in faculty numbers, and differences in opportunities to buy time with grants (NSF almost never funds release time, while NIH is willing to do so). At the lower-division level, Biol. 201 (Cell Biology) and Biol. 202 (Genetics) have been taught about half the time by tenure-track faculty and half the time by lecturers. Biol. 203 (Ecology and Evolution) and Biol. 204 (Plant and Animal Form and Function) have been taught entirely by tenure-track faculty. At the upper-division level, virtually all ecology, evolution, organismal and behavior classes are taught by tenure-track faculty. Most classes are small, ranging from 10-30 students. Occasional classes have as many as 50 students. For upperdivision classes in cell and molecular biology, there is enormous undergraduate interest as these are the courses that apply most directly to the health professions. Many of our students find these topics particularly interesting. Some classes are quite large (up to 100 students per section) and each semester several upper-division classes in this area are taught by non-tenure-track faculty. (These are excellent lecturers with appropriate Ph.D. level training.) Thus, both the teaching and learning environments are different across the major areas of the department.

Publications: Faculty in Biology are expected to publish regularly. Although there is some variation, since 1996, the general trend is an increase in number of publications per year (Fig. 11). This is interesting in that the faculty size has changed little. Each year, these publications include several in very prestigious journals such as *Science* and *Nature*. Complete lists of annual publications can be found in the department's annual reports, which are available in the Biology Department.

Each year, most of the tenure-track faculty publish in peer reviewed journals. For the last five years, on average, 83% of the tenure-track faculty have published in any year. Typically, faculty who do not publish in one year publish in the next.

Every year, our faculty earn honors and awards. Some of the most impressive in the last five years include: Jim Brown's election to the National Academy of Science; Eric Charnov's continuing award as a MacArthur Fellow; and Maggie Werner-Washburne's Presidential Award for Excellence in Science Math and Engineering Mentoring. During this five-year period, Cliff Dahm was the University Research Lecturer, Sam Loker became a Regent's Professor, and three faculty were Regent's Lecturers. Also, Maggie Werner-Washburne was elected an AAAS Fellow, Ulfar Bergthorsson won the Stebbins Medal for the best paper in plant systematics or evolution, and Tom Turner had an NSF CAREER award. Furthermore, Bruce Milne was awarded the Distinguished Landscape Ecologist Award from IALE, and four faculty won major teaching awards on campus.

Review of Faculty: In addition to the university-level procedures for tenure and promotion review, Biology faculty are reviewed each year. Faculty members are required to submit annually a data report (Appendix L). These data are reviewed by the Salary Committee and the Chair. Typically, annual salary adjustments include a cost-of-living adjustment and a small merit raise.



Untenured faculty are assigned two mentors from among the tenured faculty. The mentors are expected to discuss the expectations for tenure and promotion, observe teaching at least once per semester, answer questions about departmental issues, and present the untenured faculty member's record at a meeting of the tenured faculty each spring.

Governance: The faculty are led by a chair and two associate chairs. Most faculty business is discussed at faculty meetings held every one to four weeks. While there is a regular time for faculty meetings, meetings are not held unless there is business to discuss. Faculty meetings are always held to discuss tenure and promotion decisions and faculty hires. Votes on all major decisions are conducted by paper ballot with a 24-hour voting period, which allows voting by

faculty whose family and other responsibilities prevent them from staying until the end of long meetings.

Faculty Hires: Planning for faculty hires involves three components. First, the department holds a retreat every few years to discuss the long-term needs in the department. The last of these retreats was held in 2004. Second, for many years, the department has had the practice of trying to build in the area of cell and molecular biology, while retaining our recognized strength in ecology, evolution, and behavior. Third, when faculty leave the university through retirement or otherwise, we consider the holes created in the department's teaching and research programs.

In practice, following the recommendations that result from the faculty retreats is hampered by several factors. First, faculty separations from the university are not always predictable. Since the last program review, we have experienced more turnover in faculty than at any previous time in the department's history. Of the 32 faculty present in Spring, 1996, 16 have retired, one died, and one left for another job. In addition, between the two reviews, five other faculty joined and then left the department. Of the current faculty, 20.5 were not present during the last review. (The 0.5 FTE represents a faculty member with a joint appointment.) Second, since faculty lines do not automatically stay in the department, replacement of faculty takes time and, in some cases, we are still waiting to replace areas of expertise vacated several years ago. Often, by the time a line comes available, additional retirements or separations have occurred and hiring priorities are muddied. Third, the department has avoided reductions in size only because of special hiring opportunities. Two faculty were hired through the NIH-funded CETI program (Center for Evolutionary and Theoretical Immunology, see below), three were special spousal hires, and two were special hires where soft money research positions were converted to tenuretrack lines. These are valuable hires of quality faculty and our numbers would be severely limited without them; however, these hires are the result of special opportunities rather than the outcome of a department-wide planning processes. Nonetheless, as a consequence of the department taking the initiative to make special hires and using grant funds to leverage, expedite and support hires and to create new programs, we have avoided the significant losses in faculty size that have plagued other UNM science departments, many of which have been ravaged by retirements and recruitment by other campuses. Aggressive and successful efforts have been made to retain some of our faculty who have been offered jobs elsewhere. As noted above, many of the new hires have been women.

Despite the issues listed above, three major shifts in faculty expertise have occurred. First, two faculty with expertise in behavioral ecology and community ecology, who were also museum curators, were replaced with faculty whose expertise is more directly in systematics and phylogeny. This, accompanied by another hire in 2002 of a phylogeneticist, has increased expertise in systematics and phylogenetics.

Second, funding of the CETI (Center for Evolutionary and Theoretical Immunology) program allowed the department to develop in a new direction, one that fits the department well as it draws on expertise from both evolutionary and cell/molecular biology. Hiring of two new Biology faculty for this program, along with existing expertise in the department (including research faculty) and CETI-supported hires in other departments and at the Los Alamos National Labs, has allowed for significant growth of a program in evolutionary and theoretical immunology and parasitology/infectious disease. The immunologically related hires associated with CETI have permitted the development of a critical mass of investigators that has achieved visibility and a growing level of prominence on national and international scales. Included in the

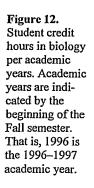
future plans for CETI, if and when the renewal proposal is funded, are additional leveraged hires, one to replace a departed comparative immunologist and two additional hires to benefit both CETI and to contribute to the department's general needs.

Third, an unplanned shift is occurring. The department has had an international reputation in behavioral ecology and had always been able to attract excellent graduate students in that area. However, already one well-known faculty member from that area has retired and others are nearing retirement age. We have no young faculty in this area. Without some action, this expertise will be lost to the department. A few years ago, faculty in behavioral ecology asked the department to consider making junior hires of behavioral ecologists, before the existing, well-known faculty retired. The thought was that we had the best opportunity to attract excellent young faculty while our reputation in behavior ecology was still intact. However, after a thorough discussion, the faculty voted to use the faculty lines for another urgent departmental need—to fully staff the MSB curators. Currently, there are no plans to hire in behavioral ecology, but the possibility of making such hires is by no means foreclosed. Senior faculty in this area should continue to pursue this path. Whether expertise in new areas in the department can achieve the reputation held by the behavioral ecologists is not known.

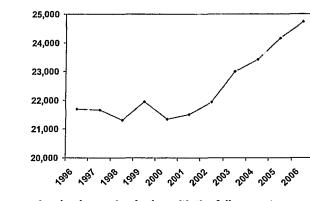
Roles for Retiring Faculty: Usually, retired faculty are granted emeritus status after a request to the department. They may have office space in Marron Hall, very near the main biology building, and mailboxes in the department's Main Office. Retired faculty do not retain lab space, but often continue writing and doing research by sharing space with other faculty. Retired faculty are occasionally hired to teach courses, as needed. Retired faculty serve on graduate committees, but may not be the sole chair of these committees.

Faculty Involvement in Interdisciplinary or Cross-Unit Academic Programs: Faculty have been involved in a number of large, interdisciplinary training programs. These include the Biocomplexity and IGERT programs described above. Current programs include the PIBBS, IMSD, and MARC programs. In addition, Bruce Milne founded the Sustainability Studies program at UNM which is by definition interdisciplinary.

Faculty Workload Analysis: The number of student credit hours taught per year has increased steadily since the last program review (Fig. 12). Overall, we are teaching 14% more student credit hours now than in 1996–1997.



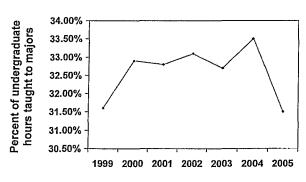
Student credit hours per academic year



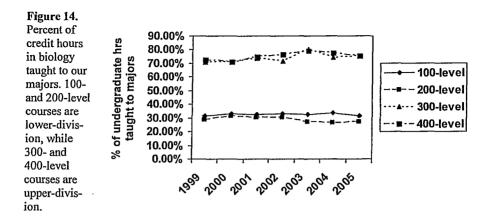
Academic year beginning with the fall semester

Of those student credit hours, a declining number are taught to our majors (Fig. 13), due to the increasing number of students in our non-majors courses. The College of Arts and Sciences has supported teaching extra sections of those courses to improve student access to courses that are part of the university core curriculum and to increase access to courses that are prerequisites for health sciences programs, especially nursing.

Figure 13. Percent of student credit hours taught to majors in biology from 1999–2005. Figures are for academic years, i.e., 1999 represents the 1999–2000 academic year.



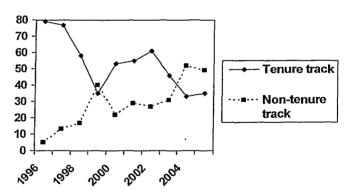
The situation is different in upper- and lower-division courses. Most of the student credit hours in upper-division courses are taught to our majors (Fig. 14).



As the number of lecturers in the department has increased, the proportion of student credit hours taught by the tenure-track faculty has decreased (Fig. 15). This is largely because the lecturers teach primarily in the large, non-majors courses. For example, in Fall 2003, tenure-track faculty taught 34% of the lower-division student credit hours (SCH), 67% of the upper-division SCH and 90% of the graduate SCH. In Fall 2004, tenure-track faculty taught 3% of the lower-division SCH, 69% of the upper-division SCH, and 93% of the graduate (SCH).

Figure 15.
Percent of
student credit
hours taught by
tenure-track and
non-tenure-track
faculty. 1999 is
an unusual year
because several
visiting assistant
professors were
hired to deal with
retirements and
sabbatical leaves.

Percent of student credit hours



Support for Faculty Development: Faculty support starts at the hiring stage. For the last five faculty who came into the department as full-time assistant professors, starting salaries averaged \$56,500 and setup packages averaged \$287,000. Currently, these setup packages are funded 35% from the Office of the Vice President for Research, 42.2% from the College of Arts and Sciences, and 22.8% from the Biology Department. The Biology Department's portion comes from overhead funds that are returned to the department. Currently, there is a large deficit in the Research Office and we are concerned about their continued ability to provide setup funds.

Typically, beginning faculty are given a teaching release by the department for the first semester, and then most get a research semester from the College of Arts and Sciences between the mid-probationary review and the tenure review. New faculty are assigned two mentors from the tenured faculty.

The department provides additional support for faculty from its overhead accounts. These funds are used for faculty travel to meetings, publication costs, and research support for faculty who are between grants or are starting new projects.

Faculty Retention Efforts: The department makes substantial efforts to retain faculty who are under consideration for faculty positions at other universities. The policy of the College of Arts and Sciences in this matter has varied among Deans, Sometimes we are able to make counter offers when a faculty member is offered an interview, sometimes after an interview and in other cases, not until a job has been offered. In the last 4.5 years, Retention efforts have been made for six faculty. These efforts include pre-emptive salary adjustments (two cases), spousal hires as a means of retaining one of our faculty (two cases that have resulted in hiring of two female tenure-track faculty members), competitive counter-offers that have resulted in retention (one case), and one on-going case involving hoped-for retention of a faculty member who accepted another position elsewhere, but who has remained on leave of absence at UNM in the meantime. In addition to a higher salary or the offer of a spousal position where relevant, our efforts in this area also include making provisions for staff assistance, working out special time-sharing arrangements with other academic units or institutions, and provisions of more material resources. Unfortunately, there are seldom funds from the college to deal with the potential inequities created for faculty who are less mobile due to family or other reasons. The annual salary increment given to the department is not sufficient to take care of these kinds of situations.

SPECIAL PROGRAMS WITHIN THE DEPARTMENT

Museum of Southwestern Biology (MSB)

The MSB produced a separate self-study document, Appendix N, that details its goals and status. The Museum's activities are briefly summarized below.

The MSB is a distinct unit within the Department of Biology and is headed by a Director, who reports to the Dean of the College of Arts and Sciences. Its role is distinct from, but highly complimentary to, the normal teaching, scholarship and outreach missions of the Department. The MSB acts as a repository for representative specimens and data that document biological diversity. MSB curators and staff are charged with maintaining and enhancing collections to increase and disseminate knowledge of our natural history and environment. The MSB does not

have a formal public exhibition program. Rather, the MSB is dedicated to advancing knowledge in, and service to, the scientific fields of organismal biology, ecology, systematic biology, public health, and natural history. MSB applies its resources and expertise to the service of the Department, UNM, the state of New Mexico, and to the wider regional, national, and international scientific communities.

Faculty-curators, museum associates, and staff usually have full-time appointments in the Department of Biology and are expected to meet departmental expectations of performance in scholarship, teaching and service. These activities are reported in the broader Biology Department Self Study. In practice, research and teaching are highly integrated into the curatorial mission. The MSB report (Appendix N) provides metrics intended to describe and assess performance in the following areas: (i) collections growth and development, (ii) scholarly activity of MSB staff and associates, and (iii) student curatorial mentorship and training. The performance of each the MSB's nine Divisions is compared to peer institutions in the United States through narrative descriptions of collection growth, use, and enhancement. Based on self assessment, the MSB is on par with nationally and internationally known research university collections includeing Arizona State University, Yale University, and the Illinois Natural History Survey at the University of Illinois Urbana-Champaign.

The planning process of the MSB is done by an advisory executive committee (composed of the director and curators) and annual retreats for the entire MSB staff. Through this process, the museum has identified three major goals. First, it will enhance use and visibility of the collections through development of world-wide web accessible, integrated databases. Second, it will develop formal curatorial training and mentorship programs for undergraduate and graduate students. Finally, it will enhance opportunities for integrated, specimen-based research across UNM. Chaîlenges to fully implementing database goals include lack of information technology staffing and physical space

Center for Evolutionary and Theoretical Immunology (CETI)

One of the prominent research programs with its administrative home in the Biology Department is the Center for Evolutionary and Theoretical Immunology (CETI), which is supported primarily by the National Institutes of Health (NIH) National Center for Research Resources (NCRR) Centers for Biomedical Research Excellence (COBRE) program. CETI also is incorporated as a Level One center within the College of Arts and Sciences. CETI is devoted to the study of the origins and diversification of immune systems across the spectrum of organismal life; it also is dedicated to revealing the underlying principles that govern how immune systems work. The program has its major emphasis within the Biology Department, but also has as formal participating faculty in the College of Engineering's Department of Computer Science, and theoreticians at the Los Alamos National Laboratory. In addition to providing mentoring for junior investigators seeking to attain their own independence and research funding, CETI also has provided more than \$300,000 to upgrade core research facilities in the Biology Department, including the purchase of two new automated sequencers, several new research quality microscopes, and incubators and environmental chambers; it also has provided significant support to establishing a mass spectroscopy center devoted to proteomics study in the Department of Chemistry and Chemical Biology. CETI has provided \$450,000 in renovation funds to completely overhaul one of the wings of our building as improved research space to support CETI activities, and has supported the visits of numerous prominent investigators to Biology and

UNM. In addition to its core NCRR funding, CETI also is supported by research grants awarded to its individual participants, both junior and senior participants alike.

This program is funded by a COBRE grant from NIH. The COBRE grant is a \$10.4M, five-year award that has provided support for 10 tenure-track and/or senior investigators, 11 research-track faculty and/or postdocs, nine graduate students, 12 undergraduate students and eight research staff. The grant award has the possibility for renewal at the end of the original five-year funding period, which will end in June, 2008.

Long Term Ecological Research (LTER) program

The Sevillelta LTER program is a long-term, comprehensive, integrated, interdisciplinary research program addressing key hypotheses on pattern and process in aridland ecosystems. Our focal sites are the 100,000 ha Sevilleta National Wildlife Refuge, located about 80 km south of Albuquerque and the Middle Rio Grande bosque between Cochiti Dam and Elephant Butte Reservoir. Since its inception in 1988, the Sevilleta LTER program has conducted research at multiple ecological levels and a variety of spatial and temporal scales. The Sevilleta is organized into five thematic areas with designated group leaders: climate and abiotic drivers (Cliff Dahm), water fluxes (Will Pockman), soils and biogeochemistry (Bob Sinsabaugh), producer dynamics (Estaban Muldavin), and consumer dynamics (Blair Wolf).

The Sevilleta LTER is involved in education and outreach through a School Yard LTER program (BEMP), an NSF-funded GK-12 program, a summer REU program, an ESA SEEDS chapter, and everyday classroom teaching by our researchers.

The Sevilleta LTER program supports our graduate program in several ways. First, students use the site for their research projects. Second, the LTER provides summer fellowships of up \$3,500 and supported seven students last summer. Finally, students working at the Sevilleta can use the resources of the Sevilleta field station.

LTER Network Office

The LTER Network Office is funded as a Cooperative Agreement with the National Science Foundation (Robert Waide, PI). The first cooperative agreement was for six years in 1997 at \$7,289,433. We were successful in renewal of the Cooperative Agreement in 2003 for \$8,161,893. We are in the process of writing our third renewal proposal this spring for continued funding in 2009.

Summary: The LTER Network Office was created by the National Science Foundation in 1983 to support and coordinate network and site activities of the U.S. Long Term Ecological Research (LTER) Network (in support of the overall LTER vision, mission, goals and objectives). It moved to the University of New Mexico from the University of Washington through a competitive grant process in 1996. With more than two dozen sites participating in the Network within the United States, rapidly advancing technology, and growing collaborations with other national observatory networks, federal agencies, and countries, the complexity of facilitating collaborations among sites and maintaining supporting infrastructure has created great challenges and an even greater need for a strong and dedicated Network Office.

The mission of the LTER Network Office is to provide a central point of contact and collective expertise to support the objectives of the LTER Network by:

- providing an efficient computational and communication infrastructure;
- · developing and deploying state-of-the-art techniques in information management;
- maintaining a strong public outreach program;
- · coordinating interactions with other scientific networks, agencies, and entities;
- providing administrative support;
- contributing to an efficient and effective environment in which site, cross-site, and synthetic
 research and education can be conducted.

Impacts of the Program on the Department: The LTER Network Office supports or partially supports one tenure-track faculty member and four research faculty. The research faculty, while broadly experienced, are all internationally known leaders in the area of ecological informatics and have been successful at attracting significant additional funds to further knowledge in areas ranging from sensor networks and remote sensing to computing infrastructure and software development. The LTER Network Office operations are supported by four office staff, three computer support staff, two information systems specialists (one supported by USGS NBII), and a public information officer. The LTER Network Office usually funds one to two students per year to assist with core services provided to the LTER Network scientists.

The LTER Network Office maintains a controlled-environment server room in the basement of the Center for Environmental Research, Information & Art (CERIA) Room 123. Currently, this room is shared by various divisions of the Museum of Southwestern Biology and Sevilleta LTER Project. In addition, we have designed, outfitted, and currently maintain an innovative information technology training laboratory in Room 335 of CERIA. This facility is used regularly for intensive training courses, seminars, and workshops involving scientists, students, and information management specialists from around the world. UNM students and faculty are eligible to apply for many of these courses and workshops.

FACILITIES AND RESOURCE BASES

Support Staff? The department staff includes 89 members, 26 of which are paid in part or full by I & G funds. Every year in the annual report, the chair says that the support staff perform minor miracles on a daily basis to keep the department afloat. This is because the department becomes larger (in terms of programs, not faculty) and more complex every year and because the demands of the university accounting system and auditing become more difficult every year. In 1996, the department had 23 state-funded staff positions (the number of FTE lines was less). In 2002–2003, there were 21.14 FTE's, and in 2006–2007, there 22.88 FTE's. State support for staff lines is in no way adequate. The department supplements this by paying all or part of some staff salaries from overhead and foundation accounts. Some essential functions, such as managing the research greenhouse and growing plants for our courses, are not supported by state lines at all (Appendix B).

Space: Space for our research and teaching missions has always been in short supply. However, there have been several major changes since the last program review.

At the time of the last review, the department had just received permission to renovate and use much of the space in a nearby building that formerly had been the campus bookstore. Garnering funds for and completing the renovations took nearly a decade from the time the space was first promised. After a number of problems, new space became available in 2004–2005. This space was occupied by the collections and staff of the Museum of Southwestern Biology. This included the curators, so six faculty moved from offices in the main Biology building (Castetter Hall) to the newly renovated building (Center for Environmental Research, Information & Art [CERIA]). The staff of the LTER Program and the LTER Network Office also moved into CERIA. There is no faculty lab space in this building.

Moving the museum collections opened up considerable space in the basement of Castetter Hall, but funds to renovate this space for new uses were not immediately available. However, \$7M became available from a student-funded bond issue to renovate 20,000 sq. ft. in the newer wing of the basement for teaching. In mid-October, 2007 this space opened with five new teaching labs, three new lecture rooms, offices for seven lecturers, an advising suite, student study areas, and a student commons area. This represents the most significant renovation of Castetter Hall since it was constructed.

Since the last review there also have been funds received for renovating some faculty labs, with the funding coming from the university, the student-funded bond issue and the CETI Program. University funding for research lab renovation has been particularly hard to come by in the last decade as the university has invested in upgrading core infrastructure. An example of this problem faces us at present. With the opening of the new teaching labs in the basement, four rooms in the old wing of Castetter Hall are available now for other uses. We had thought to renovate these into new faculty labs, but funding is not available and is unlikely to become available in the near future.

We do plan to provide up to 35,000 sq. ft. of new space in a phased addition to Castetter Hall. Funds for Phase I, a two-story 15,000 sq. ft. addition, are almost in place and construction will begin this semester. We are still working to put together funding for Phase II, which will include a new research greenhouse and a three-story addition.

We are still in need of substantial renovation funds for our current building. While some very nice renovation has occurred, other parts of the building have little or no renovation since the 1950s and 1960s. The recent renovation of the basement has shown us what could be possible.

Over time, the department has been frustrated by changes in administration that alternately emphasized new construction or renovation. We have been plagued by delays in obtaining funds and by increased construction costs that result from these delays. Nonetheless, our current construction and plans could put us in better shape than we have been in for decades.

Special Facilities

Molecular Biology Facility (MBF): The MBF provides (1) access to the tools and techniques of molecular biology for faculty and students who do not have suitably equipped labs, (2) common equipment for all molecular biology work, and (3) support and equipment to classes. Available equipment includes DNA sequencers, ultra- and high speed-centrifuges, gel documentation systems, and DNA analysis software. In 2006–2007, more than 49,000 sequences were run on the facility's genetic analyzers. Twenty-six tenure-track faculty, 34 graduate students, and 45

undergraduates used the facility. Students from five classes used the MBF and 18 peer-reviewed manuscripts acknowledge the facility.

Sevilleta LTER Field Station: The field station is operated by the Biology Department in collaboration with the U.S. Fish and Wildlife Service. It supports research in biology, ecology, geology, and anthropology. The primary mission of the field station is to provide housing and research space for programs centered at the Sevilleta Wildlife Refuge. It also acts as a facility for meetings and small conferences. The facilities include housing for up to 48 people, general laboratories, specimen processing and storage facilities, reference collection, a computer center, a library and a large conference room.

Library Resources

The University Libraries (UL) is a member of the Association of Research Libraries, and is composed of four separate facilities on the University of New Mexico's Main Campus in Albuquerque: Zimmerman Library (education, social sciences, and humanities); Centennial Science and Engineering Library (CSEL); Parish Memorial Library (business and economics); and the Fine Arts and Design Library.

The four branches of the UL hold more than two million print volumes in their collections. Currently, the UL has more than 8,000 subscriptions to print journals and nearly 17,000 subscriptions to electronic journals in all disciplines. There are numerous special collections in the UL, including the Map and Geographic Information Center (MAGIC) at Centennial Library. The MAGIC collections include approximately 221,000 maps and cartographic images.

The UL provides 24/7 remote electronic access to more than 300 electronic databases, electronic journals, electronic reference sources and other books, and the library catalog (LIBROS) of print holdings. There are several electronic sources that specifically support research in biology at all levels. The JSTOR archive contains journal collections focusing on: general science; ecology and evolution; botany; developmental and cell science; health sciences; and zoology. BioOne provides electronic access to 84 journals in the biological sciences, including many smaller society publications. The UL collaborated with the American Ornithologists Union, the Cooper Ornithological Society, the Association of Field Ornithologists, the Wilson Ornithological Society to produce SORA, a searchable archive of more than 120 years of international ornithological literature. The UL provides access to more than a dozen major databases covering various aspects of the world's biological literature, including BIOSIS, Web of Science, Zoological Record, and several environmental databases through Cambridge Scientific Abstracts.

The staff at CSEL provides library instruction to students in the sciences and engineering. In 2007, more than 50% of these sessions were conducted for students in undergraduate biology classes, both majors and non-majors. Library staff had contact with 72 unique classes or lab sections in these instruction sessions, interacting with approximately 1,440 students. More than half of these sessions were taught by the biology librarian.

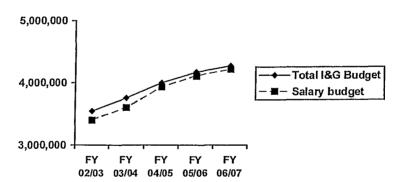
The biology librarian provides additional assistance to the department by selecting books for the library's collections and handling biology reference questions directly for any students, faculty, and staff in the department. Additional reference support is provided by all CSEL librarians via the reference desk, which is staffed in person, by phone, and by e-mail over 50 hours per week.

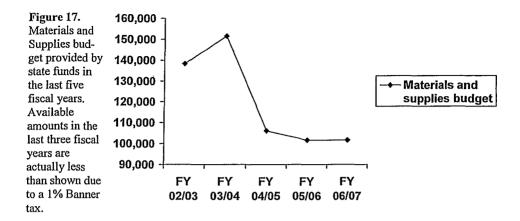
Financial Resources

The department has four main sources of funding, state funding (the I & G budget) that is allocated to the department by the College of Arts and Sciences, course fees that are collected from students, overhead funds generated by grants, and gifts that are managed by the Biological Society of New Mexico (BSNM) and the UNM Foundation. The faculty, staff and students in the department also hold grants funded by a variety of agencies. These funds, of course, are for research projects, not for the general operation of the department. This section provides an overview of our financial situation. Details can be found in a report provided by our accounting staff (Appendix M).

I & G Budget: The state-funded budget includes two parts—Salaries and Materials & Supplies. Starting in fiscal year 2004–2005, a 1% tax was imposed on all transactions in the I &G budget. This tax funds implementation and operation of a new data base system—Banner. The listing below of the total I & G budget is shown after the Banner tax was imposed, since the effect is to reduce the funds we receive. Generally speaking, while the department's I & G budget has increased overall, the increase is entirely in salaries (Fig. 16). The Materials and Supplies budget has decreased in the last five years (Fig. 17). Funds in the Salary budget can be spent only on salaries. Funds from unfilled positions are reclaimed by the College of Arts and Sciences.

Figure 16.
Total I & G
budget for the
past five fiscal
years. Budget
amounts are
after the Banner tax has'
been removed.





The Materials and Supplies budget is even more limited than it appears here as a number of fixed or rising costs are paid from this account. Fixed costs include the operating budget for the Museum of Southwestern Biology (\$48,800), a budget for the Animal Research Facility (\$12,600) and the lease for departmental copiers (\$36,500). Additionally, there are two other large costs: telecommunications (\$62,400 in FY 2006/07) and tuition for special T.A.s (\$32,500 in FY 2006/07). The large telecommunications bill arises because the university has not increased for many years our budget for telephone lines. As the department increased in size and complexity, additional telephone lines were needed and the department pays for them from the I & G budget. The T.A. tuition cost is generated when the department agrees to add sections to courses to meet university enrollment needs. When many students want to enroll in a closed course, the university tries to open up additional sections so that students can progress through the curriculum. When additional biology lab sections are needed, the department is offered T.A. stipend support, but not T.A. tuition support. We are unwilling to create a second class of T.A.s who do not receive tuition support, so we pay their tuition from the I & G budget. Thus, our acquiescence to the universities goals costs us about \$30,000 per year.

Because of these nearly fixed costs that are necessary to operate the department, our Materials and Supplies budget is spent before we start thinking about funding for classes. In 2006–2007, when our fixed costs, as listed above, were \$192,000, our Materials and Supplies budget was only \$100,643 (after the Banner tax was applied). The College of Arts and Sciences recognizes this problem and has supplied additional operating funds to the department in four of the last five years (\$67K in FY 2002/03, \$76K in FY 2004/05, \$132K in FY 2005/06, and \$116K in 2006/07). Note that these funds declined in the last year and that these are not guaranteed funds for the department. In FY 2006/07, after fixed costs were paid, the department had \$22,683 for teaching courses, which equaled \$2.26 per student or \$0.97 per student credit hour. That was actually a relatively good year, as the average for the last five years was \$0.47 per student or \$0.20 per student credit hour.

Course Fees: Because the state budget for teaching materials had become completely inadequate, the department began charging fees for all courses. Some course fees for the more expensive labs had always been a part of the budget; however, because all courses had costs that could not be covered by the state budget, the department applied for and gained approval to charge the following course fees: \$5 per lecture class, \$10 per discussion class, \$30 for all lab classes (that do not have special, higher fees), and \$75 for all field trip and anatomy and physiology classes.

Charging course fees has turned around the department's teaching budget. These fees generated \$136,000 in FY 2006/07. These funds are monitored carefully and are spent only on teaching, which allows us to purchase supplies for classes and to engage in a program of upgrading teaching equipment. For example, in the past year, the department purchased 20 new microscopes for upper-division courses; these replaced microscopes from the 1940s. We still face challenges in providing lab supplies, which increase in cost, but we are in a better circumstance than we were a decade ago.

Overhead Funds: A portion of the overhead generated from grant accounts is returned to the department from the Office of Research. These funds are used for start-up costs, research support, faculty development, graduate student support, etc.

In FY 2006/07, the department's overhead allocation was \$416,273.00. The money was used as listed below.

General Category Expenditures:		
Faculty Travel Support	\$10,000	
Catastrophic Leave	\$2,500	
Start-up Packages	\$107,745	
Cost Shares	\$120,000	
Shipping Charges	\$1,000	
Faculty Meetings	\$1,000	
Faculty Moves	\$10,000	
Biology Renovations	\$35,000	
F&A Splits	\$26,800	
GRAC	\$5,500	A graduate-student-administered research fund
Green Card/Visas	\$10,000	•
Graduate Computer Pod	\$2,500	
Proposals	\$500	
SAC Deals	\$6,000	Supplemental administrative compensation
Salary Support	\$69,000	

Foundation Accounts: The department, through its own development efforts, has accumulated some accounts managed by the UNM Foundation. These support scholarships for undergraduate and graduate students, the Museum of Southwestern Biology, research, and discretionary activities. Table 3 summarizes the current UNM Foundation accounts.

Table 3. Summary of Biology Department Accounts in the UNM Foundation.

Type of Accounts	Number of Accounts	Purpose	Funds Available to Spend	Endowment Amount
Non-endowed I	Non-endowed Biology Foundation Accounts:			
	1	Museum of		İ
	9	Southwestern	\$35,964.00	
ĺ	ĺ	Biology	1	ľ
		N.M. Natural		
1	1	Heritage	\$218,383.00	
	Į	Program		
1	1	Plant Ecology	Ø5 007 00	
	1	Scholarship	\$5,887.88	
		Chair's		
	1	Discretionary	\$2,936.00	
		Fund		
Endowed Biolog	gy Accounts:			
	1	Scholarships		
		for graduate		
	8	and	\$51,127.15	\$875,064.09
i		undergraduate		
		students		
		Museum of		ļ
	3	Southwestern	\$875,064.09	\$108,659.79
	İ	Biology		
		Departmental		
		research		
	3	support and	\$43,894.04	\$503.128.37
ł		chair's		
		discretion		
Biology Trust	1	Scholarship		\$11,695.00
Fund Account		этир		****,570.00

Grant Funding: In 1996, the department had \$4,927,390 in grant expenditures. In FY 2006/07, the department had \$13,358,472 in grant expenditures on 219 grant indices (based on UNM's accounting system, the number of grant indices is a measure of the number of active grants. This is a slight overestimation as a few grants have more than one index). Thus, although the faculty has stayed at about the same size, grant activity has increased considerably. Average inflation during the period would have increased grant activity only to \$6,331,203.40.

Although grant activity has increase in the last decade, it has fallen off a bit in the last two years (Fig. 18). The peak in FY 2004/05 represents the initiation of the large NIH grant that funds the CETI program.

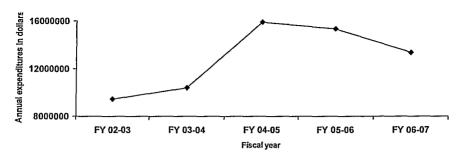
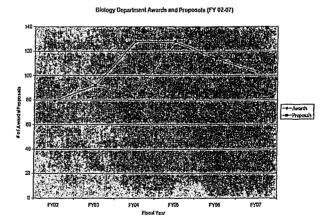


Figure 18. Annual expenditures of grant dollars from Fiscal Year 2002/03 to Fiscal Year 2006/07.

We worry somewhat about the decline in grant dollars for the last two years. This may represent normal funding cycles for some large programmatic grants, the increasing difficulty of obtaining federal funds, or reductions in submissions of proposals by our faculty. The last would generate the most concern. We also are concerned about the changing climate for funding from federal agencies. A comparison of number of proposals and awards over the last five years (Fig. 19), shows a dip in submission in FY 2004, but a subsequent increase in proposals. Thus, faculty effort in seeking awards is not the most likely explanation for the decline in grant dollars. We would like to work with the college and university development staff to improve our connections with and funding from private foundations.

Figure 19. The number of proposals and awards for the Biology Department from FY 2002-FY 2007.



On average, the department has funding per year from 55 different agencies. These range in amount from a few hundred dollars to millions of dollars. Typically, the largest amount of funding comes from the National Science Foundation (NSF). This is primarily because of the large grants to the LTER and LTER Network Office, but there are also numerous single investigator grants. Funding from NIH also is substantial and increasing over time, in part due to

the large COBRE grant that funds the Center for Evolutionary and Theoretical Immunology (CETI). Details of funding sources are presented in the financial report (Appendix M).

While most of the grant dollars come from awards to tenure-track faculty, substantial grant activity also comes from the work of other department members, especially the research faculty. In FY 2006/07, 36% of the grant dollars came from awards to members of the department who were not tenure-track faculty. On average, 26 tenure-track faculty hold grants each year.

Current and Projected Costs: The bulk of our annual I & G budget is for salaries and the salary funds cannot be moved to other budget categories. We expect salaries to continue to increase and worry about the slow rate at which the state budget increases. Salaries need to rise to be competitive with our peers and to retain our faculty. The department would benefit from both an increase in the number of staff lines and an increase in the rate of pay for staff. Essential duties are still supported by overhead funds. The number of guaranteed T.A. lines has shown essentially no increase in the last five years. Additional T.A.s are supported each year by special allocations, but these allocations do not cover all of the costs of T.A. support, e.g., tuition is not paid. Thus, these special allocations are problematic for two reasons. First, they create a financial burden for the department, because the department pays the TA tuition. Second, because they are not guaranteed, so we cannot plan around them and cannot increase the size of our graduate program.

We also expect materials and supplies costs to continue to rise, likely at higher than the rate of inflation. In recent years, this budget actually has declined, and we use course fees to cover the shortfall.

Grant revenues are difficult to predict. Given the current funding climate and the state of the federal budget, in the near future it is more likely that these funds will decrease rather than increase. This creates two problems for the department. First, faculty are likely to experience gaps in funding and ask for support from the departmental overhead funds. Second, fewer grant dollars means a smaller overhead budget. Yet we expect the demands on the overhead budget to be even greater, as travel costs for faculty, gaps in funding, and requirements for start-up funds all increase.

We are very concerned about our overhead budget. This budget has kept the department afloat during many lean times at UNM. However, this budget is allocated from the Office of the Vice President for Research (OVPR). In the last year, a multimillion dollar shortfall in the OVPR budget has been discovered and reported. Trying to cover that deficit is likely to affect all units that rely on overhead funds.

The debt that has been reported in the Office of the Vice President for Research and Economic Development (OVPRED) imperils the research activities of the Biology Department in several ways:

1. It is likely to lead to a permanent, institution-wide redistribution of overhead funds (currently 56% OVPRED, 26.4% college, 13.2% department, and 4.4% PI) to something less favorable to the colleges, departments and individual PIs. This is disastrous, because, at the departmental level, we depend on our overhead funds to support travel to professional meetings or for collecting trips, to enable purchase of equipment items or supplies needed by faculty in transitional funding situations, or to provide supplemental support for the research activities of graduate students. Overhead funds are among our most discretionary funds, and insofar as

- they are devoted to research activities, and given that we have created the overhead streams in the first place by virtue of getting grants funded, these are very important to us.
- 2. A reduction in the level of funds returned to the units that generate them in the first place is a huge negative incentive for PIs. Even though the PI share received now is small, it is something, and can be used by the PI to initiate totally new projects or to make scientific trips that would not be possible otherwise. If there is no return or a diminished return, we feel it will eventually cause the number of proposals submitted to decline.
- 3. There is a considerable concern that if the OVPRED office retains more research overhead funds to service a debt, this will impact significantly their ability to provide start-up funds related to future hires (currently, they contribute 35%). Will this amount to a de facto hiring freeze in the sciences where large start-up packages are the norm?
- 4. Many of our large, multi-investigator projects rely heavily on cost-shares to help pay for the support personnel needed to administer the program in question. In some cases, virtually 100% of the overhead generated has been returned to the projects via cost shares. If cost shares suddenly are eliminated because of debt problems, then the efficient operation of some of our most valued programs becomes increasingly imperiled.
- 5. More philosophically, if overhead funds generated from research are not plowed directly back into research, but instead are siphoned off by other UNM financial units, then this sends a very strong negative message to the faculty that research is not sufficiently valued, or that the research infrastructure (compliance, proposal handling, accounting) is not being sufficiently supported. All of these things create difficulties for submission or support of research endeavors, create negative incentives for continuing to submit proposals, and cast doubt on the potential of UNM to excel in research.

The Relationship Between the Budget and the Department's Mission and Goals: The department has little control over the I & G budget, yet this budget is necessary to perform our primary missions of research, teaching and service. Annual increases in salary, as provided by the state, are small enough that only small merit awards can be given. Larger increases in salary come from counteroffers to those faculty who can seek jobs elsewhere and from adjustments based on administrative responsibilities. This is typical of the entire university. Our needs for additional staff lines are very difficult to address and extra T.A. lines are not allocated in a way that allows us to plan for new graduate students.

The department does control its course fee budget. Course fees were created to address directly the need for teaching equipment and supplies. The course fees budget is used entirely for those purposes.

The overhead budget is used most directly to support our goals related to the research mission. Here, where the department does have control, funds are allocated directly to faculty research needs.

The Plan for Dealing with Increases or Decreases in Resources over the Next Five Years: During initial planning for this review, we were asked to consider the impact of a 5% increase or decrease in the budget. Decreases in the I & G budget would be disastrous for the department. Of this year's \$4.2 million budget, only \$100,000 was allocated to materials and supplies. That money is allocated entirely to fixed costs. So, unless we plan to stop using telephones or photocopiers, we cannot really cut that part of the budget. Thus, with a 5% cut, \$210,000 would have

to come from salaries. If it were a temporary cut, we could slow down hiring, but that would affect the number of courses we teach. If it were a permanent cut, we would have to cut faculty or staff lines. Since the numbers of personnel already are minimal for a department of this size, any cut would have a direct effect on the number of courses we could teach. This would jeopardize the university's goals to increase student graduation rates.

Because we are covering course supplies by assessing course fees, a \$210,000 increase in the budget would most likely be spent on salaries. Given that state-funded staff lines are nearly the most limited resource in the university, we would likely add at least one staff line. Given our low ratio of faculty to majors, we also would likely add a faculty line.

COMPARISONS TO OTHER PROGRAMS

National Rankings: There are no routine comparisons of programs in biology, and given the breadth of the field, comparisons are rather difficult. We are still best known for our program in ecology and evolution, but do not have a department with that name. It is seldom possible to separate out just a part of a program for a review.

National Research Council (NRC): The last NRC doctoral training ranking was published in 1995. Because of an administrative problem, data were submitted for only a few programs from UNM, and we are not entirely certain what was submitted about our department. Nonetheless, our program in ecology, evolution and behavior was ranked 47 out of 130 (The University of Utah was 25 and The University of Arizona was 20). Size of the faculty played a large role in that ranking, and we have fewer faculty in ecology and evolution than do departments dedicated to that area. The best single univariate predictor was Science Citation Counts per faculty member. The next set of NRC rankings are underway. Our department chose to be ranked in ecology and evolution. This resulted in the entire faculty being surveyed for this area, although not everyone works in ecology and evolution. In the last decade, there have been some highly cited papers produced by our faculty, we added another distinguished ecologist, and Jim Brown was elected to the National Academy. These will likely improve our ranking, but we won't know for about six months. While there is a good chance that we will improve this time, we will decline in ranking in this area in the next time period unless we make some significant changes. Our three distinguished professors in ecology and evolution are all likely to retire before the next round of NRC rankings and we have no current plans to replace them with senior hires.

U.S. News and World Report publishes an annual ranking of graduate programs, although programs in biology are ranked only by opinions of those in the field. We do not fare well in a general ranking of biology departments, ending up in 2007 in a tie for 105th. This is no surprise, however, given the size of our department. UNM's peer institutions with higher rankings all have more biology faculty, often found in two or three departments. U.S. News and World Report also gives a listing of top programs in ecology and evolution; we are not among the 13 they list, and a longer list is not published. Of the 13 published, eight are very well-known private universities and the other five are very large public universities with far more faculty and resources than UNM. It is hard to know what to make of this list.

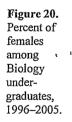
Within UNM Comparisons: Biology is unique among the sciences at UNM in its large number of majors coupled with a strong enrollment in service courses. Since the service courses are now

handled very well by lecturers, we want to comment especially on the number of majors. The ratio of undergraduate majors to tenure-track faculty is far higher in the Biology Department than in any of the other science departments at UNM (Table 4). Having increased our number of lecturers does not solve the problem the high majors: tenure-track faculty ratio creates. Our majors are the students who need small, upper-division courses, access to research experiences in our labs, and mentoring from individual faculty. Obviously, our ability to do this is impaired by the high numbers of majors. No faculty member can have 38 students in his or her lab.

Table 4. The numbers of tenure-track faculty and majors in science departments at UNM.

Department	Tenure-Track Faculty, Fall 2007	Majors * from Jan. 2008 Hyperion Report	Ratio of Majors to Faculty
Biology	35.5	1348	38
Chemistry	16	289	18
Earth and Planetary Sciences (includes Environmental Sciences majors)	21	183	8.7
Physics and Astronomy	28	130	4.6

In addition to attracting many more majors than the other science departments, the Biology Department also has been successful in attracting minority and female students to the sciences (Figs. 20 and 21).



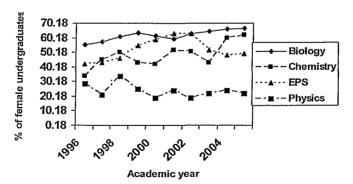
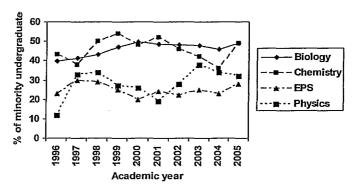


Figure 21. Percentage of minority students among Biology undergraduates 1996–2005.



In addition to the high proportion of minority students among our undergraduates, the number of minority students also is impressive. In 2005, we had 406 minority students among our majors. At the same time, the combined number of minority majors was only 103 in Chemistry, Earth and Planetary Sciences and Physics.

Student Credit Hours and Instructional Costs, UNM Departments and Peer Institutions: UNM spends less per student credit hour on biology instruction than is spent at our peer institutions or at Carnegie Research Universities. This is not a problem unique to the Biology Department as many departments in the College of Arts and Sciences face a similar shortfall. Among the sciences, UNM spends more per student credit hour on Earth and Plantetary Sciences instruction than is typical at our peers and nationally, but it spends less than other universities on all of the other sciences. Only two other departments at UNM have more than the national average of instructional spending: Anthropology and Political Science.

Table 5. Comparison of Instructional Expenditures per Student Credit Hour among Science Departments for Fiscal Year 2004/05. Source: 2005 Delaware Study of Instructional Costs and Productivity

Department	National for Carnegie Research Universities	UNM Peer Institutions	UNM
Biology	\$203	\$219	\$194
Chemistry	\$221	\$265	\$157
Geological & Earth Sciences	\$225	\$207	\$262
Physics	\$234	\$291	\$208

Table 6. Comparison of Student Credit Hour Production per FTE Faculty Member among Science Departments for Fiscal Year 2004/05. Faculty Include Tenure-track Faculty, Nontenure-track Faculty, and Teaching Assistants. Source: 2005 Delaware Study of Instructional Costs and Productivity

Department	National for Carnegie Research Universities	UNM Peer Institutions	UNM
Biology	246	223	233
Chemistry	241	232	260
Geological & Earth Sciences	202	187	229

The Biology Department teaches more student credit hours per faculty FTE than our peer institutions, but this is also the case for other science departments at UNM (Table 6). We are able to do this because we have hired lecturers to teach the large sections associated with our non-majors courses. These lecturers have higher teaching loads than tenure-track faculty.

We are particularly interested in the ratio of majors to faculty members at our peer institutions. The data we have gathered suggest that our ratio of majors to faculty is high, even for a biology department (Table 7). This affects our ability to provide small, upper-division courses for majors and to provide significant research experiences to more than a small fraction of our majors.

Table 7. The number of Biology Faculty, Majors and the Ratio of Majors: Faculty at some of UNM's peer institutions.

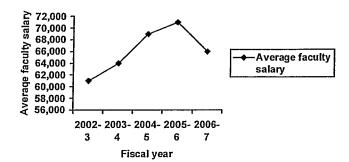
University	Number of Tenure- track Biology Faculty	Number of Biology Majors	Ratio of Biology Majors to Faculty
UNM	35.5	1,348	38
University of Iowa	36	717	20
University of Utah	43	800	18.6
University of Missouri	42	1,050	25
University of Oklahoma–Zoology	35	1,000	28.6

The ratio of biology majors to faculty would be lower if we included lecturers in the counts. We have not done this for two reasons. First, we do not have comparable data for the other institutions cited. Second, and more important, for most of the lecturers, the primary role is in the non-majors curriculum. Of the 8.5 lecturers currently in the department, five never teach majors courses, one teaches primarily majors courses, and 2.5 teach half of the time in majors courses. So, the number of lecturer FTE's that could be assigned to the major's curriculum is 2.25. Adding that number to our tenure-track faculty produces a faculty: majors ratio of 36.2, still well above that of other institutions. Also, the lecturers, while helping to teach courses, cannot provide space in research labs for our students.

Salaries: Average faculty salaries at UNM remain below those of our peer institutions. A 2006 study done by the New Mexico Secretary of Higher Education indicated the following gaps in total compensation for UNM faculty: -\$18,000 for professors, -\$7,000 for associate professors, and -\$6,000 for assistant professors. Thus, as has been the case for many years, the longer a faculty member stays at UNM, the greater the compensation gap becomes.

Average faculty salaries in the Biology Department actually decreased in the last year (Fig. 22), because of the retirement of more highly paid faculty and their replacement by new faculty at lower salaries.

Figure 22. Average faculty salary in the Biology Department for the last five years.



In 2006–2007, the average faculty salary was \$65,944. As a comparison from one of our peer institutions, in the same year, the average faculty salary in the Molecular, Cellular and Developmental Biology Department at Colorado University–Boulder was \$87,128, and it was \$88,308 in Ecology and Evolutionary Biology at the same institution. In all three departments, lecturer salaries were included in the averages.

RECENT PLANNING EFFORTS IN BIOLOGY

The most recent faculty retreat, held on March 5-6, 2004 at the Sevilleta LTER Field Station, was attended by 28 faculty members. The retreat focused primarily on planning for faculty hires and started with the following questions:

- 1. Do we want to grow?
- 2. Do we want to develop new areas?
- 3. Do we want to instead emphasize solidifying our existing areas?
- 4. Do we want to focus hires and develop a smaller number of concentration areas or do we want to remain broader? (See Appendix O for more details.)

Discussion ranged from budgetary issues, the need to consider special hiring opportunities that leverage large funding programs, the need to hire faculty that builds on our strengths and bridges between programs, the need to improve faculty diversity, and to consider the interests of our junior faculty.

A list of desired hires, in no particular order, included: animal evolution and behavior ecology; genetics of collective behavior; traditional "ologies"; an evolutionary developmental



biologist; a functional morphologist; cell biology; ecological genomics; stress physiology; plant developmental biology; and insect biology.

Since then, we have actually hired: two faculty members for the CETI Program; an ornithologist and an entomologist who are also museum curators; three ecologists and one evolutionary biologist who were special hires; and a mathematical biologist hired through the new B.A./M.D. Program. Currently, a cell biology faculty search is in progress. The lack of correspondence between the list generated at the retreat and the actual hires comes from the lack of new lines for hiring and the need to take advantage of special hiring opportunities to maintain faculty numbers.

In Fall 2004, the department was asked to plan around the themes of Success, Excellence and Distinction for an initiative in the College of Arts and Sciences (See Appendix O for complete reports). The first two themes related primarily to our educational mission.

The Plan for Success focused around our core curriculum. Goals to have automatic prerequisite checking and to have a permanent, full-time line for our staff advisor have been met. A proposal to require our students to take the Biology GRE for outcomes assessment (The Major Field Achievement Test is a more affordable alternative.) was not funded, and we are still searching for ways to assess the majors' curriculum.

The Plan for Excellence considered our needs for new teaching space (which is now available), for a new staff member to help guide students to field and laboratory experiences, for more modern equipment for teaching labs, for the desire to offer more small courses at the 300- and 400-level, and for more advising staff. We were able to raise the advisor line to full time and are purchasing some new equipment from our course-fees account. No university resources have been available to further these plans.

The Plan for Distinction discussed our faculty productivity and considered comparisons to other institutions. One goal is for the ecology, evolution and behavior program to reach the top 25 in the next NRC ranking, due this summer, and to retain that ranking in 2015. The data are in for the current ranking, but we lack specific plans to retain our rank. Concerns for the future centered around renovating current space and gaining new space and improving faculty salaries. There also were concerns about the declining graduate applications While we are making progress in obtaining new space, we need support from the university to address our concerns about salary.

CONCLUSIONS

The Department of Biology at UNM remains strong, contributing in major ways to the educational, research and service missions of the university. As in all previous reviews, our strength comes from the efforts of our faculty to work within the considerable constraints of low funding levels from the state and enormous demand for our courses. We are proud of our strengths, but have important concerns.

We are proud to have completely revised the core sequence for our majors in response to assessment of the program and of learning objectives. We are concerned about the coordination of the upper-division curriculum and about development of a new assessment plan.

We are proud of the strong non-majors courses built by our new cadre of lecturers. We are concerned about providing a career ladder for these valuable faculty.

We are proud of our graduate students and of their success in careers after leaving UNM. We are concerned about declining graduate admissions and are seeking ways to increase recruitment effort and success.

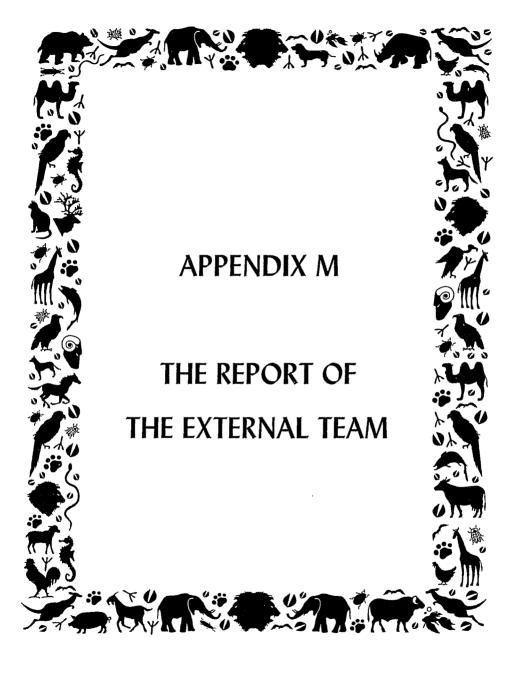
We are proud of the accomplishments of our faculty, but are worried that numbers of tenure-track faculty have not increased significantly in more than a decade. Should we be able to increase faculty size, we need to think carefully about the organizational structure of the department.

We are proud of our strong reputation in ecology and evolution and our growing expertise in other areas. We are worried about maintaining the reputation we have, while also developing in other areas.

We are proud of our continued success in securing grant funding. The direct funds allow us to accomplish our research goals and those overhead funds that are returned to the department allow us to support faculty and staff. We are worried about the national climate for research funding and the potential for reallocation of overhead funds within the university.

We involve many undergraduates in research, but could do more if both the number of faculty and the amount of research space were increased.

We are delighted that space was renovated for the Museum of Southwestern Biology in the CERIA building and that our basement was renovated extensively to provide new teaching space. We are looking forward to building a new addition to our building that will add faculty research space. We still need to find funding for further renovation and maintenance of our existing space.



University of New Mexico Department of Biology Academic Program Review

April-May, 2008.

Report of the External Review Team

(Dr. Christopher Bayne, Oregon State University, Dr. Candace Galen, University of Missouri, Dr. George Uetz, University of Cincinnati, and Dr. Patricia Crown, University of New Mexico, Anthropology)

Executive Summary

Assessment of Program:

The overall quality of the UNM Biology Department is very good, although somewhat uneven from a sub-disciplinary perspective. The department has a strong reputation for its program in Ecology, Evolution, Organismal, and Behavioral Biology (EEOB), but other areas (e.g., Integrative Biology, Cellular and Molecular Biology) have not yet reached this same level or are just emerging as foci of potential excellence (e.g., CETI). Although the EEOB group is smaller than those at some larger research universities (with dedicated EEOB departments), it compares very favorably, and in our judgment is nationally competitive based on well-recognized senior faculty members, strength in publications and grant support, and research resources such as the Museum of Southwestern Biology and the Sevilleta Long Term Ecological Research (LTER) site.

The department offers a wide array of courses for undergraduates, and the program currently includes 1300 biology majors. A recent increase in course registration speaks well of the department and the health of the discipline, but constitutes an instructional burden that has surpassed resources and strains infrastructure. Graduate level courses are more diverse in some sub-disciplines, with more faculty in some areas (EEOB) than others (CMB, Integrative Biology), but this is to be expected in light of existing faculty expertise. Graduate students commented favorably on the free and open nature of communication across sub-disciplines and on the accessibility and helpfulness of the faculty. The department has sought funds for increasing the diversity of its student body, and their exceptional success in obtaining funding for both undergraduate and graduate programs speaks to their commitment and is a notable aspect of this unit.

Our conclusion is that the UNM Biology Department has a dynamic, interactive, and creative faculty and student population, with a strong commitment to excellence in education and research. Research by departmental faculty, postdoctoral fellows and graduate students addresses fundamental issues across a broad spectrum of disciplines, ranging from basic ecology, environmental quality and conservation biology to biomedical science and tropical medicine. The Department has done exceedingly well with static investment and unstable administrative leadership in the past decade or more since its last external review, attesting to the strength and vision of its faculty. The Department's short and long term goals are appropriate and reasonable, deserving of immediate attention and increased investment by the UNM administration.

Recommendations:

The department is at a critical juncture in its development. Increases in the numbers of majors and in enrollment in service courses have fueled curricular needs which, along with a lack of critical mass, necessitate hiring more faculty in Cellular and Molecular Biology (CMB). At the same time, impending retirements of senior distinguished faculty in EEOB threaten loss of the department's national prominence in its major area of excellence. Ideally, growth needs to be strategic and forward-thinking (i.e., hiring ahead of imminent retirements), and vision-driven rather than opportunistic (i.e., hiring should not be related only to retirements). Continued faculty growth is critical for several reasons: a) sustained prominence of currently outstanding programs (e.g. EEOB), b) achievement of critical mass in CMB, and c) integration of the different sub-disciplines within the department to achieve overall excellence.

Modest new growth, by 3 or 4 new tenure-track FTEs and one-to-one replacement of retiring faculty in the short-term, is advisable for the reasons stated above. Possible "cluster hires" at the senior/associate level (rising stars) are key to sustaining prominence and building on strength in EEOB, and rapidly infusing new energy and attracting graduate students to CMB. Such cluster hires should be strategic, focused on key disciplinary areas (e.g., behavior) that can be approached at multiple levels of biological organization (e.g., ecological/evolutionary, integrative, and cellular/molecular). One such hire, if strategically defined and possibly linked to a retirement replacement, could serve the additional need for a Faculty Director of the Sevilleta Field Station.

Growth in undergraduate demand for the department's courses, both for majors and non-majors, needs to be addressed. While some grant-supported programs support additional staff for enhancing the diversity, success and retention of students, the high numbers of majors creates student advising needs that exceed resources of existing staff. We recommend that (i) additional funding be directed to staffing the need for student advising, and (ii) the creation of a peer-advising program involving students. Additional staffing in the area of IT support is also advisable for enhancement of student advising, graduate student recruitment and faculty research support.

During our visit, three emerging problems came to our attention, which we believe deserve an immediate response from the administration. 1) An ongoing search in CMB should be encouraged to proceed with an offer to the second candidate if the first offer is turned down. 2) Over the past decade, internal UNM support for Biology and its programs (non-salary I & G funds) has been declining, owing to static budgets, shortfalls and additional "taxes" levied across the university. As a consequence, the department has had to rely to an ever-increasing degree upon indirect cost returns from grants (F & A distribution). This committee is concerned by recent actions to freeze and/or divert accrued F & A funds from the department back to the central administration, as cutting off these funds in the short term would have dire long term consequences. 3) Faculty efforts to win grant support funding are not facilitated by existing policies in the Office of Sponsored Project Services. Access to support for grant submission should be streamlined, and lead times for obtaining OSPS approval prior to submission deadlines need to be meaningfully reduced. Additional recommendations for addressing current issues and goals for future development may be found throughout this document.

Introduction

The Review Team [Dr. Christopher Bayne, Oregon State University, Dr. Candace Galen, University of Missouri, Dr. George Uetz, University of Cincinnati, and Dr. Patricia Crown, University of New Mexico, Anthropology] visited the UNM Biology Department and several UNM Administrative Offices on April 8-10, 2008. We thank staff, students and faculty members of the Department, and representatives of the UNM Administration who gave of their time to make our 2 ½ days on campus an informative and productive visit. We offer the following assessment and advice for consideration by departmental and administrative stakeholders, who aim to build on the educational and scholarly achievements of the Biology Department including those of the Museum of Southwestern Biology.

I. Overall quality of the unit.

Contemporary biology is an extraordinarily diverse discipline, encompassing the living world from the sub-cellular to global scales. The overall quality of the UNM Biology Department is very good, but somewhat uneven from a sub-disciplinary perspective. The Center for Measuring University Performance 2007 report [http://mup.asu.edu/research.html] ranks UNM (entire institution) at the threshold of the top 100 (tied for 105) among the top 200 U.S. research universities rated overall. UNM compares more favorably with its peer public institutions; it ranks 44th nationally among the 200 top state-supported research universities rated. While the 2008 National Research Council discipline-based rankings are not yet available, such a detailed analysis by disciplines would likely reveal a higher ranking for UNM Biology among Ecology, Evolution and Behavior departments. How well this position is maintained, and/or how high the UNM Biology Department will rise in the future clearly depends on an infusion of new resources from the administration. The Department has done exceedingly well with static investment and unstable administrative leadership in the past decade or more since its last external review, attesting to the strength of its faculty and its vision in building a world renowned program in Ecology, Evolution, Organismal and Behavioral biology (EEOB). Bringing other aspects of the Biology program, particularly in Cellular and Molecular Biology (CMB), to this same high level will require substantial investment from the UNM administration. While no modern biology program can effectively fulfill its mission without some balance in its representation of its subdisciplines, the successful recruitment of new faculty in CMB now entails high start-up costs in comparison to those needed for organismal biologists.

II. The unit's contribution and mission as related to the strategic directions of UNM.

To address this issue, we used President Schmidly's "Strategic Framework for 2008 and Beyond".

Strength through Diversity.

The Biology Department has sought and received funds for increasing the diversity of its student body. Their exceptional success in obtaining funding for support of programs at both the undergraduate and graduate levels speaks to their commitment to diversity and is a notable aspect of this unit. They have secured major federal grants from NIH (IMSD, MARC) and NSF (URM, REU-sites, SEEDS and GK-12

Programs) to increase the numbers of competitive under-represented minority students in biology. The Biology Department has a higher than average percentage of minority undergraduate students in their BA program. At the graduate level, the department has graduated ten minority Ph.D.'s in the past three years, an impressive record, especially in light of the negligible support forthcoming from the Graduate School to support minority recruitment. However, minority representation is especially low among faculty (~10% and well below percentages in New Mexico at large) a deficit that is likely to have substantial negative impact on retention of minority undergraduates and attraction of top minority graduate students. Future hires should encourage more diversity among faculty and should aggressively pursue special opportunities to bring in outstanding minority candidates whenever possible, with strong backing from the College of Arts and Sciences and the UNM administration.

· Student Success through Collaboration.

The Biology Faculty does an exceptional job in working collaboratively with undergraduate and graduate students to provide research experiences. Undergraduates participate in research by volunteering in labs, engaging in workstudy positions, taking advantage of regular student employment positions and independent study opportunities, and of opportunities within the Biology Honors program. The Department should make every effort to track the number of students engaging in research. As elaborated above, the department has external funding for several undergraduate research and training programs and efforts to garner these funds have been well supported by the UNM Office of Research.

Vital Academic Climate.

The Biology Department has a dynamic, interactive, and creative faculty and student population. The graduate students in particular commented on the free and open nature of communication across sub-disciplines within the Department and on the ease of obtaining help from any faculty member or student. Recent building expansions have been planned to facilitate interactions that optimize the academic climate. New developments that enhance the academic climate within the Department of Biology include efforts of Research Faculty and Teaching Faculty to develop a defined reward system for accomplishments and provide a clear road map for advancement, paralleling those of the tenure track system. These efforts should be encouraged and facilitated by departmental and university administrators. One weakness in the Biology Department that is an impediment to the provision of a Vital Academic Climate is the lack of a first rate departmental Web Site. Web resources can enhance the academic climate by expediting the sharing of knowledge, skills and resources among labs, offices and programs, and the dissemination of news on departmental and individual accolades and opportunities. Additional staffing in the area of IT support, for student advising, graduate student recruitment and faculty research support is recommended. These functions enhance access, performance, collaboration and pride.

Excellence through Relevance.

The undergraduate program currently includes 1300 biology majors. It is, if anything, too successful at attracting students. However, the actual numbers of students

graduating with BA or BS degrees in biology each year hover around 200, indicating that many students either drop out or choose another major prior to graduation. Unfortunately, there are no data available for tracking career choices or post-graduate training for graduating students. The graduate program is nationally recognized in behavior, evolution and ecology, but has not achieved such recognition in cellular and molecular biology. These areas of biology will remain relevant throughout the 21st century and beyond. The number of applications to the graduate program has been falling in recent years, but this may be a national trend. Stronger interdisciplinary ties to health science programs across campus (i.e. in the Medical School) could promote graduate recruitment in biomedical sub-disciplines, enhancing the Department's relevance to health care and the quality of life for citizens of New Mexico. For example, an active group in the Department of Biology works on evolutionary genomics of Hantavirus and would benefit from such linkages.

· Research for a Better World.

Research by UNM Departmental faculty, postdoctoral fellows and graduate students addresses fundamental issues across a broad spectrum of disciplines, ranging from basic ecology, environmental quality and conservation biology to biomedical science and tropical medicine. Given the strength of this biology department in Ecology and Evolution, it is important to note that 'ecosystem services', a major thrust of contemporary research in EEOB, connect directly to human health and wellness. Relevant scholarly work within the department includes research on the determinants of structure in the southwestern landscape, efforts to document the biodiversity of the region and to better understand how tropical parasitic diseases are transmitted to humans, Major contributions to these efforts are made by faculty with appointments in Biology and the Museum of Southwestern Biology. The Sevilleta Long Term Ecological Research (LTER) site and the new Sustainability focus are crucial to these efforts. Additionally, research by faculty in the department's Center for Evolutionary and Theoretical Immunology (CETI) is closely tied to biomedical issues of global significance. Campus leadership to nurture these interdisciplinary programs and help build linkages to other strong units with complementary strengths (e.g., Anthropology, Medical School, Bio-engineering, and Pharmacy) could facilitate synergistic growth.

International Engagement.

Departmental faculty, postdoctoral fellows and graduate students are engaged in international efforts to solve fundamental issues in conservation biology and tropical parasitology. These run the gamut from bacteria in Antarctica to infectious diseases in Australia's platypus, human blood flukes in East Africa, and to indigenous plants of southern Africa. The University Administration could build on these endeavors by strengthening departmental resources that foster international collaboration. In this regard, the Sevilleta LTER and the Museum of Southwestern Biology are notable. Both units offer obvious platforms for comparative studies at international scales and for bridging to long-term studies of similar ecological communities in other regions of our planet. University administrators could build on these assets by providing seed money for international conferences on desert systems hosted by Sevilleta or the Museum and, in the case of Sevilleta, by endowing a senior faculty position that would attract a scientist with an active international research program to serve as director. Continuing

endorsement of the department's Center for Evolutionary and Theoretical Immunology will also be consistent with these goals.

III. Impact and visibility of instructional programs.

The Biology Department offers a wide array of courses for undergraduates, and these are given ample visibility both on-line and in the UNM Catalog. Recently revamped introductory courses (Bi 201 and 202) attract growing numbers of students, from which one can infer that 'visibility' is more than adequate.

Graduate level courses are more diverse in those sub-disciplines (i.e. EEOB) with highest faculty representation. Since graduate students consider communications with faculty to be excellent, it is reasonable to infer that, as graduate programs are tailored for individual students, relevant courses are effectively brought to their attention.

The Department began (Spring 2007) an effort to collect data on course impacts (and more) from students, using UNM's "Opinio" system. If extended to additional courses, this promises to be an excellent tool for future planning, such as modifying course syllabi and other components of the curriculum. Reflecting a need we discuss elsewhere, 45% of Bio 201 students responding to the 2007 survey indicated that they had not yet seen an academic (Biology) advisor; this is unfortunate, but – given the present level of staffing - predictable.

IV. Profile and distinction of faculty and students,

The tenure-track faculty members of the UNM Biology department represent three basic areas (sub-disciplines) of Biology, although with varying degrees of academic breadth, depth and overall strength.

- a. Ecology, Evolution, Organismal, and Behavioral Biology. Although this group is smaller than those at some larger research universities (such as those with dedicated EEOB departments), the UNM group compares very favorably, and, in our judgment, is nationally competitive (likely within the top 25% of peer EEOB groups). This is based on several strengths:
 - i: Well-recognized senior faculty members, with 3 eminent scholars (one member of the National Academy of Science Brown).
 - ii: Overall faculty strength in publications and grant support.
 - iii: Vital resources for research: specifically the Museum of Southwestern Biology and the Sevilleta Long Term Ecological Research (LTER) site.
 - iv: Success in graduate recruitment: nearly 80% of the departmental graduate students are in this area.
 - v: The department has made several outstanding new hires in this area, and attracts a large group of new talent in post-docs and research faculty.
- b. Integrative Biology, Comparative Immunology and Parasitology. A second area of strength is found in the Center for Evolutionary and Theoretical Immunology (CETI).

Through this program, the department has been able to recruit outstanding faculty nationally and internationally. Because of its broad and interdisciplinary nature, this group also serves as a natural bridge to other programs including Medicine, Mathematics, and Computational Biology.

c. Cellular and Molecular Biology. This focus area, an important part of contemporary Biology departments, lacks critical mass. This is evidenced by a smaller complement of faculty and low graduate enrollment. Several individuals in this area maintain highly visible and productive research programs that are well funded. Bringing this area up to the level of peer institutions will take a significant infusion of resources for recruitment of new faculty, including funds to equip new labs to enable competitive research. While such a recruitment program may well be a challenge for UNM, a minimum of three new faculty in strategically chosen areas is advisable in order to meet needed curricula and to knit together related, existing strengths.

V. Student Success and Learning Outcomes

It is practically impossible for a group of outside visitors to assess the quality of instruction, other than its scope. All one can do is note the obvious: that the quality of instruction is the direct consequence of the quality of the instructors (generally high) and the quality of the infrastructure (lecture rooms and course supplies, among which qualities vary).

The absence of data on where former students have gone and what they have done after graduating from UNM makes it futile to attempt a meaningful analysis of student success. The Department recognizes this and indicated that it is their intention to try to track student movements in the future. This responsibility could be assigned to a new FTE staff member associated with IT in the Department.

The following suggestions are designed to help the faculty facilitate student success.

- Biol 500 (Graduate Seminar) should be revamped to include strategies for thriving in graduate school, and should include submission of a research proposal for funding. A higher proportion of the graduate students should have external fellowships and grants; they are capable of this.
- To improve competitiveness in graduate recruitment, the policy of raising pay for Teaching Assistants/Associates at 8% annually needs to be continued over at least 3 years. To avoid creating a group of 2nd class graduate students, the pay rates for Graduate Assistant need to be brought up to those of TAs and RAs, even if this occurs over 2 or 3 years.
- There should be an assessment of the merits and demerits of a technology fee to
 fund computing infrastructure, hardware (including upgrades), software (including
 upgrades) and help/support (perhaps this is more appropriate at the college or
 university level).
- "Research Day" as it is currently run may be a missed opportunity. Other
 institutions of Higher Education use such a day to advertise the diversity and
 quality of opportunities for prospective graduate students who are being

recruited. This would require a calendar change, from mid-April to (perhaps) December/January. By making this change, the faculty would demonstrate to administrators the importance of recruitment. Limited additional funds are required for meeting some of the expenses of bringing prospective students to campus for 2 days including the specified Research Day.

 New UNM initiatives at the Rio Rancho campus would seem to present Biology with opportunities to acquire infrastructure that better supports at least their lower division courses. Pro-active engagement in planning for that campus is advisable

VI. Contributions to other academic units and collaborative initiatives.

A large NIH-supported program based in the Department (The Center for Evolutionary and Theoretical Immunology, ES Loker, PI - http://biology.unm.edu/CETi/people.htm) extends its umbrella to include The Los Alamos National Laboratory and the Santa Fe Institute, and includes people in several UNM departments including Statistics and Computer Science.

The Department also serves as home for the Program in Interdisciplinary Biological & Biomedical Science (James Brown, PI - http://pibbs.unm.edu/). This is a collaboration among the Departments of Biology, Computer Science, Physics, Math and Statistics, the Los Alamos National Laboratory (LANL), and the Santa Fe Institute (SFI).

UNM is fortunate to have faculty with interests in taking the initiative to seek support of this nature. Such efforts should be encouraged and rewarded.

VII. Community service and experiential learning opportunities.

The Biology Department engages in substantial outreach to the local community through several mechanisms. These include collaboration with the Dine' (Navajo) College and Southwestern Indian Polytechnic Institute to provide research training in Biology for under-represented minorities (NSF-funded URM Program, UNO); unparalleled curatorial expertise in biodiversity and natural history within the state of New Mexico through the Museum of Southwestern Biology; and several K-12 education programs housed at the Sevilleta LTER (e.g., NSF-funded GK-12, a School Yard LTER program); participation in the Ecological Society of America's SEEDS program, and a new, promising program in Urban Sustainability.

The external review committee was very favorably impressed with the caliber of outreach by Biology faculty and graduate students. Our only suggestion would be to advertise these outstanding programs more effectively to state legislators and the public at large.

VIII. Opportunities for Further Development.

The Biology Department has several unique opportunities for enhancing its stature as one of the leading research and education units at UNM and in New Mexico at large.

 First, the university should support strategic hires that take advantage of both current excellence and unique resources. A case in point would be the funding of an endowed chair in conservation with responsibilities including Directorship of the Sevilleta LTER Station.

- Next, the university should invest resources at the faculty recruitment level that parallel and complement the Department's success in diversity recruitment and training at undergraduate and graduate levels.
- At the level of undergraduate instruction, the Review Committee urges the Biology Department to think creatively about how to best take advantages of new teaching facilities and resources coming on board at the Rio Rancho Campus.
- The Department should build on interdisciplinary partnerships (e.g., CETI, PIBBS) to recruit new faculty in Cell and Molecular Biology thereby bringing the critical mass in that sub-discipline over the sustainability threshold.

IX. Appropriateness of departmental short and long-term goals.

The Department's short and long term goals are appropriate and reasonable.

- To maintain their reputation in ecology and evolutionary biology, and continue to build their reputations in comparative immunology and cell/molecular biology.
- To use their new space to promote new research initiatives and enhance research strengths.
- To ensure continued access to a fair share of overhead funds, a goal we strongly
 urge the university to meet.
- To attract top graduate students through competitive stipends. [This is a problem throughout the university and must be addressed if this department is to maintain its current prestige and reputation.]
- To continue work on their undergraduate curriculum and involve even more undergraduates in faculty research labs.
- To increase faculty and student diversity.
- To emphasize <u>skills</u> in science as a complement to the <u>content knowledge</u> that has traditionally characterized undergraduate curricula.
- · To improve faculty salaries.
- To develop partnerships that improve K-12 education and enhance interactions across campus.
- To acquire more staff to help with the research, teaching, and service missions of the Department, particularly to (i) enhance undergraduate advising and (ii) supply expertise in web page design and management.

 To provide more career development and mentoring for non-faculty staff, research faculty, and graduate students.

These are all important and relevant goals. They represent the strategic goals typical of Biology departments at many universities throughout the country. Below, we discuss concerns and recommendations that pertain to departmental goals.

X. Questions raised in departmental self-study.

As part of our charge in reviewing the self-study from the department, we were asked to consider five questions.

1. The first question we were asked to consider is *how the department should grow, and whether growth would require division by sub-discipline*. We consider that continued growth is critical for three reasons: a) sustained prominence of currently outstanding programs (e.g. EEOB), b) achievement of critical mass in CMB, and c) integrating the different sub-disciplines within the department thereby achieving overall excellence. Modest growth (by 3 or 4 new tenure-track FTEs, and one-to-one replacement of retiring faculty) in the short-term is advisable for the reasons stated above.

Growth in faculty size need not lead to division into a putative alternate 'structure' (i.e., two departments). The present status is preferable (and has been arrived at through years of careful, sustained self-assessment and numerous decisions). Division into separate departments should not be considered until and *only if* a substantive number of individual faculty members demonstrate that their interests cannot be represented adequately within the extant departmental leadership structure (that is itself flexible).

Recommendations – faculty growth. In envisioning the support needed from UNM we see that:

- Possible "cluster hires" at the senior/associate level (rising stars) are key to sustaining prominence and building on strength in EEOB, and rapidly infusing new energy and attracting graduate students to CMB. Such cluster hires could be strategic, in that they could be focused on key disciplinary areas (e.g., behavior) approached at multiple levels of biological organization (e.g., ecological/evolutionary, integrative, and cellular/molecular). One such hire, if strategically defined, could potentially serve the additional need for a Faculty Director of the Sevilleta Field Station.
- Growth should not come at the expense of efforts to retain talented middle-rank and senior faculty. This is likely a university-wide issue. The University is advised by this committee to rapidly implement a plan to alleviate salary compression especially for the most egregious cases at the senior and midcareer levels.
- 2. How can the department *ensure maintenance of quality of its programs*? The department is at a critical juncture in its development. Increases in the numbers of majors and in enrollment in service courses have fueled curricular needs, which along with a lack of critical mass necessitate hiring more faculty in CMB. At the same time, impending retirements of senior distinguished faculty in EEOB threaten loss of the

department's national prominence in this, its major area of excellence. Ideally, growth needs to be strategic and forward-thinking (i.e., hiring ahead of imminent retirements) and vision-driven rather than opportunistic (i.e., hiring should not be related *only* to retirements).

Concerns and recommendations – maintenance of program quality. In order to retain the department's reputation for excellence in EEOB, we suggest the following:

- A major concern expressed to us is the impending loss through retirement of several prominent senior faculty in behavioral ecology. One way to address this concern would be to hire in advance of impending retirements, as part of a series of planned "cluster hires". A cluster hire in the behavior area might include:1) a senior eminent faculty member in ecology/evolution of behavior, 2) a "rising star" in integrative biology of behavior, e.g., a neuroethologist or behavioral neuroendocrinologist, and 3) a promising junior faculty member in an emerging area of behavior-related research at the cellular-molecular level, e.g., behavioral genomics, neurogenomics, neuro-cognitive brain function, etc.. This type of hiring plan would address several pressing issues simultaneously, and facilitate development of synergy and integration among sub-disciplines.
- Competitive set up packages are essential: in 2008, \$500K should be seen as a starting point for competitive set up packages in CMB.
- Growth in EEOB should capitalize on the outstanding LTER which is a unique resource for UNM: for example, an endowed chair that ties the directorship of the Sevilleta Field Station to a new faculty line in Biology.
- Because of lack of IT support, the department's accomplishments and strengths
 are not well advertised. This is an issue that is in all likelihood reducing graduate
 application rates and reducing the visibility of the biology program to state
 shareholders (legislature etc.).
- 3. Should the department continue to add majors, or (alternatively) raise criteria for entry and retention ("success")?

Recommendations –growth in the numbers of majors. The committee recommends a policy allowing natural growth while retaining existing expectations of Majors. If growth becomes excessive, only then should GPA requirements or other filters be implemented.

- Develop several emphasis areas for UG Majors in Biology, and appropriate advising documents and web pages that facilitate student access to these areas of emphasis in their degree programs.
- Hire at least one other full-time undergraduate advisor for the departmental staff;
 a single individual cannot provide advising for 1300 undergraduates.
- The University should provide resources to monitor student outcomes; this
 cannot be done with existing departmental resources.

4. Should the department cooperate with other departments wishing to collaborate? What criteria should be used?

Recommendations – interdepartmental collaboration. This has to be on a case-by-case basis, guided by collective good judgment. Wherever the benefit to the department and/or individual faculty research exceeds the cost in time and resources, it is worth considering. For example:

- Since critical mass does not yet exist for faculty in CMB and the faculty cannot
 offer a full spectrum of graduate courses that comprise a credible curriculum,
 cooperation with the College of Medicine might help. CMB faculty members
 should assess graduate level offerings and orchestrate these together with
 courses in other departments to constitute a graduate core for MS and Ph.D.
 students.
- A less desirable case might involve the Medical School gaining by increasing in numbers of minority students, whose 'credits' would then be losses to Biology.

There appears to be some interest among the faculty in potential opportunities to develop cross-disciplinary degree programs at the Master's level. There is a new trend toward "Professional Science Master's" (PSM) degrees at the national level [http://www.sciencemasters.com/], and UNM is uniquely positioned to offer several.

- The current undergraduate Conservation Biology program could be used as a basis for an expanded Master's degree. This has much potential to synergize with a newly-developed program in Sustainability (tailored to human occupation of the desert Southwest, and Native American philosophies/values that permitted such). This strategy would build on existing strengths and make the most of unique merits of this location. Opportunities for collaboration with other departments (e.g., Anthropology) are an important "value-added" aspect here.
- New initiatives for a Professional Science Master's degree program in Museum Sciences (in collaboration with other departments, e.g., Anthropology) should also be considered. As with a possible Conservation Biology Master's program, an effort should be made to synergize with the existing program in <u>Sustainability</u> (tailored to human occupation of the desert SW).

The responsibilities for these two initiatives would be likely be met largely by faculty within the Museum of Southwestern Biology and the LTER group. This would require adjustment of expectations and workloads, so that there is no conflict with curatorial responsibilities.

5. In the department's self-study report, what has been overlooked?

We were impressed by the thoroughness of the self-study, and commend the department head Sam Loker, Diane Marshall and others who contributed. In the document, we were surprised by the size of the departmental staff, the number of associated research faculty, and the group of lecturers teaching in the fundamental core and service courses. However, during our meetings with these groups, we learned of

frustrations unique to each of them. Addressing these issues would go far toward improving morale and increasing productivity.

Staff workload and morale – Concerns raised by departmental staff centered on increasing workloads resulting from expectations placed on them subsequent to their appointments. Some of this is due to institution-wide requirements of new software (Banner), some to the ever-expanding requirements for accountability in program management (meeting federal and state mandates), and resentment for what is perceived as reliance on the phrase in letters of appointment: "Other duties as assigned".

Recommendations - additional staff support

- 1.0 FTE support staff for preparation, equipment maintenance and coordination of 300 and 400-level undergrad courses.
- 1.0 FTE in IT + Web Page creation and curation. This individual will serve the needs of the department and its instructional programs, as well as have a significant allocation of effort in the Museum.

Student advising – Currently, there is a single undergraduate advisor. Even with help from several faculty, a single person in not adequate to advise all undergraduate majors in Biology. While some grant-supported programs support additional staff for enhancing the diversity, success and retention of both undergraduates and graduate students, the high numbers of majors create student advising needs that exceed those that can be met by existing staff.

Recommendations - student advising

 We recommend that (i) additional funding be directed to staffing the need for student advising, and (ii) there should be created a peer-advising program involving students.

Research Faculty and Lecturers – The academic mission and productivity of the tenure-track faculty is strengthened by the presence of talented and productive non-tenure track, associated researchers and educators. Both groups suffer from somewhat undefined status. This situation deserves attention – e.g., needs for space, standardized salary scales, promotion criteria etc. – as the morale, productivity and quality of the work of these two groups would clearly benefit from opportunities for career development.

Recommendations – Staff, Lecturers and Research Faculty. Staff, lecturers and Research Faculty need to be included in the department's affairs in a meaningful way, since they will play a role in its future development, and that development will impact them.

Each group should consider electing a spokesperson or representative who
would be charged with carrying forward their concerns to the departmental
leadership, and communicating departmental information to constituents.

- A defined career track should be developed, paralleling that for tenure-track faculty: e.g., Teaching Assistant Professors—Teaching Full Professors; Assistant Research Professor —Full Research Professor with salary increases commensurate with rank.
- Grants awarded to research faculty contribute F & A to the department and the
 university (up to 36%, according to the self-study). Federal grant agreements
 require that researchers be provided with the same basic support (office space,
 supplies, telephones, computers, internet, library access, clerical staff, etc.)
 made available to instructional faculty. UNM should ensure that it lives up to its
 agreements to provide all research faculty with these basics.
- When the Department of Biology develops a 5 year plan, institutional
 administrators including relevant VPs and the President should meet jointly with
 the department for a discussion of the plan with the aim of refining the document
 and developing means (actions) for the achievement of its goals within
 reasonable time lines.

XI. Additional Concerns and Further Recommendations.

Just as a demoralized group of faculty, students and staff will be less successful in their endeavors, a hopeful one will be more likely to perform at their highest possible levels. In spite of impressive accomplishments by all member groups in the department, impediments to achieving maximum effectiveness became evident to us as we talked with faculty, students and staff. Below we list such concerns and issues, and describe means to move beyond them.

Specific and urgent recommendations: During our visit, three emerging problems came to our attention, which we believe deserve an immediate response from the administration.

- A. An ongoing search in Cellular and Molecular Biology has identified two top candidates. At most peer institutions with which the committee is familiar, job offers would be made to both, considering that one candidate is a minority scientist of top caliber. At the very least, the search committee should be allowed to make an offer to the second candidate if the first offer is turned down.
- B. Budget considerations and F & A distribution. It is necessary to acknowledge that operating budgets for departments and programs can not be left unchanged year to year without lowering the quality and/or quantity of offerings/services including education and scholarship. Over the past decade, internal UNM support for Biology and its programs (non-salary I & G funds) has been declining, owing to static budgets, shortfalls and additional "taxes" levied across the university. As a consequence, the department has had to rely to an ever-increasing degree upon indirect cost returns from grants (F & A distribution). This is the major source of support for infrastructure, staff needs, set-up packages and cost sharing in the Biology Department. There is great concern among UNM faculty over the recent re-allocation of these funds at the university level, with the result of a reduction in the share available to the department. This committee is deeply concerned about recent actions to freeze and/or divert accrued F & A funds from the department back to the central administration, as cutting off these funds in the short term would have dire long term consequences. Related to this concern, good

financial stewardship should not be 'rewarded' by raiding 'carry-forward' funds within the Museum and elsewhere. We urge the UNM administration to make every effort to renew its financial support of the department as soon as possible.

C. Faculty efforts to win grant funds are not facilitated by existing policies in the Office of Sponsored Project Services. Staff within the OSPS may need to be reminded that they work <u>for</u> the faculty, not vice-versa. Access to support for grant submission by UNM PI's should be streamlined. Lead times for obtaining OSPS endorsements prior to submission deadlines need to be minimized. These are small but essential steps that UNM can take immediately to maintain its competitiveness for external funding.

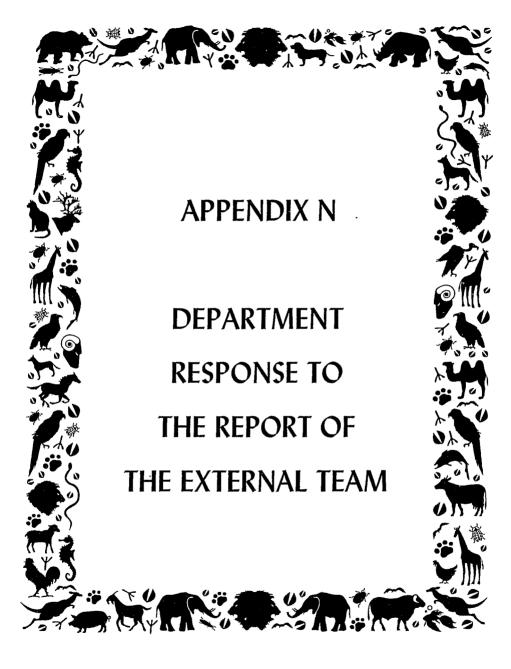
Additional recommendations addressing current issues and goals for future development.

Special mention needs to be made of the **Museum of Southwestern Biology**, which is a unique resource as well as an integral part of the department's programs.

- Through reappointments, and the Promotion & Tenure process, the Museum should demonstrate that curatorial work is valued as a scholarly endeavor. It is noted that Museum faculty spend a considerable amount of time meeting curatorial responsibilities, seemingly without workload credit equivalent to that of teaching.
- To facilitate responsible planning, the department is encouraged to share budget data with the Museum Director early in each fiscal year.

In looking toward the future of the essential partnership between the UNM administration and the Biology department, there are several key components worth considering.

- If, as has been suggested, the President acts to use a performance-based model for budgeting, the mechanism that will be used to fund initiatives for new components needs to be made transparent. The department's 'benchmarks' in grant income and scholarly publication rates should be assessed over a 5-year basis, rather than a year-to-year basis. The administration must also understand that graduate programs and research (the generation of new knowledge) are not always best valued in the context of a "business model" (i.e., as sources of finance), but as the essence of the academic enterprise and the fuel on which strong, high quality academic programs thrive.
- We commend President Schmidly's initiatives to raise the level of donor solicitation, including endowed chairs that reside in successful departments such as Biology. We hope that UNM will invest in new efforts to attract philanthropic donations; work with the Chair and members of the Biology department to define investments (Endowed Chairs, Fellowships, and infrastructure).
- UNM should continue to seek legislative funding for sustained momentum in enhancing and renovating campus facilities and buildings, as a mechanism to facilitate continued growth in research and nurture the excellent programs that are already in place.



University of New Mexico Department of Biology Academic Program Review

April-May, 2008

Departmental Response to the Report of the External Review Team

Including a Summary Response from the Museum of Southwestern Biology (MSB)

3 October 2008

A NARRATIVE SUMMARY OF OUR RESPONSE

The extensive recommendations presented by the External Review Team provide importance guidance for the continued excellence of the UNM Biology Department. The attached document details the departmental response to each recommendation. In addition, the Museum of Southwestern Biology, a separate administrative unit from Biology, but populated by Biology faculty serving as curators and with a long, intimate association with Biology, below provides their own summary response to the review.

In this summary, we focus on three key recommendations that: 1) encapsulate the most serious issues that threaten sustained excellence in the Biology Department and 2) require immediate and sustained assistance from the University administration to address.

The External Review Team clearly perceived the pernicious effect that the stagnation of faculty growth has had on the department. They strongly recommended a moderate and immediate increase in faculty size coupled with a plan to anticipate retirement of key faculty members in EEOB (ecology, evolution and organismal biology). In response to this recommendation, we present a hiring plan that is the result of careful, long-term planning by the department and which is in line with the department strategic plan. This plan consists of the recruitment of two new Cell/Molecular biologists (CMB), two new faculty members in support of the CETI (our NIH-funded Center for Evolutionary and Theoretical Immunology) renewal proposal if successful, and four hires in EEOB to replace distinguished faculty that are on the verge of retirement. In order to preserve the integrity of outstanding programs in the Biology Department, these hires need to take place over the next four years. If implemented, this plan will result in sustained prominence of the outstanding EEOB program, achievement of critical mass in CMB, and integration of the different sub-disciplines within the department to achieve overall excellence. In the absence of a commitment to these hires, it is the consensus of the External Review Team and the Biology Department faculty that excellence cannot be sustained.

The declining quality of applicants to the graduate program in Biology is a serious obstacle to improving the national standing of the Department, and several recommendations from the External Review Team focus on this issue. The Department can address some of these recommendations directly, but others require institutional support. In particular, we must continue to increase graduate student stipends by at least 8% annually for two more successive years as the single most important factor in attracting and recruiting superior students. In addition, the Department needs to mount a vigorous outreach program involving electronic and print advertisement, recruiting visits to campus, and active recruitment of underserved groups. Finally, the Department needs to stabilize funding for key elements of our infrastructure, including the Sevilleta Field

Station. These objectives can only be achieved with the administrative and financial support of the University.

The External Review Team identified significant shortcomings in student advisement, IT support, tracking and assessment of student success, and laboratory preparation for 300-400 level courses. The Department requires institutional assistance to address these important issues by recruiting another student advisor, an IT specialist, a part-time assessment person, and an additional person for lab preparation.

The External Review Team viewed the development of the Rio Rancho Campus as an important opportunity. The Department is eager to assist with the Rio Rancho development, but there are significant uncertainties about the effect of the new campus on research-intensive and higher-plane functions of the main campus. Until these uncertainties are discussed and clarified with the Administration, they will inhibit full Departmental participation.

Regarding the review team's bottom line assessment of the department as "very good", we are acutely aware as seasoned grant writers that the term "very good" means we have work to do, and we look forward to partnering with UNM's administration to strive towards achievement of the review team's suggested goals.

Acknowledgments: We would like to express our sincere thanks to our review team comprised of Dr. Christopher Bayne, Dr. Candace Galen, Dr. George Uetz, and Dr. Patricia Crown as the UNM member, for taking their task very seriously, and for providing feedback of genuine value to the department. We note that our review process took place at an extraordinary time in UNM's history and we greatly appreciate both the forbearance of our reviewers and their willingness to engage the department and the administration, often in a very spirited manner, as a part of their duties. We also wish to thank Ms. Bessie Gallegos and Ms. Nancy Middlebrook for their skill in organizing the review.

A BULLET POINT SUMMARY OF IMPORTANT ACTIONS REQUESTED BY REVIEW TEAM

- Achieve critical mass in Cell/Molecular Biology (CMB) faculty by making competitive offers, undertake coordinated hires ahead of retirement of distinguished Ecology, Evolution, Organismal and Behavior (EEOB) faculty, hire outstanding minority candidates, strive to integrate, increase interdisciplinary approaches and favor international emphasis
- Improve career trajectories for Lecturers, reduce faculty salary inequities, value the work of MSB curators more
- For undergraduates, improve outcomes assessment and career tracking, develop emphasis areas
- For graduate students, increase and improve recruiting efforts (especially for minorities) and salaries, work with other UNM units to develop a CMB core, consider rearranging Bio 500 to make it more relevant, consider adopting a Professional Masters program, consider making Research Day more of a grad recruitment opportunity
- Regarding staffing, hire an IT person to help with recruiting and to update webpage, an additional student advisor is needed, somehow improve outcomes assessment and student tracking, more support staff for 300-400 courses is needed
- Other goals should be to improve outreach efforts, work with the
 administration to improve return of overhead funds and service provided
 by pre-award grant offices, accept the reality of Rio Rancho campus and
 use it to our advantage, do a better job with outside fundraising, be
 skeptical about the business model for running UNM, and continue to seek
 upgrades of facilities

BULLET POINT SUMMARY OF IMPORTANT DEPARTMENTAL RESPONSES

- Suggested faculty hiring plan in response to review and in coordination with departmental needs
 - 2008-2009: Cell/Molecular biologists #1 and #2
 - 2009-2010: CETI hire #1 (if funded); first EEOB distinguished hire
 - 2010-2011: CETI hire #2; EEOB hire #2
 - 2011-2012: EEOB hire #3
- Continue to increase graduate student stipends by at least 8% for two more successive years as the single most important recruitment tool, and improve our advertisement and outreach
- Staff needs to be met in priority of need
 - IT specialist
 - Another advisor
 - At least a part-time outcomes assessment person
 - Upperclass facilities manager and lab prepper
- And finally an appeal to our administration: we want to assist with the Rio Rancho Campus but do not let RR needs undercut the research-intensive and higher-plane functions of the main campus

A SEPARATE SUMMARY RESPONSE TO THE REVIEW FROM THE MUSEUM OF SOUTHWESTERN BIOLOGY (MSB)

As curators of the MSB, we felt the contributions of the MSB to the Department, the College, UNM, and the scientific community at large were severely underemphasized, making it difficult to advocate for our substantial needs. In part this was a consequence of the fact that one of the proposed members of the external review team, a museum specialist, was at the last moment unable to participate in the review. Some of the issues we would like to have seen raised are:

- The need for a full-time IT person is critical to maintain IT infrastructure, computerized security, and develop new systems to accommodate dataintensive curatorial programs in the MSB
- The need for recognition and encouragement at A&S and in the Department of MSB Faculty curators and staff efforts to develop crossdisciplinary undergraduate (e.g., UMEB, UNO) and graduate education and training programs (e.g., MSB-IGERT) that focus on recruitment, retention, and matriculation of top students, including underrepresented minority students and national merit scholars.
- Recognition of, and compensation for curatorial duties performed by Faculty Curators
- Summer compensation for Faculty Curators to acknowledge that curation is a 12-month job
- Recognition of substantial contribution of human resources and specimens to teaching, research and outreach missions of the Department and UNM.
- Emphasis of the fact that the MSB is the primary organization responsible for field courses and a academic concentration area in Conservation Biology
- Address the need for increased funds for operating expenses, especially in our newest divisions (Birds, Arthropods, Parasites)

DETAILED DEPARTMENTAL RESPONSE TO REVIEW

FACULTY GROWTH AND HIRING

Note that with one retirement and another faculty member on long term leave, we actually have fewer faculty in the department this year than last.

One of the major recommendations of the team was that it is important to achieve a critical mass of faculty in the area of Cellular and Molecular Biology (CMB), both for purposes of covering teaching demands and creating research synergies.

We agree wholeheartedly with this recommendation. This is why we had planned to make a CMB hire in this area in 2007-8, and had also planned another cell/molecular search in 2008-2009. We feel it is important to make both hires as soon as possible.

Permission to move forward with making offers to CMB candidates identified in our 2007-8 search, including a minority scientist was identified as a "specific and urgent requirement" by the committee. We are encouraged to aggressively pursue special opportunities to bring outstanding minority candidates whenever possible, with strong administrative backing.

We again wholeheartedly agree. It is for this reason that the administration's cancellation of our cell/molecular hiring process in 2007-8, particularly when an excellent minority candidate had been identified, was so discouraging.

Another major recommendation was to work hard to sustain prominence in Ecology, Evolution, Organismal and Behavioral (EEOB) Biology by making vision-based hires ahead of retirement of distinguished faculty working in this area.

We are in complete agreement with this recommendation. Let's get started! Our response to this question is not unrelated to the response to the following recommendation.

One suggested strategy was to proceed with a planned "cluster hire" that might, for example, consist of a senior, eminent EEOB faculty member, a rising star in integrative biology of behavior (neurotheologist), promising junior person in behavior-related CMB interface).

If we had assurance that resources were available to support such a concept, ahead of the retirements of the three distinguished professors, we would be happy to engage in the needed departmental discussion about such a cluster hire. Without the pledge for such resources, then

there is reluctance to spend a lot of time doing this, as it could be a conversation for which spirited disagreements exist. The specific cluster hire proposed has merit in that it recognizes that studies of behavior will increasingly have to be integrated with neurobiology, provides a logical way to introduce neurobiological studies to our department (long one of our shortcomings), and provides another way to integrate organismal and molecular approaches within our department. Whether this would be the specific approach taken to replace our senior EEOB faculty would however be a matter for specific faculty discussion.

A third major recommendation was to strive to integrate different sub-disciplines within the department to achieve overall excellence.

One of the fundamental operating principles for UNM's Biology Department for many years has been to foster cross-cutting approaches to Biology, one that knits CMB to EEOB. We agree in principle this is a smart way for us to continue to proceed. However, we can not do this simply by adding to the workload of existing faculty. Additional hires are crucial.

A recommendation of 3-4 net new tenure track hires as well as one-to-one replacement of retiring faculty was recommended, preferably with an emphasis on strategic cluster hires to enable synergies to develop.

In formulating a response to these requests, UNM needs to take into account that our hiring plan had already identified the hiring of two cell/molecular biologists to replace retired or absent faculty and that an impending submission of the COBRE CETI proposal if funded provides the opportunity to make at least two additional hires (comparative immunologist, parasitologist) and possibly support other hires, that serve as integrative positions with interests in both CMB and EEOB. Some overlap between the CETI-aided positions and the suggested three preemptive EEOB hires would be encouraged. Also, if it turns out that, as suggested, the preemptive EEOB hires are actually concluded before the three distinguished profs actually retire, these three hires would not be true "net new" hires and should not preclude actually making the three net new hires suggested by the review team.

The completion of the addition to Castetter Hall will allow for growth in size of the faculty in line with what was called for by the review team. It would be illogical for UNM to invest so much time and effort in construction of such a research facility if a concomitant increase in faculty to populate it was not also allowed.

In general, we implore UNM to adopt a solution that does not require intradepartmental strife to achieve these objectives. In other words, UNM needs to come up with net new resources to facilitate the mandated

increase in size of the Biology Department, rather than promoting warfare between biologists representing different parts of the spectrum. At a time when the research enterprise on UNM's main campus is hurting, we maintain that investing money in improving and growing the Biology Department by hiring outstanding faculty who are able to write competitive grant proposals is a smart strategy.

We are encouraged to nurture interdisciplinary programs to help build linkages and to strengthen departmental resources that foster international collaborations. The hire of an endowed chair in conservation biology with an active international program to serve as a director of the LTER (and field station) is encouraged.

Continuing departmental support for programs like PIBBS and CETI is consistent with goals to promote interdisciplinary and international approaches. The LTER, LTER network, and MSB also have strong roles to play here. Increased communication among major funded programs and perhaps pooling of resources is encouraged to bring more international scholars to New Mexico in more integrated and consistent ways (as for example in a distinguished lecture series, or for small conferences with international focus, preferably with multidisciplinary emphasis.

We need to make hires accompanied by \$500K start-up packages in CMB.

Agreed, that there is no point in attempting to make hires if we can not be competitive, and this is yet another reason why the unimpeded flow of overhead funds back to the units that generate them is so critical (see financing section below).

FACULTY DEVELOPMENT

We should develop a defined reward and promotion system for Lecturers and Research Faculty that parallels that for the tenure track faculty. This should include a clearer space allocation policy, promotion criteria, salary scales, election of a spokesperson, and provision of the same kinds of assistance afforded tenure track faculty.

We agree. Biology has been one of the most proactive units in all of UNM in this regard. We have developed a proposed plan for how to proceed in defining career tracks for Lecturers and have passed this agenda to the College for further consideration. We have a spokesperson appointed to function at the college level to help promote this agenda. We have implemented policies to try to bring both Lecturers and Research Faculty/Postdocs more into the departmental fold, and we are happy to continue to work on doing so. This includes provision of offices (should be more possible with new space coming on line) and basic facilities,

alternative opportunities for funding (as by teaching when grant funds are in peril), and having an opportunity to meet with the departmental administration to voice concerns and needs.

We need to alleviate low salaries and salary compression at mid- and seniorlevel faculty ranks.

An inspection of past Biology program reviews would reveal similar if not identical comments. Of course, yes, we agree and would love to see the resources made available to make such a plan a reality. Although we would be enormously grateful if such resources are forthcoming, and are loath to not accept any influx of funds to help with this matter, we argue that we need to proceed carefully with full departmental buy-in in a way fair to all faculty ranks. For example, it would potentially be catastrophic if the solution were to mostly ignore existing associate and full professor salaries and solve the problem only by hiring in new professors - assistants or otherwise - at salaries inflated by our current standards. Likewise, any solution that targeted the associate and full professors should be very mindful of our need to recruit promising junior colleagues.

Regarding MSB, curatorial work needs to be more valued.

Yes, no conceptual disagreement, and of course this requires new resources. This is because if teaching loads are reduced to accommodate the curatorial duties, as they should be, then there is a need for funds to hire additional professors to take up these duties. Simply sloughing these duties off on the existing faculty is not the solution. Also, this is not something that should be accomplished by hiring of additional Lecturers as there is a general feeling that our department has gone as far down this path as we should. As previously noted, there are a number of other departmental duties for which it could be argued that lightened teaching loads are required, such as advising or running the molecular facility. We need to be careful to keep these needs in mind as well. Finally, any solution here should take into account that the productivity of faculty/curators varies considerably, and that at least to start with, this is something that should be phased in starting with the most productive curators. We encourage a discussion with all the relevant parties that takes this broader set of issues into account.

UNDERGRADUATE PROGRAM

In response to the question of whether the department should continue to accept ever more undergraduates, or alternatively raise criteria for majors, the committee recommended a policy of "natural growth" and retaining current expectations, only later imposing filters if growth its excessive. We agree with this approach but the question becomes, "when does natural growth become excessive"? Note that we have twice as many undergraduate majors now as during the last review. At that time the number of majors per faculty member was already considered excessive.

We should develop several emphasis areas with appropriate advising and supportive web pages.

In principal we do not disagree, but then the question becomes, who will help us keep track of the extra administrative/advising burdens that will ensue? It is for this reason that we are not enthusiastic about pursuing this approach across the board. There may be some groups within the department, particularly where undergraduate enrollment is lower, for whom developing an area of emphasis makes immediate sense. However, we do not intend to require that faculty engage in this extra work Can we think about a course release for someone to work on this?

The department should make every effort to track the number of students engaging in research, graduating, etc., and more advising is needed.

Yes, this is currently one of the greatest shortcomings not only in Biology but across the entire UNM campus. We would love to be able to collect this data but without new resources to do this, given our staff is already complaining about the need to multi-task (see other parts of the report), the department can not in good conscience impose these tasks on anyone currently employed. It would be ideal to have a specific staff member assigned to this purpose, but as discussed below in the staff section, there are other urgent staff needs as well and we must guard against the temptation of having one person do too many things. For tracking alumni, it makes no sense for the department to develop its own data base and tracking system. This kind of system needs to be developed at the university level in a manner that adds departments to add a few questions for their former majors.

GRADUATE PROGRAM

Several recommendations were made, some requiring more resources. The resource-driven recommendations were: provide support for minority recruitment, increase the number of students with external fellowships, and keep raising grad student pay for two more years at 8% per year.

We agree with all these recommendations but have to figure out how to find the resources. We are willing to do our part but the UNM administration needs to provide leadership here, guided by the principle that graduate research is one of our most important priorities. Some funds can be provided from departmental resources (overhead or foundation

accounts) for minority recruitment (for example to support faculty travel to SACNAS) and RA support for an outstanding minority grad student. We can also consider providing supplemental funding to outstanding students to get them to come to UNM (provide them mini research budgets). Provision of more RA options to our students is critically needed. One of the best way to ensure this, particularly in a time when it is difficult to secure federally-funded scholarships, is through the mechanism of donation from private sources. We need to keep trying to find sources of private funding to support grad student scholarships.

We were very encouraged by UNM's recent decision to increase graduate student stipends and we need to follow up on this, exactly as recommended by our review team, with increases of similar magnitude over each of the next two years. Then, once this is achieved, we can't assume the problem is solved for another decade because our peers will also be increasing their stipends as well. Increased stipends will dramatically increase our competitiveness among our peers for recruiting excellent grad students.

We should assess merits and demerits of a technology fee to support computer infrastructure.

Our first response to this suggestion is that our students are not significantly limited by access to technology or computers and we are reluctant to impose any fees on them. Any upgrades needed should come from departmental resources. A technology fee was recently imposed on students across the university, although this fee has been used primarily to implement the new database system.

We should use research day as an opportunity to recruit grad students (change its timing to Dec/Jan). To go with this, funds are needed to bring students to campus.

We agree with the need to devote resources to recruit graduate students and to have some kind of communal recruiting process. We have always provided funds to bring in promising candidates and certainly intend to continue this practice.

With respect to changing the timing of Research Day to accommodate graduate recruitment, this would need to be debated among the faculty. One factor mitigating against this change is that it often takes our students most of the academic year to generate the results needed to present at Research Day. It is true that the presentations of Research Day would do much to encourage new students to come, but it would also add additional recruitment responsibilities to an event that is already pretty demanding for many of us, and could dilute or diminish student research efforts.

Note also that Research Day is equally important to graduate and undergraduate students. It is not likely that undergraduate students could be ready for a earlier deadline and it would be unfortunate to shut them out of this event. Perhaps a different kind of research event focusing on the work of lab groups could meet recruitment needs.

CMB faculty need to partner with other units of UNM (particularly to health science programs) to develop a more comprehensive program to serve as a graduate core in this area.

This is a good idea. It is also not a new idea and has been tried in the past. Part of the problem is that this largely depends on cross-Lomas communication, and this is largely a function of the interactiveness of the administrators and faculty involved, and this cast of characters is always changing. This is also an enormously time-intensive endeavor and if this were to be promoted, then our faculty need to receive teaching releases or we need high level staff support to achieve it. Another problem is that the UNM bureaucracy for approving major curriculum changes is labored, takes too much time, and often stifles such initiatives. This needs to be streamlined if we are to undertake such approaches.

We need to revamp Bio 500 to include sections on how to succeed in grad school and how to write proposals.

This is a course that should always be flexible and subject to revision, depending on the opinions of the current graduate student body and faculty. Much of the content now is viewed as being essential information pertaining to the topic of how to succeed in graduate school. We have often opted in the past to keep the demands imposed by this class manageable - the suggestion to include a segment on proposal writing will increase the time commitment. As part of the same discussion, we can also debate whether we need to include ethics training as well. We are open to the suggestions and encourage a faculty discussion of the topic.

We should consider the development of a Professional Masters Degree Program, largely involving MSB and LTER faculty. For example, our existing Conservation Biology program could be synergized with Sustainability and Anthropology graduate programs, and Museum Sciences could also be linked with sustainability.

We are reluctant to create new degree programs unless there is clear administrative direction, and provision of resources and staff support, to assist us. The faculty in the programs most affected here need to voice their opinion on such programs.

STAFFING

Several recommendation regarding staff needs were provided and we respond to them here in order of our perceived needs.

An IT person should be recruited to help with advising, outcomes assessment, recruitment and faculty research support, including helping MSB.

Yes, we desperately need help in all of these areas and an IT hire is our highest priority for staff. However, we need to be careful and avoid the usual UNM solution of trying to make one person do too many things and become ineffective at all of them. For example, if we are to get serious about outcomes assessment, this should be a task for a separate individual, not an IT person. Also, MSB should be able to get their own IT person to address their specialized needs as opposed to having one person assist both the department and the museum.

The duties of the IT person need to be carefully defined, and include assistance with upkeep of website and assistance with advising and recruitment efforts. The IT person can not be expected to be an advisor as well: advising is a separate and specialized function (see below). Also, whereas an IT person can assist the grant-writing mission, they can not be expected to be a fully engaged pre-award person either.

The department already has plans to hire a full-time pre-award person with available funds.

An additional student advisor is needed.

Agreed, this is our second staff hiring priority. Time and again, in conversations with the community, it comes to light that UNM students have received inadequate or erroneous advising. It is one source of student failure. We have over >1300 students wishing to have an intimate relationship with the Biology Department and having one full-time advisor is just not enough to facilitate that. Faculty pitch in and help but this robs them of valuable time, and it is not trivial for faculty members to keep up with all the changes in advising requirements and associated book-keeping.

The department should make every effort to track the number of students engaging in research, and to track student success.

Yes, as noted elsewhere, this is one of UNM's greatest institutional shortcomings. This is also a specialized and ongoing task and should not be imposed piecemeal on existing faculty unless there is a longer-term, sustained commitment accompanied by teaching releases, salary increases or other inducements. Preferably, it should be handled by a

specialist with the appropriate training. The more seriously this is taken, the better and more reliable the date obtained. In other words, if we are to get "outcomes", there is no point in getting poor data and being fundamentally mislead by it. We feel the department should be given the resources to make a part-time specialized hire to assist us in this area.

Another person needed for prep support of 300/400 level courses.

This has long been a need of the teaching mission in our department. The lack of such a person has for years had several detrimental effects on our teaching program, most notably the failure to provide more intensive, modern and meaningful laboratory courses. Most of the effort associated with development of such labs has fallen entirely on the faculty member in charge. Provision of such a person for our lower division courses has been enormously beneficial.

We also note that the construction of the Math/Science Learning Center with the Non-Majors Introductory Lab function of our department removed to a location remote from the remainder of our operation will necessitate the hiring of at least one more Biology Lab Prepper.

In a similar vein, whereas as suggested by our Review Team we need to get on board with the Rio Rancho Campus concept, we note that the RR effort will require the hiring of many new staff and we are pleading that the administration not preempt us from hiring the staff we need here on the UNM Main Campus to support our flagship teaching and especially research efforts. We note also, that the current agreement is that lower division courses will be taught by CNM faculty on the Rio Rancho campus. Thus space and facilities for "our" lower division courses will not, in fact, increase. We have concerns about this plan because we have worked very hard on our new core curriculum. We need a mechanism to ensure that students who take the biology core at Rio Rancho get the same knowledge and skills as those who take the biology core on the main campus. The administration should provide funds for a faculty or staff member to coordinate curriculum between UNM and Rio Rancho. Again, we cannot ask our existing faculty to simple add duties.

Initiate peer-advising with our students.

Although we agree that it is a good idea to have our beginning students interact with more experienced students, and such interactions can provide invaluable communications that might not otherwise occur, we are reluctant to recommend solving our advising shortcomings with this approach. This requires someone to oversee the student-advising program and very careful screening is required to be sure that the selected individuals transmit accurate information. Confidentially issues

make further complicate this approach. Peer advisors could not handle degree audits, adding notes to advising files online or evaluation of transfer courses. And, peer advising for entering students in university studies appears to be the source of a number of student misconceptions.

WEB SITE

Provide a first rate web site.

We have just hired a temporary web site design person to assist with this effort, and our first priority for staff hiring is an IT person to assist us in maintaining the site. We will need individuals running important programs that can showcase our department to be proactive about providing content, and working with out IT staff to keep it up to date.

OUTREACH

Advertise more effectively the outreach programs to legislators and public at large.

Provision of a hands-on, "willing to regularly come to the department and get their hands dirty" outreach person from Scholes Hall would be a refreshing development. Also, clearly an improved web site will assist in this effort. The department, through its own grant-writing efforts, perhaps does more than the review team noticed.

FINANCING

Again identified as specific and urgent recommendations are the needs for UNM to overcome the trend of diminishing I&G support and increasing reliance on overhead funds, which are then being either frozen or held back by the administration.

The only thing that has saved Biology from complete financial ruin has been the imposition of across-the-board course fees (largely to offset the reduced I&G funds), the fact that we generate considerable overhead funds to help make up for shortfalls in I&G funding, and a frugal and disciplined approach to our spending. The uncertain return of overhead funds (that we have rightfully earned by virtue of our hard work) sends all the wrong messages to our Pls. Not only is it a disincentive to write proposals, it also greatly interferes with our ability to provide start-up packages, and to undertake larger scale creative initiatives in collaboration with the UNM administration. The imposition of "taxes" on our I&G funds to support the initiatives of newly-hired Provosts or other administrators are devastating to Biology, as they take away resources needed to make new hires to replace retired faculty.

The freezing of departmental foundation and overhead funds that occurred while our review team was on location in the department, and that ultimately was instrumental in catalyzing the April faculty uprising, was an acute embarrassment for us and for UNM.

Our Office of Sponsored Projects office is not facilitating our efforts to secure grant funding.

This is a long-standing problem at UNM and surely identical comments can be found in past program reviews. However, this problem has grown worse in the past year. With the recent hiring of new administrators in the research office with intimate knowledge of the whole gamut of problems, it is our hope that we can begin to rectify these problems. Our role has recently been to meet with sponsored projects employees to work to develop stream-lined procedures, to encourage them to spend time in residence in the department so they can become more acquainted with the Pls, and to initiate the hiring of a pre-award Biology staffer who can help facilitate communication and proposal preparation for Pls. We note there is little that will improve unless UNM hires more grants administrators, somehow reduces their turnover rate, and adopts an approach that puts Pls on a pedestal.

The department should share its budget data with MSB.

This in fact has been happening and there is no reason for this not to continue.

SOME BIGGER PICTURE ISSUES

In response to a question as to whether the department, if it grows larger, should split, the response was this need not lead to an alternate structure (two departments).

We agree with their assessment that the present structure is preferable. This at least at present is not a major subject of departmental debate.

The department needs to take advantage of the Rio Rancho campus.

Yes, rather than dither and complain about what is increasing a certainty, how can we take the initiative here and try to influence the course of its development to our advantage? Is this a place to encourage certain clusters of excellence to develop? Rather than proceed with a willy-nilly plan to hire "one of everything" and essentially create yet another low-grade community college, can we seize an opportunity here to develop

some subject areas (neurobiology???) we have long needed but are not otherwise likely to get here on the main campus?

We should assess benchmarks in publications and grant dollars over 5 year intervals rather than on a year-to-year basis.

We have no fundamental disagreement with this idea despite the amusing socialistic overtones of the "five year plan", and it is clearly the case that our productivity does vary among years.

Attract more philanthropic support, including for endowed chairs, fellowships and infrastructure.

Particularly in times of federal funding shortfalls, seeking alternative sources of support for our programs is of critical importance. Our recent experience in partnering with Mr. Bill Uher has been positive and had lead to some tangible gains for the department, and prospects for other donations to the department are good. Other interactions with UNM's fund-raising apparatus have been poor however and have lead to withdrawals of proffered funding. As with many other aspects of UNM, stability in fund-raising mechanisms with a long-term institutional memory is needed. Also needed is greater sensitivity to the fact that when faculty are instrumental in raising funds, the money should actually benefit them. It is a particularly bad sign for UNM that even national academy members do not have endowed chairs. This should be the focal point of UNM-Biology fund raising.

Continue to seek support for upgrade and expansion of facilities.

Yes, emphatically, we are not done with facilities improvement, and we can not sit idle here. If we are not careful, the main campus will lose its animal care facilities. This would be a catastrophe, particularly for our ecology and evolution programs which often require specialized facilities and maintenance of unconventional species, and a plan to provide such facilities for both Biology and Psychology is urgently needed. Such plans have been offered before by the department but have been rejected by the administration at the time. A Phase III for Biology expansion is needed, one that considers elimination of Marron Hall and replaces it with a building with a new flexible and multi-purpose "vivarium" in the basement, and in above ground floors additional office and teaching complexes to favor interdisciplinary approaches, the quietly effective and productive Natural Heritage Program (with great fund-raising potential), the development of the Earth, Water, Environment Nexus (EWEN) program, and other longer term initiatives likely to attract funding and prestige.

The business model is not always the best way to view universities.

In our view, this administrative approach lead directly to the faculty revolt of April 2008, and if we are not careful, the research enterprise of UNM will be further degraded and lost, and more uprisings will follow. Significant erosion in our research mission has already occurred, as manifested in loss of excellent faculty, inability to hire outstanding new faculty, reduced return of overhead funds to generating units, funding shortfalls in the OVPRED office, and the lack of cohesive and stable leadership willing to partner with our resident experts to build, from the bottom up, research initiatives that really fit our research expertise, that are truly innovative and distinctive, and that are realistic for New Mexico and UNM. Having decisions driven by matters of student credit hour generation while ignoring the need to promote and foster the growth of research efforts, is not an inspiring way to run a university and if it continues, will promote mass defections.

DEPARTMENT OF CHEMISTRY AND CHEMICAL BIOLOGY ANNUAL REPORT

July 1, 2007 - June 30, 2008

Martin L. Kirk, Interim Chairman

Significant Developments during the Academic Year, 2007-2008

Prof. and Chair <u>Cary J. Morrow Retires</u>. Following 36 years of service to the Dept., Prof. Cary Morrow retired this Summer. Cary took on a difficult task in becoming the Chair of Chemistry and Chemical Biology, and successfully stabilized the Dept. during his tenure as Chair. The Department is now well-positioned for substantial growth and we anticipate Chemistry and Chemical Biology to play key roles in the College moving forward.

Faculty Searches. Dr. Chris Orendorff declined our offer which was made in the summer of 2007. Dean Norwood had previously authorized a search in the fall of 2007 for a biological chemist on a tenure track with an open rank. A search committee headed by Prof. Dunaway-Mariano was carried out in Spring 2008. Members of the Search Committee were Profs. Dunaway-Mariano, Guo, Tierney, and Morrow. Thirty-six applicants applied for the position with a cutoff for first review being Sept 15, 2007. In Oct, 2007 the search was cancelled and a request to re-advertise at the Assistant Professor level was sent to OEO. Permission was granted and applicants from the previous search were invited to resubmit their applications for the new search at the Assistant Professor rank. The search committee consisted of Profs. Dunaway-Mariano (Chair), Guo, Tierney, and Wang. This search yielded 64 applicants with a deadline for the first review being Nov. 30, 2007. Four finalists (Nicholas Silvaggi – 1/9-11/08; Joseph Tang -1/16-18/08; Dong Xu -1/13-15/08; Adrian Keating-Clay -1/21-23/08) were invited for interviews. Unfortunately, our top candidates all accepted positions at other institutions. As a result, two additional candidates were interviewed; Profs, Hyun-Suk Lim (3/23-24/08) and Xinjing Tang (3/26/28). Dean Claiborne subsequently canceled this search in order to provide startup funds for an external Chair hire.

The external Chair search was initiated in the Fall of 2007. The search committee consisted of Profs. Morrow (Chair), Dunaway-Mariano, Guo, Keller, Kemp, Wang, Datye, and Vanderjagt. The advertised search yielded 12 applicants, and the deadline for the initial review of candidates was Sept. 30, 2007. The committee identified three finalists (Paul Cary, 2/6-8/08; Dominic Casadonte, 2/9-12/08; Lawrence Bottomley, 2/20-22/08) for interviews. Dean Claiborne extended an initial offer to Prof. Cary. This offer was declined by the candidate. Prof.

Bottomley was invited by Dean Claiborne for a second interview and, subsequently, an offer was extended to Prof. Bottomley which he declined. The search was then closed without a hire being made for this position.

New Faculty. No new faculty members were added during this annual report period. We are in desperate need of new faculty in order to remain competitive among peer institutions. I estimate that we are anywhere from 50% to 100% below peer institutions of our size. It is critical that this situation be rectified prior to our next large retirement phase which is anticipated to begin in 2-3 years.

<u>Tenure Decisions.</u> Assistant Professor Wei Wang underwent review for tenure and promotion to Associate Professor during the 2007-2008 academic year. He was awarded tenure and promoted, effective July 30, 2008.

<u>Mid-Probationary Reviews</u>. No faculty members underwent mid-probationary review during the 2006-2007 academic year.

<u>Faculty Resignations and Retirements</u>. No faculty members resigned during the 2006-2007 academic year. Professor and Chair Cary Morrow retired on July 30, 2008.

Sabbatical Leaves. There were no sabbatical leaves during the 2006-2007 academic year.

Other Faculty Changes. Professor Martin Kirk assumed the role of Interim Chair of the Department on Aug. 1, 2008. Prof. Wei Wang resigned as Coordinator of the Seminar Committee and Assistant Prof. John Grey assumed this position. Prof. Wang is now the Chair of the Graduate Recruitment Committee. Deborah Evans who holds half-time position as Associate Director of the Nano Sciences and Micro Systems interdisciplinary program, is now the Department's Undergraduate Advisor.

Undergraduate Program Effort continued to be put into a restructure of the undergraduate program during the 2007-2008 academic year. New B.A. majors and minors in chemistry that allow students considerable flexibility in selecting the courses they take after general chemistry were instituted. The new B.S. program and curriculum that has been under development for several years was submitted and approved for implementation during the Fall 2008 Semester. The phase-in plan was developed by Prof. Deborah Evans and approved by Chair Morrow. This plan allows for current students to effectively complete their program of study.

The number of students enrolled in a Chemistry major or minor in each semester of the 2007-2008 academic year is summarized in the following table:

Semester	Major	Minor
Summer 2007	213	229
Fall 2007	219	593
Spring 2008	229	661

<u>Departmental Awards</u>. Nearly \$27,000 in awards were made to undergraduate and graduate students in Chemistry at the spring 2008 departmental graduation and awards ceremony. The funds for these awards are taken from the interest on endowments made to the Department. A table of those receiving awards follows appears in Appendix VII.

Major Instrumentation Facilities. The Mass Spectrometer Facility located in the Chemistry Department continued to grow during the 2007-2008 academic year under the direction of Charlotte Mobarak. Chris Enke continued working at 15% time under the auspices of the IGERT that was instrumental in creating the Center. This internationally known Mass spectrometrist was hired to oversee the on-going development of the Center and to help Charlotte learn how to solve problems that were encountered. The Mass Spectrometer Facility began sharing -80C freezer space with the Kirk group in order to ensure sample integrity. The Facility will be in charge of routine maintenance of the freezer.

Graduate Program

The number of students enrolled in the MS and Ph.D. programs in each semester of the 2006-2007 academic year is summarized in the following table:

Semester	MS	PhD
Summer 2007	7	39
Fall 2007	6	43
Spring 2008	9	40

Graduate Recruitment. Recruiting high quality graduate students remains a considerable challenge for the Chemistry Department. Nationally, in continues that approximately half the number of undergraduate chemistry majors are turned out as there are openings in graduate programs in Chemistry. In the last two decades many graduate programs in the US have fiercely recruited domestic students and now rely heavily on foreign students to make up first-year graduate classes in chemistry. The entering graduate student classes in Chemistry at UNM has been comprised of more than 50% students from China for more than a decade.

The department continued to put a significant effort into graduate recruitment under the leadership of Graduate Recruitment Committee chair, Prof. Hua Guo, and Prof. Wei Wang. A

number of other faculty members have worked hard on this effort. Of particular note, the committee put more effort into recruiting international students from countries other than China. This effort has resulted in a broader representation of home countries for our foreign students in recent classes. Countries in Africa, especially Tanzania, have been especially well represented.

There is continuing desperate need to increase the stipends that can be offered to the graduate Teaching Assistants in chemistry. The regional salaries are \$2-4k per year higher then what we are offering, making it very difficult to recruit domestic students, and increasingly hard to recruit foreign students. This problem needs to be addressed immediately if we are to maintain any semblance of regional competitiveness.

Through careful administration of Teaching Assistant salary funds plus a number of new grants to faculty members allowing them to hire more Research Assistants, the department was again successful in avoiding over-committing its budget as had happened in 2005-2006. (As was reported in the 2005-2006 Annual Report, "Late in the fall semester of 2005, several faculty lost grants which had provided Research Assistantship support for a number of graduate students, and the Department had to meet our obligation to these students by hiring them as Teaching Assistants during the spring semester. During much of the spring semester, it remained uncertain how many of these students would return to RA positions in the fall, so recruiting of graduate students for fall 2006 was significantly curtailed through most of the spring semester. As a result, a smaller than normal class was recruited to enter in fall 2006.") Recruiting for fall 2008 is expected to progress at a normal level. In the past, we have had recruitment difficulties due to faculty members keeping students on TA's because they have insufficient grant funds to move the students working under their direction on to RA's. This should be partially alleviated due to Profs. Kemp, Tierney, Wang, and Grey having recently received new extramural funding through NSF and PRF. The class of students recruited for Fall 2007 was only eight.

Accomplishments. A number of significant accomplishments were made during academic year 2007-2008. These are listed below:

- 1. A chemical inventory for Homeland Security was completed
- 2. Our new curriculum was approved and implemented
- 3. BAMD program support continued
- 4. A reclassification of laboratory supervisors was completed
- 5. First-Aid/CPR training is now required for all TA's and laboratory staff; two classes have already been certified (60 people); more classes are scheduled for fall 2008

- 6. A security camera system was installed in the department
- 7. New computers and software have been placed in our computer laboratory for undergraduate and graduate student use
- 8. The Daub Endowed Chair was established
- 9. The Riley Schaeffer Lectureship was established; funds solicited currently are \$16,286
- 10. The Banner Payroll System was implemented
- 11. The Banner Budget System was implemented
- 12. A new Departmental web page was created by a hired consultant under the direction of Prof. Hua Guo
- 13. Assessment projects and report completed for General Education Core classes.

Sponsored Projects - The following is a list of grant awards from the past fiscal year:

FY 2007-2008 Awards

	11 2007 -2000 AWdi	=-	
889219	SNL/UNM Jason Cox Scholarship	25,000.00	Brozik
889165	UNM PREP - (Post-Bac Research Ed Prog)	286,677.00	Keller
889229	ASU: Synthesis of Cis Stilbenes as Anticancer Agents	756.00	Deck
889214	ASU:	756.00	
889193	BostonUniv: DHHS:	216,776.00	Dunaway-Mariano
801513	NIH:NMSU INBRE	15,000.00	Enke
889166	DoE: Wave Packet Based Statistical Approach to Complex-Forming Reactions	92,000.00	Guo
889191	NIH: Simulations of Substrate Binding and Catalysis of Subclass B2 beta Lactamases	72,825.00	Guo
889186	DOE: Direct Expxidations Using Molecular Oxygen	237,000.00	Kemp, Richard A.
889226	SNL: ThermochemicalCyclesFor Splitting of Water	6,096.00	Kemp, Richard A.
889217	NSF: Electronic & Magnetic Studies of Heterospin Inorganic/Organic Molecular Materials	125,000.00	Kirk
889161	LANL: Unusual Metal-Ligand Redox Interplay in 4f- Element Metallocene-Based Molecular Magnetic Materials	9,950.00	Kirk,
889230	NIGMS: Spectroscopic Studies of Molybdoenzymes and Models	277,200.00 _	Kirk
889155	NIH/UnivMd: Giardia Drug Targets: Structure Function & Inhibitors	231,123.00	Mariano, Patrick
889190	NSF: Electron Transfer Photochemistry	107,000.00	Mariano, Patrick
801515	NIH:NMSU INBRE	110,418.00	Mobarak
889192	DoE: Design & Development of Selective Extractants for An/Ln Separations	147,800.00 _	Paine

889222	DOE: Preorganized & Immobilized Ligands for Metal Ion Seperation	135,000.00	<u>Paine</u>
889228	AFOSR: Solid-State Nulear Magnetic Resonance Investigations of Microwave Tube Cathode Structure	33,890.00	Smith
801517	INBRE	102,719.00	Tierney
889211	ACS/PRF: Recyclable and Reusable (S) Pyrrolidine Sulfonamide Org	35,000.00	Wang
889223	RAC: Quantum Dots for Specific Melanoma Tumor Imaging	00.000,8	Wang
889232	NSF: Bifunctional Organic Molecule-Mediated Catalysis	155,000.00	Wang
889213	SNL: SURP Guantum Dots for Melanoma Tumor Imaging	40,000.00	Wang
801516	INBRE:	105,719.00	Wang

Cumulative Total 2,576,705.00

Significant Plans and Recommendations for the Near Future

The Department of Chemistry and Chemical Biology continues to be in an extremely fragile state. If we continue on the present pathway, it seems likely that, in less than a decade, UNM could well be the only Carnegie RU/VH University without a graduate program in chemistry. This is terrifying to both the senior and junior faculty in the department. The impact of the program's absence on hopes for UNM being invited to join the AAU would be most significant. We continue to make tenure track hires at a rate slower than current faculty are being lost. The consequence of this is that in less than five years, the graduate program will no longer be viable. It is hard to believe that this is the administration's intention, and ask that strong action be taken immediately. We are anywhere from 50-100% smaller in faculty size than viable departments in Universities of our size. For example, approximately 16 years ago I was offered a tenure-track position in Chemistry at Utah State University. UNM possessed a superior faculty and infrastructure at that time and I accepted a position as Asst. Prof. in 1993. Currently, Utah State's Chemistry Department Faculty is ~50% larger than ours at UNM and the have a beautiful new state-of-the-art research facility. In spite of these difficulties, the Department continues to work very hard to improve our stature. Chemistry truly is the central science, and can make vital contributions to the College, University, and the Nation. Chemistry is poised, with proper backing from the administration, to become a significant player in a variety of initiatives key to the long-term research mission at UNM.

<u>Future Hiring</u>. With regard to tenure track faculty hires and losses, Chemistry's problem is not going to be solved through joint hires, such as the joint hire with Pharmacy and involving the UNM Roadmap program on the North Campus that was recently proposed. Although at first glance such interdisciplinary hires seem very attractive, they would contribute little or nothing to meeting our instructional needs. This fact does not seem to be fully appreciated by those pressing the Department to enter into such arrangements. In contrast, they apparently think that they are offering the Department a fabulous deal at no cost when, in fact, the cost is quite high.

The Department has updating its long-range plan and specified an order in which hires might reasonably be made. The fact remains that to maintain a viable graduate program, at least ten hires of tenure-track faculty need to be made in the next five years, and, at this point, the first four could be in any area of chemistry or chemical biology. Three of the ten will be sought during the 2007-2008 academic year. The start up packages for those ten hires will probably total at least \$3 - \$4 million. This staggering sum will be required to compete successfully for the candidates who will carry the Department toward research excellence. It is rare for a competitive start up offer to be less than \$250k. An experimental physical chemist planning to make measurements on a state-of-the-art instrument may require \$500 to \$700k or more. During spring 2006, the faculty renewed our commitment to making faculty hires into the two research areas of biologically related chemistry and materials chemistry. The administration must decide soon that the required investment be made.

Two crucial immediate concerns are the following:

- (1) The recent retirements of Niemczyk and Enke, the resignation of Engen, and the move of Cabaniss to Water Resources has decimated the analytical chemistry division making us unable to maintain and offer a program in this area. This is true even at the undergraduate level. We are now forced you use part time instructors. This represents a serious blow to the Department, and there is serious concern that this could happen to other divisions in the Department as well.
- (2) In organic chemistry, the department is faced with three retirements in the next few years. Prof. Morrow already retired in summer 2008. Profs. Deck, Holder, and Mariano are also eligible to retire. At that point, the current group of three Professors, one Associate Professor (Wang) and one Lecturer (Whalen) will be reduced to one Associate Prof. (Wang) and one Lecturer. Prof. Wang is an *outstanding* researcher, and, if this situation is not addressed, he will undoubtedly be recruited away by another department. Thus our hard work and time investment

in mentoring this faculty member will have been wasted. These six faculty members teach in the two-semester undergraduate organic chemistry lecture program. In fall 2006, those two courses, Chem 301 and 302, enrolled about 615 students in seven sections and in spring 2007, about 535 students in six sections. Most of the students are not chemistry majors but are in other fields such as biochemistry, biology, pre-pharmacy, pre-medicine, chemical engineering, etc. If this problem is not addressed, a lot of students in other programs are going to be affected negatively. With the exception of three people we have subsequently hired as Lecturers (Bellew, Ray, and Whalen) previous experience with part-time instructors for organic chemistry has generally ranged from less than satisfactory to disastrous. Moreover, a single tenure track faculty member cannot provide a viable graduate program in organic chemistry.

We have one biochemist (Dunaway-Mariano) in a Department of Chemistry and Chemical Biology. This is unacceptable. Should she become ill or move to another institution, Chemical Biology will be follow the path of Analytical Chemistry in the Department and cease to exist. Like Professor Wang, Professor Grey (physical chemistry) is a rising star, having received PFR funding in only his second year. Additional hires in physical chemistry are necessary in order to provide colleagues and proper mentoring for Prof. Grey. Sadly, the physical division is in nearly as dire straits as the organic division with Profs. Ondrias and Evans holding half-time appointments and Prof. Ondrias likely retiring in the next 5 years.

The impending problem of a large group of Chemistry faculty retirements, in a relatively short time (mid to late 2000's decade), was first brought to the administration's inattention more than fifteen years ago. Professor Morrow was the Chair at that time and discussed the situation with then Dean Bill Gordon on numerous occasions. The problem was subsequently discussed with succeeding Deans of Arts and Sciences by succeeding Chairs of Chemistry. The problem has now become a full-blown crisis. The problem has, of course, been exacerbated by the growing demand for our undergraduate courses by the many students seeking to enter the study of biology, pharmacy, medicine, and other science intensive fields. Hiring a Lecturer in organic chemistry is only a temporary solution to an extreme problem. More Lecturers could be hired, but that will do nothing to prevent the downward spiral of the Department's graduate program into oblivion.

In summary, UNM must have a strong, nationally recognized, and fully staffed

Department of Chemistry and Chemical Biology if the University is to improve its posture

among peer institutions and particularly if the University aims to count itself among a higher tier

of peer institution. To this end, we must hire at a rate of 2 faculty per year for the next 5 years in order to remain a viable Department and provide quality service, research and instruction to the University. Our hiring should be a judicious combination of additions at both the junior and senior levels. We realize that start-up funds may be limited initially, but we also believe there are effective ways to hire at the mid- and senior-levels using the guaranteed overhead generated by the prospective faculty member's current, and perhaps future, funded projects. Target greas for hiring. We see four key target areas for synergistic hiring in the Department. We prefer synergistic hires to joint hires, as the Jr. candidate's tenure will be handled and decided in a single Department. We envision such synergistic hires in direct association with ongoing thrust areas in the University. For example, two Depts. could hire four faculty (2+2) in order to develop immediate expertise and presence in a given research area of importance to the overarching University mission. This would immediately make UNM a significant player in the proposed area, develop an inter- and/or cross-disciplinary research presence at UNM, and provide a highly collaborative research environment in house. Additionally, the setup packages could be greatly reduced since multiple PI's would be using common instrumentation in a facility-like environment.

Proposed Target Areas.

- A. Molecular Electronic Materials. Prof. John Grey is a rising star in our Dept. and his research program focuses on key problems in the emerging area of molecular electronic materials research. We would like to build on this key thrust, particularly with Physics and Electrical/Chemical Engineering.
- B. Biological Chemistry. This represents half of our Departmental title, and we envision a powerful biological chemistry division interacting strongly with the Dept. of Biology. Preliminary conversations with Chair Loker in Biology indicate that their Dept. would be very interested in synergistic, bottom-up hiring plan. Shared facilities would be of great utility to both Depts. and the close proximity between Biology and Chemistry and Chemical Biology make this highly feasible and greatly desirable.
- C. Organic Chemistry. Prof. Wei Wang is one of our brightest young faculty in a division where the other four faculty are all over 53 years old. This is an area where very strong interactions can be made with the College of Pharmacy and the nascent molecular electronic materials thrust.

D. Analytical Chemistry. We have been decimated here. The recent retirements of Niemczyk and Enke, the departure of Engen to Tufts, and the reduced appointment of Cabaniss have essentially left us without an Analytical program. A strong analytical program would provide great possibilities for interactions with programs on North Campus that would benefit from instrument-related research efforts. This is particularly true with respect to mass spectrometry.

Graduate Student Stipends. The stipends offered by the Chemistry Department to potential Teaching Assistants are very low relative to other schools in the region and to those of our peer institutions. This problem was identified in an evaluation of the Department by an external review team as far back as 1968. It has continued to be raised in the evaluations by external teams that have visited the Department in 1980, 1993, and 2003. The importance of increasing the stipends that we can offer potential graduate students cannot be over-emphasized for the following two reasons:

First, the salary we offer makes it especially hard to recruit well-trained and motivated domestic students. This fact negatively impacts the undergraduate instructional program of the Department because the people who we have available to serve as undergraduate laboratory instructors are the graduate students we can attract. The currently accessible graduate students often have a mediocre preparation and limited native ability and many are poorly motivated.

Second, in the field of academic chemistry, graduate students provide the "hands" that actually conduct research. In return, the student learns how to think about solving research problems in chemistry and how to design and carry out the experiments needed to solve a chemistry problem. It is not uncommon for an experiment to require many hours of more or less continuous attention. Most faculty members do not have the required blocks of unfettered time to carry out more than a few such experiments per semester because of teaching commitments, guiding the research of a group of students working under her/his direction, and participating in service through committee work, etc. In an active research group, the blocks of faculty time which are available for scholarship must be committed to preparing manuscripts, presentations, and proposals for grant support. When high quality graduate students are not available because stipends are not adequate to attract them, conduct of each group's research is slowed. This means that manuscripts are not submitted for lack of results. Then grants are not renewed because results are not being published. Further, TA's are not moving onto RA's (where a graduate student earns a stipend for conducting the research that will eventually become her/his

dissertation) because there are not sufficient grant funds to pay for the RA. The student must remain on a TA, which has two effects: (1) The rate of research is slowed further because of the time required for the teaching commitments of the TA, and (2) A new graduate student cannot be brought into the Department's program because there is no TA available. In this kind of environment, top quality faculty members move elsewhere in frustration. Clearly this is a downward spiral, and the Chemistry Department is caught in it! A huge impact could be made on this problem with \$200k, or less than the startup cost for a single new faculty member.

Needs of the Graduate Program. Ultimately, there are no greater needs in the graduate program than the two already discussed: (1) the need for new tenure-track faculty to teach high quality courses at the graduate level and to teach graduate students how to conduct modern research in chemistry and (2) the need for competitive TA stipends. In the face of those two items, issues like an aging departmental instrument package pale by comparison. Regarding TA stipends, these have increased from \$1719.42/mo. To \$1770.00/mo. However, funding from A&S is still insufficient. We currently receive funds for 33 TA's but must cover 45-48 TA slots. The unfortunate consequence of this is that undergraduate students must be hired to cover all of our laboratory assignments. This vicious cycle has greatly reduced the number of graduate students that the Department can accept, and this ultimately leads to low graduate student matriculation in our Department.

Needs of the Undergraduate Program. By far the biggest problem faced by the undergraduate program is the loss of teaching faculty described above. Second most important is the problem of delivering a sufficient number of sections of laboratory courses to meet the growing demand caused by the service course role we are required fill. There are two significant components to this problem: instructors and space. The latter would have probably been solved for a time by the originally planned construction and proper equipping of the new Math and Science Learning Center. Whether or not sufficient funds have been provided to furnish and equip properly the general chemistry laboratory in the building, even in its reduced format (i.e., without a third general chemistry laboratory) remains to be seen. As a result, when the building is completed, only the General Chemistry Laboratory courses are scheduled to move into the new space.

Unfortunately, the Math and Science Learning Center was not built as originally planned and it does not provide adequate capacity to meet the ever increasing demands of our undergraduate laboratory program laboratory moving forward. In effect, we will likely not be

able to serve the same number of students that are currently enrolled in General Chemistry due to the one-third space reduction. Of equal importance is the fact that the Math and Science Learning Center will not house our Organic Chemistry Laboratories. These will continue to be taught in the documented unsafe and antiquated laboratories in Riebsomer and Clark Halls. The Administration should be aware of the serious problems that exist in the organic laboratories since it has been warned on a number of occasions over the last 15 years. We believe that it is only a matter of time before a disaster occurs in the Undergraduate Organic Laboratories and, when it does, the Administration will have a difficult time rationalizing the years of neglect that served as a possible cause.

Finding sufficient laboratory instructors continues to be a growing problem, and the inability for these instructors to offer a quality laboratory experience is an even bigger issue. Because we are now attracting fewer and fewer quality graduate students into our program, the number of graduate students that serve as TA's (see above) has declined and the quality of laboratory instruction has continued to decrease. As an only partially acceptable interim solution, we have had to draw instructors from a pool of undergraduate students who have previously completed the course for which they serve as a TA. We have also started moving toward delivering the preliminary lecture in each laboratory section by video rather than risk having the students not know what to do when carrying out the day's experiment owing to a language issue. What is really needed, however, are sufficient resources in the Department budget and larger numbers of research active faculty that will enable us to attract a cadre of high quality, motivated graduate students to teach these laboratory courses.

Two examples of the level to which our frustration in addressing this problem have risen are as follows. Firstly, during the 2006 spring/summer intercession, we tested a possible solution to the problem of students being shut out of the Organic Chemistry Laboratory course. Two sections of Chem 303L were offered during that three-week period. The experiment was highly successful in that it led to a decrease in the backlog of students who had been unable to enroll in a lab section in previous semesters. The success of this program can be partially attributed to the availability of two unusually well-qualified and experienced part time faculty members (Ms. Alisha Ray and Dr. Don Bellew) to teach the two sections. A repetition of this experiment was to be tried during the spring/summer intercession of 2007. Unfortunately, only one section was funded initially, and, by the time funds were made available for the second section to be opened, interested students had gone on to other things. If we are serious about using this or any other

innovative approach to solving this problem, a firm commitment of funds needs to be made available much earlier in the spring semester. In addition, we will need another staff member to help with storeroom support for these intensive sessions while the regular staff prepare for the upcoming summer session.

Secondly, in the fall 2005, we desperately tried to open new sections of laboratory courses to meet the demand caused by enrollment overloads. However, the central administration responded by providing funding to make graduate students into Supplemental Instruction leaders. Perhaps this type of retention effort is useful, but it should be secondary to meeting the demand for more laboratory courses. Former Chair Morrow believed that this was a refection of "micro-managing", and stated such in last year's annual report.

Space Completion of the Math and Science Learning Center will not solve the current problems associated with students being shut out of freshman and organic chemistry laboratory courses. During the past two years, considerable effort went into planning the various spaces that were to be built for Chemistry in the Learning Center. Sadly, if the proper attention by the architects who design the building was given to the planning and if sufficient funds were made available for building, furnishing and equipping the laboratories, an outstanding general chemistry and organic chemistry instructional laboratory space would have resulted. But instead, a revised plan that eliminated the organic chemistry laboratories and truncated the number of general chemistry laboratories was adopted and this has left us with the same problem (perhaps lessened slightly) that existed prior to the initiation of the new building design.

Moving the general chemistry laboratory courses into the new facilities will result in three laboratories in the current building being vacated. Room 150, the current organic laboratory, will remain to serve the same function. Chemistry 415 (soon to renumbered as 432), our capstone laboratory course will use half of this lab. The department is in the process of developing a chemical biology laboratory course that would use the other half of the room. The two freshman laboratories, rooms 109 and 207, will also be vacated. These two rooms will provide some of the space that will be needed for new tenure-track faculty, as well as dedicated laboratory space for other upper division laboratory courses taken by our majors. Once the availability date for the new Learning Center space becomes known, funding will be sought to renovate the vacated rooms to transform them into modern research/office space and laboratories for the upper division laboratory courses and research. As the number of research-active, tenure-track faculty in the Department reaches 20, the need for additional laboratory space will become

significant and additional space will need to be identified, remodeled or built in order for the tenure-track faculty to reach its target size of 25.

Separations/Hires of Staff

Marcella Greathouse (Accountant I) resigned in June 2007. A search was conducted for a Fiscal Services Tech to replace Ms. Greathouse, and this resulted in the hiring of Ms. Katherine Grey. A reclassification of the laboratory coordinator positions was initiated (Research Tech/Physical Science) in order to make job titles and job descriptions correlate with actual duties. A new title, Teaching Lab Tech, was approved by Compensation, and current employees Gary Bush and John Bauer were subsequently reclassified. Karen DeZetter was hired in April 2007 to replace Daniel Cano, who resigned early in the year. Ms. DeZetter was hired under the new title of Teaching Lab Tech.

Faculty Publications

Donald Bellew

W. M. Brown, A. Sasson, D. R. Bellew, L. A. Hunsaker, S. Martin, A. Leitao, L. M. Deck, D. L. Vander Jagt, and T. Oprea. "Efficient Calculation of Molecular Properties from Simulation using Kernel Molecular Dynamics," *Journal of Chemical Information and Modeling*, 48 (8), 1626–1637.

Stephen Cabaniss

Cabaniss, S.E. "Quantitative structure-property relationships for predicting metal binding by organic ligands" 2008, Environ. Sci. Technol. 42:5210-5216.

Cabaniss, S.E., Madey, G., Leff, L., Maurice, P.A., Wetzel, R. "A stochastic model for the synthesis and degradation of natural organic matter. Part II. Molecular property distributions" Biogeochem. 2007, 86, 269-286.

Cabaniss, S.E., Maurice, P.A., Madey, G. "Stochastic synthesis of DOM: Predicting Cu(II) complexation from precursor structures" 2007 Appl. Geochem. 22, 1646-1658.

Lorraine Deck

Efficient Calculation of Molecular Properties from Simulation Using Kernel Molecular Dynamics Brown, W. M.; Sasson, A.; Bellew, D. R.; Hunsaker, L. A.; Martin, S.; Leitao, A.; Deck, L. M.; Vander Jagt, D. L.; Oprea, T. I. J. Chem. Inf. Model; (Article); 2008; 48(8); 1626-1637.

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Rational redesign of the 4-chlorobenzoate binding site of 4-chlorobenzoate: coenzyme a ligase for expanded substrate range Wu R, Reger AS, Cao J, Gulick AM, Dunaway-Mariano D. (2007) **Biochemistry**, 46 14487-99.

Swiveling Domain Mechanism in Pyruvate Phosphate Dikinase. Lim K, Read RJ, Chen CC, Tempczyk A, Wei M, Ye D, Wu C, Dunaway-Mariano D, Herzberg O (2007) **Biochemistry** 46,14845-14853.

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Appendices

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Appendix I - Teaching Schedules by Semester

Summer 2007 Teaching Schedule

Course Number	Title	Days	Times	Location	Instructor
CHEM 111 001	Elem of Gen Chem with Lab	MTWRF	0920-1020	DSH 333	Rubie, N
CHEM 111L 011	Elem Gen Chem Lab-D	TR	1030-1130	MITCH 207	Rubie, N
CHEM 111L 012	Elem Gen Chem Lab-D	MW	1030-1130	MITCH 207	Rubie, N
CHEM 122 001	General Chem with Lab	MTWRF	1030-1130	CLARK-101	Ho, K
CHEM 253 001	Quant Analysis with Lab	MTWR	1250-1350	CLARK-101	Dunphy, D.
CHEM 301 001	Organic Chemistry	MTWRF	0920-1020	CLARK 101	Bellew, D
CHEM 302 001	Organic Chemistry	MTWRF	1140-1240	CLARK-101	Deck, L

Fall 2007 Teaching Schedule

Course Number	Title	Days	Times	Location	Instructor
CHEM 111 001	ELEM OF GEN CHEM	MWF	1000-1050	CLARK101	PAINE,R
CHEM 111 002	ELEM OF GEN CHEM	MWF	1300-1350	CLARK101	RAY,A
CHEM 121 001	GENERAL CHEM	MWF	1100-1150	WOOD 101	WEIS,D
CHEM 121 002	GENERAL CHEM	MWF	1200-1250	CLARK101	LITCHMAN,W
CHEM 122 001	GENERAL CHEM	MWF	0900-0950	WOOD 101	BELLEW,D
CHEM 122 002	GENERAL CHEM	MWF	1000-1050	WOOD 101	BELLEW,D
CHEM 122 003	GENERAL CHEM	MW	1730-1845	CLARK101	BELLEW,D
CHEM 122 004	GENERAL CHEM	MWF	0900-0950	WOOD 101	BELLEW,D
CHEM 132 001	PRIN OF CHEM	MWF	0900-0950	HUM 309	KELLER,D
	INTEG ORG		1100-1215		
CHEM 212 002	CHEM+BIOCH	TR		ASM 1016	RAY,A
CHEM 253 001	QUANT ANALYSIS	TR	0930-1045	CLARK101	WEIS,D
CHEM 301 001	ORGANIC CHEMISTRY	MWF	0900-0950	CLARK101	WHALEN,L
CHEM 301 002	ORGANIC CHEMISTRY	MWF	1100-1150	CLARK101	MORROW,C
CHEM 301 003	ORGANIC CHEMISTRY	MWF	1100-1150	MITCH122	WHALEN,L
CHEM 302 001	ORGANIC CHEMISTRY	MWF	0800-0850	MITCH101	HOLDER,R
CHEM 302 002	ORGANIC CHEMISTRY	MWF	1100-1150	KIVA 104	WANG,W
CHEM 302 003	ORGANIC CHEMISTRY	TR	1900-2015	MITCH101	BENTLEY,P
CHEM 312 001	PHYSICAL CHEMISTRY	MWF	0740-0850	CLARK101	YANG,J
CHEM 326/627	ST: NMR 200	F	1300-1450	CLARK166	SMITH,K
	BIOLOGICAL		1100-1215		DUNAWAY-
CHEM 421/521	CHEMISTRY	TR	0000 1015	CLARK101	MARIANO
CHEM 454 001	INSTRUMNTL ANALY	TR	0930-1045	DSH 334	CABANISS,S
CUEM ED4 DD4	MOLECULAR STRUC		1400-1515	ODTO 044	CHO!!
CHEM 501 001	THRY	TR	1100-150	ORTG 241	GUO,H
CHEM 514 001	SYNTHESIS ORG CHEM PHYS METH INORG	MWF	1000-1050	CLARK166	DECK,L
CHEM 534 001	CHEM	MWF	1000-1000	DSH 232	TIERNEY,D
O11LW 004 001	SYN MECH INORG	141.44.1	1230-1345	DOITEDE	1121(1421,0
CHEM 536 001	CHEM	TR	1200 1010	DSH 228	KIRK,M
	T: INSTRUMNTL ANALY	TR	0930-1045	DSH 334	CABANISS.S
	RESEARCH		1500-1600		
CHEM 623 001	COLLOQUIUM	F		CLARK101	KEMP,R
CHEM 625A001	SEM: ANALYTICAL	w	1200-1250	CLARK166	CABANISS,S
CHEM 625B002	SEM: INORGANIC	М	1200-1250	BANDE105	TIERNEY,D
CHEM 625C003	SEM: ORGANIC	F	1200-1250	MITCH218	BENTLEY,P
					WANG,W
CHEM 625D004	SEM: PHYSICAL	W	1200-1250	CLARK166	KELLER,D

Spring 2008 Teaching Schedule

Course Number	Title	Days	Times	Location	Instructor
CHEM 111 001	ELEM OF GEN CHEM	MWF	1000-1050	CLARK101	PAINE,R
CHEM 111 002	ELEM OF GEN CHEM	MWF	1300-1350	CLARK101	RAY,A
CHEM 121 001	GENERAL CHEM	MWF	1100-1150	WOOD 101	YANG, J.
CHEM 121 002	GENERAL CHEM	MWF	1200-1250	CLARK101	LITCHMAN,W
	GENERAL CHEM				
CUEM 422 004	Offered with Chem 122	MWF	0000 0050	WOOD 101	BELLEW,D
CHEM 122 001 CHEM 122 002	GENERAL CHEM	MWF	0900-0950 1000-1050	WOOD 101	BELLEW,D
CHEM 122 002	GENERAL CHEM	TR	1800-1030	CLARK101	BELLEW,D
CI ILIVI 122 003	GENERAL CHEM		1000-1913	CLARRIOT	DELECTOR
1	Offered with Chem 122	1	1		
CHEM 122 004	001	MWF	0900-0950	WOOD 101	BELLEW,D
	INTEG ORG		1		
CHEM 212 002	CHEM+BIOCH	TR	1600-1740	CLARK 101	RAY,A
CHEM 253 001	QUANT ANALYSIS	TR	0930-1045	CLARK101	DUNPHY, D.
CHEM 301 001	ORGANIC CHEMISTRY	MWF	0900-0950	CLARK101	WHALEN,L
CHEM 301 002	ORGANIC CHEMISTRY	MWF	1100-1150	CLARK101	MORROW,C
CHEM 301 003	ORGANIC CHEMISTRY	MWF	1100-1150	MITCH122	WHALEN,L
CHEM 302 001	ORGANIC CHEMISTRY ORGANIC CHEMISTRY	MWF	0800-0850	MITCH101	HOLDER,R
	Offered with Chem 302		ł		
CHEM 302 002	004	MWF	1100-1150	KIVA 104	MARIANO, P
CHEM 302 003	ORGANIC CHEMISTRY	TR	1730-1845	TAPY 201	DECK. L.
	ORGANIC CHEMISTRY	<u> </u>			
}	Offered with Chem 301]		
CHEM 302 004	002	MWF	1100-1150	KIVA 104	MARIANO, P
		MWF	14001450		l i
CHEM 312 001	PHYSICAL CHEMISTRY	M	1500-1600	CLARK101	KELLER,D
	ST: NMR 200 Offered with Chem 627	1			1
CHEM 326 001	001	F	1300-1450	CLARK166	SMITH,K
0712.11 020 001	ST INSUITU URANIUM	 	1000 1-100	OD WATER	Civility
CHEM 326 002	MIN	M	1300-1350	MITCH 111	CABANISS,S
	BIOLOGICAL				
011514 404 004	CHEMISTRY Offered with	1	4400 4045	OL A DIKAGA	DUNAWAY-
CHEM 421 001	Chem 521 001	TR	1100-1215	CLARK101	MARIANO
	INSTRUMNTL ANALY	i i			
CHEM 454 001	Offered with Chem 545 001	TR	0930-1045	DSH 334	CABANISS,S
CITEIN 454 001	CHEM & PHYS	11	0330-1043	D311334	CADAMOO,O
CHEM 471 001	NANOSCALE	TR	1100-1215	WOOD 149	EVANS, D
CHEM 514 001	SYNTHESIS ORG CHEM	MWF	1100-1150	CLARK166	DECK,L
CHEM 515 004	T:SPECTROSCOPY	MWF	0900-0950	CLARK 166	WANG,W
CHEM 515 002	T STEREO CHEM	MWF	0900-0950	CLARK 166	MORROW,C
CHEM 515 005	T:ORGANIC RXN MECH	MWF	0900-0950	CLARK 166	DECK,L
	BIOLOGICAL				
	CHEMISTRY Offered with	'_ _			DUNAWAY-
CHEM 521 001	Chem 421 001	TR	1100-1215	CLARK 101	MARIANO

	TR	1230-1345	DSH 228	KIRK, M
T:BIOINORGANIC CHEM	MWF	1000-1050	DSH 232	TIERNEY,D
T: INSTRUMNTL ANALY Offered with Chem 454 001	TR	0930-1045	DSH 334	CABANISS,S
T: SIM. COMP CHEM SYS	TR	1400-1515	ORTG 153	GUO, H
RESEARCH COLLOQUIUM	F	1500-1600	CLARK101	KEMP,R
SEM: ANALYTICAL	Τ	0800-0850	CLARK166	CABANISS,S
SEM: INORGANIC	M	1200-1250	BANDE105	KIRK, M
SEM: ORGANIC	F	1200-1250	MITCH218	WANG, W
SEM: PHYSICAL	Т	1200-1250	CLARK166	KELLER,D
ST: NMR 200 Offered with Chem 326	E	1300-1450	CI ABK 166	SMITH,K
	T: INSTRUMNTL ANALY Offered with Chem 454 001 T: SIM. COMP CHEM SYS RESEARCH COLLOQUIUM SEM: ANALYTICAL SEM: INORGANIC SEM: ORGANIC SEM: PHYSICAL ST: NMR 200	T: INSTRUMNTL ANALY Offered with Chem 454 001 TR T: SIM. COMP CHEM SYS TR RESEARCH COLLOQUIUM F SEM: ANALYTICAL T SEM: INORGANIC M SEM: ORGANIC F SEM: PHYSICAL T ST: NMR 200 Offered with Chem 326	T: INSTRUMNTL ANALY Offered with Chem 454 001 TR 0930-1045 T: SIM. COMP CHEM SYS TR 1400-1515 RESEARCH COLLOQUIUM F 1500-1600 SEM: ANALYTICAL T 0800-0850 SEM: INORGANIC M 1200-1250 SEM: ORGANIC SEM: PHYSICAL T 1200-1250 ST: NMR 200 Offered with Chem 326	T: INSTRUMNTL ANALY Offered with Chem 454 001 TR 0930-1045 DSH 334 T: SIM. COMP CHEM SYS TR 1400-1515 ORTG 153 RESEARCH COLLOQUIUM F 1500-1600 CLARK101 SEM: ANALYTICAL T 0800-0850 CLARK166 SEM: INORGANIC M 1200-1250 BANDE105 SEM: ORGANIC F 1200-1250 MITCH218 SEM: PHYSICAL T 1200-1250 CLARK166 ST: NMR 200 Offered with Chem 326

Appendix II - Undergraduate and Graduate Enrollment - By Courses

Appendix II - Undergraduate and Graduate Enrollm					
	Summer	Fall	Spring		
	2007	2007	2008		
111 Enrollment	32	247	224		
121 Enrollment	52	596	423		
# of Sections	11	3	2		
# Labs	2	25	18		
122 Enrollment	42_	269	405		
# of Sections	1	2	4		
# Labs	2	15	21		
131 Enrollment	0	0	0		
132 Enrollment	0	0	0		
Chem 212	0	80	63		
Chem 253	0	79	18		
Chem 311	0	35	0		
Chem 312	0	0	41		
Chem 315	0	111	0		
Chem 331L	0	16	0		
Chem 332L	0	0	12		
Chem 415	0	14	0		
Chem 421	0	0	87		
Chem 431	0	30	0_		
Chem 433	0	4	0		
Chem 454	0	0	28		
Chem 471	0	20	20		
301 Enrollment	106	331	312		
# of Sections	1	3	3		
302 Enrollment	61	232	237		
# of Sections	1	3	4		
303L Enrollment	75	240	192		
# of Sections	5	15	12		
304L Enrollment	35	167	181		
# of Sections	2	10	11		
504	0	8	0		
511	0	7	0		
514	0	0	4		
515	0	4	4		
521	0	0	9		
536	o {	0	6		
537	0	5	6		
540	0	10	0		
545	0	0	1		
567	0	2	8		
587	0	0	0		

Appendix III - Graduation Report by Semester

FALL 2007 NEW STUDENT LIST:

LAST	FIRST	DEGREE	COUNTRY
Dong	Chao	PhD	Chlna
Edens	Lance	PhD	USA
Hutt	Ken	PhD	USA
Ottley	Leigh Anna	MS	USA
Pimentel	Adam	PhD	USA
Zheng	Li	PhD	China

OFFERED ADMISSION - 18 Students

OTT AT THE OTTO TO DEGRADE						
COUNTRY	OFFERS	ACCEPTED	DECLINE	NO RESP		
CHINA	11	2	1	8		
MEXICO	1	0	Î.	0		
USA	6	4	2	0		

DENIED ADMISSION - 72 STUDENTS

COUNTRY	NUMBER OF STUDENTS
CHINA	23
ERITREA	1
GHANA	5
HONDURAS	1
INDIA	10
JORDAN	
KENYA	[1]
NEPAL	2
PAKISTAN	1
POLAND	1
SADIA	1
SRI LANKA	8
TANZANIA	7
THAILAND	2
USA	8

SPRING 2008 NEW STUDENT LIST:

LAST	FIRST	DEGREE	COUNTRY
Bush	Nancy	PhD	USA
Denis	Ordonez	PhD	Honduras

OFFERED ADMISSION - 2 Students

OIT DIGDO TIDIN	1001011 20	tadonia		
COUNTRY	OFFERS	ACCEPTED	DECLINE	NO RESP
HONDURAS	1	1	0	0
USA	1	1	0	0

DENIED ADMISSION - 8 STUDENTS

COUNTRY	NUMBER OF STUDENTS		
CHINA			
CAMEROON	1		
ISRAEL	1		
MOROCCO	1		
SRI LANKA	1		
USA ,	3		

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Appendix IV - Undergraduate Graduates Fall 2007 and Spring 2008

Appendix IV - Undergraduate Graduates Fan 2007 and Spring 2006						
1		1	GRAD	GRAD		
LAST NAME	FIRST NAME	DGR	SEM	YR		
LEWIS-KRAITSIK	JAY	BA	SU	07		
ANDREWS	SCOTT	BS	FA	07		
COPLEN	AMY	BS	FA	07		
HALL	JUSTINE	BS	FA	07		
HOMAN	VICTORIA	BA	FA	07		
KRAUS	TARA	BS	FA	07		
MARTINEZ	NICK	BA	FA	07		
TAYLOR	SARAH	BS	FA	07		
ABU-AFIFEH	ABEER	BS	SP	08		
ARAGON	BERNADETTE	BA	SP	08		
BAKER	AMBER	BA	SP	08		
BONNETT	JANA	BA	SP	08		
DORIN	RACHEL	BA	SP	08		
FOUTZ	JONAH	BA	SP	08		
GAINER	LEAH	BS	SP	08		
HAMPTON	DAVID	BS	SP	08		
HUTCHISON	STEPHEN	BS	SP	08		
KHAVARI	MANIJEH	BS	SP	08		
MAESTAS	AMORETTE	BS	SP	08		
MONTEVERDI	JORDAN	BS	SP	08		
NOCE	MONICA	BS	SP	08		
OUEIS	HANINE	BS	SP	08		
RIVERA	SHEILA ANN	BA	SP	08		
SIMS	PATRICK	BS	SP	08		

Appendix V - Masters and PhD Graduates Fall 2007 and Spring 2008

LAST	FIRST					[GR	GR
NAME	NAME	DRG	CHAIR	MEM 1	MEM 2	MEM 3	MEM 4	SEM	YR
FELIX	ANA	PhD	KEMP	PAINE	WANG	FOLSON	BAKER	FA	2007
KATEGELA	ESTHER	MS/NT	CABANISS	N/A				FA	2007
LI	LING	PhD	MARIANO	DDM	GUO	MATTHEWS		FA	2007
NIU	WEILING	PhD	DDM	MARIANO	WANG	ORLANDO		FA	2007
WU	RUI	PhD	DDM	KIRK	WANG	VANDERJAGT		FA	2007
GONG	MAOZHEN	MS/TH	MARIANO	WANG	DDM			SP	2008
LI	HAO	PhD	WANG	MARIANO	GUO	FENG		SP	2008
LI	ZHIMIN	MS/NT	GUO					SP	2008
MALISA	RAPHAEL	MS/NT	KIRK	PAINE	GUO	TIERNEY		SP	2008
SHARMA	SURABHI	MS/NT	KIRK	KEMP	PAINE			SP	2008
WANG	CANHUI	PhD	GUO	DDM	WANG	KELLER	OPREA	SP	2008

Appendix VI - Undergraduate and Graduate Student Awards and Scholarships

Student	Scholarship	Amount
Patrick Sims	Charles Leroy Gibson Scholarship	\$100.00
Jordan Monteverdi	Mike S. Millican Memorial Prize	\$150.00
Casey Seaman	Paul Mozely Award	\$250.00
Harry Pratt	Dean E Uhl Merit Scholarship	\$300.00
Amorette Maestas	Joan Willard hemsing Tinoco Scholarship	\$1,000.00
Leah Gainer	Joan Willard hemsing Tinoco Scholarship	\$1,000.00
Manijeh Khavari	Joan Willard hemsing Tinoco Scholarship	\$1,000.00
Monia Noce	Joan Willard hemsing Tinoco Scholarship	\$1,000.00
David Hampton	Maurice Hughes Scholarship	\$1,000.00
		\$4,000 +
	Thomas Whaley Endowed Memorial	\$1,000
Giang Nguyen	Award	supplies/chemicals
	Thomas Whaley Endowed Memorial	\$4,000 + \$1,000
Anh-Dung Le	Award	supplies/chemicals
7 till Dalig Lo		T
Devon	Thomas Whaley Endowed Memorial Award	\$4,000 + \$1,000 supplies/chemical
Devoil	Clark-Person-Graham Memorial	\$1,000 supplies/chemical
Gebhard Luilo	Endowment	\$1,000.00
	Clark-Person-Graham Memorial	7,,033,03
Ken Hutt	Endowment	\$1,000.00
	Clark-Person-Graham Memorial	
Gregory Smith	Endowment	\$500.00
Marie Parkes	T.S. Elicker Memorial Award	\$2,000.00
Diana Habel-		۱ ۱
Rodriquez	Hillard L. Smith/Dow Graduate Fellowship	\$1,100.00
Tony Williams	Hillard L. Smith/Dow Graduate Fellowship	\$1,100.00
Monique Cordova	Merck Index	Book
Omar Abu-Daydeh	CRC Handbook	Book
Daniel Colman	CRC Handbook	Book
Kang Ho	CRC Handbook	Book
Brian Hunt	CRC Handbook	Book
Candice Korte	CRC Handbook	Book
Daniel O'Connell	CRC Handbook	Book

Appendix VII - Assistantship Report by Semester

LAST NAME	FIRST NAME	DRG	YEAR	ADVISOR	SP 08	FA 07	SU 07
ACKER	ISAAC	MS/N	2007	KEMP	TA	TA	TA
BERHANE	ABEBE	PhD	2002	KIRK	RA	RA	RA
BORO	BRIAN	PhD	2002	KEMP	RA	RA	RA
BREECE	ROBERT (MATT)	PhD	2005	TIERNEY	TA	TA	TA
BUSH	NANCY	PhD	2008	NEW	TA	20079	
CAO	JIAN	PdD	2004	DDM	TA	TA	RA
CHEN	DANQI	PhD	2005	MARIANO	TA	TA	RA
COX	JASON	PhD	2003	BROZIK	RA	RA	RA
DENG	YURONG	PhD	2003	CABANISS		TA	TA
DONG	CHAO	PhD	2007	TIERNEY	TA	TA	144.5
EDENS	LANCE	PhD	2007	KELLER	RA	RA	
EDICOME	CORNEL	PhD	2004	PAINE	RA	RA	RA
FULTON	MEITA	PhD	2004	KIRK	RA	RA	Fillippe Co.
GAO	YONGQIAN	PhD	2006	GREY	RA	RA	TA
	1	1		<u> </u>	1.0.	1	1
HABEL-]	İ	}			
RODRIGUEZ	DIANA	PhD	2004	KIRK	RA	RA	RA
HUANG	HUA	PhD	2006	DDM	TA	TA	RA
HUTT	KEN	PhD	2007	WANG	TA	TA	
JIANG	WEI	PhD	2005	WANG	RA	RA	RA
KERSI	DOMINIC	PhD	2006	KIRK	TA	TA	RA
LANSING	RAYMOND	PhD	2003	KEMP	RA	RA	RA
ഥ	YUZHI	PhD	2006	KIRK	TA	TA	RA
Ll	ZHIMIN (H)	PhD	2004	DDM	TA	TA	RA
LUILO	GEBHARD	PhD	2004	CABANISS	TA	TA	TA
MOUSAVI	ALIYAR	PhD	2004	CABANISS	TA	TA	TA
MRUTU	AGNES	PhD	2004	KEMP	RA	RA	RA
MTEI-PETER	REGINA	PhD	2005	KIRK	RA	RA	RA
MYERS	WILLIAM	PhD	2003	TIERNEY	RA	RA	RA
งมนร	BENJAMIN	PhD	2005	WANG	RA	RA	RA
OTTLEY	LEIGH	MS/NT	2007	KEMP			1.15
PARKES	MARIE	PhD	-2007	KEMP			1 4441
PIMENTEL	ADAM	PhD	2007	DDM	TA	TA	E. Chillia
SARIA	JOSEPHAT	PhD	2003	KEMP	TA	TA	TA
EMPOMBE	JOSEPH	PhD	2005	KIRK	RA	RA	RA
EVERNS	VIRGINIA	MS/NT	2006	TIERNEY			
HEN	TING	PhD	2005	TIERNEY	TA	RA	RA
MITH	GREGORY	PhD	2007	GUO	TA	TA	TA
/ANG	LIANGBING	PhD	2004	DDM	RA	RA	RA
/ANG	MIN	PhD	2005	DDM	TA	TA	RA
/ILLIAM	WILSON	PhD	2004	KEMP	TA	TA	TA
/ILLIAMS	ANTONIO	PhD	1999	KIRK	RA	RA	RA
AO	XIN	PhD	2006	TIERNEY	RA _.	RA	RA
E	HEXIN	PhD	2003	WANG	RA	RA	RA
	CHUNCHUN	PhD	2004	DDM	TA	TA	RA
-IANG		PhD	2006	DDM	TA	TA	RA
HANG	HONG [
	HONG LI		2007	TIERNEY	TA I	TA	34.7
HAO HENG	ri -	PhD	2007 2006	TIERNEY	TA	TA	RA
IAO		PhD PhD	2007 2006 2005	TIERNEY LOPEZ MARIANO	TA TA	TA TA	RA RA

Appendix VIII - Departmental Seminar Schedules - Fall 2007 and Spring 2008

August 24, 2007 August 31, 2007 Professor James W. Herndon Department of Chemistry & Biochemistry **New Mexico State University** (Wang) September 7, 2007 September 14, 2007 Professor Chuo Chen Department of Biochemistry University of Texas Southwestern Medical Center "Synthesis of Oroidin Natural Products" (Wang) Professor Fred MacDonnell September 21, 2007 Department of Chemistry & Biochemistry University of Texas, Arlington (Kemp) September 28, 2007 Professor Chengzhi Cai Department of Chemistry University of Houston "Biomolecules on Silicon Surfaces: Synthesis of Building Blocks, Conjugation on to the Surfaces, and Applications" (Wang) Professor Bill Poirier October 5, 2007 Department of Chemistry **Texas Tech University** 66 66 (Guo) NO SEMINAR - Fall Break October 12, 2007 October 19, 2007 Professor Wayne Gladfelter Department of Chemistry University of Minnesota (Kemp) October 26, 2007 November 2, 2007 **Professor Andre Gesquiere Department of Chemistry** University of Central Florida 66 66 (Grev) Dr. Jerome Stavinoha November 9, 2007 Eastman Chemical Company "Epoxybutene. The Development of a Low Cost Process from Butadiene" (Mariano) November 16, 2007 Professor Wei Wang Department of Chemistry and Chemical Biology University of New Mexico 66 66 (Wang) November 23, 2007 NO SEMINAR - Thanksgiving Break

Professor Christian Reber Department of Chemistry

November 30, 2007

Université de Montréal (Grev) December 7, 2007 Professor Michael J. Krische Department of Chemistry and Biochemistry University of Texas at Austin (Wang) January 25, 2008 Professor Jeff Aube Department of Medicinal Chemistry University of Kansas "New Reactions of Alkyl Azides" (Wang) February 1, 2008 Professor Jung-Mo Ahn **Department of Chemistry** University of Texas, Dallas "Development of alpha-Helix Mimetics for Biomedical Applications" (Wang) February 8, 2008 **Professor Greg Cook** Dept. of Chemistry, Biochemistry, Molecular Biology North Dakota State University "New Dimensions in Selectivity with Indium and Bismuth **Promoted Reactions**" (Wang) February 15, 2008 Professor Tarek Sammakia Department of Chemistry & Biochemistry University of Colorado "The Development of the Intramolecular Vinylogous Aldol Reaction and its Application to the Total Synthesis of Peloruside A" (Whalen) **Professor Kevin Burgess** February 22, 2008 **Department of Chemistry** Texas A & M "Chiral Crabtree Catalyst Analogs for Syntheses of Deoxypolyketide Chirons" (Wang) February 29, 2008 **Professor George Schatz Department of Chemistry** Northwestern University "Nanoparticle optical properties and DNA-linked nanoparticle structures: new challenges for theory" (Guo) March 7, 2008 **Professor Scott Weinert Department of Chemistry** (Oklahoma State University) "Synthesis of Discrete Oligogermanes via the Hydrogermolysis Reaction" (Paine)

March 14, 2008 Professor Joe Konopelski

Department of Chemistry & Biochemistry University of California, Santa Cruz

"Methods and Strategies for Heterocyclic Natural Product Synthesis" (Wang) March 21, 2008 NO SEMINAR - Spring Break **Professor Jeremy Smith** March 28, 2008 **Department of Chemistry and Biochemistry New Mexico State University** "One and two electron transformations of high valent iron imido and nitride complexes" (Kemp) April 4, 2008 **Professor Zhen Huang Department of Chemistry** Georgia State University "Chemogenetic Investigation of Nucleic Acid Structure and Function using Selenium as the Atomic Probe" (Wang) Professor Ken Karlin April 11, 2008 Department of Chemistry Johns Hopkins University "Dioxygen Reactivity in Copper and Heme-Copper Coordination Complexes: A Bioinorganic Perspective" (Kirk) April 18, 2008 Professor Alfredo Cardenas Department of Chemistry University of South Florida "Conformational changes and folding of proteins studied with boundary value algorithms" (Evans) **Professor Michael Best** April 25, 2008 **Department of Chemistry** University of Tennessee-Knoxville "Chemical Approaches to the Study of Biological Recognition Events" (Whalen) May 2, 2008 Professor Prakash Reddy **Department of Chemistry** University of Missouri-Rolla "Recent Studies of Stable Carbocations" (Bellew)

> Professor Jason Shearer Department of Chemistry University of Nevada - Reno

(Tierney)

May 9, 2008

"Nickel Superoxide Dismutase: Peptides, Proteins and Models"

ANNUAL REPORT

Department of Communication & Journalism AY 2007-2008 (July 1, 2007-June 30, 2008) John Oetzel, Chair

Significant Developments

This academic year met with several developments. The first and most significant was the accreditation of the journalism and mass communication undergraduate programs. The Accrediting Council on Education in Journalism and Mass Communication (ACEJMC) is the body that details a set of nine standards for journalism and mass communication program. The program was accredited until 2002 at which time we decided to revoke our application for reaccreditation. The 2002 site visit identified some areas of improvement for the department and for the past four years we have been working on correcting these areas and engaging in proactive strategic planning to strengthen our program. We carefully reviewed curriculum, did a thorough assessment of the program, and enhanced alumni relations (among other steps) in preparation for the self-study. The self-study was completed in October, 2007. A site team composed of three faculty members and one journalism professional visited the Department in January 2008. The site team found the program in complete compliance with the nine standards (a necessary requirement since this was a new application toward accreditation). The site team's recommendation is advisory to the Accrediting Committee, which met in March 2008. The Accrediting Committee voted unanimously to accept the site team's recommendation. The Accrediting Committee's decision is advisory to the Accrediting Council, which met in May 2008. The Accrediting Council also voted unanimously to accept the site team and Accrediting Committee's recommendation and the accreditation was official.

A second significant development was the completion of the assessment of the undergraduate communication major. We found that the assessment of the journalism and mass communication programs was very helpful in enhancing and clarifying curriculum and student services. As a result, we decided to engage in a similar type of assessment of the communication program. Assessment tools included the following: (a) use of surveys of students during the program, at graduation, and post-graduation for former students; (b) use of outside evaluators of student portfolios; (c) assessment of student speeches in the core course—public speaking (130); and (d) faculty review of curriculum. Data were collected in Spring 2008 and analyzed during Summer 2008. The final results will be presented to the faculty in early Fall 2008 and the faculty will identify changes to make to the program to enhance student success. A separate report about the assessment of the public speaking curriculum was also completed and changes to the way the course is taught and TAs are trained were implemented.

A third significant development was continued work toward our strategic plan. In AY05-06, we decided that we had four goals for the department: a) to meet the needs of the diverse undergraduate students that we serve, b) to improve our research reputation of the department (including having a strong graduate program), e) to enhance our interdisciplinary and community relationships, and d) create a department climate where we recruit people from different

intellectual perspectives and cultural backgrounds, and help them thrive. Each year, the department crafts action plans to specifically address these four goals. These plans are reviewed annually and committees provide a report to the faculty about progress (and change) towards goals. There is a committee associated with each goal and charged with developing and carrying out the action plan (and three different committees for the undergraduate goal since we have three majors—communication, journalism, and mass communication). Some of the work accomplished in each area includes the following:

- a) Undergraduate: Completed the assessment of student learning for communication majors; completed assessment of public speaking course (a core course); reviewed the curriculum of the communication majors to identify how we are meeting learning objectives; reviewed retention and graduation statistics—found that an average of 83% of majors return each year and 87% of students who graduate from the program do so in six years.
- b) Research Reputation and Graduate Program: Focused on three areas of research experiments in the graduate program: intercultural communication, mass communication and contact, and health communication; program in intercultural communication is ranked 3rd in the country; identified the need to review curriculum to create a strong program and the work will be completed in AY08-09
- c) Interdisciplinary/community relations: Met with our advisory board twice; participated in grant proposal by the Latin American & Iberian Institute to strengthen the international component of our curriculum—the grant was funded and we will teach four courses in AY07-09 that have significant international aspects; worked to strengthen ties with the Robert Wood Johnson Health Policy Center and BA/MD program—a faculty member is focuses work on communication for the RWJ center (White) and the department hired a new faculty member (Rao) in AY07-08 that will have significant teaching and service responsibilities in the BA/MD program.
- d) Diversity—The department created a new committee that is charged with addressing diversity; committee created a diversity plan that identifies activities for recruiting, retaining, and helping faculty, students, and staff from diverse backgrounds; graduation rates for students of color are higher than that of the university, but slightly below those of Whites (ranging from 68-79%);

The Department's strategic plan dovetails nicely with the newly initiated UNM strategic plan and the Department was one of nine programs/departments featured at a Town Hall organized by the President's office is May 2008.

Significant Plans and Recommendations

The future plans include plans associated with the four core goals of our strategic plan and developing resources for the department.

For undergraduate education, we will implement the suggestions from the faculty about the communication major. This will finalize all of the undergraduate assessment for the time being. We have determined that a three year cycle of assessment is appropriate for our programs. The next cycles of assessment will be the following: Journalism and Mass Communication: (Spring 2010); and Communication and Public Speaking (Spring 2011).

For graduate/research, we will be undertaking a coordinating of the curriculum. We are going to organize the curriculum around learning objectives to strengthen the program. We are also taking steps to enhance the research productivity of graduate students. Our students produce many conference papers, and we want to help them turn these into published research. Finally, the faculty have decided that we need to strengthen our public relations efforts around the research that we do. The faculty as a whole is quite productive, but we have done a poor job of communicating these results to the outside world (university, Albuquerque/New Mexico, and our discipline). All of these efforts will be tied to the assessment of the graduate program which we will discuss in January 2009.

For community relations/interdisciplinary relations, we are going to continue our relationship with our advisory board. We are also going to consider ways to develop workshops that benefit the department and community. For example, we are going to continue the success of the 2008 Career Fair when 25 companies and 200 students attended. Additionally, we have developed linkages with the Interdisciplinary Film and Digital Media program.

For diversity, we are going to continue are participation in recruiting fairs for high school students and consider visiting high school programs for recruiting students. The review of the journalism and mass communication programs identifying ways to strengthen the teaching of diversity and will implement these changes in AY07-08. We are one of six departments that received a Mellon Foundation grant proposal that created dissertation fellowships for underrepresented students in six social sciences and humanities (anthropology, sociology, history, linguistics, American studies, and communication & journalism).

Finally, we are committed to enhancing the resources of the department to meet our strategic plan. We have three approaches. First, we are continuing efforts on fundraising. We have had two calendar years (2006 and 2007) that have nearly doubled the amount of money raised the year before and will continue these efforts. We have a development committee that has identifying three goals for the coming year: increasing sales of bricks in our welcome pathway, raising money to name a room after Everett Rogers, and continue strengthening relationships with alumni. Second, we have made efforts to increase grant writing and rewards are evident in the list below. Third, we have realized that the building and equipment are attractive to outside media organizations. We are going to craft a business plan that focuses on the rental of equipment and space for workshops, documentaries, public service announcements, and other activities. These resources will enable us to provide funds for new equipment, travel to conferences/for research, and student awards.

Appointments to Faculty/Staff

Karma Chavez, Assistant Professor Saumya Pant, Assistant Professor Nagesh Rao, Associate Professor Jeanette Albany, Administrative Assistant II

Separations of Faculty/Staff

Krishna Kandath, Assistant Professor

Publications/Creative Work

The department publishes a newsletter available at http://www.unm.edu/~cjdept/. Publications of individual faculty members are listed below.

Karen Foss

- Foss, K. A. A feminist hullabalioo: Reuniting the wild sisters. Women and Language, 30, 38.
- Foss, K. A. (2008). Harvey Milk and the queer rhetorical situation: A rhetoric of contradiction. In C. Morris (Ed.), Queering public address: Sexualities in American historical discourse. Tuscaloosa: University of Alabama Press.
- Foss, K. A. (2008). Rhetoric and gender." In Wolfgang Donsbach (Ed.), *International encyclopedia of communication* (pp. 4253-4257). Malden, MA: Blackwell.
- Krolokke, C., & Foss, K. A. (2007). "Sorg hellere for en solid tremmesent": Feministiske udfordringer til retorikken" ["You'd better build a strong crib": Feminist challenges to rhetoric"]. Rhetorica Scandinavica, 42, 4-19.

Miguel Gandert

Rituales del Tierta y Espiritu,, photographs by Miguel Gandert Exhibition and catalogue Samuel Dorsky Museum of Art, SUNY New Paltz:

The Young Jewelers: Forging a Future,, catalogue portraits of native American artists, Heard Museum

Deliberate Gestures/The Photographic Portrait, University of New Mexico Art Museum, Albuquerque, NM

Identity Expression, Gallery Project: Ann Arbor, Michigan

Miguel Gandert photographer, Bill Thomas writer, Tracks of Time, Washington Post Magazine, April 27, 2008

Dirk Gibson

- Gibson, D.C., Candelario, C, Fletcher, C, Olivas, M, Garcia, A., and Burnet, R. (2008, February). "Commercial Space Tourism and Human Survival." Proceedings of the Space Technology and Applications International Forum. CD Rom. PACS: 01.75.+m; 07.87.+v.
- Gibson, D.C., Warin, R., and Gassaway, R. (2007). "Martha Stewart," In Robert W. Kolb, (Ed). Encyclopedia of Business Ethics and Society. Sage Publications, Inc.: Thousand Oaks, California. 2006-07.
- Gibson, D.C., Garcia, A., and Martinez. C. (2007) "Equal Employment Opportunity." In Robert W. Kolb, (Ed). Encyclopedia of Business Ethics and Society. Sage Publications, Inc.: Thousand Oaks, California. 760-63.
- Gibson, D.C. (2007). "Voluntary Product Recalls." In Robert W. Kolb, (Ed). Encyclopedia of Business Ethics and Society. Sage Publications, Inc.: Thousand Oaks, California. 1774-77.
- Gibson, D.C., Clark, A., and Loveland, G. (2008). "American Bar Association." In Robert W. Kolb, (Ed). Encyclopedia of Business Ethics and Society. Sage Publications, Inc.: Thousand Oaks, California. 72-73.
- Gibson, D.C., Evjen, M., and Roberts, J.L. (2007). "Managed Competition." In Robert W. Kolb, (Ed). Encyclopedia of Business Ethics and Society. Sage Publications, Inc.: Thousand Oaks, California. 1312-14
- Gibson, D.C., Olivas, M., and Roybal, T. (2007). "Egalitarianism." In Robert W. Kolb, (Ed). Encyclopedia of Business Ethics and Society. Sage Publications, Inc.: Thousand Oaks, California. 661-664.
- Gibson, D.C., Fletcher, C, Olivas, M., Garcia, A., Burnet, R. and Lorne, W (2007). "Space Tourism is the Key to Commercial Space Development." Space 2007: Proceedings of the American Institute of Aeronautics & Astronautics. AIAA 2007-6224.
- Gibson, D.C., Warin, R., Armijo, N., Condon, N., Warren, M. and Roybal, T. (2007). "A Quantitative Description of Space Tourism Public Relations Tactics." Space 2007: Proceedings of the American Institute of Aeronautics & Astronautics. AIAA 2007-6225.
- Gibson, D.C., Evjen, M., Roberts, J., Martinez, C., Pick, N., and Pedraza, J. (2007). "Public Relations and the Development of Space Tourism." Space 2007: Proceedings of the American Institute of Aeronautics & Astronautics. AIAA 2007-6224.
- Gibson, D.C., Fletcher, C., Castanon, J., and Gonzales, J. (2007). "Space Tourism Public Relations Functions & Purposes." Space 2007: Proceedings of the American Institute of Aeronautics & Astronautics. AIAA 2007-614.

Judie Hendry

Taylor, B. C., & Hendry, J. (2008). Insisting on persisting: The nuclear rhetoric of "Stockpile Stewardship." *Rhetoric & Public Affairs*, 11(2), 303-334.

Pamela Lutgen-Sandvik

- Lutgen-Sandvik, P. & McDermott, V. (2008). The Constitution of Employee Abusive Organizations: A Communication Flows Theory. Communication Theory, 18(2), 304-333.
- Lutgen-Sandvik, P. (2008). Intensive Remedial Identity Work: Responses to Workplace Bullying as Trauma and Stigma. *Organization*, 15(1), 97-119.
- Lutgen-Sandvik, P. (2007). "But Words Will Never Hurt Me": Abuse and Bullying at Work: A Comparison Between Two Worker Samples. Ohio Communication Journal, 45, 27-52.
- Lutgen-Sandvik, P., Tracy, S. J., & Alberts, J. K. (2007). Burned by Bullying in the American Workplace: Prevalence, Perception, Degree, and Impact. Journal of Management Studies, 44(6), 835-860.

Ginny McDermott

- McDermott, V. M., Detzel, J. G., & White, K. (2008). Ethical paradoxes in community-based participatory research. In M. Dutta-Bergman & H. A. Zoller (Eds.), *Emerging perspective in health communication: Meaning, culture, and power* (pp. 182-202). New York: Lawrence Erlbaum.
- Lutgen-Sandvik, P., & McDermott, V. M. (2008). The constitution of employee-abusive organizations: A communication flows theory. *Communication Theory*, 18, 304-333.

Tema Milstein

- Milstein, Tema. (2008). When whales "speak for themselves": Communication as a mediating force in wildlife tourism. *Environmental Communication: A Journal of Nature and Culture*, 2 (2), 173-192.
- Milstein, Tema. (2007). Watching endangered orcas: The role of communication in balancing marine tourism and sustainability. *International Coastal and Marine Tourism Congress Proceedings*.
- Milstein, Tema. (2007). Animal discourse: How human communication informs and shapes the human relationship with other animals. In Marc Bekoff (ed.) Encyclopedia of Human-Animal Relationships: A Global Exploration of Our Connections with Animals.

 Westport, CT: Greenwood Publishing Group.

Milstein, Tema. (2007). Learning in the field: Engaging students via experience and application. *Ecologue, Fall, 2-4*.

John Oetzel

- McDermott, V. M., Oetzel, J. G., & White, K. (2008). Ethical paradoxes in community-based participatory research. In M. Dutta-Bergman & H. A. Zoller (Eds.), *Emerging perspective in health communication: Meaning, culture, and power* (pp. 182-202). New York: Lawrence Erlbaum.
- Oetzel, J. G., Dhar, S., & Kirschbaum, K. (2007). Intercultural conflict from a multilevel perspective: Trends, possibilities, and future directions. *Journal of Intercultural Communication Research*. 36, 183-204.

Ilia Rodriguez

Rodríguez, I. (2008, July). El valor de la investigación histórica para la teorización sobre la prensa "étnica" en los Estados Unidos: El caso del periodismo en español de Nueva Orleans [The relevance of historical research for the theorization of ethnic press models].
 Razon y Palabra. Primera Revista Electrónica en América Latina Especializada en Comunicación [on-line serial] 63. Available at: http://www.razonypalabra.org.mx/index.html

Richard Schaefer

- Chandrashekar, Santhosh; Burton, Laura; & Schaefer, Richard (2007, Aug.). SafeTeen Safe Driving Program Evaluation. Albuquerque, NM: SafeTeen New Mexico.
- Schaefer, Richard (Reporter and Producer) (2007, Oct. 29). Campesinos. [in-depth news story] KUNM Evening Report. Albuquerque, NM: KUNM-FM.
- Johnson, Katie (Reporter), & Schaefer, Richard (Producer) (2007, Oct. 30). El muro. [in-depth news story] KUNM Evening Report. Albuquerque, NM: KUNM-FM.
- Gonzales, Carolyn (Reporter), & Schaefer, Richard (Producer) (2007, Oct. 31). Regresan. [indepth news story] KUNM Evening Report. Albuquerque, NM: KUNM-FM.
- Zaragoza, Krystal (Reporter), & Schaefer, Richard (Producer) (2007, Nov. 1). Las mujeres. [indepth news story] KUNM Evening Report. Albuquerque, NM: KUNM-FM.
- Bechtol, Eric (Reporter), & Schaefer, Richard (Producer) (2007, Nov. 2). La economía. [indepth news story] KUNM Evening Report. Albuquerque, NM: KUNM-FM.
- Frederickson, Dick (Host), Gonzales, Carolyn (Expert), & Schaefer, Richard (Expert) (2007, Nov. 2). Cross Border Issues Group and immigration. *University Showcase*. Albuquerque, NM: KUNM-FM.

- Schaefer, Richard (Reporter and Producer) (2008, Jan. 9). Bill Richardson, everyone's friend. [news story] KUNM Evening News. Albuquerque, NM: KUNM-FM.
- French, Leonardo (Host), Gonzales, Carolyn (Expert), & Schaefer, Richard (Expert) (2007, Nov. 2). Red Inmigración. Cuernavaca, Morelos, MX: Canal Tres- 103.9-FM.

Olaf Werder

- Clark, A., & Werder, O. (2007). Analyzing International Radio Stations: A Systems Approach. *Interna-tional Communication Gazette*, 69(5), 527-535.
- Werder, O. (2007). Battle of the bulge: A comparison of obesity prevention campaigns in the United States and Germany. *Obesity Reviews*, 8(5), 451-457.
- Werder, O. (2008). Standardization vs. differentiation Cultural influences on English-language and Span-lish-language TV advertising in the US. In: Pedro Rodrigues, Peter Neijens (Eds.), New Trends in Advertising Research, (pp. 85-100). Lisbon, Portugal: Silabo Publishing.

Staff Activities

Mary Bibeau

Memb er of NACADA (National Academic Advising Association)

Member of NMAA (New Mexico Academic Advising Association)

Shirlev Rev Lovato

Conducted training sessions to Department Administrators in the College of Arts & Sciences on a new budgeting software that was implemented in Spring 08 called Banner Budget Planner and Mass Salary Update. This tool was designed to help department administrators accomplish the mass salary updates and the preparation of the fiscal year budgets for I&G and contracts/grant funding

Collaborative efforts with Britton Construction and various contractors to troubleshoot and resolve unfinished building renovation tasks and projects

Received the "2008 Chair's Award for Excellence" in recognition of "Outstanding service to the College of Arts and Sciences" including a \$500 monetary award

Volunteer work for the accounting department of a government contractor that includes assisting the controller with financial reporting, writing up standard operating procedures, and assisting

the payroll administrator to process monthly payroll

Part of a team of professionals who assisted with the recruitment/orientation and hiring processes for a new joint venture in Albuquerque. Worked with approximately 400 new employees regarding explanation of benefits and hiring paperwork within a two day session

Sean Sois viej

Donated use of projector equipment to 516 Arts non-profit arts gallery director Deborah Gavel for local filmmaker screenings.

Provided editing support for "Indigo" documentary produced by Local Community Filmmaker Mary Lance.

Supported Alumni at NM Department of Fish & Game. Redesigned, installed, configured and trained editor for efficient updated workflow.

Provided projectors to 516 Arts non-profit arts gallery for show "Trappings".

Hosted Sony camera workshop for Duke City Shootout and UNM ArtsLab.

Provided camera gear to alumni Uchenna Romaine for production work with Native American casinos and UNM Cancer Research center.

Provided custom-built shared rental database software to Jonathan Longcore of KUNM for gear tracking and management.

Collaborated with Jonathan Longcore of KUNM on development of weekly local audio event streaming.

Assisted UNM's University Communications with video gear and training.

Provided gear to UNM Women's Center Staff Alumni Christina Lovato for UNM video production.

Grants

Patricia Covarrubias

Metaphors to Live and Die For: International Perspectives. Faculty course designer/instructor in a grant/contract funded by the US Department of Education Undergraduate International Studies and Foreign Language (UISFL) Title VIA program and administered by the Latin American and Iberian Institute at the University of New Mexico charged with introducing a new course Metaphors to Live and Die for: Global Perspectives—aimed at internationalizing the

undergraduate UNM curriculum, \$2,500 (from total grant \$79,000), Spring 2008.

New Identities: Danish Women as Muslims. Co-researcher with a collaborator from Denmark. Project charged with studying contemporary and controversial trends with Danish women converting to slam. \$800 from the Feminist Research Institute at the University of New Mexico, Spring 2008.

University of Southern Denmark Research Collaboration Exchange. \$1,500.00 travel grant awarded by the Office of International Programs and Studies at the University of New Mexico. This was he first exchange of the new program between the Department of Communication and Journalism at the University of New Mexico and the Department of Cultural Studies at the University of Southern Denmark. The project involved teaching a course titled, "Health and Identity," 20–28 May 2008 at the Odense and Copenhagen campuses as well as helping graduate students develop research projects. Course participants included two professors/researchers from the University of New Mexico, two from the University of Southern Denmark, and graduate students from the two universities.

John Oetzel

Awarding Agency: US Department of Education Undergraduate International Studies and Foreign Language. The purpose of this Title VIA program was to increase the curriculum with international themes. It was administered by the Latin American and Iberian Institute at the University of New Mexico with cooperation of several academic departments. The C & J department offered two courses over two semesters during this academic year. Principal Investigator: Susan Tiano; Role: Track advisor.

Awarding Agency: Funding Agency: Native American Research Centers for Health (NIH). Project: Community-Based Participatory Research: A National Assessment. Principal Investigator: Nina Wallerstein. The purpose of this project was to identify key characteristics of the CBPR process and create of model of this process. 2-year project. \$300,000. Role: Coinvestigator.

Richard Schaefer

SafeTeen New Mexico Grant (2008, Jan. – Aug.) of \$2,500 to fund an assessment survey, of the SafeTeen Safe Driving Module in New Mexico High Schools, conducted by C&J graduate students Laura Burton and Tatjana Rosev and supervised by Richard Schaefer.

Coordinator for exchange students from Universidad Fray Luca Paccioli in Cuernavaca, Mexico during April 2008. Worked with the broadcast students to produce video, radio and presentation projects for dissemination in Morelos, Mexico and New Mexico. (\$2,545 from UNM Student Affairs)

Coordinator for exchange students from University of New Mexico during July 2008. Worked with students from UNM to in Central Mexico, Chiapas and Guatemala to produce projects for broadcast and presentations in Morelos, Mexico and New Mexico. (\$2,000 from UNM Student Affairs plus \$2,300 from Universidad Fray Luca Paccioli in Cuernavaca, Morelos, Mexico)

Olaf Werder

Awarding Agency: Research Allocation Committee, University of New Mexico.

Amount: \$6,219, Project Period: 1-year award, 2008.

Culture's influence on health policy: A systemic analysis of health literacy levels in Denmark and the United States. The purpose of the project was to examine whether health literacy problems are culture-bound, i.e. whether certain cultures are better equipped to deal with the literacy problem. Principal investigator, Olaf Werder.

Awarding Agency: National Institute of Child Health and Human Development Amount: \$275,000, Project Period: 5/1/08-4/30/10

Project Title: Adolescents Committed To Improvement of Nutrition and physical activity (ACTION)

Project Description: Cooperative project between various main campus and HSC campus departments within UNM. The primary goal of the proposed study is to use Community Based Participatory Research (CBPR) and social marketing methodologies to develop a media-based educational curriculum to use in combination with clinical management by primary care providers for overweight adolescents.

Principal Investigator: Alberta Kong, M.D., M.P.H.

Co-Investigator

Awarding Agency: Office of International Programs and Studies

Amount: \$1,500, Project Period: May 08

University of Southern Denmark Teaching/Research Collaboration Exchange Travel Grant. The purpose of this exchange is to critically examine examples of health communication that take place cross-culturally in advertising, health campaigns as well as in various healthcare practices from the Danish and US perspectives. In addition, a joint seminar is taught on location in Denmark.

Judith White

"An Examination of Sources and the Sourcing Process Used by Reporters and Public Information Officers in Writing Science, Health or Technology News Stories and News Releases" PI: Judith McIntosh White University of New Mexico, (RACS grant) April 2008-Sept. 2008; \$1700

"Teaching Public Relations Online" PI: Judith McIntosh White University of New Mexico, (TACS grant) December 2007-December 2008; \$2448.00

Department of Earth and Planetary Sciences

Annual Report

July 1, 2007 – June 30, 2008

John W. Geissman, Chair

I. GENERAL DEPARTMENTAL INFORMATION

FACULTY AND STAFF

PROFESSORS:

Carl Agee, Ph.D., University of Columbia, 1988.
Yemane Asmerom, Ph.D., University of Arizona, 1988.
Adrian J. Brearley, Ph.D., University of Manchester, (United Kingdom), 1984.
Laura J. Crossey, Ph.D., University of Wyoming, 1985.
John W. Geissman, Ph.D., University of Michigan, 1980.
David Gutzler, Ph.D., Massachusetts Institute of Technology, 1986. (Regents Lecturer Karl E. Karlstrom, Ph.D., University of Wyoming, 1981.
Barry S. Kues, Ph.D., Indiana University, 1974.
Leslie D. McFadden, Ph.D., University of Arizona, 1982.
Jane Selverstone, Ph.D., Massachusetts Institute of Technology, 1985. (Regents Lecturer)
Gary Smith, Ph.D., Oregon State University, 1986.
Zachary Sharp. Ph.D., University of Michigan, 1987.

ASSOCIATE PROFESSORS:

Maya Elrick, Ph.D., Virginia Tech. University, 1990.
Peter Fawcett, Ph.D., Pennsylvania State University, 1994.
Tobias Fischer, Ph.D., Arizona State University, 1999.
Rhian H. Jones, Ph.D., University of Manchester, Great Britain, 1986.
Grant Meyer, Ph.D., University of New Mexico, 1993.
Mousumi Roy, Ph.D., Massachusetts Institute of Technology, 1997.
Louis A. Scuderi, Ph.D., University of California, Los Angeles, 1984.
Gary Weissmann, Ph.D., University of California, Davis, 1999

ASSISTANT PROFESSORS:

Joseph Galewsky, Ph.D., University of California, Santa Cruz, 1996

SENIOR RESEARCH PROFESSORS:

Roger Y. Anderson, Ph.D., Stanford University, 1960. Cornelis ("Kase") Klein, Ph.D., Harvard University, 1965. Wolfgang E. Elston, Ph.D., Columbia University, 1953. Lee A. Woodward, Ph.D., University of Washington, 1962.

RESEARCH PROFESSORS:

Horton Newsom, (Institute of Meteoritics), Ph.D., University of Arizona, 1981. Franciscus J.M. Rietmeijer, Ph.D., Rijksuniversiteit-Utrecht, Netherlands, 1979. Charles K. Shearer, Jr., (Institute of Meteoritics), Ph.D., University of Massachusetts, 1983. David Draper, (Institute of Meteoritics), Ph.D., University of Oregon, 1991 Penny King, (Institute of Meteoritics), Ph.D., Arizona State University, 1999.

LECTURERS:

Amy Ellwein, Lecturer III (Natural Sciences Program)
Matthew Nyman, Lecturer III (Natural Sciences Program), Ph.D., Virginia Tech University
Paula Watt, Lecturer III, Ph.D., 1996, University of New Mexico
Timothy F. Wawrzyniec, Lecturer III, Ph.D., University of New Mexico

PROFESSOR EMERITUS:

Roger Y. Anderson, Ph.D., Stanford University, 1960. Wolfgang Elston, Ph.D., Columbia University, 1953 Rodney C. Ewing, Ph.D., Stanford University, 1974. James J. Papike, Ph.D., University of Minnesota, 1964. (Regents Professor). Lee A. Woodward, Ph.D., University of Washington, 1962.

RESEARCH STAFF:

Mehdi Ali, Senior Research Scientist I, Ph.D., University of Arizona, 1989.

Viorel Atudorei, Research Scientist III, Ph.D., University of Lausanne, Switzerland, 1998.

James Connolly, Research Scientist III, M.S., University of New Mexico, 1981.

Jed Frechette, Research Scientist III, M.S., University of New Mexico, 2007.

Shenghong Huang, Research Scientist I, Ph.D., University of New Mexico, 2007.

David T. Lescinsky, Research Scientist III, Ph.D., University of Arizona.

Peng Li, Senior Research Scientist I, Ph.D., University of Virginia, 2003.

Victor Polyak, Senior Research Scientist I, Ph.D., Texas Tech University, 1998.

Aurora Pun, Adjunct Assistant Professor, Ph.D., University of New Mexico, 1996.

Michael N. Spilde, Research Scientist III, (Institute of Meteoritics), M.S., South Dakota School of Mines and Technology, 1987.

Timothy Wawrzyniec, Research Scientist, Ph.D., University of New Mexico, 1999.

POST-DOCTORAL RESEARCH SCIENTISTS:

Jamie Barnes, Ph.D., University of New Mexico, 2006 Joya Tetreault, Ph.D., University of Colorado, 2007

ADJUNCT PROFESSORS:

Bruce Allen, University of New Mexico, 1993.
Warren S. Baldridge, Ph.D., Caltech University, 1978.
M. Susan Barger, Ph.D., Pennsylvania State University, 1982.
John D. Bloch, Ph.D., The University of Calgary, 1989.
Mark B. E. Boslough, Ph.D. Cal Tech.
Michael Crane, M.S., University of New Mexico, 1997
Corey Fincher, M.S., University of New Mexico, 2005
Fraser E. Goff, Ph.D., University of California, Santa Cruz, 1977.
Grant H. Heiken, Ph.D., University of California, Santa Barbara, 1972.
Claudia Lewis, Ph.D., Harvard University, 1994.
Spencer G. Lucas, Ph.D., Colorado School of Mines, 1994.
Duane M. Moore, Illinois State Geological Survey

Claudia Mora, Ph.D., University of Wisconsin,
Donald Peterson, Ph.D., Stanford University, 1961.
Aurora Pun, Ph.D., University of New Mexico, 1996.
Walter C. Riese, Ph.D., University of New Mexico, 1980.
John Shomaker, Ph.D., University of Birmingham (United Kingdom), 1995.
Gregory Valentine, Ph.D., University of California, Santa Barbara, 1988.
Erik Webb, Ph.D., University of Wisconsin, Madison.
Thomas Williamson, Ph.D., University of New Mexico, 1993.
Yifeng Wang, Ph.D., Indiana University, 1993.
Jolante van Wiik

STAFF:

Mary Bennett, Accountant II
Mabel T. Chavez, Editorial Technician
Shannon Clark, Program Coordinator, Institute of Meteoritics
Eileen Embid, Editorial Specialist
Mark Fleharty, System Administrator
Gilbert E. Griego, Harding Mine Maintenance Mechanic
Cindy Jaramillo, Administrative Assistant III
LeeAnn Lloyd, Administrative Assistant II, Institute of Meteoritics
Robert Macy, Research Engineer II
Bryan MacFarlane, Field Research Assistant
Paula Pascetti, Department Administrator
Anthony Velardez, Facilities Service Technician
Peter Kindilien, Systems Analyst 3

VISITING SCIENTISTS:

Roberto Molina-Garza, UNAM
Michael Petronis, New Mexico Highlands University
Daniel Holm, Kent State University
Kent Condie, New Mexico Tech
Ulrike Werban, UFZ-Centre for Environmental Research in Leipzig, Germany
Morgane LeBrun, Ecole Normale Superieur de Geology, Nancy, France
Leslie Melim, Western Illinois University
Dr. Jeff Grossman, USGS, Reston,
Rhawn Denniston, Cornell College

DEPARTMENTAL STANDING COMMITTEES, 2007-20081

GRADUATE COMMITTEE

T.Fischer

J. Selverstone

P. Fawcett (Sabbatical, Fall '07)

Y. Asmerom

L. Scuderi

K.E. Karlstrom

R. Jones

GRADUATE ADMISSIONS COMMITTEE

G. Meyer

Z. Sharp

C. Agee

R. Jones

M. Elrick

M. Roy

INSTRUMENTATION AND FACILITIES

Z. Sharp

C. Shearer

T. Fischer Y. Asmerom

C. Agee

V. Atudorei

A. Brearley

UNDERGRADUATE COMMITTEE

D. Gutzler

G. Weissmann

G. Smith

M. Nyman

M. Elrick

L.J. Crossey

L.D. McFadden (Sabbatical Spring, 08)

COMPUTATIONAL FACILITIES

J. Galewsky

D. Gutzler

J. Connolly

M. Roy P. Fawcett (Sabbatical, Fall 07)

T. Wawrzyniec

GEOCHEMISTRY LABORATORY COMMITTEE

L. Crossey

Z. Sharp

Y. Asmerom

M. Ali

M. Elrick

J. Selverstone

G. Weissmann

FACULTY PRODUCTIVITY ASSESSMENT

J.W. Geissman

J. Selverstone

L. Scuderi

P. Fawcett

T. Fischer

COLLECTIONS COMMITTEE

B. Kues

G. Smith

GRADUATE ADVISOR

M. Roy

¹ Committee Chair underlined.

UNDERGRADUATE ADVISORS

G. Weissmann (Env. Sci)

M. Elrick (E&PS)

L.J. Crossey (E&PS and Env. Sci., Also Honors

Advisor)

P. Watt (All Course Equivalency checks)

LIBRARY LIAISON

B. Kues

VEHICLES

K.E. Karlstrom

P. Pascetti

A. Velardez

SAW ROOM

T. Wawrzyniec

ALUMNI NEWSLETTER EDITOR

B. Kues

ALUMNI RELATIONS

J. Galewsky

J. W. Geissman

T. Wawrzyniec

FACULTY REPRESENTATIVE TO CASWELL SILVER BOARD

J. Galewsky

HYDROLOGY SEARCH

G. Weissmann

L.J. Crossey

M. Roy

J. Galewsky

D. Gutzler

FIELD COMPUTATIONA FACILITIES

L. Scuderi

G. Meyer

K. E. Karlstrom

T. Wawrzyniec

J.W. Geissman

DIVERSITY AND HUMAN RESOURCES COMMITTEE

Y. Asmerom

M. Roy

G. Weissmann

M. Elrick

L.J. Crossey

APPOINTMENTS AND SEPARATIONS

APPOINTMENTS TO FACULTY

Paula Watt, Lecturer III

SEPARATIONS FROM FACULTY

Paula Watt, Lecturer III

SEPARATION FROM STAFF

Peng Li, Senior Research Scientist I, Ph.D. Bryan MacFarlane, Field Research Assistant ********************

II. ACTIVITIES, ACHIEVEMENTS, AND PLANS

INTRODUCTION

This annual report summarizes the activities, accomplishments and plans of the Department of Earth and Planetary Sciences (E&PS), during the academic year 2007-2008. It also includes, when appropriate, some relevant information for the Institute of Meteorities and Astromaterials Institute (IOM; Professor Carl Agee, Director and Full Professor in the Department), a Category II Institute in the College of Arts and Sciences that has been closely affiliated with the Department since 1967. Most details of faculty activities (Part III), including faculty, staff, and student publications, however are derived from biographical supplements for calendar year 2007. Therefore, published papers, chapters and other documents included in the report, for example, are only for that year. Because this is the only document that comprehensively summarizes the Department's history during the past year and it is used as a source of information by interested parties within and outside of the University, we have attempted to make it as complete as possible.

During academic year 2007-2008, the faculty of the Department of Earth and Planetary Sciences consisted of 21 regular tenured or tenure-track faculty, 3 Lecturers and 9 Senior Research Professors and/or Research and Research Associate Professors. In addition, 12 Ph.D.-level research scientists (five within IOM and one M.S. level research staff member) filled several non-faculty positions within the Department. Most of these individuals are scientific staff with specific responsibilities relating to analytical laboratories and departmental research activities. Also, the Department has five emeritus faculty members, four of them retain offices in Northrop Hall and are still actively engaged in scientific research. Finally, the Department has a large number of Adjunct faculty members, nearly all of whom have Ph.D.s and who are engaged in various collaborative research projects involving other faculty and staff members and graduate and undergraduate students. A few Adjunct Professors are retired, eminent scientists from other institutions and who spend parts of their last, but highly productive years of their research careers at UNM. The Departmental faculty is thus augmented by many Earth and Planetary scientists, with Ph.D., or Master's degrees, who in some cases participate in teaching and advisement of graduate students, adding in important and beneficial ways to the research capabilities and scholarly reputation of the Department.

The permanent scientific staff in the Department and IOM also includes several technicians and Research Associates. The office administrative, clerical, and support staff also contribute vitally to the functioning of the Department. Several other scientists affiliated with other institutions were in residence in the Department for periods ranging from weeks to the entire year, conducting research as visiting scientists and working with faculty and staff members. The names of all these departmental personnel are included in the first section of this report and in the Appendix.

FACULTY AND STAFF ACCOMPLISHMENTS

Instructional Activities

1. Student enrollments

Student enrollments in Department of Earth and Planetary Sciences courses during the 2007-2008 academic years, as indicated by total student credit hours (SCH), totaled 9348 for regular courses, and 10444 counting Natural Sciences Program courses (see Table below). These figures represent a continued modest increase from the 2005/06 academic year, when we saw the first year of overall student credit hour decline after six straight years of increases in SCH associated with courses offered in Earth and Planetary Sciences. These figures include academic year courses plus our two summer courses (E&PS-319L and 420L in early summer in 2008 as well as student credit hours generated by courses that are part of the now seven -year old Department degree program in Environmental Sciences (Env. Sc.). The Department's SCH figures for the past 11 years are given below.

Year	SCH	SCH (with Natural Sciences)	% change from previous year	
			regular	Inc. N.S.
1997-98	5882	6534	-6.7	+ 3.7
1998-99	5705	6777	-3.0	+3.7
1999-00	6464	7580	+13.3	+11.8
2000-01	6752	7812	+4.5	+3,1
2001-02	7041	8181	+4.3	+4.7
2002-03	8417	9953	+19.5	+21.7
2003-04	8705	10,061	+4.4	+2.1
2004-05	8930	10,190	+2.58	+1.28
2005-06	8653	9977	-3.10	-2.09
2006-07	8813	10,177	+1.8	+2.0
2007-08	9348	10,444	+6.07	+2.6

Over the past nine years, there has been an overall increase of some 75% (for E&PS courses only) since academic year 1999-00 and overall E&PS SCH productivity has returned to levels last observed during the late 1980s. In fact, the numbers of students in many of our core E&PS courses is at near record highs, and continues to seriously tax our teaching facilities and resources.

In the past several annual reports, we have emphasized the considerable increases in E&PS enrollments since 1999-00. These increases have occurred in part because of overall enrollment increases at UNM during this time period, although the rate of increase has declined over the past few years. The percentage increase in SCH for Earth and Planetary Sciences is considerably larger than the overall increases in SCH for both UNM as well as the College of Arts and Sciences over this time period. The increases certainly reflect the increasing popularity of the Environmental Sciences 101 (Blue Planet) sections and associated laboratory course, Env. Sci. 102L. In fact, in the context of preparing our course teaching schedule for Spring, 2009, we are facing the need to add at least one additional lecture section of Env. Sci 101, and several Env. Sci. 102L sections. Accordingly, in the report from three years ago, we also indicated that the Department very much appreciates receiving additional TA and GA support from the College (mainly associated with the "Success funds") to aid in the Department's academic mission in recognition of the need for additional TAs and related support associated with the increased enrollments and new laboratory sections. The small decreases in student credit hour production we observed in the 2005-06 AY (again, the first after six straight years of increases) seems most likely to reflect the overall slight downturn in UNM and College enrollments also observed during that AY. In our recent reports, we emphasized that we were not overly concerned that this relatively small decrease was indicating the inception of a worrisome, longer-term trend. This past 2007-08 AY numbers are consistent with overall strong course enrollments over the past several years. Nevertheless, the faculty does understand the importance of maintaining these enrollments, and when possible, attempting to increase them in measured and appropriate ways.

2. Developments in Course Offerings

As always, the tenure-stream faculty continued to teach over 90 percent of the courses offered during academic year 2007-08. The small number of courses taught by "Part-time Instructors" and Lecturers are by researchers who have a strong affiliation with the Department, sometimes through "Adjunct Professor" status, such as Dr. Aurora Pun, Dr. Thomas Williamson (Dinosaurs and their World); and Dr. Tim Wawrzyniec (Petroleum Geology, and New Mexico Field Geology).

Several new additions to our course offerings continue to have success. In the Spring of 2008, Dr. Laura Crossey offered a special 400 level course in Environmental Field Methods, a timely course needed by our increasingly large group of Environmental Science majors. Dr. Rhian Jones also continued to offer a new course at the 400 level entitled Analytical Methods in Geochemistry. Both faculty members intend to use this experience as a basis for the development of formal, new courses essential to our curriculum. After an initial complete overhaul of a critical course in the undergraduate degree program, E&PS-433 (Statistics and Data Analysis), two years ago, Drs. Dave Gutzler and Mousumi Roy continued to develop a very well-subscribed, and completely redesigned and reorganized course. On the basis of their experience teaching this course two years ago, they continued to co-teach the course during the 2007-08

AY and will do so in the 2008-09 AY. Dr. Dave Gutzler also led a new graduate seminar (E&PS-548) on the topic of "drought". This seminar proved to be quite popular amongst graduate students, not the least because of the highly timely nature of this topic, one of great interest to the good citizens of the State of New MexicoFinally, Dr. Louis Scuderi and Dr. Tim Wawrzyniec taught a graduate level topics course in the use of GIS/Geopad technology for field geologic studies. The course was fully subscribed, and many of the graduate students continued to use geopads for their graduate research over the summer months. The course will be again taught in Spring, 2009.

The Department continues to assume responsibility for the Natural Sciences Program, which consists of a sequence of three courses integrating the Natural Sciences for College of Education students who will become K-9 teachers in New Mexico's public schools. This program provides potential public school teachers with solid training in science and in the effective teaching of science to younger students. In 2007-2008, 17 classes were offered, again producing over 1096 student credit hours, a significant contribution to the total SCH produced by the Department. The continuing integration of Natural Sciences Program and geoscience education into the Department is an important goal for the Department. Dr. Matthew Nyman, recently appointed in a new Lecturer position in the Department as the Natural Science Program Director, also continued to direct the operation of this program. So far, he has been successful in many respects developing additional courses in the Natural Science Program, helping develop important new contacts and collaboration at Sandia National Laboratory with key scientists, as well as helping to acquire new funding through grant proposals. Late in the 2006-07 AY, a search was conducted for an additional Lecturer position in the Natural Sciences Program, and that position was filled in January, 2008, by Amy Ellwein, Ph.D., candidate in the Department of Earth and Planetary Sciences, who will be completing her Ph.D., in Spring, 2009.

3. Summer Course Offerings

During the early part of Summer, 2008, the Department conducted its 3-week Introductory Field Geology (E&PS-319) and Advanced Field Geology (E&PS-420) courses as well as E&PS 101, and E&PS 105L. The Field Volcanology Course (E&PS-453), which, historically, has been taught every other year, was not taught this past summer. It is unlikely that this course will be taught in Summer, 2009.

Curriculum Changes and Outcomes Assessment

The only significant change in the E&PS curriculum in 2007-2008 was the addition of a well-subscribed graduate level course in the linking of GIS-based technologies with portable, field-ruggedized computers (Geopads), taught by Professor Louis Scuderi and Dr. Tim Wawrzyniec, Lecturer III.

Plans for outcomes assessment occupied a considerable amount of time by several faculty in the Department, during the 2007-2008 academic year, in anticipation of a formal outcomes assessment program in place at UNM. The Department prepared comprehensive Goals/Objectives and corresponding Outcomes for ALL of its programs (E&PS BS, E&PS BA, Env.Sci., B.S., and Graduate Program), and has provided numerous TENTATIVE examples of specific outcome assessment plans for each of the programs. The Department does continue to utilize many procedures adopted during the last effort by the University to develop such program. For example, all graduate exams are formally evaluated with specific outcomes assessment goals in mind; and we continue to offer key courses for our seniors in both the conventional Geoscience as well as the Environmental Science Programs that are designed to fulfill "capstone course" goals.

Research and Publication

The faculty, research staff and students of the Department continued their high level of productivity in research in 2007-08. Research is an essential and fundamental function of the Department of Earth and Planetary Sciences at UNM, as it should be in any academic department at a research university. As we have repeatedly noted in past annual reports, the Department's status and respect within its discipline depends primarily on the quality and quantity of its research, and its collective ability to attract external funding for research activities as well as high-quality graduate students in its Graduate Program, just as a university's stature depends mainly on the

scholarly activities of its entire faculty. Indeed, the highly favorable outcome of the external review of the Department in the 2003-04 AY strongly reflects this. The Department anxiously awaits the outcome of the long-awaited NRC report on the rankings of graduate programs in the sciences. This report was due to be released in February, 2008, and, at the time of preparing this report, it appears that the NRC report may be released before December, 2008. Notably, with an essentially non-changing instructional and general (I&G) budget (thus decreasing in real dollars), overhead return funds continue to be used for a wide range of purposes to augment research activities in the Department. The 2007-08 year saw an unprecedented array of financial crises (i.e. the late August, 2007, announcement of the very large and growing debt in the Office of the Vice Provost for Research and Economic Development, OVPRED) and a complicated array of possible responses to these financial difficulties by the Central Administration. The Department of Earth and Planetary Sciences is very concerned about a potential loss in overhead return to the Department. Part of the reason for this concern is the fact that the (partial) salaries of several key staff in the Department are paid using overhead return funds, a practice we were instructed to carry out by a previous Dean of the College of Arts and Sciences.

Our active research programs form an essential teaching tool in keeping undergraduate and graduate students up to date, in educating them not only about facts but also about how knowledge is gained, and (especially with graduate students) providing support for thesis/dissertation work and in the mentoring process of future geoscientists.

During calendar year 2007-08, members of the Department tenure-stream faculty produced over one hundred publications, and these are primarily scholarly papers in refereed journals and edited volumes, but they also include geologic maps and other important publications (see section III). Most of these publications are papers published in major national and international journals (also see University of New Mexico Faculty Publications and Creative Works, 2007). Department and IOM research scientists and graduate students collectively also published a large amount of research (see The Annual Report of the Institute of Meteoritics, 2007). Department faculty, staff and students also were included as contributing authors on over 170 abstracts of papers presented at numerous professional meetings and conferences. Although publications by Department Adjunct faculty are not formally included in this report, many Adjunct faculty are also quite active with respect to publishing results of their research. Part 4 of Section III includes additional information concerning the research activities of some of our Adjunct faculty members.

As with the past several years, graduate students and several undergraduates participated significantly in the Department's publication effort (see section IV). Many refereed papers published in 2007-08, as well as those submitted this year, had student coauthors and students also contributed to many of the published abstracts based on presentations made at professional meetings. At the Geological Society of America meeting in Denver, over 15 students, including two undergraduates, presented their research; at the Fall American Geophysical Union meeting, in San Francisco, 16 students, including three undergraduates, presented their research work. Numerous graduate students also presented work at Sectional Meetings of the Geological Society of America and at the Spring Meeting of the New Mexico Geological Society. The Department faculty continues to be strongly committed to involving students at both the graduate and undergraduate level in research, to encourage them to present the results of their research through professional talks, and to publish the results of their research in appropriate venues. All of these activities will clearly play an important role in their preparation for careers in the Earth Sciences.

E&PS and IOM have and continue to be very successful in acquiring substantial funding from several external agencies in support of its research and teaching mission (see section III, part 3). Contracts and grant awards to faculty and staff in the Department of Earth and Planetary Sciences during 2007-08 totaled over \$2.5 million, with over 45 active research grants held by faculty in Earth and Planetary Sciences. Also, research scientists and E&PS faculty in the Institute of Meteoritics were awarded over \$1.5 million in funding associated with several grants, mostly associated with research supported by NASA. During the 2006-07 year, in a combined effort with the School of Engineering, the Department was successful in obtaining funding (\$675,000) from the National Science Foundation for a focus ion beam scanning electron microscope (FIB/SEM), which has been delivered and is now being installed in the Electron Microbeam Analysis Facility in the basement of Northrop Hall. This instrument represents a major step forward in obtaining state-of-the-art instrumentation for nanoscience and nanotechnology research on the UNM campus and opens up substantial new research opportunities in the areas of nanocharacterization, nanomachining and nanofabrication. The successful proposal with Professor Abhaya Datye, Chemical and Nuclear Engineering as

Principal Investigator and coPIs Adrian Brearley (E&PS) and Zayd Lesemann, Mechanical Engineering was funded through the NSF Major Research Infrastructure Program.

UNM scientists in other Departments or Colleges/Schools often are awarded research grants and contracts that involve the utilization of E&PS analytical facilities, including the TEM, stable isotope, radiogenic isotope, analytical chemistry, and paleomagnetism laboratories in support of the research activities associated with those awards. This represents another important avenue by which E&PS researchers contribute to research and acquire external funding for UNM.

In addition to publications and grant/contract-supported research, the E&PS faculty and research staff also pursued numerous research projects during 2007-08 that were not externally funded or published upon during the year (see Section 3). Eventually many of these creative works do ultimately receive funding following the second or even third time proposal requests are submitted, reflecting both improvement in the focus and/or overall quality of the proposal, or the availability or increase in funding in associated areas of NSF and other funding organizations, or both. Finally, it is essential for UNM administrators to recognize that the quality and long-term scientific impacts of research conducted by faculty, staff and students in the Department are not at all necessarily directly correlated to the size of the contracts and grants that support such research. Historically, E&PS faculty have understand the importance of producing IDC funds to the university, the College and the Department, but we also understand the even greater importance in the long term of the importance of the knowledge and understanding of nature and the degree to which we can impart this to our students. We hope our administrators also understand this, and hope that UNM does not follow the "lead" of other institutions of higher learning that have opted to place a premium on specific types of research as well as specific funding levels insofar as tenure, promotion and other important measures of achievement are recognized in academia.

Other Scholarly Activities

As reported in previous Annual Reports, most of the faculty and research staff participated widely outside the University in various professional activities at the state, national and international levels during 2007-2008. These activities include service on society committees and science review panels of governmental agencies, as well as participation in professional organizations, such as presenting talks and posters at national meetings, organizing and chairing symposia, leading field trips, and serving as officers. Such activities represent an important form of service to the profession, but also increase professional recognition, the opportunity for collaborative research, and leads to greater visibility for UNM and the creative work of its faculty. This participation is shown in sections III and IV.

Participation by the faculty and research staff as Editors, Associate Editors, and on Editorial Boards of national and international journals was substantial in 2007-08 as it has been in the past. For example, Dr. Karlstrom is serving a four-year term as co-Editor of the Bulletin of the Geological Society of America. In addition, Dr. Geissman, who was the GSA Bulletin Editor for six years from 1995-01, is currently the Chief Science Editor for EOS, the weekly news journal of the American Geophysical Union, an international society of over 60,000 members. Several faculty are members of Journal Editorial Boards. Also, several faculty members participated in scholarly and professional activities in numerous foreign countries. Such activities help to advance UNM's reputation nationally and internationally.

University and Public Service

Service to the College, University and to the citizens of New Mexico is an important component of the Department's activities. E&PS Faculty members are heavily involved in different areas of service to the College, University and Community. A few selected examples of this service that illustrate the diverse nature of this service include: (1) Invited specialty talks to groups in the community (e.g., Indian Pueblo Cultural Center, New Mexico Native Plant Society, Rotary Club) (2) Participation in radio programs broadcasting features involving diverse topics in the Earth and Environmental Sciences (e.g., KUNM), including global warming and the energy crisis in the hopes of educating New Mexico citizens about how eight years of totally failed federal administrative policies require

immediate attention; (3) Several, typically pro-science based articles as contributions to the Albuquerque Journal, including on global warming, energy sustainability, and the never-ending perception by less than intelligent individuals concerning the difference between faith and science, and many other major newspapers; (4) Coaching youngsters in sporting activities to help promote healthy American values.

An important activity provided by the Department to the University and the public is maintenance (without direct University support) of two public museums, one devoted to geology and specifically the geology of New Mexico (minerals, rocks, fossils) and the other to astromaterials (e.g., meteorites). These museums are open each weekday, are free, and are visited by thousands of school children and adults each year. A free pamphlet provides information for a self-guided tour, and faculty and graduate students on occasion lead tours when arrangements have been made in advance. Thousands of recorded (group) visitors toured the Geology Museum in 2007-08; and many (unrecorded) individuals also visited the museum. These visitors include dozens of elementary, middle, and high school classes from around New Mexico, together with teachers and parents (see Appendix for a complete list). The Geology Museum and collections constantly receive donations of new materials, and donated funds are used to purchase several display-quality specimens each year. The Geology Museum was again represented by Dr. Gary Smith at the Annual Tucson Gem and Mineral Show, the nation's largest, during the AY 2007-08. Our museums were highlighted in Dr. Mike Mares' "Linking Time, Place and Culture: The Museums and Collections of UNM" presentation on Monday, 1 October, 2007, as part of the UNM Connect celebration week.

Another important form of service the Department provides to the University is through assistance lent to the Institute for Medieval Studies. Research and other activities conducted by the Institute contribute in many important ways to the dissemination, publicizing and understanding of Earth, environmental and planetary sciences, both within the University community and the public. In 2007-08, the Department was again pleased to help support and sponsor this historically very successful lecture series.

The Department also maintains the Harding Pegmatite mine in southern Taos County, donated to UNM by Dr. Arthur Montgomery, as an unusual mineral-collecting locality and outdoor geological laboratory. Mr. Gilbert Griego, a Department staff member, is the long-time caretaker of the property. Over 1000 people visited the Harding property in 2007-08, and they came from all over the country (see Appendix). Among the visitors were mineralogy and field geology classes from several other universities, in addition to students from UNM. Clearly, the Harding Mine is very well known to geologists and amateur rock hounds and mineral collectors, and in maintaining and operating it, the University and Department perform a notable service for the public. The Department welcomes visitors and voluntary contributions to help maintain this resource, but permission from the E&PS Department must be obtained before each visit. Working with the State of New Mexico, the Department and UNM are in the process of placing security gates on several of the mine entrances, for the sake of the safety of its visitors.

GENERAL DEPARTMENTAL ACTIVITIES

Facilities

Capital Improvements

Over the past few years, a number of major and minor capital improvements have taken place in Northrop Hall, although, as we continue to point out in these Annual Reports, additional upgrades are still clearly needed. In Spring, 2004, the College, with help from the UNIM Physical Plant, supported the costs of purchasing and installing a backup electrical power generator for specific analytical research facilities in Northrop Hall. This system was installed in the Fall of 2005. With increasing need for a superior backup power generation system, the Department was able to upgrade this initial system in Spring, 2007, using funds provided by the College, Department, and Institute of Meteoritics. As noted in previous reports, the presence of such a system is crucial to Northrop Hall, as several times in the past few years, including in July, 2008, when our newly installed XRF instrument in the Analytical Geochemistry Laboratory was seriously damaged, unplanned power outages have caused serious damages to instruments in the Department's laboratories at a cost of several thousand dollars and lost research and teaching time.

As first reported in the Annual Report from three years ago, recently departed Provost Reed Dasenbrock developed a plan to use State of New Mexico bond funds to construct a new building to house the "Science and Math Learning Center". With the passage of the state bond issue, about \$25,000,000 is available to support construction of a new four or five story building that will house the Department of Mathematics, and also freshman Chemistry laboratories, some Biology laboratories, and one large lecture hall and several computer-based classrooms. The Department of Earth and Planetary Sciences will have about 5000 square feet of space designated in this new building for the Natural Sciences Program laboratory/classroom, office space for the Natural Sciences Program, a laboratory/classroom for the E&PS Physical Geology lab, and, as a shared space with Biology, a laboratory/classroom for the Environmental Science Program labs. The availability of this new space will go a long way towards relieving a rapidly increasing "space problem" in Northrop Hall that has been exacerbated over the past few years with growth of E&PS faculty, staff and laboratories. The Department greatly appreciates the keen interest by the College of Arts and Sciences over the past 2007-08 year in fostering the development of the Science Math Learning Center and it looks forward to the actual initiation of construction, sometime in 2009.

In 2007-08, no institutional requests for new equipment and major capital improvements were submitted, as no University-level funds were then available to support them.

We continue to upgrade the Department's facilities, including those directly related to teaching, as needed with available funds, from a number of sources. In 2007-08, the faculty voted on a proposal to utilize the annual College "Instructional Equipment Allocation funds to upgrade the Department's classroom computational facilities with a new large format plotter, as well as to add considerable additional memory for the Department server. The proposal was funded by the College, and new plotter was in place by the time of several annual geoscience meetings in Fall, 2007, and has received heavy use. The additional memory for the Department server has greatly broadened our teaching and research capabilities.

Analytical Facilities

The Department and Institute of Meteoritics continue to maintain an array of outstanding and growing analytical facilities necessary to advanced research in many areas of the Earth Sciences. As mentioned above, these facilities are also utilized extensively by other departments and high-tech centers on campus, as well as institutions outside UNM (e.g., the National Labs). Sustaining the operation and maintenance of the Department's analytical laboratories (mainly from grants and user fees) is for the most part successfully accomplished, but in some cases rather precariously. The costs of instructing students in the utilization of analytical facilities, service contracts and technician salaries is a persistent and usually growing drain on budgets.

As in several previous years, in 2007-2008, the Department used a part of its IDC return funds to help support successful cost-share proposals to acquire new equipment. One example is a recently successful proposal to the Instrumentation and Facilities Program of the Earth Sciences Division of the NSF by Dr. Tobias Fischer for a rare gas mass spectrometer. As another recent example of the use of IDC return funds, the Department partially supported a major addition to the stable isotope laboratory. Spurned by a number of rapidly emerging research projects, the lab was in need of a large radius mass spectrometer in order to be able to analyze carbon monoxide (needs of Maya Elrick) and ¹⁷O (Rhian Jones, Adrian Brearley). The laboratory negotiated the purchase of 'used' instrumentation from the University of Iowa for the sum of \$35,000. The instrumentation is valued at well over a half a million dollars if purchased new. The equipment was installed on the third floor of Northrop Hall in May, 2007, and has lived up to all expectations. The laboratory also received a gift from a private company of a VG mass spectrometer and some very worthwhile peripherals, such as microbalances, etc. valued at about \$100,000. The stable isotope laboratory is now able to fill the needs of all current users, making analyses that could not have been done with previously existing equipment.

In early summer, 2007, the existing XRF instrument in the Analytical Chemistry Laboratory was essentially destroyed when a water pipe above it burst. Senior Research Scientist Dr. Mehdi Ali was able to recoup a considerable part of the worth of the instrument by working with UNM Risk Management and the State. Additional funding for a replacement, state of the art Rigaku XRF unit was cobbled together from a number of sources, including the Caswell Silver Foundation, the Department of Earth and Planetary Sciences, the Department

of Chemistry, the Department of Anthropology, and the College of Arts and Sciences. The new XRF unit was installed in May, 2008, and has received considerable use.

Recently, with Congressional funding to strengthen support for the Institute of Meteoritics, space in the lower level of Northrop Hall has been recently renovated into an entirely new research facility for Dr. Penny King, a new Senior Research Scientist in the Institute of Meteoritics. Although E&PS faculty were, overall, concerned about the loss of teaching space in Northrop Hall, we collectively recognized that, in the long term, with the completion of the Math/Science Learning Center, a new, and adequately renovated space for teaching Earth History and other laboratory sections would be defined.

Finally, in terms of new analytical facilities, the Radiogenic Isotope Geochemistry Laboratory, under the direction of Dr. Yemane Asmerom, recently added a Neptune MC-ICPMS instrument, which has dramatically expanded the research capabilities of the laboratory, which is housed on the third floor of Northrop Hall. A well-attended celebration of its installation took place in Spring, 2008.

In addition, and very importantly, IDC return funds are also used to help support salaries of very key staff members involved in support of the laboratories, Department computer network management and essential front office operations. Without these funds, these supported individuals may not remain with E&PS.

Computing Facilities

During 2007-08, the Department also used a substantial part of its general funding from the state to support faculty, staff and student use of its computers and network. Funds are used to support renewal of software licenses critical for both research and education (e.g., ARC-GIS) as well as new software applications. Our Department Computational Facilities Committee recognized the acute need to replace our very old large format plotter and for additional memory storage related to the Department server, and was fortunate to receive support from the College, in early Fall, 2007, to replace the plotter and obtain additional server memory.

4. Teaching Facilities

One major upgrade to our teaching facilities in Northrop Hall took place during the 2007-08 year. In late May, 2007, outgoing chair Dr. Les McFadden, and incoming Chair Dr. John Geissman, completed and submitted a proposal to the Frank and Marie Gorham Foundation for funding to support the acquisition of ten (10) ruggedized portable computers (geopads) for field computational instruction in GIS-based activities, including digital mapping. The geopads and related software and hardware arrived in early Fall, 2007, and were installed and uploaded and their use is currently being supervised by Dr. Tim Wawrzyniec, Lecturer III in the Department. In Spring, 2008, Dr. Wawrzyniec and Professor Louis Scuderi taught a class in geopad use, which was fully-subscribed.

On a different note used at the end of the Spring, 2007, semester, the Department did lose a relatively wellused teaching space (room B-19) for Earth History and Paleontology laboratory sessions, as well as numerous small graduate classes and informal meetings.

The author of this report emphasizes that it is very safe to assume that the entire Department of Earth and Planetary Sciences looks forward to the completion of the Science Mathematics Learning Center and the availability of three large, currently occupied spaces for renovation into educational and research facilities.

Recruiting Visits

The Department was not visited by any large companies in the petroleum and energy resource areas during the 2007-08 period. However, representatives from Shell Oil did request that we send several of our graduate students to Houston, for an all expenses paid geosciences graduate student "fair" in Houston in August, 2008. Two of our

graduate students who participated in the fair were offered permanent jobs upon completion of their graduate degrees. Shell Oil has expressed interest in visiting the Department for recruiting purposes this academic year.

Professional Lectures given in the Department during the 2007-2008 academic year are listed below:

<u>Date</u>	<u>Speaker</u>	Title of Presentation
8/24/07	John W. Geissman	Chair, E&PS, UNM, Introduction of New and Returning Graduate Students, Faculty and Staff.
8/31/07	Dennis McQuillan	New Mexico Environment Department, "Air, Water, Food and Sex: An Overview of Environmental Issues in New Mexico"
9/07/07	John Barger	Stanford Synchrotron Radiation Laboratory, "Synchrotron-Based Investigations of the Structures of Bacteriogenic Mn Oxides: Powerful Natural Oxidants and Sorbent/Catalysts"
9/14/07	Peter Fawcett	UNM, Earth and Planetary Sciences, Drilling in the Valles Caldera for a Long Mid-Pleistocene Climate Record"
9/21/07	Terry Pavlis	University of Texas at El Paso, "Tectonics in Extreme Environments: Interactions of Erosion and Tectonics in the St. Elias Orogen, Southern Alaska"
9/28/07	Wolf Elston	UNM, Earth and Planetary Sciences, Giant Volcanoes of Southwestern New Mexico"
10/05/07	Henry Fricke	Colorado College, "New Ways of Studing Old Dinosaurs: What Stable Isotope Geochemistry Can Tell Us About Their Movement, Diet and Physiology"
10/12/07	FALL BREAK	NO COLLOQUIUM
10/19/07	Timm John	University of Oslo, Norway, "Reactive Fuild Flow in Slabs? A Metamorphic View on The Origin of the Slab Component and Some New Concepts of Flow Pattern Formation"
10/26/07	Art Goldstein	National Science Foundation, "NSF Earth Sciences: How Does It Work and What's New"
11/02/07	Hersh Gilbert	Purdue University, "Lithospheric Foundering in Continental Deformation"
11/09/07	Paul Bierman	University of Vermont, "Using 10-Be To Establish Background Rates of Sediment Generation and Transport"
11/16/07	Lynda Williams	Arizona State University, "Volatile Light Elements in Baltic Basin Bentonites: Correlating Crystal Growth and Chemical Tracers for Hydrocarbon Exploration"
11/23/07	THANKSGIVING	NO COLLOQUIUM
11/30/07	Kevin Righter	NASA Johnson Space Center, "Outstanding Problems in Our Understanding of the Origin of the Earth and Moon"
12/04/07	James J. Butler, Jr.	Kansas Geological Survey, Darcy Distinguished Lecturer, "What The Heck Is A Phreatophyte? A Field Investigation of Ecohydrologic Processes in Stream-Aquifer System"
12/07/07	Dan Breecker	UNM, Earth and Planetary Sciences, "Implications of Pedogenic Carbonate Formation Conditions For Reconstructing Paleoenvironments"
1/25/08	Martin Kennedy	University of California, Riverside, "Oxygenation of the Precambrian Atmosphere: The Rise of The Clay Mineral Factory"
2/01/08	Lindy Elkins-Tanton	Massachusetts Institute of Technology, "On Foundering Lithosphere and Volatile Migration: Upside-Down Melting"
2/08/08	Adrian Harvey	University of Liverpool, "Alluvial Fan Dynamics: A Review"

2/15/08	Qusheng Jin	University of Oregon, "A Metabolism-Based Modeling Approach to Redox Transformations in a Nitrate- and Uranium- Contaminated	
2/22/08	David Noone	Aquifer at Oak Ridge, Tennessee, USA" University of Colorado, Boulder, "Atmospheric Water Cycles and The Large-Scale Controls on Humidity From Stable Water Isotopes" University of Texas at Austin, "Cuatrocienegas Basin, Mexico Influences of Man and Climate on a Semi-arid, Regional, Karstio Aquifer"	
2/29/08	Brad Wolaver		
3/07/08	Brian Ebel	Stanford University, "Hydrology and Land Use: A Simulation-based Perspective"	
3/14/08	David Boutt	University of Massachusetts, "Coupled Processes in Hydrogeology: From Aquifers to Sedimentary Basins"	
3/21/08	SPRING BREAK	NO COLLOQUIUM	
3/28/08	Claudia Mora	Los Alamos National Laboratory, "Hurricane and Climate Records in Tree-ring Cellulose Stable Isotopes"	
4/04/08	Roger Anderson Wolf Elston Lee Woodward	Special Presentations Honoring Emeritus Faculty	
4/11/08	Brooks Ellwood	Louisiana State University, "Applications of Magnetic Susceptibility	
4/18/08	John Grotzinger	to Correlation and Developing Floating Point Time Scales" California Institute of Technology, "Caswell Silver Distinguished Lecturer, "Mars Science Laboratory 2009: The Search for Water and Biosignatures on Mars"	
4/25/08	David Moecher	University of Kentucky, "Pseudotachylyte as a Monitor of Temperature and Fluids"	
5/02/08	Jolante van Wijk	Los Alamos National Laboratory, "Small-scale Convection During Continental Rifting: Evidence from the Rio Grande Rift"	
5/09/08	Erik Hauri	Carnegie Institute of Washington, "Giant Impacts, Lava Veneers, and Hydration of the Earth's Mantle by Subduction"	
5/09/08	Undergraduates	Caswell Silver Undergraduate Research Symposium Introductions, University of New Mexico, Earth and Planetary Sciences Opening Comments — Dr. Laura J. Crossey	
		Presentations of Completed Research Projects	
	Brandi Cron	Introductions by Project Advisor "Geomicrobiology and Geochemical Energy for Microbial Metabolism in CO ₂ -Rich Springs of the Tierra Amarilla Anticline,	
	Brandon Dixon	NM." Advisor: Dr. Laura J. Crossey. "Precambrian Basement of the Defiance Uplift: Possible Correlation to the Uncompangre Quartzite and Influences of Basement Fabric on	
	Patrick Higgins	Later Tectonism." Advisor: Dr. Karl E. Karlstrom. "An Index of the Onset of the North American Monsoon Season in Central New Mexico." Advisor: Dr. David Gutzler.	
	Eric Tegtmeier	"Origin of Breccias Near the Santa Fe Impact Structure: Tectonic, Impact, or a Bit of Both?" Advisor: Dr. Horton Newsom.	
	Stephen Teet	"Relationships Between Temporal Variations in Groundwater Chemistry and Micrometeorological Fluxes Along the Middle Rio	
	Thomas Sower	Grande of New Mexico." Advisor: Dr. Laura J. Crossey. "Incision History of the Rio Salado and Implications for Uplift History of the Jemez Mountains I." Advisor: Dr. Karl E. Karlstrom.	

Dylan Rose-Coss "Incision History of the Rio Salado and Implications for Uplift History of the Jemez Mountains II." Advisor: Dr. Karl E. Karlstrom.

Josh Gallegos "Geochemistry and Ecology of CO₂-Rich Bubbling Springs Along the

Tijeras Fault." Advisor: Dr. Laura J. Crossey.

Research Progress Reports

Introductions by Dr. Laura J. Crossey

Nicolas George Advisor: Dr. John W. Geissman Zachary Gallegos Advisor: Dr. Horton Newsom.

Advanced Environmental Science Class Presentation

Professor Laura J. Crossey

Doreen Jameson "Red River Water Quality and Questa Mine Waste Rock Drainage"

Roxane Skalski Jake Baggerman Natalie Blea

Gerhard Schoener

Timi Noger Dylan Rose-Coss Aaron Buffington Miguel Montoya Christopher Chavez

Andrea Pompeo Jessica Brown Marisa Valdez "Seasonal and Interannual Influences on Water Quality, Jemez River,

Northern New Mexico."

"Snow Pack (SWE) and Discharge of the Rio Grande"

Poster Introduction - UNM's Water Usage and the Future of

sustainability.

ALUMNI INITIATIVES AND SUPPORT

As noted in the past Department Annual Reports, the Department is very fortunate to be financially and morally supported by a large group of active and enthusiastic alumni. As current Chairperson of the Department, I break from a bit of tradition and emphasize, to an even greater degree, how important alumni support of Department activities has been in the past, and must continue to be in the future. A key goal of the Department's will be to enhance our outreach to our alumni. For the past five years, I have been the Chair of my alma mater's alumni advisory board, as part of a public institution of higher education with the largest public endowment in the nation. Alumni support is crucial to the lifeblood of an institution, and in a Department like Earth and Planetary Sciences, it makes, literally, all the difference in the world between a fair department and one that can truly compete, at all levels, with overall far better supported institutions across the nation. If I am Chair for four years or for eight years, I promise to dedicate my most sincere efforts to make our alumni appreciated and cultivate that appreciation for the betterment of Earth and Planetary Sciences.

The Department continues to increase and improve contacts with alumni through gatherings at professional meetings, publication of a well-circulated Department newsletter ("News from Northrop Hall") and through many personal and professional contacts. In addition, in early April, 2008, the Department hosted a celebration for three emeriti faculty (Dr. Roger Anderson, Dr. Wolf Elston, and Dr. Lee Woodward), at which over 200 alums and many of their spouses returned to Northrop Hall for two days of geoscience talks, field geologic trips, an introductory welcoming reception in the Silver Family Museum, and a banquet at the Hilton Hotel. The Department continues to work closely with College Development staff, to engage in new activities related to development, and is very pleased to have a full Development staff now in place. In addition, the Department is very pleased to have the opportunity to work with a geoscientist (Mr. John Welty) in the UNM Foundation! Individually and collectively alumni (and other supporters of the Department) provide generous financial, advisory and moral support for many departmental activities, which contribute significantly to our success in our educational and research missions. In addition, their support provides the funds associated with 20 scholarships, funds and endowments that enable the Department to provide financial support to over fifty undergraduate and graduates each year. Financial aid provided through these resources ranges from a few hundred dollars to full three-year graduate fellowships. Many tens of thousands of dollars are provided through funds such as the Alumni Fellowship, the Albert and Mary Black Family

endowments and the Ernest Rich Fund. The largest amount of funding to the Department comes from the Caswell Silver Foundation for Earth Sciences, and the Kelley, Miossec, Wanek, Rhodes, Vann and Wengerd Scholarships, discussed in more detail below. In June, 2008, the Department received a contribution of \$100,000 from a donor in Los Alamos to establish the Ronald G. Boyd Memorial Endowment in Mineralogy. As noted in a previous section, the Department was the recipient in 2007-08 of another large donation from the Frank and Marie Gorham Charitable Foundation that supported the acquisition of 10 Geopads for computer-oriented field instruction and research purposes and has provided several research graduate student fellowships for the 2008-09 academic year. Frank Gorham, now deceased, was a long-time supporter of the Department. One of his sons, Tim Gorham, is also a Department alumnus, and it is in part through his recent efforts that these most recent generous gifts have been provided to the Department. We continue to engage in discussions with Mr. Tim Gorham concerning future support of Department activities.

The endowments in the UNM Foundation associated with the Department of Earth and Planetary Sciences continue to account for a substantial percentage of all endowments in the College of Arts and Sciences. The financial aid we are able to provide our students is augmented by other scholarships and other forms of aid acquired from institutions outside the University (e.g., the Geological Society of America, the New Mexico Geological Society, American Association of Petroleum Geologists) and funds from the University (e.g., SRAC; tuition waivers). A full summary of scholarships and fellowships received by Earth and Planetary Sciences students is presented in Part IV of this report.

Thanks to the efforts of Pat Gratton and several additional alumni who have maintained careers in the oil and gas industry, a long-standing tradition at the annual American Association of Petroleum Geologists is the "Rio Rats" alumni gathering. The Department will continue to provide a connection to the gathering each spring at the Annual AAPG meeting. In fact, Dr Geissman was planning to attend the meeting in April, 2008, in San Antonio, but his trip had to be cancelled because of an urgent meeting concerning budgetary matters in the College of Arts and Sciences. The Chair plans to attend the AAPG meeting in Spring, 2009.

Caswell Silver Foundation

The most important source of alumni support to the Department is the Caswell Silver Foundation. Funds generated by the investments of the Foundation in 2007-08 provided full-time support, including stipend, tuition, medical insurance, and a research budget, for the Leon Silver/Vincent Kelley graduate student Fellow Lyman Persico. In addition, funds provided support to augment Graduate Teaching Assistant stipends and were distributed, on a competitive basis, to support Graduate Student research-related activities in summer, 2008. The Foundation also subsidized much of the travel expenses of faculty members participating in professional meetings. As noted repeatedly in previous Department annual reports, the faculty recognize that, the presence of the Caswell Silver Graduate Fellowships as well as additional scholarship funds made possible by the Foundation (and funds from other alumni contributions), we have had a far greater chance to attract some of the most highly qualified, academically capable graduate students, including those from underrepresented backgrounds, to the Department.

The Caswell Silver Foundation also supports the Caswell Silver Distinguished Lecturer series, which allows the Department to bring scientists of the stature of National Academy of Sciences Members for lectures and visits with faculty and students. Visits by Distinguished Lecturers are welcomed by the Department, as they provide opportunities to interact with some of the most distinguished and influential scientists in the country as well as to inform them of our department and the research and other academic activities we are pursuing. In Spring, 2008, the Department invited Dr. John Grotzinger, from California Institute of Technology, a highly distinguished scdimentologist and geochemist, who is currently devoting most of his research efforts to the Mars Exploration missions. The faculty, staff and students of the Department are very fortunate to have the chance to hear and interact with scientists of his stature, a chance we would not have without the generous support of the Caswell Silver Foundation.

As in previous years, the Silver Foundation made possible two \$800 Meritorious Staff Awards, presented to two outstanding non-academic staff members of the Department. These awards allow the faculty to express in a tangible way their deep appreciation for the efforts of the staff in contributing to the effective operation,

advancement and well being of the Department. Recipients of these awards, presented at the Department's May 2008, Commencement Ceremonies, were Mabel Chavez (Editorial Tech, Earth and Planetary Sciences) and Shannon Clark (Program Coordinator, Institute of Meteoritics).

Another very important function supported by the Foundation is the Caswell Silver Undergraduate Research Symposium, now held during the last week of classes. The most recent, The Seventh Annual Symposium was again very well attended, attracting the participation of many undergraduate majors conducting research in diverse areas of the Earth, environmental and planetary sciences.

In terms of Foundation activities, at the Spring meeting of the Foundation Board, Professor Leon T. Silver, President of the Caswell Silver Foundation Board, retired from his administrative position on the Board. He will continue as emeriti President of the Board, and his many years of service on the Board are very greatly appreciated! Mr. Alberto Gutierrez, President of Geolex, has taken over as President of the Board. The next meeting of the Foundation Board is on November 15, 2008.

PLANS AND GOALS

The relatively recent additions to the faculty of Dr. Gary Weissmann, Dr. Joe Galewsky, Dr. David Boutt (who will arrive in January, 2009), Dr. Matt Nyman (Lecturer III, Natural Sciences Program), Ms. Amy Ellwein (Lecturer III, Natural Sciences Program), and Dr. Tim Wawrzyniec have strengthened the Department in many important ways. As noted last year, the addition of Dr. Galewsky helps strengthen a program in the area of meteorology and climate dynamics that had only included Dr. Dave Gutzler. The Department hopes that at some time in the near future that it may have an opportunity to hire another faculty member in this scientific discipline, as we believe the Department and College are potentially well positioned to develop a strong research program in an area that would complement other strong programs in the College and elsewhere at UNM and that would be of particularly great significance in a drought-prone, poor, mostly arid state.

The importance of the addition of Dr. Nyman as Director of the Natural Sciences Program has been discussed in previous annual reports. Nevertheless, it would not be inappropriate to note again that the development of K-9 (on p. 10) teachers in the sciences (providing them with both content and effective pedagogy) may prove, in the long run, to be one of the most significant academic activities through which the Department aids citizens in the State of New Mexico. We welcome the further addition of Ms. Amy Ellwein, as Lecturer III, to the program during the 2007-08 year. Ms. Ellwein will complete her Ph.D., degree in Fall, 2009. There is simply no substitute for science literacy, and a nation with an increasing number of scientifically illiterate citizens (e.g., who believe that biblical creationism is an adequate explanation for biological diversity- a position taken by the country's current president—or believe the Earth to be 7000 years old) is a nation that will inevitably decline, and recent events in the United States are at least hinting at such a decline. Both Dr. Nyman and Ms. Ellwein were very active in the design review process for the new Natural Sciences laboratory/teaching space in the Science Math Learning Center. The Natural Sciences Program is looking forward to moving into their new spaces in the SMLC, hopefully in 2011?

Dr. Weissmann succeeded Dr. Mike Campana, who accepted a position as Director of a university-wide program at Oregon State University. As the Department elected to name, as of Fall of 2006, the Department's new Black Family Professor of Hydrogeology, a position partly endowed by funds donated to the Department by the Black Family, Interim Dean Norwood, after a series of discussions with the Chair and associated faculty discussions, formally endorsed a plan that would permit the Department to conduct a search for another hydrologist in AY 2007-08, and we are pleased to report that the search was concluded in late Spring, 2008, with the acceptance by Dr. David Boutt, currently on the faculty at the University of Massachusetts, Amherst, of a hiring offer from the College. Dr. Weissmann served as the chair of the search committee. The arrival of Dr. Boutt, in January, 2009, will help the Department strengthen its hydrology program and serve to further improve ties with the institution's Water Resources Program. Our successful search reflects the efforts in AY 2006-07 by an ad hoc Department committee that identified subdisipline(s) in the general realm of hydrogeology that would most likely help it to develop a nationally strong program. We hope that our emerging program will compliment the very strong hydrology program at New Mexico Tech (rather than foolishly attempt to compete with it, a seriously inappropriate strategy in largely publically funded university in a poor state).

The National Research Council (NRC) was engaged in conducting its decadal (+/-) national evaluation of doctoral programs at institutions of higher learning during AY 2006-07. The Department is excited about the ongoing evaluation, as the faculty firmly believe that during the past two decades the Department has progressively built a doctoral program in a much stronger research-oriented department that is, at the least, second to none in the "peer group" of institutions, established by the NM Commission of Higher Education, to which UNM is compared. Earth all Planetary Sciences may possibly be, when size and other appropriate factors are considered, in the upper quartile of institutions with programs in the Earth Sciences. As a matter of information, the response by E&PS Faculty was 100 percent. We look forward to learning the outcome of this comprehensive evaluation, which was, in principle, to be announced in February, 2008, but has been postponed until November, 2008, at the earliest.

It was our intent during the Spring, 2008, semester, to initiate a discussion of long-range plans for the Department, including but not limited to: future tenure-track hires in the context of long-term academic and research goals of the Department, the utilization of space in Northrop Hall to be made available upon completion of the Math/Science Learning Center, and the sustainability of our graduate program in terms of improving graduate student support. Because of a number of unexpected matters affecting the Department and the College, this discussion was postponed. A Department long-range planning committee, which is not a standing committee of the Department, is now being constituted and discussions will begin early in the Spring, 2009, semester.

III. ACTIVITIES OF THE FACULTY AND RESEARCH SCIENTISTS

- Activities of Full, Associate and Assistant Professors
- Activities of Research Professors
- Activities of Senior Research Scientists and Staff

1. TEACHING ACCOMPLISHMENTS OF FACILLY AND RESEARCH STAFF

Yemane Asmerom, Professor

Spring:

E&PS 101 - Physical Geology

E&PS 493 - Independent study

E&PS 551 - Problems

Fall:

E&PS 101 - Physical Geology

E&PS 534 - Principle Isotope Geochemistry

Lab activities:

Work on installation of the second Neptune and renovation of the ICP Facility. The process was complicated because Thermo had to be compelled to deliver replacement instrument.

Graduate students supervised

Andy DuFrane (Ph.D) – Graduated. Leah Johnson (M.S.) – Defended and graduated.

Graduate student committee

Anthony Salem (Ph.D.; second thesis chair)
Jennifer Edmunson, (Ph.D.) Defended and graduated.
Eileen Embid (MS) Progress.
Newell, Dennis (Ph.D.) Defended and graduated.
McLain, Angela (Ph.D.) Progress.

Lab training and consulting UNM (partial)

Andy DuFrane (UNM)
Leah Johnson (UNM)
Zach LaPointe (UNM; undergraduate)
Rhawn Denniston (Cornell College)
Johanna Kieniewicz (Washington Uni.).
Eileen Embid (UNM)
Matt Loewen (Univ. Puget Sound)
Jason (Univ of South Florida)
Kevin Donahue (UNLV)
Matt Lachniet (UNLV)

Adrian Brearley, Professor

Courses taught

Spring 2007:

E&PS 210 - Life In The Universe (19 enrolled)

E&PS 551 — Problems (1 enrolled) E&PS 599 — Thesis (1 enrolled) E&PS 699 — Dissertation (3 enrolled) Fall 2007:

E&PS301 – Earth Materials (42 enrolled) E&PS302L – Mineralogy Lab (29 enrolled)

NSMS 512 - Nanocharacterization Techniques. Cotaught w/A. Datye (ChNE), J. Fulghum (ChNE), D. Keller (Chemistry) (45 enrolled)

E&PS 599 – Thesis (1 enrolled) E&PS 699 – Dissertation (2 enrolled)

Advisement and thesis committees:

M.S. Thesis Advisor and Committee Chair

Kristen Mullen Crystal Donnolly (left program, Spring 2007)

PhD Thesis advisor and Committee Chair

Neyda Abreu (Graduated Summer 2007) Jana Berlin Rena Ford Beth Nichols (changed advisor, Fall 2007)

M.S. Thesis Committee member

Alexis Ault Melissa Nelson Hollis Koyach

Ph.D. Thesis Committee Member

Mark Tyra
Laura Burkemper
Jennifer Edmunson
Ayman Karim (Chemical and Nuclear Engineering)
Matt Dawson (Anthropology)

PhD Thesis Examination Committee

John Hurley

Laura J. Crossey, Professor

Courses taught

Spring 2007: Env Sc 430 - Advanced Environmental Science

Env Sc 530 – Advanced Environmental Science E&PS 415 – Geochemistry of Natural Waters E&PS 515 – Geochemistry of Natural Waters

E&PS 552 – Problems E&PS 699 – Dissertation

Summer 2007: E&PS 420L - Advanced Field Geology, w/K. Karlstrom

E&PS 520L - Advanced Field Geology (15 enrolled) w/K. Karlstrom

Fall 2007:

E&PS 101- How Earth Works (24 enrolled) w/ K. Karlstrom

(Freshman Learning Community)

E&PS 105L - Physical Geology Lab (24 enrolled) w/ K. Karlstrom

(Freshman Learning Community)

E&PS 519L - Field Methods in Geomicrobiology (3 enrolled)

Biology 441/551 – (6 enrolled)
E&PS 551 – Problems (5 enrolled)
E&PS 599 – Masters Thesis (1 enrolled)
E&PS 699 – Dissertation (1 enrolled)
Professional Project – (1 enrolled)

Advisement and thesis committees:

PhD Committees Chaired

Dennis Newell (Co-Chair, 2007) Matthew Kirk (Chair) Bart Faulkner (Co-Chair, 2007)

PhD Committees Member

Angela McLain Maceo Martinet (Biology) Sean Connell Ondrea Hummell (Biology) Ann Ollila

MS Committees Chaired

James Dyer (Chair, MWR, 2007)
Eileen Embid (Chair)
Jan Curtis (Chair, MWR)
Jessica Lopez-Pearce (Chair)
Amy Williams (Chair)
Elizabeth Premo (Chair)
Sara Mustafa Chudnoff (Chair, MWR)

MS Committees Member

Catrina Johnson
Melissa Nelson (2007)
Ryan Crow
Magdalena Sandoval (2007)
Kristen Mullen
Ginny Rust (exam cmte)
Mousavi Aliyer (Chem)

Undergraduate Sr. Thesis/Research Supervision

Alex Kirk (current) Brandi Cron (biology, current) Stephen Teet (biology, current) Joshua Gallegos (current)

Students supported with my extramural grants

Graduate

Matthew Kirk (PhD: GK-12 Grant Fellowship-Spring 07)
Mel Strong (PhD: GK-12 Grant Fellowship Spring 07, Fall 07)
Tony Salem (PhD: GK-12 Grant Fellowship Spring 07, Fall 07)
Jessica Lopez-Pearce (MS: GK-12 Grant Fellowship Fall 07)
Leah Johnson (PhD: GK-12 Grant Fellowship Fall 07)
6 Biology GK-12 Grant Fellowships
Eileen Embid (0.2 FTE RA supplement)

Undergraduate (10-15 hrs per week/research support)

Kim Guggliani (Spring 2007, Fall 2007) Alex Kirk (Spring 2007, Fall 2007) Brandi Cron (Biology) Joel Montross (Fall 2007)

Also 6 minority undergraduates from A&S and Engineering (STEM) with Alliance for Minority Participation funding

Maya Elrick, Associate Professor

Courses taught

Spring 2007:

Earth History - (40 enrolled)

Oceanography - (22 enrolled)

Fall 2007:

E&PS 304 - Sedimentology-Stratigraphy (24 enrolled)

Advisement and thesis committees:

Undergraduate Advisor/PhD Advisor

Mark Tyra PhD- NSF RA funding Bethany Theiling-PhD Stephanie Yurchyk-MS

Thesis committees

John Rissetto, PhD (Anthropology)

Senior Thesis advisor

Leslie Livengood

Peter J. Fawcett, Associate Professor

Courses taught

Spring:

Env. Sci. 101 - The Blue Planet (155 enrolled)

E&PS 439 - Paleoclimatology (31 enrolled) E&PS 599 - Thesis Research (1 enrolled)

Fall:

One Semester Sabbatical Leave

E&PS 599 - Thesis Research (1 enrolled)

Advisement and thesis committees:

Graduate students superviased

Catrina Johnson (M.S.)

Christy Laudadio (M.S. – co-advisor with Louis Scuderi) Justin Dodd (PhD – co-advisor with Zach Sharp)

Postdoctoral fellows supervised

Gonzalo Jimenez-Moreno (PhD University of Granada, Spain)

PhD Graduate thesis committees

Dan Breeker, Natalie Dawson (Biology), Linda Donohoo-Hurley John Hurley, Ginny Rust, Mel Strong, Mark Tyra, Judith van der Elst (Anthropology), Kate Zeigler

MS thesis committee

Jed Frechette Andy Yuhas

External examiner for MS exam

Ben Swanson

Tobias Fischer, Associate Professor

Courses taught

Spring 2008:

E&PS 101

Fall 2007:

E&PS 252 - Volcanoes

E&PS 531L - Igneous Petrology with Jones and Baldridge

Advisement and thesis committees:

Post-Doc supervised

Dr. Jaime Barnes supervised with Sharp

Graduate Students supervised

Euan Mitchell, M.S. finished end of 2007

Graduate Committee

Euan Mitchell, PhD Ashley Edelman, MS Zabe Premo, MS

Exam Committee

Christine Laudadio (LS)

Joseph Galewsky, Assistant Professor

Spring 2007:

Env. Sci. 101 - The Blue Planet (175 enrolled)

E&PS 522 - Appl Math for Earth/Env Sci. (13 enrolled)

Fall 2007:

Spring 2008:

E&PS 476/576 - Physical Hydrology (30 enrolled)

Env. Sci. 101 - The Blue Planet (160 enrolled)

E&PS 522 - Fluid Mechanics (11 enrolled)

Advisement and thesis/exam committees:

PhD Advisees

John Hurley

PhD Committees

Caitlin Callahan
Justin Dodd (advisor for 2nd Ph.D. proposal)
Ginny Rust
Mel Strong
Brian Yanites (student at the University of Colorado, Boulder)
Leah Johnson (advisor for 2nd Ph.D. proposal)

MS committees

Leah Johnson

MS exams

Leah Roberts

PhD exams

Scott Muggleton

Undergraduate research

Alex Drue (with Z. Sharp)

John W. Geissman, Chair and Professor

Courses taught

Spring:

E&PS 490 – Presentations (7 enrolled)

E&PS 310L - New Mexico Field Geology

Summer:

E&PS 319L - Introductory Field Geology (17 enrolled) w/G. Meyer

Fall:

E&PS 508 - Paleomagnetism (2 enrolled) E&PS 490 - Presentations (17 enrolled)

Graduate students supervised:

Scott Muggleton, PhD
Kate Zeigler, PhD
Linda Donohoo, PhD
Jenn Boyd, PhD, Anthropology (co-advised)
Sean Connell, PhD (co-advised)
Travis Naibert, MS

Danielle Odette, MS Jack Grow, MS

Exam committees

Graduate Students financially supported

Linda Donohoo-Hurley Kate Zeigler Scott Muggleton Travis Naibert Danielle Odette

Course Development

Continued to modify/improve undergraduate field geology course (E&PS319L), with Professor Meyer.

Undergraduate Research Advising

Greg Peacock Noel Gibbs

Graduate Theses Completed Reader

David Gutzler, Professor

Courses taught

Spring:

E&PS 433 – Data Analysis and Statistics (19 enrolled) E&PS/Geog 352 – Global Climate Change (26 enrolled)

E&PS 599 – Masters Thesis (1 enrolled) E&PS 699 – Dissertation (1 enrolled)

WR 598 - Water Resources Program Professional Project (1 enrolled)

Guest lectures:

Global warming lecture, Nat Sci 263L, UNM Gallup, Apr 12.

Fall:

No classroom teaching: A&S-sponsored research semester

E&PS 493 - Independent Study (1 enrolled)

E&PS 699 – Dissertation (1 enrolled) WR 598 – Water Resources Program Professional Project (1 enrolled)

Guest lectures:

North American monsoon lecture, Biology 503 (Biological Complexity

Seminar), Sept. 5.

Monsoon/orography lecture, E&PS 523 (Alpine/Himalayan Tectonics

Seminar), Nov 19.

Supervision of graduate students:

M. Strong (Ph.D., E&PS)

K. Jones (completed M. Water Resources degree, November), L. Martinez (MWR)

Other graduate thesis committees:

M.S.: J. New, C. Laudadio, A. Yuhas (E&PS) Ph.D. A. Ellwein, J. Dodd, J. Hurley (E&PS)

Rhian H. Jones, Associate Professor

Courses taught

Spring, 2007:

E&PS 101 - How the Earth Works: An Introduction to Geology

(130 enrolled)

Fall, 2007:

E&PS 513. - Advanced Igneous Petrology (5 enrolled) Team taught with Prof. T. Fischer and Dr. S. Baldridge

Student advisement.

Advisor for:

Jana Berlin, Ph.D. (co-advised with A. Brearley)

Hollis Kovach, M.S. (comprehensive exam September 2007)

Committee member for:

Neyda Abreu, Ph.D (defended May 2007)

Crystal Donnelly, M.S.

Rena Ford, Ph.D.

Karen Hutchins, Ph.D. (advised second proposal, comprehensive exam November 2007)

Exam committees:

Lyman Persico, Ph.D. (Fall 2007)

Karl E. Karlstrom, Professor

Courses taught

My course load in 2007 consisted of 4 courses (three undergraduate courses and one 400/500 level courses). Given my GSA Bulletin editorship, which carries a 1 course per semester release time, this gives an adjusted equivalent teaching load of ~5 courses for 2007 using the departmental "fair share" workload policy.

Spring 2007:

E&PS 307L - Structural Geology (10 enrolled)

E&PS 599 - Masters Thesis (2 enrolled)

Summer 2007:

E&PS 420L/ 520L - Advanced Field Geology (10

enrolled)

Fall 2007:

E&PS 310 - New Mexico Field Geology (22 enrolled)

E&PS 101/105 – Introduction to Geology (23 enrolled) taught as an overload with additional compensation from the Freshman Learning

Communities Program

E&PS 599 -- Masters Thesis (2 enrolled)
E&PS 495 -- Senior Thesis (1 enrolled)
E&PS 493 -- Independent Study (1 enrolled)

E&PS 491 - Problems (1 enrolled)

Students supervised:

In 2007, my structure/tectonics research group consisted of 1 Ph.D. and 2 M.S. students. 1 MS student, Magdalena Sandoval, completed her MS in 2007. I met regularly with each student.

Tony Salem (Ph.D.) started in Fall 2005, he came from Arizona State University. His PhD project involves a tectonic study of the Maria Fold and Thrust Belt. His expected completion date is Fall 2008. Funding is from a departmental TA, the G K-12 grant (to Scott Collins and Laura Crossey) and supplemented by my research grants.

Magdalena Sandoval (MS) started in Fall 2005. She came from University of Oregon and worked on neotectonics of the Aspen Anomaly in Colorado and evolution of the upper Colorado River system. She defended in Fall 2007. Funding was from a departmental TA supplemented by the CREST NSF grant.

Ryan Crow (MS) started in Fall 2005. He came from University of Colorado and is working on the Quaternary volcanic and tectonic geomorphic history of western Grand Canyon, His expected completion date is Spring 2008. Funding is a mixture of TA support (1/3) and the Trail of Time NSF grant.

Chairman of thesis committee for 2007

Tony Salem Magdalena Sandoval Ryan Crow.

Member on thesis committees in 2007

Eileen Embid Rob Sanders (New Mexico Tech) Jessica Lopez-Pierce and Amy Williams.

Barry S. Kues, Professor

Courses taught

Spring, 2007:

On sabbatical

Fall, 2007:

E&PS - 101 (190 enrolled)

E&PS - 250 (22 enrolled)

Grant A. Meyer, Associate Professor

Courses taught

Spring 2007:

Env. Sci. 101 - The Blue Planet

E&PS 516 - Topics/Hillslope Geomorphology (w/L.D. McFadden)

Summer 2007:

E&PS 319 - Introductory Field Geology (w/J.W. Geissman)

E&PS 101 - How the Earth Works (w/P. Watt)

Fall 2007:

E&PS 481/581L - Geomorphology and Surficial Geology and Lab

**Coordinator for Env. Sci., 102L The Blue Planet Laboratories, Fall and Spring semesters (6 and 7 sections, respectively)

Advisement and thesis committees

Dissertations and Theses Advised

Current Advisees: Lyman Persico (MS 2006, current PhD), Ben Swanson (PhD)

Co-advising: Carolyn Domrose (MS) with Les McFadden

Committee membership: Debra Bryan, Sean Connell, Amy Ellwein, Caitlin Callahan, Nina Lanza (PhD)

Leah Roberts, Devin Gaugler, Nick Engdahl, Ashley Edelman (MS)

Andrew Robertson (MWR)

Scott Worman, Anthropology (PhD)

Leslie D. McFadden, Professor

Courses taught

Fall, 2007

E&PS 485L/585L - Geomorphology Surficial Geology Lab

(7 enrolled)

Spring, 2007

E&PS 516 - (8 enrolled) Topics/Hillslope Geomorphology

Guest lecturer:

Conservation and Indigenous Biology (BIOL/NATIVE AMER STUDIES 430) Soil geomorphic and field ecological studies of grazing and climate impacts on the Hopi and Navajo Reservations.

ANTH 375/575 Archeology Field Research - applications of soils in archeological studies.

Community and Regional Planning 470/570 - Semiarid lands Development, Planning and Restoration Community and Regional Planning (Department of Architecture and Planning) - Relevance of Soil geomorphic and ecologic studies in NE Arizona to research in landscape ecology and Holocene climate change.

Field workshop organizer and leader

Natural Sciences Program-SEIS Workshop Series in Soils, Climate and Environmental Change (with A. Ellwein).

Graduate students supervised or Co-supervised

Angela McLain (Ph.D.)
Amy Ellwein (Ph.D; co-advised with L. Scuderi)
Carolyn Domrose (M.S.)
Devin Gaugler (M.S.)
Leah Roberts (M.S.)
Debra Bryan (Ph.D.)
Dan Breecker (Ph.D., co-advised with Z. Sharp)

M.S. thesis committees

Jen New Jed Freschette

Ph.D. committees

Bob Powers (Dept of Anthropology) Ben Swanson Lyman Persico

Matthew Nyman, Assistant Professor/Lecturer

Courses taught

Summer 2007: NTSC 400 - Schoolyard Geology for Elementary Teachers (17

enrolled) co-taught w/C. Stuckman, Albuq., Public Schools

Fall 2007: NTSC 261L - (21 enrolled)

NTSC 400 – Earth Systems Science for High School Teachers (3

enrolled). This was a new class funded by the NSF Geo-Teach

program.

Spring 2008: NTSC 261L – (17enrolled)

NTSC 400 – Earth Systems Science for Middle School Teachers (3 enrolled). Same class as for Fall 2007 but with middle school teachers.

Summer 2007: NTSC 400 - Earth Systems Science for Educators w/ Field Based

Applications: This will be a similar graduate level class but with field

applications.

Aurora Pun, Adjunct Assistant Professor

Courses taught

Spring:

E&PS 101 - How Earth Works (94 enrolled)

E&PS 105L - Physical Geology Lab (102 enrolled)

Fall:

E&PS 101 - How Earth Works (19 enrolled)

E&PS 105L - Physical Geology Lab (122 enrolled)

Mousumi Roy, Associate Professor

Courses taught

Spring:

E&PS 527 - Introduction to Geophysics

E&PS 427 – Introduction to Geophysics PHAST 327 – Introduction to Geophysics

E&PS 533 - Statistics and Data Analysis in Earth Sciences

E&PS 551 - Problems in Geophysics

Fall:

Env. Sci. 101 – The Blue Planet E&PS 551 – Problems in Geophysics

Thesis and advisement committees:

PhD Defense

B. Lewis (UNM Physics)

PhD exam committees

S. Muggleton

E. Martin

N. Lanza

K. Hutchins

MS defense

A. Ault

MS exams committees

J. Grow

T. Naibert

D. Odette

D. Gaugler

G. Rust

M. Halick

Post-docs supervised

Joya Tetreault

Students supervised

Caitlin Callahan (Ph.D; RA support) Emily Martin (second Ph.D. proposal advisor) Markella Hoffman (U. Kansas student)

Research assistant

Amy Luther (provided support) Nicolas George (EPS undergrad; provided support)

Louis A. Scuderi, Associate Professor

Courses taught:

Spring:

E&PS 455L./555L - Computational and GIS Applications in

Geomorphology (12 enrolled)

Fall:

Env. Sc. 101 - The Blue Planet (104 enrolled)

E&PS 300/400 - LiDAR and Geospatial Modeling, taught as an

overload (10 enrolled)

Course was developed with Tim Wawrzyniec. Additional course E&PS 523C. T / Geopods Workshop was also developed in Fall 2007 to be taught in Spring 2008.

Student advised (Committee Chair)

Andy Yuhasm, MS Christine Laudadio, MS

PhD students

Amy Ellwein James Hukla

Committee membership

Devin Gaugler, MS Anthony Salem, PhD. Barton, Faulkner, PhD. (completed)

Anthropology

Committee Membership Roberto A. Herrera, Ph.D. Luke Kellett, PhD.

Engineering/Computer Science

Committee Membership Oguz Demirci, PhD Completed Spring 2007 Janakiramanan Ramachandran, PhD

Jane Selverstone, Professor

Courses taught:

Spring: E&PS 303L – Igneous & Metamorphic Petrology (17 enrolled)

E&PS 519 - Topics in Geochemistry (9 enrolled)

E&PS 599 - MS thesis (1 enrolled)

Fall: E&PS 101 – How the Earth Works (103 enrolled)

E&PS 523 - Alpine-Himalayan Tectonics (8 enrolled)

E&PS 551 - Problems (1 enrolled)

E&PS 493 - Independent study (1 enrolled)

Undergraduate students supervised

Johanna Blake - Spring 2007 Noel Gill - Fall 2007

Graduate students supervised

Alexis Ault, MS - completed summer 2007

Melissa Halick, MS

Thesis and dissertation committees (in addition to students listed above)

Jana Berlin, PhD Caitlin Callahan, PhD Rena Ford, PhD

Jack Grow, MS

Euan Mitchell, MS, PhD

Scott Muggleton, PhD

Travis Naibert, MS

Stacey Chambliss, PhD Anthropology Connie Constan, PhD Anthropology

Zachary Sharp, Professor

Courses taught

Spring: E&PS 407 – Thermodynamics Phys. Fndts. Geochemistry (1 enrolled)

E&PS 507 - Thermodynamics Phys. Fndts. Geochemistry (7 enrolled)

E&PS 401 - Seminar (10 enrolled) E&PS 501 - Seminar (6 enrolled)

Fall: E&PS 101 sect. 1 - Blue Planet (135 enrolled)

E&PS 101 sect. 2 - Blue Planet (132 students)

E&PS 401 – Seminar (14 enrolled) E&PS 501 – Seminar (11 enrolled)

E&PS 551 - Problems (1 enrolled)

E&PS 699 - 1 student

Graduate students supervised/major advisor:

Dan Breecker (PhD) w/ Les McFadden, 2002 - present Mel Strong (Ph.D.) w/ Dave Gutzler, 2003 - present Dennis Newell (PhD), 2005-2007 Mark Tyra (PhD) w/ Maya Elrick, 2005 - present Justin Dodd (PhD). 2006 - present

Exam committee member:

Jana Berlin, Ph.D. Rena Ford, Ph.D. John Hurley, Ph.D. Melissa Halick (M.S.) Kristen Mullen (MS)

Outside PhD examiner

Chris Fraser, Biology Tim Lowry (advisor)

Gary A. Smith, Professor

Courses taught

Spring:

E&PS 333 - Environmental Geology (31 enrolled)

E&PS 699 - Dissertation (1 enrolled)

Summer:

E&PS 493 - Independent Study (1 enrolled)

Fall:

E&PS 201L - Earth History (28 enrolled)

E&PS 551 - Problems (1 enrolled) E&PS 699 - Dissertation (1 enrolled)

Student advisement:

Ph.D. Students Advised Sean Connell

Ph.D. Dissertation and/or Comprehensive Examination Committee Matt Kirk Kate Zeigler Dennis Newell

M.S. Thesis and/or Examination Committee Jed Frechette

Timothy Wawrzyniec, Research Scientist

Teaching Accomplishments

Tim F. Wawrzyniec is a structural geologist specializing in kinematic analysis, and geophysics. He earned his Ph.D. from the University of New Mexico 1999, and worked for Vastar, Inc. of Houston, Texas until joining the Bureau of Economic Geology at The University of Texas at Austin in 2000. In 2002, he started GWN consulting where he continued his work with the BEG on several Gulf Coast basin-analysis projects. He joined the University in July of 2003 as a Senior Research Scientist at the University of New Mexico where he manages the Paleomagnetism Laboratory. He also directs the University of New Mexico Lidar Lab, which formed in March, 2004 and is supported by a consortium of users from several Universities, government agencies, and several departments in both the College of Arts and Sciences and the College of Engineering at the University of New Mexico. He continues to conduct research applying paleomagnetism, fluid inclusion analysis, geospatial analysis using lidar based models, and field studies to address a variety of process oriented, tectonic and surface process problems. Current funded research includes a tectonic and paleomagnetic study in southern Mexico, bank erosion processes along the Rio Grande corridor, and hillslope processes in Blue Gap Arizona. Unfunded projects include in, northern Scotland, and tectonic problems closer to home along the eastern margin of the Colorado Plateau.

During 2007 Dr. Wawrzyniec was hired as a non-probationary Lecturer III in the department and has been charged with developing a number of new classes for the Department of Earth and Planetary Sciences. Offered as Topics classes, these include Petroleum Geology, Lidar and Geospatial modeling, and Geopads workshop. The latter is a class being offered in 2008, but is based on the alumni funded Geopads program under the direction of Dr. Louis Scuderi. The Petroleum Geology class was offered in Spring 2007, and had 7 students that focused on understanding sequence stratigraphy, intrabasinal deformation and tectonics, and how these topics related to petroleum geoscience. The lidar class was offered to 14 students who worked to understand how to apply lidar technology to geologic problems. The number of available software seats for processing data necessarily limited the class size. Both classes were well received and regularly attended by the students.

Gary Weissmann, Associate Professor

Courses taught:

Spring:

E&PS 443/543 - Aquifers and Reservoirs (14 enrolled)

Fall:

EnvSC 330 - Environmental Systems (41 enrolled)

E&PS 445/545 - Sedimentology and Stratigraphy (11 enrolled)

Graduate students advised:

Ginny Rust, MS/PhD Beth Nichols, PhD Nick Engdahl, MS

Graduate student exam committees:

Lyman Persico, PhD Marti Frisbee, PhD-NMT

2. PUBLICATIONS DURING THE CALENDAR YEAR 2007-2008

(E&PS tenure-track Faculty are underlined; ** = research scientists; * = students)

Refereed Journal Papers and Chapters in Edited Volumes

Solar forcing of Holocene climate: New insights from a speleothem record, southwestern United States <u>Asmerom, Y.</u>, **Polyak, V., Burns, S., and *Rassmussen, J., Geology, 35: 1-4 (2007)

Variable intensity of teleconnections during the late Holocene in subtropical North America from an isotopic study of speleothem from Florida

van Beynen, P.E., <u>Asmerom, Y.</u>, **Polyak, V., Soto, L., and Polk, J.S., Geophysical Research Letters, 34, L18703, doi:10.1029/2007GL031046 (2007)

Episodes of late Holocene aridity recorded by stalagmites from Devil's Icebox Cave, central Missouri, USA Denniston, R.F., DuPree, M., Dorale, J.A., <u>Asmerom, Y.</u>, **Polyak, V.J., and Carpenter, S.J., Quaternary Research, 68: 45-52 (2007)

U-Pb systematics in mare basalt source regions: a combined U-Pb, Rb-Sr and Sm-Nd study of mare basalt 10017 Gaffney, A., Borg, L., and <u>Asmerom, Y.</u>, Geochimica et Cosmochimica Acta; v. 71, no. 14, pp.3656-3671 (2007)

New age constraints on the Middle Stone Age occupations of Kharga Oasis, Western Desert, Egypt Smith, J.R., Hawkins, A.L., <u>Asmerom, Y.</u>, **Polyak, V., and Giegengack, R., Journal of Human Evolution, 52: 690-701 (2007)

Synchronous millennial-scale climatic changes in the Great Basin and the North Atlantic during the last interglacial Denniston, R.F., <u>Asmerom. Y.</u>, **Polyak, V., Dorale, J.A., Carpenter, S.J., Trodick, C., Hoye, B., and Gonzalez, L., Geology, 35: 619-622 (2007)

Caribbean and Pacific moisture sources on the Isthmus of Panama revealed from surface water and stalagmite δ^{18} O gradients

Lachniet, M.S., W.P. Patterson, S. Burns, Y. Asmerom and **V. Polyak Geophysical Research, 34, L01708, doi:10.1029/2006GL028469 (2007)

Geologic origins of salinization in a semi-arid river; the role of sedimentary basin brines Hogan, J., Phillips, F., Mills, S., Hendrickx, J., Ruiz, J. Chesley, J., and Asmerom, Y., Geology, 35: 1063-1066 (2007)

Chlorine isotope homogeneity of the crust, mantle and carbonaceous chondrites Sharp, Z.D., Barnes, J.D*, Brearley, A.J. Fischer, T., Chaussidon, M. and Kamenetsky, V.S. Nature 446, 1062-1065 (2007)

Origin and mechanical significance of fishnet (honeycomb) garnets in high-pressure metasedimentary rocks from the Tauern Window

Hawkins, A*, Selverstone, J., Brearley, A.J., Beane, R. J., Ketcham, R. and Carlson, W.D. Eastern Alps. J. Metamorphic Geology 25, 565-583. doi:10.1111/.1525-1314.2007.00714x (2007)

Mineralogy, aqueous alteration and primitive textural characteristics of fine-grained rims in the Y791198 CM2 carbonaceous chondrite: TEM observations and comparison to ALH81002 Chizmadia, L.J.* and Brearley, A.J.

Geochimica et Cosmochimica Acta 71, 602-625 (2007)

⁴⁰Ar/³⁹Ar and field studies of Quaternary basalts in Grand Canyon and model for carving Grand Canyon: quantifying the interaction of river incision and normal faulting across the western edge of the Colorado Plateau Karlstrom, K.E., Crow*, R., McIntosh, W., Peters, L., Pederson, J., Raucci*, J., Crossey, L.J., Umhoefer, P., Dunbar, N.,

Geological Society of America Bulletin, v. 119, p. 1283-1312 (2007)

Biogeochemistry at the zone of intermittent saturation: Field-based study of the shallow alluvial aquifer, Rio Grande, New Mexico

*Vinson, D.S., *Block, S.E., Crossey, L.J., and Dahm, C.N.

Geosphere, v. 3 p. 366-380 (2007)

Millennial-scale paleoclimate cycles recorded in Paleozoic deep water carbonates of North America Elrick, M., and Hinnov, L.A., Palaeogeography, Palaeoclimatology, Palaeoecology, v. 243, p. 348-372 (2007)

Orbital- and millennial-scale vegetation and climate changes of the past 225 kyr from Bear Lake, Utah-Idaho (USA) Jiménez-Moreno, G., Anderson, R.S., and <u>Fawcett, P.J.</u>, Quaternary Science Reviews, v. 26, p. 1713-1724 (2007)

Chronotopographic analysis directly from point-cloud data: A method for detecting small, seasonal hillslope change, Black Mesa Escarpment, NE Arizona

**Wawrzyniec, T.F., McFadden, L.D., *Ellwein, A., Meyer, G., Scuderi, L., McAuliffe, J., and Fawcett, P.J., Geosphere, v. 3, p. 550-567; doi: 10.1130/GES00110.1 (2007)

Geochemical Indicators of Redox Conditions as a Proxy for mid-Pleistocene Climate Change From a Lacustrine Sediment Core, Valles Caldera, New Mexico Johnson, C.M.*, Fawcett, P.J., and Ali, A.S.,

New Mexico Geological Society Guidebook, 58th Field Conference, Geology of the Jemez Mountains Region II, p. 418-423 (2007)

Appraisal of post-South Mountain volcanism lacustrine sedimentation in the Valles Caldera using tephra units WoldeGabriel, G., Heikoop, J., Goff, F., Counce, D., <u>Fawcett, P.J.</u>, and Fessenden-Rahn, J., New Mexico Geological Society Guidebook, 58th Field Conference, Geology of the Jemez Mountains Region II, p. 83-85 (2007)

The He-CO₂ isotope and relative abundance characteristics of geothermal fluids in El Salvador and Honduras: new constraints on volatile mass balance of the Central American Volcanic Arc de Leeuw, G.A.M., D.R. Hilton, <u>T.P. Fischer</u> and J. A. Walker Earth and Planet, Sci. Let., 158, 132-146 (2007)

Gas geochemistry of volcanic and hydrothermal fluids of Central America

Fischer, T.P., Shaw, A.M., and Hilton, D.R.

IN: Central America: geology, Resources and Hazards" edited by J. Bundschuh and G. Alvarado, Balkema, the Netherlands (2007)

Variable SO₂ emission rates for Anatahan volcano, the Commonwealth of the Northern Mariana Islands: Implications for deriving arc-wide volatile fluxes from erupting volcanoes Anatahan fluxes Hilton, D.R., <u>Fischer, T.P.</u> McGonigle, A., and de Moor, J.M. Geophysical Res. Lett. 34, doi:10.1029/2007GL030405 (2007)

Measurements of water vapor D/H ratios from Mauna Kea, Hawaii, and implications for subtropical humidity dynamics

Galewsky, J., M. Strong* and Z. Sharp

Geophysical Research Letters, v. 34, doi:10.1029/2007GL031330 (2007)

Diagnosing moisture transport using D/H ratios of water vapor M. Strong*, <u>Z.D. Sharp</u> and <u>D.S. Gutzler</u> Geophysical Research Letters, v. 34, L03404, doi:10.1029/2006GL028307 (2007)

Observational and modeling requirements for predicting drought on seasonal to decadal time scales S. Schubert, R. Koster, M. Hoerling, R. Seager, D. Lettenmaier, A. Kumar and D. Gutzler Bull. American Meteorological Society, v. 88, p. 1625-1630 (2007)

Microsctructures and thermal history of metal particles in CH chondrites Goldstein J.I., <u>Jones R.H.</u>, Kotula P.G. and Michael J.R. Meteoritics and Planetary Science, v. 42, p. 913-933 (2007)

Tectonic model for the Proterozoic growth of North America Whitmeyer, S., and <u>Karlstrom, K.E.</u>, Geosphere, v. 3, no. 2, p. 220-259 (2007)

Metamorphism in middle continental crust, Upper Granite Gorge, Grand Canyon, Arizona: implications for segmented crustal architecture, processes at 25-km-deep levels, and unroofing of orogens Dumond*, G., Mahan, K., Williams, M.W., and <u>Karlstrom, K.E.</u>, Geological Society of America Bulletin, v. 119: p. 202 – 220 (2007)

Pennsylvanian paleontology of limestone blocks in the resurgent dome of Valles caldera <u>B.S. Kues</u> and F. Goff Geology of the Jemez Region II (B.S. Kues, et al., eds), New Mexico Geological Society, Guidebook 58, p. 85-87 (2007)

Quantitative material properties for meteoroids from interplanetary dust particles <u>F.J.M. Rietmeijer</u>
Advances Space Research, 39(4), 583-589 (2007)

Laboratory simulation of Mg-rich ferromagnesiosilica dust: The first building blocks of comet dust <u>F.J.M. Rietmeijer</u> and J.A. Nuth III J.A. Advances Space Research, 39(3), 351-357 (2007)

The bacterial metallome: composition and stability with specific reference to the anaerobic bacterium Desulfovibrio desulfuricans.

L.L. Barton, F. Goulhen, M. Bruschi, N.A. Woodwards, R.M. Plunkett and <u>F.J.M. Rietmeijer</u> Biometals, 20, 291-302 (2007)

Light scattering by fluffy Mg-Fe-SiO and C mixtures as cometary analogs (PROGRA² experiment)
E. Hadamcik, J.-B. Renard, <u>F.J.M. Rietmeijer</u>, A.C. Levasseur-Regourd, H.G.M. Hill, J.M. Karner* and J.A. Nuth Icarus, 190, 660-671(2007)

Experimental light scattering by fluffy aggregates of magnesiosilica, ferrosilica, and alumina dust analogs H. Volten, O. Muñoz, J.W. Hovenier, <u>F.J.M. Rietmeijer</u>, J.A. Nuth, L.B.F.M. Waters and W.J. van der Zande Astronomy and Astrophysics, 470, 377-386 (2007)

A refractory Ca-SiO-H₂-O₂ vapor condensation experiment with implications for calciosilica dust transforming to silicate and carbonate minerals

F.J.M. Rietmeijer, A. Pun*, Y. Kimura and J.A. Nuth III Icarus, online doi:10.1016/j.icarus.2007.11.022 (2007)

Natural variations in comet-aggregate meteoroid compositions F.J.M. Rietmeijer

Earth, Moon, and Planets, online doi 10.1007/s11038-007-9164-4 (2007)

Carbon in meteoroids: Wild 2 dust analyses, IDPs and cometary dust analogues A. Rotundi and F.J.M. Rietmeijer

Earth, Moon, and Planets, online doi 10.1007/s11038-007-9218-7 (2007)

Microbeam analyses of the most challenging extraterrestrial samples ever returned. <u>F.J.M. Rietmeijer</u> Microscopy Today, 15(4), 6-10 (2007)

Geomorphic expression of mid-crustal extension in convergent orogens Pazzaglia, F.J., <u>Selverstone, J., Roy, M.</u>, Steffen, K., Pearce, S., Knipsher, W., and Pearce, J., Tectonics, no. 26, doi:10.1029/2006TC001961(2007)

A field and laboratory method for monitoring the concentration and isotopic composition of soil CO₂. *Breecker, D.O. and Sharp, Z.D. Rapid Comm. Mass Spec. v. 22, p. 449-454 (2008)

Principles of Stable Isotope Geochemistry Sharp, Z.D.
Prentice Hall, 344 pp. (2007)

A monazite oxygen isotope thermometer.

*Breecker, D.O. and Sharp, Z.D. American Mineralogist, v. 92 1561-1572 (2007)

Does student performance on formative assessments correlate to learning assessed by exams? $\underline{G.A.\ Smith}$

Journal of College Science Teaching, v. 36, no. 7, p. 28-34 (2007)

Introduction: Unlocking 3D earth systems-Harnessing new digital technologies to revolutionize multi-scale geological models

**T.F. Wawrzyniec, R.R. Jones, K. McCaffrey, J. Imber, N. Holliman, and R.E. Holdsworth Geosphere, v. 3, Issue 6, pp. 406–407 (2007)

Paleomagneticaly dating of fault slip in the Southern Rocky Mountains, USA, balancing Laramide strain north and east of the Colorado Plateau

**T.F. Wawrzyniec, *A.K. Ault, J.W. Geissman, E. Erslev, and S. D. Fankhauser Geosphere, v. 3, no. 1, p 16-25 (2007)

Slow and fast deformation in the Dora Maira Massif, Italian Alps: Pseudotachylites and inferences on exhumation history

Zechmeister, M., Ferre, E., Cosca, M.A., and <u>Geissman, J.W.</u>, Journal of Structural Geology, v. 29, p. 1114-1130 (2007)

Pervasive horizontal fabric and rapid vertical extrusion: lateral overturning and margin subparallel flow of deep crustal migmatites, northeastern Bohemian Massif

Pressler, R.E., Schneider, D.A., Petronis, M.S., Holm, D., and Geissman, J.W., Tectonophysics, v. 443, p. 19-36 (2007)

Relative size of fluvial and glaciated valleys in Central Idaho Amerson, B.E., Montgomery, D.R. and Meyer, G.A. Geomorphology, v. 93, p. 537–547 (published online 6 Apr 2007).

Books Edited

Geology of the Jemez Region II

<u>B.S. Kues</u>, S.A. Kelley, and V.W. Lueth (editors)

New Mexico Geological Society, 58th Field Conference Guidebook, 499 p. (2007)

Annual Editions, Environment 08/09 Sharp, Z.D.(Editor) (This is a textbook for which I was the sole editor.) ISBN: 0-07-351548-5, pp. 229

Book Chapters and Book Monograph

Interplay of Miocene rift tectonics and rhyolitic magmatism in the southern Jemez Mountains, New Mexico G.A. Smith and S.D. Lynch

New Mexico Geological Society Guidebook, 58th Field Conference, Geology of the Jemez Mountains Region II, p. 262-267 (2007)

Eruptive Processes Responsible for Fall Tephra in the Upper Miocene Peralta Tuff, Jemez Mountains, New Mexico S. Kindel* and G.A. Smith

New Mexico Geological Society Guidebook, 58th Field Conference, Geology of the Jemez Mountains Region II, p. 268-274 (2007)

The Cerrillos uplift, the La Bajada constriction, and hydrogeologic connection between the Española and Santo Domingo basins of the Rio Grande rift, New Mexico

D.A. Sawyer, B.D. Rodriguez, V.J.S. Grauch, S.A. Minor, M. Descz-Pan, R.A. Thompson, D.P. Dethier and G.A. Smith

U.S. Geological Survey Professional Paper 1720, 189 p. (2007)

Tectonism of the Southwest Silver Peak Range: Paleomagnetic and Geochronologic Data bearing on the Neogene development of a regional extensional complex, central Walker Lane, Nevada, in Till, A.B., Roeske, S.M., Sample, J.C., and Foster, D.A., eds., Exhumation Associated with Continental Strike-Slip Fault Systems Petronis, M.S., Geissman, J.W., Oldow, J.S., and McIntosh, W.C.,

Volume Special Paper 434, Boulder, Geological Society of America, p. 81-106 (2007)

How much strain can continental crust accommodate without developing obvious through-going faults?, in Sears, J.W., Harms, T.A., and Evenchick, C.A., Whence the Mountains? Inquiries into the Evolution of Orogenic Systems: Burchfiel, B.C., Studnicki-Gizbert, C., Geissman, J.W., and Wang, E.,

A Volume in Honor of Raymond A. Price, Geological Society of America Special Paper 433, p. 51-62 (2007)

Two Middle Pleistocene Glacial-Interglacial Cycles from the Valle Grande, Jemez Mountains, New Mexico Fawcett, P.J., Heikoop, J., Goff, F., Anderson, R.S., Donohoo-Hurley, L., Geissman, J.W., Johnson, C., Wolde-Gabriel, G., Allen, C.D., and Fessenden-Rahn, J., New Mexico Geological Society Fall Field Conference Guidebook (2007)

A 200 kyr Pleistocene lacustrine record from the Valles Caldera: Insight from environmental magnetism and paleomagnetism, *in* Kues, B.S., Kelley, S., and Lueth, V.W., eds., Geology of the Jemez Region II New Mexico *Donohoo-Hurley, L., <u>Geissman, J.W., Fawcett, P.J.</u>, **Wawrzyniec, T.F., and Goff, F., Geological Society, Fall Field Conference Guidebook: Socorro, New Mexico Geological Society, p. 424-432 (2007)

What do we know about the magnetostratigraphy across the Triassic-Jurassic boundary?, in Lucas, S.G., and Spielmann, J.A., eds., The Global Triassic, Volume Bulletin 41 *Donohoo Hurley, L., Geissman, J.W., and Lucas, S.G.,

Albuquerque, New Mexico Museum of Natural History and Science, p. 33-38 (2007)

Notes, Extended Abstracts, and Other Publications

Summer North American monsoon outlook

D.S. Gutzler

New Mexico Climate, v. 5, p. 4-5, New Mexico Climate Center, NMSU (2007).

Climate change and water resources in New Mexico

D.S. Gutzler

New Mexico Earth Matters, v. 7, no. 2, p. 1-4, NM Bureau of Geology and Mineral Resources, NMT (2007).

From the Science Editors

Karlstrom, K.E., and Murphy, B.,

Geological Society of America Bulletin, v. 119, p. 259 (2007)

Does the arc-accretion model adequately explain the Paleoproterozoic evolution of southern Laurentia: An expanded interpretation-Comment

Karlstrom, K.E., Whitmeyer, S.J., Williams, M.L., Bowring, S.A., and Jessup*, M.J.,

Geology, DOI 10.1130/G23971C.1 (2007)

River incision histories of the Black Canyon of the Gunnison and Unaweep Canyon: Interplay between late Cenozoic tectonism, climate change, and drainage integration in the western Rocky Mountains Anders, A., <u>Karlstrom, K.</u>, Hood, W., Cole, R., Oesleby, T., Betton, C., et al., Geological Society of America Guidebook, National meeting (2007)

Geology

B.S. Kues

In R.C. Sivinski, Checklist of vascular plants in the Sandia and Manzano Mountains of central New Mexico: Occasional Papers of the Museum of Southwestern Biology, no. 10, p. 2 (2007)

Conference organizers' message

B.S. Kues, S.A. Kelley, J. Gardner, F. Goff, C. Goff, and K. Ziegler

Geology of the Jemez Region II (B.S. Kues et al., eds), New Mexico Geological Society, Guiebook 58, p. ix. (2007)

Challenges to understand aerogel contaminated by hypervelocity-impacted comet Wild 2 dust F.J.M. Rietmeijer

Lunar and Planetary Science, XXXVIII, CD-ROM #1082, Lunar and Planetary Institute, Houston

Deep metastable eutectic condensation in low-silica Al-Fe-SiO-H₂-O₂ smoke: Simple experiments, major implications.

F.J.M. Rietmeijer, A. Pun* and J.A. Nuth, III

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Mapping upper mantle anisotropy beneath the western US: toward a coupled seismic and geodynamic analysis of crust-mantle coupling

Gaherty, J., Tetreault, J., Roy, M., P. Chen, and A. Lerner-Lam

Earthscope National Meeting (2007)

A multidisciplinary investigation for Rio Grande Rift deformation Lowry, A.R., Sheehan, A.F., Roy, M., Nerem, S., Guerra, M., and A. Luther Earthscope National Meeting (2007)

Using xenoliths to explore variations in upper mantle composition and the relation of composition to seismic velocity structure beneath the Colorado Plateau

*Callahan, C., Roy, M., and K. C. Condie

Abstracts with Programs -Geological Society of America, v. 39, no. 6, pp.278 (2007)

The central Colorado Plateau bullseye linking patterns of quantified incision, exhumation, and flexure Pederson, J., *Callahan, C., and M. Roy,

Abstracts with Programs, Geological Society of America, v. 39, no. 6, pp.184 (2007)

Exhumation history of the Colorado Plateau Kelley, S., Stockli, D., Lee, J., Pederson, J., Roy, M. and *C. Callahan, Abstracts with Programs Geological Society of America, v. 39, no. 6, pp.185 (2007)

New paleomagnetic results from the latest Triassic to earliest Jurassic Moenave Formation, southwest Utah, and northwest Arizona

Hurley, L., Geissman, J.W., Lucas, S., and M. Roy,

Abstracts with Programs Geological Society of America, v. 39, no. 5, pp.13 (2007)

Models of seismic anisotropy and upper mantle deformation at the San Andreas fault system: Investigation of the role of crust-mantle coupling

*Tetreault, J., Roy, M., Gaherty, J., Chen, P., and L. Zhao

American Geophysical Union Fall Meeting (2007)

Experimental evidence for high-pressure phase separation in the H₂O-CO₂-CaCl₂ system: implications for rock rheology

Selverstone, J., Chernak, L.*, Tullis, J., and Cooper, R.,

American Geophysical Union Fall Meeting (2007)

CO₂ strengthening of quartz in the dislocation creep regime Chernak, L.*, Tullis, J., and Selverstone, J.,

American Geophysical Union Fall Meeting (2007)

Associated alluvial fans to Holocene climates, San Bernardino Mountains California Eppes, M.C., McFadden, L.D., and Griffing, D.,

Geological Society of America Abstracts with Programs, v. 39 (6) p. 260 (2007)

Black Mesa revisited: New OSL dates provide evidence of Late full-glacial and Early Holocene eolian activity on Black Mesa, northeastern Arizona

*Ellwein, A.L., McFadden, L.D., and Mahan, S.,

Geological Society of America Abstracts with Programs, v. 39 (6) p.79(2007).

Extreme conditions of pedogenic carbonate formation and implications for paleoenvironmental reconstruction and and paleosol PCO₂ barometery

*Breecker, D.O., Sharp, Z., and McFadden, L.D.,

Geological Society of America Abstracts with Programs, v. 39 (6) p. 182 (2007).

Links between climate, ecosystems, and geomorphic change

Meyer, G.A., Galewsky, J., McAuliffe, J.R., and McFadden, L.D.,

National Science Foundation Climate over Landscapes Workshop, Boulder, CO, (2007) invited.

Fire, climate, and fans

Meyer, G., **Frechette, J.D., New, J.K., and Pierce, J.L.,

Geological Society of America Abstracts with Programs, v. 39, No. 6, p. 259 (2007) invited.

Mass movement effects on the Middle Fork of the Salmon River, Idaho

Meyer, G.A., and Leidecker, M.

Geological Society of America Abstracts with Programs, v. 39, no. 6, p. 179 (2007)

Episodic geomorphic impact of severe fire in ponderosa pine and mixed-conifer forests of the Sacramento Mountains. New Mexico

**Frechette, J.D. and Meyer, G.

Geological Society of America Abstracts with Programs, v. 39, no. 6, p. 109 (2007)

Testing a debris flow source area and initiation hypothesis for simple 'classic' martian gullies

*Lanza, N.L., G. Meyer, **H. Newsom, R. Wiens, and C. Okubo

Submitted to The Workshop on Martian Gullies: Theories and Tests, Lunar and Planetary Institute, Houston, Texas (2008)

Invited Presentation and the Keynote Speaker for the Inaugural Session on Tree-Ring Reconstructions in Natural Hazards Research

Scuderi, L.A., McFadden, L.D. and McAuliffe, J.R.,

Dendrogeomorphic evidence of hillslope erosion in response to climate variation AD 1600 to present: Colorado Plateau, northeastern Arizona, USA. (solicited) Geophysical Research Abstracts 9, 01452 (2007)

Comparisons of satellite and ground-based sulfur dioxide retrievals

Meier, V.; Scuderi, L., Fischer, T., Realmuto, V.; Hilton, D.; *Yuhas, A.,

Geophysical Research Abstracts 9, 01455 (2007)

International Congress for Conservation Biology, Society of Conservation Biologists, Port Elizabeth, South Africa: June 2007

*Yuhas, A. and Scuderi, L.A.,

MODIS/NDVI Detection of Drought Induced Vegetation Die Off in Semi-Arid Ecosystems (2007)

International Workshop on Environmental Changes and Sustainable Development in Arid and Semi-arid Regions, Alashan Left Banner, Inner Mongolia

Session Chair and Organizer Laudadio, C., Scuderi, L.A. and Fawcett, P.,

China, September 2007

Detection of playa lake level change: A remote sensing approach

*Yuhas, A., and Scuderi, L.A.,

NDVI based evidence of a global vegetation die off signal in semi arid regions (2007)

Geological Society of America, Annual Meeting Denver

*Yuhas, A., and Scuderi, L.A.,

MODIS/NDVI Based Detection of Drought Induced Vegetation Die Off in North American Ecosystems (2007)

Tl: Oxygen isotope composition of modern pedogenic carbonate from the southern margin of the Tibetan Plateau *Breecker, D., Sharp, Z.D., Newell, D., Jessup, M. Cottle, J. A.G.U. Fall meeting (2007)

Invited Vapor-liquid fractionation of B, Li, and Cl stable isotopes: Experimental constraints at 400 and 450 °C/20 to 42 MPa

Liebscher, A., Barnes, J.D., Heinrich, W., Meixner, A., Romer, R.L. and Sharp, Z.D. Goldschmidt Meeting (2007)

Invited Chlorine Isotope Distribution on Earth Sharp, Z.D. and Barnes, J.D. Goldschmidt Meeting (2007)

Chlorine Isotope Geochemistry as a Monitor of Fluid-Rock Interaction in Volcanic Systems Sharp, Z.D., Barnes, J.D. and Fischer, T.P.

A.G.U. Fall meeting (2007)

Mineral Springs of Southern Tibet, Everest Region: geochemical window to three structural levels Newell, D.L., Jessup, M.J. Cottle, J.M., Hilton, D.R., Fischer, T. and Sharp, Z.D. AGU Fall Meeting (2007)

Probing subtropical humidity dynamics with stable isotopes of water vapor from Mauna Kea, Hawaii Galewsky, J., Strong, M. and Sharp, Z.D. (2007)

Tectonic Evolution of the Española Basin, Rio Grande Rift, North-Central New Mexico Koning, D.J., Smith, G.A., Connell, S.D.*, Slate, J.L., WoldeGabriel, G., Peters, L., McIntosh, W., Dunbar, N., and Horning, R.
Geological Society of America, Abstracts with Programs Vol. 39, No. 6 (2007)

Stratigraphic Architecture of the Española Basin and Abiquiu Embayment, Rio Grande Rift, New Mexico: Tectonic, Climatic, and Volcanic Controls on Sedimentation Koning, D.J., Smith, G.A., Connell, S.D.*, and Broxton, D.

Geological Society of America, Abstracts with Programs Vol. 39, No. 6 (2007)

Dispersion analysis using particle tracking simulations through heterogeneity based on outcrop lidar imagery Klise, K.A.*, Weissmann, G.S., McKenna, S.A., Tidwell, V.C., *Frechette, J.D., and **Wawrzyniec, T.F., GSA Annual Meeting and Exposition, Denver, Colorado, October 28-31 (2007)

Outcrop-based lidar imagery to develop millimeter-scale models of heterogeneity Weissmann, G.S., *Frechette, J.D., Woodward, W., Nichols, E., **Wawrzyniec, T.F., and Klise, K.A., AGU Fall Meeting, San Francisco, CA, (2007)

A new view of fluvial facies models- aggradational distributary networks Weissmann, G.S., Hartley, A.J., and Nichols, G., GSA Annual Meeting and Exposition, Denver, Colorado (2007)

Investigation of non-Fickian dispersion using lidar imagery on outcrops Weissmann, G.S., *Frechette, J., **Wawrzyniec, T., and Klise, K., GSA Annual Meeting and Exposition, Denver, Colorado (2007)

Numerical investigation on the ability to predict non-Fickian dispersion from aquifer properties Klise, K.A.*, McKenna, S.A., Tidwell, V.C., and <u>Weissmann, G.S.</u>. GSA Annual Meeting and Exposition, Denver, Colorado (2007)

Classification and segmentation of terrestrial lidar data for lithofacies analysis Frechette, J.D.*, <u>Weissmann, G.S.</u>, **Wawrzyniec, T., GSA Annual Meeting and Exposition, Denver, Colorado (2007)

Three-dimensional modeling of hydrogeological properties in the Ringold formation, Hanford Site, Southeast Washington

Murray, C.J*., Weissmann, G.S., YuLong, X., *Frechette, J.D., Last, G.V., Bjornstad, B.N., and Allen-King, R.M., GSA Annual Meeting and Exposition, Denver, Colorado (2007)

Aquifer sedimentology of fans: needs for future research Weissmann, G.S.,
Invited Keynote Address, Alluvial Fans 2007, Banff, Alberta, Canada (2007)

Assessing geostatistical models in capturing geologic realities, Ground Water Summit Rust, G.L*, and Weissmann, G.S.,

National Ground Water Association, Albuquerque, NM (2007)

Regional-scale influence of large incised-valley fill deposits on ground water flow, 2007 Ground Water Summit, Weissmann, G.S., Lansdale, A.L., Phillips, S.P., and Burow, K.R., National Ground Water Association, Albuquerque, NM (2007)

Petrologic assessment and controls on aquifer anisotropy at Lawrence Livermore National Laboratory, California, Ground Water Summit

Mikesell, L.R.,* and Weissmann, G.S.,

National Ground Water Association, Albuquerque, NM (2007)

U.S. Geological Survey Scientific Investigations Map 2913 (2007)

Maps

Geologic map of Eastern Grand Canyon (Chuar Valley and Furnace Flats area) at 1:24,000 scale Timmons, J.M., <u>Karlstrom, K.E.</u>, and Pederson, J., Printed in 2007 and for release in 2008 by the Grand Canyon Association (2007)

Geologic map of Pueblo of Isleta Tribal lands and vicinity, Bernalillo, Torrance, and Valencia counties, New Mexico
Maldonado, F., Slate, J., Love, D.W., Connell, S.D., Cole, J.M., and Karlstrom, K.E.,

Preliminary geologic map of the La Madera quadrangle, Rio Arriba County, New Mexico Koning, D.J., <u>Karlstrom, K.E.</u>, *Salem, A., and Lombardi, C., New Mexico Bureau of Geology and Mineral Resources, Open-file Geologic Map OF-GM 141, scale 1:24,000 (2007)

3. EXTERNALLY FUNDED RESEARCH GRANTS AND CONTRACTS

Awarded in January 1, 2007 - June 30, 2008

Continental Response to Abrupt Climatic Events from Speleothem Data, SW USA Y. Asmerom and V. Polyak.

National Science Foundation [48 months]

\$400,000 [Funded in 2007]

Collaborative Research: Millennial-scale tropical rainfall variability from 100 to 20 ka: Testing cross-isthmian water vapor transport and feedbacks on thermohaline circulation

Y. Asmerom, UNM PI,

National Science Foundation [Resubmitted, funded at reduced amount [\$100,000 and administered though UNLV at \$100,000]

Major Research Infrastructure – MRI: Focused Ion Beam System for Nano Fabrication and Nano Machining of Materials

A. Datye (PI), <u>A.J. Brearley</u> and Z. Leseman (coPIs) NSF Major Research Infrastructure Program \$762,140 (June 2007-May 2009)

Integrated mineralogical and isotopic studies of STARDUST cometary samples A.J. Brearley, (PI)
NASA Stardust Data Analysis Program
\$199,000 (1 May 2007-30 April 2010

Upgrade of digital imaging capabilities for UNM transmission electron microscopy laboratory A.J. Brearley, (PI)
NASA Planetary Major Equipment Program
\$83,748 (1 May, 2007 – 30 April 2009)

Collaborative Research: Testing models for incision and neotectonics of the Grand Canyon region: field studies, 40Ar/39Ar dating of Neogene basalts, and detrital zircon and monazite studies of alluvial deposits K.E. Karlstrom and L.J. Crossey
Noticed Science Research: Testonics Programs

National Science Foundation, Tectonics Program \$164,712; (June 1, 2007 to July 31, 2009)

Collaborative Research: Dating sedimentary sequences: In situ U/Th-Pb microprobe dating of early diagenetic monazite in Neoproterozoic black shales

L.J. Crossey and K.E. Karlstrom, J. Bloch and M. Williams

National Science Foundation, Sed. Geo and Paleo Program

\$105,920/2 years (June 1, 2007 to July 31, 2009)

Collaborative Research: RUI: Biogenic cave carbonates: Identifying surface carbon input to subsurface ecosystems <u>L.J. Crossey</u> and D. Northup (Biology)
National Science Foundation, Geochem Program

Middle Paleozoic climatic and sea-level changes and their influence on marine community evolution: a comparison of models from Perunica microcontinent and Laurussian continent M. Elrick, (co-PI Jiri Fryda, Czech Geological Survey)

AMVIS (American Science Information Center-joint cooperative U.S.-Czech Republic)

\$150,000 (2008-2012)

Investigating the causes of the Late Cambrian global extinction, sea-level fall, and paleoceanographic change M. Elrick

Research Allocation Committee, spring-summer 2007

\$6000.00

Project Title: Late Pleistocene highstand shoreline chronologies and climate change: pluvial Lake Palomas, northern Mexico

P.J. Fawcett (PI)

Funding Organization: University of New Mexico Research Allocation Committee \$4,000 (October 15, 2007 – Septemer 30, 2008)

Constraining the process of volatile transfer from the subducted slab to the surface using phenocrysts of recently erupted tephras from the Izu-Bonin-Marianas arc

T. Fischer

National Science Foundation, OCE MARGINS \$75,095.00 (March 28, 2007 – March 27, 2009)

Chlorine Isotope Geochemistry of Volcanic Systems

J. Barnes, Z. Sharp and T. Fischer

National Science foundation, EAR

\$138,924.00 (May 29, 2007 - May 28, 2009)

Climate over landscapes: A workshop on the links between atmospheric sciences and landscape dynamics

J. Galewsky (PI) and G. Roe (Univ., Washington)

National Science Foundation, Geomorphology and Land Use Dynamics/Climate Dynamics Programs \$75,000 (May, 2007 – May 2008)

The impact of valleys on orographic precipitation

J. Galewsky (PI)

National Science Foundation, TeraGrid

100,000 CPU hours on new 'Ranger' 504 TFLOP supercomputer

Developing an idealized, coupled, atmosphere-land surface climate model

J. Galewsky (PI)

UNM Arts and Sciences Dean's Summer Research Award

\$20,000 (2007)

TeraGrid Development Allocations Committee Award

J. Galewsky (PI)

National Science Foundation

30,000 CPU-hour supercomputing allocation on NSF-sponsored national supercomputing network

The Seasonal Cycle of Drought

D. Gutzler (PI)

NOAA Climate Program Office/Climate Prediction Program for the Americas

\$65K (July 2007 - May 2009)

Collaborative Research: CREST: Colorado Rockies Experiment and Seismic Transects

K. Dueker, R. Aster, E. Kirby, L.J. Crossey, and others

NSF Continental Dynamics Program

\$299,457 to UNM (January 1, 2007 - December 31, 2010)

Project: Science Institutes for Highland Cluster, funded by New Mexico Public Education Department M. Nyman

Joint with Albuquerque Public Schools

\$250,000 UNM: \$100,000

Project: SEIS Museum Teaching Fellowship, funded by the Albert I. Pierce Foundation

M. Nymai

In collaboration with the New Mexico Museum of Natural History and Science (NMMNHS) \$15,000

Project: ESSEA – Distance Learning Classes for Rural and Urban Teachers in New Mexico, funded by Earth Systems Education Alliance through an NSF GEO-Teach grant.

M. Nyman (Co-PIs: G. Weissmann, D. Knotts and S. Coneally (NMMNHS)). \$39.992

Collaborative CI-Team Implementation Project: Advancement of Cyberinfrastructure-Based Science Through Education, Training, and Mentoring of Science Communities

L. Scuderi Co-Investigator

National Science Foundation, 2007-2009, \$964.892.

Geospatial Teaching and Field-Based Tools L. Scuderi, Principal-Investigator

Gorham Foundation, 2007-2008, \$60,000.

HRTEM Petrology of comet Wild 2 dust captured in STARDUST silica aerogel

F.J.M. Rietmeijer (PI)

National Aeronautics and Space Administration

\$290,450 (July 1, 2007 to June 30, 2010)

Integrated stratigraphic, geomorphic, sedimentologic, numeric, and experimental study of hangingwall ramp architecture in continental half grabens

G.A. Smith, and J.W. Geissman

National Science Foundation

\$151,966 (March 2004 - February 2009)

Collaborative research: Identification of the plate boundary between India and Indochina through integrated petrologic, structural, and paleomagnetic analyses

J.W. Geissman

National Science Foundation, Tectonics

\$104,473 (request, UNM component, two years)

Collaborative Research: Integrated Tectonic and Paleomagnetic Study of the Early Cenozoic Rotation and Extrusion of Asian Crust Around the Eastern Himalayan Syntaxis

J.W. Geissman

National Science Foundation, EAR, Tectonics

\$181,000 (three years)

Collaborative Research: Magma dynamics in sill and dike systems: Constraints from magnetic fabrics and paleomagnetism in the Karoo large igneous province

J.W. Geissman, UNM; E. Ferre, Southern Illinois University

National Science Foundation, EAR, Tectonics

\$77,256 (January, 2008 - December, 2009)

Stable Isotope Profiles in Modern Desert Soils Z. Sharp (PI) and L.D. McFadden (Co-PI) National Science Foundation \$95,007 (July 1, 2007 – June 30, 2009)

Research Experience for Undergraduates (REU) Site: New Mexico Sevilleta LTER REU Site Program Collins, S., P.I., McFadden, L.D. (Co-P.I.)
National Science Foundation
\$267,465 (April 1, 2008 – May 30, 2011)

Coupling of hydrologic/hydraulic models and aerial photos through time U.S. Army Corps of Engineers Urban Flood Demonstration Program G. Meyer, (PI) J. Coonrod (co-PI) \$82,128 (2006-2007)

Chlorine Isotope Geochemistry of Volcanic Systems Z. Sharp
National Science Foundation
\$193,674 (June 2007 – June 2009)

Stable Isotope Profiles in Modern Desert Soils Z. Sharp
National Science Foundation
\$95,007 (February 2007 – February 2009)

SGER: Chlorine Isotopes as Tracers of Subduction Zone Fluids Z. Sharp

National Science Foundation \$82,163 (June 2006 – June 2008)

Partial support for the acquisition of a Focused Ion Beam/FEGSEM for integrated mineral, and isotopic analyses of extraterrestrial materials (Co-I)

Z. Sharp NASA

\$350,000 (April 2008 - April 2009)

Using oxygen isotopes from apatitic conodonts to understand the origins of Paleozoic-Triassic 3rd-order (My-scale) sea-level changes (Co-I)

Z. Sharp

National Science Foundation \$220,183 (Septemer 2005 – September 2008)

Collaborative Research: The Nitrogen Isotope Systematics of the Icelandic Mantle (Co-I)

Z. Sharp

National Science Foundation

\$239,340 (February 2006 - February 2009)

The Department of Energy (DOE-BES): Investigation into the relationship between heterogeneity and heavy-tailed solute transport

G.S. Weissmann (PI), S. McKenna, V. Tidwell, Sandia National Laboratory and D. Benson, Colorado School of Mines

\$30,000 (\$15,000 for 2007)

Grants and Awards current in the period January 1, 2007 – June 30, 2008 (continued from previous years)

Bridging the Gap: Reconstructing the Evolution of Grand Canyon from the Dating of Speleothems V. Polyak, <u>Y. Asmerom</u> and C. Hill National Science Foundation [48 months] \$243,000

Supplement to acquire a Q-ICPMS Y. Asmerom, (PI)
National Science Foundation
\$50,000

Increasing Minority Ph.D.s in Earth and Planetary Sciences [program enlarged to include all incoming minority Ph.D. students]

Y. Asmerom, (PI)

Sloan Foundation [On-going]

\$38,000 / per student

Acquisition of a MC ICP-MS For Earth Science Research In New Mexico Y. Asmerom, (PI), Borg, L., Crossey, L.J., Fischer, T., and Polyak, V., (Co-PIs) National Science Foundation \$450,100 (not including UNM match of \$192,000)

Acquisition of a Precision Ion Polishing System for the UNM Transmission Electron Microscopy Lab A.J. Brearley, (PI)
NASA Cosmochemistry Program
\$56,608 (15 March 2006 – 14 March 2007)

Formation and Alteration Histories of Chondritic Materials A.J. Brearley, (PI) NASA Cosmochemistry Program \$875.000 (15 March 2006 – 14 March 2010)

Mechanisms and kinetics of aqueous alteration reactions in chondritic meteorites A.J. Brearley, (PI)
NASA Origins of Solar Systems program
\$140,025 (15 March, 2005 – 15 March 2008)

NSF National Nanoscience Infrastructure Network S. Brueck (CHTM) UNM site Director. UNM Participants – K. Malloy, J. Brinker and <u>A.J. Brearley</u> \$3.5M to UNM (Jan 01, 2004-Dec 31, 2009)

Alliance for Minority Programs: Undergraduate Research Support at the University of New Mexico L.J. Crossey (PI)
New Mexico State University/NSF
\$55,000 (November 1, 2006 – October 31, 2007

Track 1, GK-12: Ecohydrogeology in the Middle Rio Grande Environment L.J. Crossey (Co-I); with S. Collins (UNM, Biology)
National Science Foundation/HER (0538396)
\$1,736,028 (April 1, 2006 – March 31, 2008)

The Trail of Time: Informal Science Education initiative at Grand Canyon:

L.J. Crossey (Co-I); w/K.E. Karlstrom, and Semken, S. (ASU)

National Science Foundation, Informal Science Education Program

\$752,664 (2005 to 2007)

Using oxygen isotopes from apatitic conodonts to understand the origins of Paleozoic-Triassic 3rd-order (My-scale) sea-level changes

M. Elrick, (co-PI Zach Sharp)

National Science Foundation

\$205,183 (2005-2008)

Deep coring of the Valles Caldera: Obtaining a Long-Term Paleoclimate Record from Northern New Mexico

P.J. Fawcett (PI) and J.W. Geissman

Funding Organization: Los Alamos National Laboratory, Institute for Geophysics and Planetary Physics (IGPP)

\$35,000 (October 1, 2006 - September 30, 2007)

NGS The 2006 Eruptions of Ol Doinyo Lengai Volcano, East African Rift, Tanzania

T. Fischer (PI)

National Geographic discretionary funds

\$10,600 (January 4, 2006 - March 5, 2007)

Science and Engineering International Workshop on the Evolution and Transfer of Magmas and Volcanic Gases

T. Fischer (PI)

National Science Foundation, Office of Internatl.

\$18,000 (Septemer 19, 2006 - March 14, 2007)

SGER: Chlorine Isotopes as Tracers of Subduction Zone Fluids

Z. Sharp (PI) and T. Fischer, co-PI

NSF EAR 82,163.00 (June 1, 2006 -- May 31, 2007)

Funds post-doc Jaime Barnes

Collaborative Research: The Nitrogen Isotope Systematics of the Icelandic Mantle

T. Fischer, PI; Z. Sharp and Hilton (co-PIs)

NSF EAR-0537618

\$239,340.00 (January 1, 2006 - December 31, 2008)

Collaborative Research: CO₂ Springs and travertines of the Southwestern US: Hydrologic pathways linking tectonism to water quality

L. Crossey (PI) and T. Fischer, K.E. Karlstrom and A. Springer (co-PIs)

National Science Foundation, EAR-0538304

\$149,795.00 (January 1, 2006 - December 31, 2007)

Collaborative Research: Diagnosis of subtropical humidity dynamics using tracers of last saturation.

J. Galewsky and A. Sobel (PIs)

National Science Foundation

\$184.842 to Galewsky

Workshop on integrated scientific coring on the Colorado Plateau: Early Mesozoic history of west Pangea

P. Olsen, D. Kent and J.W. Geissman

DOSECC (Deep Observation and Sampling of the Earth's Continental Crust)

\$60,000 (October, 2006 - June, 2008)

Workshop on integrated scientific coring on the Colorado Plateau: Early Mesozoic history of west Pangea P. Olsen, D. Kent and J.W. Geissman
National Science Foundation, EAR, Sedimentary Geology and Paleobiology
\$40,000 (October, 2006 - June, 2008)

A collaborative paleomagnetic, remote sensing, and field investigation of the Neogene fragmentation of the Maya Block, with implications for the Jurassic opening of the Gulf of Mexico

T. Wawrzyniec and J.W. Geissman

American Chemical Society, Petroleum Research Fund

\$80,000 (August 1, 2006 - August, 2008)

Acquisition of a high-sensitivity Acintrex CG-5 Autograv gravimeter to augment geophysical data acquisition capabilities in the Department of Earth and Planetary Sciences

M. Roy, J.W. Geissman and **T. Wawrzyniec

National Science Foundation, EAR, Instrumentation and Facilities

\$56,000 (March, 2006 - February, 2007)

Tropical Cyclone Activity Associated with the North American Monsoon System D. Gutzler (PI) and co-PI: E. Ritchie
NOAA Office of Global Programs/Warm Season Precipitation Initiative
\$95K/yr. (Sept. 3 - Aug 06, no-cost extension to May 07)

The North American Monsoon System Climate Process Team J. Schemm (PI) NOAA; UNM co-PI: D. Gutzler

NOAA Climate Program Office/Climate Prediction Program for the Americas

\$33K/yr to UNM (June 05 - May 08)

Petrologic, Chemical and Experimental Investigations of Early Solar System Materials R. Jones (PI)

NASA / Cosmochemistry

\$351,000 (March 1, 2006 - February 28, 2009)

Meteorite Museum Renovation and Associated Outreach Activities at the University of New Mexico R. Jones (PI)

NASA / Education and Public Outreach

\$112,415 (August 16, 2003 - February 15, 2007)

Collaborative Research: The Trail of Time: A Geoscience Exhibition at Grand Canyon National Park K.E. Karlstrom, L.J. Crossey and S. Semken (ASU), National Science Foundation, Informal Science Education Program

\$1,834,740 to UNM (June 1, 2006 - May 31, 2009)

Studies of the nucleation, growth, and metamorphism of refractory materials: Simple analogs of complex natural samples

F.J.M. Rietmeijer (Co-I)

\$477,900 (April 1, 2007 to May 31, 2011)

Transmission Electron Microscope characterization of chemical vapor deposits on the returned GENESIS heat shield

F.J.M. Rietmeijer (PI)

The SETI Institute

\$10,582 (September 1, 2004 to September 30, 2007)

Analyses of ablation features on the STARDUST heat shield

F.J.M. Rietmeijer (PI)

The SETI Institute

\$10,581 (November 1, 2005 to September 30, 2007)

Collaborative Research: Interpretations of seismic anisotropy in terms of the long-term tectonic history of the Western US

J. Gaherty, M. Roy, A. Lerner-Lam (PIs)

National Science Foundation Earthscope

\$118K to M. Roy (2006-08)

Testing a new model of the Tertiary evolution of the Colorado Plateau based on constraints from magmatic patterns. xenoliths, geologic, and geophysical data; Funded by the National Science Foundation

M. Roy (sole PI)

EAR-Tectonics Program

\$100K (2006-2008)

Collaborative Research: Crustal deformation measurements and a multidisciplinary geophysical investigation of the Rio Grande Rift

A. Sheehan, S. Nerem, A. Lowry, and M. Roy (Pls)

National Science Foundation, EAR-Earthscope Program

\$124K to M. Roy (\$605K, July 2005 - July 2010)

Collaborative Research; Integrated study of exhumation and erosion using low-temperature thermochronology and geodynamic models of the Colorado Plateau

M. Roy, D. Stockli, S. Kelley, and J. Pederson (PI's)

National Science Foundation, EAR-Tectonics Program

(\$47K to M. Roy (July 2004 - July 2006)

Marie-Tharp Fellowship

M. Rov

National Science Foundation ADVANCE

(\$30K) Columbia University, Lamont-Doherty Earth Observatory, NY; (period: 2006-2008)

Collaborative Research: Metamorphic fluid evolution and rock rheology

J. Selverstone (PI) A. Brearley (collaborative with J. Tullis, Brown University)

National Science Foundation

\$131,740; 6/1/05-5/31/07

Acquisition of an ICP-OES for geoscience research at the University of New Mexico

L. Crossey, A.-M. Ali, T. Fischer, Y. Asmerom, J. Selverstone

National Science Foundation

\$162,582 (September 15, 2005 - September 14, 2007)

Center for Rapid Environmental Assessment and Terrain Evaluation (CREATE) Follow up Scientific Investigations L. Scuderi, Principal Investigator

National Aeronautics and Space Administration

\$3,500,000 (2004-2008)

National Science Foundation

L. Scuderi, Co-Investigator

EPSCOR-Hydrology

\$157,500 (2005-2008)

Acquisition of a Portable LiDAR System for Land-Surface Studies

<u>L. Scuderi</u>, Co-Investigator (with S. Collins).

University of New Mexico, Research Allocation Committee, Interdisciplinary Large Grant, \$62,065 (2005-2007)

The Department of Energy (DOE-ESMP): Geochemical and Physical Aquifer Property Heterogeneity: A multi-scale sedimentologic approach to reactive solute transport G.S. Weissmann, R. Allen-King, University of Buffalo, C. Murray, Pacific Northwest National Laboratory (PIs) \$296,895 (May 2006)

The National Science Foundation (NSF) – CAREER: Integrated stratigraphic and hydrogeologic aquifer analysis: toward improved multi-scale characterization of alluvial aquifers <u>G.S. Weissmann</u> (PI) \$380,000 (June 2002 – June 2007)

4. RESEARCH PROJECTS IN PROGRESS

Yemane Asmerom, Professor

In press

Caribbean chronostratigraphy refined with U-Pb dating of a Miocene coral Denniston, R.F., Asmerom, Y., Polyak, V.J., McNeill, D.F., Klaus, J.S., Cole, P., and Budd, A.F., Geology (in press).

Proposals submitted or resubmitted

Melting Processes and Crust-Mantle Interaction in the Cascade Arc: Constraints from U-Series, Nd, Os, Pb and Sr Isotopic Data
Asmerom PI
National Science Foundation
\$350.344

Collaborative Research: A Modeling Environment for the Study of Societal Development and Collapse: Climate, Landscape, and Political Ecology of the Maya, 2500 BP to the Present Prufer [UNM Anthro.] Asmerom [E&PS] PIS National Science Foundation \$423,721 [Prepared in 2007; submitted in on 1/2008]

Externally funded research projects in progress

Holocene Climate variability in the SW USA [On-going funding on this ended; new funding on a new project- see below].

Incision history of the Grand Canyon (Victor, Carole and Yemane PIs). NSF Grant active; published paper in Science.

Tropical climate variability since the last interglacial (Panama & Costa Rica). National Science Foundation-funded.

New project in collaboration with Keith Prufer [UNM Anthro] dealing with Mayan culture-climate dynamics; two proposals submitted.

Speleothem records of changes in atmospheric circulation in Brazil during the Late Pleistocene and Holocene (collaborative effort with UMass)

Basalt petrogenesis and mantle structure, western USA (On going)

Climate variability in sub-tropical Atlantic (speleothem-based work, Florida, in collaboration with Philip van Beynen, Univ. of South Florida; abstract submitted; paper published in 2007).

Melting and mass transport processes in arcs, Cascade Arc [New Project; Euan has a project here; proposal in review; Abstract submitted to the Goldschmidt 2008]

Rapid climate changes since the last interglacial based on speleothems from the SW USA (Partially funded by NSF and new proposal submitted to NSF; some work already completed; Abstract submitted to the Goldschmidt 2008).

New projects on Great Basin climate (some preliminary data; preproposal with Matt Lachniet).

Internally research projects in progress during 2005

Method development on the MC-ICPMS on novel isotopes [too early to describe].

Method development of high-precision U-series analysis. This is related to the MC-ICPMS that was funded by NSF.

Biostratigraphy and Extinctions related to the closure of the Central American Gateway; Climate variability in various parts on North America (in collaboration with Rhawn Denniston and students; abstract presented, manuscript in the works). Funding from PRF to Cornell College.

Manuscript in preparation

Hominid evolution project in Southern Africa

Paleoclimatic and geomorphic context of human archeology, Western Desert, Egypt. NSF funded to Washington University. Field work during break. Paper published; another submitted to Nature.

Adrian Brearley, Professor

Manuscripts in press or submitted

A TEM study of thermally modified Comet 81P/Wild 2 dust particles by interactions with the aerogel matrix during the Stardust capture process.

Leroux, H., Rietmeijer, F.J.M., Velbel, M.A., Brearley, A.J., Jacob, D. Langenhorst, F. Bridges, J.C., Zega, T.J., Stroud, R.M., Cordier, P. Harvey, R.P., Lee, M. Gounelle, M. and Zolensky, M.E. Meteoritics and Planetary Science (in press) (2008)..

Experimental investigation of phyllosilicate formation in an enstatite-forsterite assemblage and implications for hydration of solar system bodies.

Cohen, B.A., Brearley, A.J. and Ganguly, J. Meteoritics and Planetary Science (in revision) (2008)

Characterization of micron-sized Fe,Ni metal grains in fine-grained rims In the Y-791198 CM2 carbonaceous chondrite: Implications for asteroidal and preaccretionary models for aqueous alteration.

Chizmadia, L.J*., Xu, Y., Schwappach, C. and Brearley, A.J. Meteoritics and Planetary Science (in revision) (2008).

Oxygen Isotopes In Chondritic Components.

Hisayoshi Yurimoto, H. Krot, A.N., Choi, B.-G., Aleon, J., Kunihiro, T. and Brearley, A.J. Reviews in Mineralogy and Geochemistry Mineralogical Society of America, Washington D.C. (in press) (2008).

Manuscripts in preparation

Deciphering the characteristics of the CV3 chondrite Vigarano matrix: Evidence nebular and asteroidal processes. (with Neyda Abreu).

A TEM study of chondrules in the CM carbonaceous chondrites, Lewis Cliff 90500 - new constraints for the aqueous alteration of chondrules (with Nick Hanowski)

Chondrule serpentines as indicators of aqueous alteration in CM carbonaceous chondrites (with Nick Hanowski).

Zoning and Mn-Cr isotope systematics of carbonates in the ALH84034 CM carbonaceous chondrites: Evidence for prolonged aqueous activity on the CM2 chondrite parent body (with Ian Hutcheon).

Hydrous phases of martian origin in ALH84001.

Ubiquitous nanophase carbides in CM2 chondrites: Evidence for widespread Fischer-Tropsch catalysis reactions in the early solar system

Iron carbides in the Vigarano CV3 chondrite; Constraints on the conditions of asteroidal aqueous alteration (with Neyda Abreu).

The effect of cooling rate on the protoenstatite to orthoenstatite inversion: an experimental and transmission electron microscope study (with Rhian Jones).

Unfunded proposals

Development of integrated mineralogical, isotopic and chemical techniques for the analysis of Stardust and other extraterrestrial materials using a focused ion beam system NASA SRLIDAP program.

A.J. Brearley, PI. CoPIs, Charles Shearer, Rhian Jones, Zach Sharp \$918,586

Laura J. Crossey, Professor

Submitted in review

Degassing of mantle-derived CO₂ and ³He from springs in the southern Colorado Plateau regionflux rates, neotectonic connections, and implications for understanding the groundwater system Crossey, L.J., Karlstrom, K.E., Springer, A., Newell, D., Hilton, D., and Fischer, T., Geological Society of America Bulletin, submitted 12/07.

Manuscripts accepted in press

Travertines and travertine springs in eastern Grand Canyon: What they tell us about groundwater, paleoclimate, and incision of Grand Canyon, in Timmons, J.M., and Karlstrom, K.E., eds., Crossey, L.J., and Karlstrom, K.E.,

A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph (2008)

Introduction to the Monograph and Geologic Overview of Eastern Grand Canyon, in Timmons, J.M., and Karlstrom, K.E., eds.,

Karlstrom, K.E., Timmons, J.M., and Crossev, L.J.,

A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph (2008)

The Grand Canyon Unkar Group and Nankoweap Formation: Mesoproterozoic basin formation in the continental interior during supercontinent assembly, in Timmons, J.M., and Karlstrom, K.E., eds..

Timmons, J.M., Bloch, J., Fletcher, K., Karlstrom, K., Heizler, M. and Crossey, L.J., A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph.

Manuscripts in preparation

Informal Geoscience Education on a Grand Scale: The Trail of Time Exhibition at Grand Canyon Karlstrom, K.E., Crossey, L.J., Semken, S., Perry, D., Gyllenhaal, E., Williams, M.L., Dodick, J., Hellmich-Bryan, J., Crow*, R., Bueno Watt*, N., and Ault, C., Journal of Geoscience Education.

Submitted pending 2007

Alliance for Minority Programs: Undergraduate Research Support at the University of New Mexico P.I., New Mexico State University/NSF 11/1/07-10/31/08: \$55.000

Acquisition of instrumentation for volatile analyses in Earth Sciences Co-I with T. Fischer \$183,381

Maya Elrick, Associate Professor

Manuscripts in preparation

Milankovitch-timed depositional cyclicity across the Early Cretaceous carbonate platform, NE Mexico

Latta, D.K., Anastasio, D.J., Elrick, M., Hinnov, L.A., and Kodama, K.P., Paleoceanography.

Stratigraphic and isotopic evidence of Pennsylvanian glacio-eustasy from the Middle Pennsylvanian Gray Mesa Formation, central New Mexico Scott, L.A. and Elrick, M.,

Submitted

C-isotope stratigraphy and paleoenvironmental changes across OAE2 (mid-Cretaceous) from shallow-water carbonates of southern Mexico Elrick, M., Molina-Garza, R., Duncan, R., Snow, L. Earth and Planetary Science Letters.

Submitted and unfunded

Understanding the origin of Late Ordovician 3rd-order sea-level and paleoclimate change using oxygen isotopes of conodont apatite
Petroleum Research Fund (American Chemical Society)
\$134,980 2007-2010

Tracking the Late Ordovician greenhouse to icehouse transitions using oxygen isotopes of conodont apatite
National Science Foundation
\$210,000 2008-2011

Peter J. Fawcett, Associate Professor

Manuscripts in preparation

Semi-precessional monsoon variability in SW North America during middle Pleistocene interglacials
Fawcett, P.J., Heikoop, J., Hurley, L., Goff, F., WoldeGabriel, G., Geissman, J.W., and Allen,

To be submitted to Science

A reevaluation of the timing and extent of middle and late-Holocene glaciations and climatic conditions in the Sierra Nevada

Scuderi, L.A. and Fawcett, P.J.,

To be submitted Quaternary Research

Paleolimnological record of late Quaternary climate change from Laguna El Fresnal, northern Mexico

Fawcett P.J. and Castiglia, P.J.*,

To be submitted to Paleolimnology.

Lacustrine and alluvial stratigraphy of Holocene pluvial Lake Palomas shorelines, El Fresnal Basin, Chihuahua, Mexico Parker, J.*, and Fawcett, P.J.,

To be submitted to Quaternary Research

Journal Articles in Press:

Scuderi, L.A., Laudadio, C.K., <u>Fawcett, P.J.</u>, 2008, Remote Sensing of Playa lakes in western North America: Monitoring lake change resulting from climate variability in semi-arid regions, Quaternary Research, accepted pending revisions.

Journal articles submitted:

Jiménez-Moreno, G., <u>Fawcett, P.J.</u>, and Anderson, R.S., 2008, Millennial- and centennial-scale vegetation and climate changes during the Late Pleistocene and Holocene from northern New Mexico (USA), submitted to Quaternary Science Reviews.

Research proposals declined

Project Title: Collaborative Research: A high-resolution middle Pleistocene paleoclimate record (MIS 14 to 10) from the Valles Caldera, New Mexico

P.I.: Peter J. Fawcett, John W. Geissman, R. Scott Anderson (Northern Arizona University), Erik Brown and Joe Werne (University of Minnesota Duluth)
Funding Organization: National Science Foundation, Sedimentary Geology and Paleobiology
\$169,681 requested

Tobias Fischer, Associate Professor

In press

Chemical evolution of thermal waters and changes in the hydrothermal system after the November 2002 eruption in the Papandayan volcano (West Java, Indonesia)

Agnès Mazot, Alain Bernard, Tobias Fischer, Salvatore Inguaggiato and Igan S. Sutawidjaja J. Volcanol. Geotherm. Res

Volatiles fluxes (H₂O, CO₂, N₂, HCl, HF) from arc volcanoes Fischer, T.P. Geochemical J.

Work in progess

The 2005 and 2006 Eruptions of Ol Doinyo Lengai Volcano, East African Rift, Tanzania. Collaborators are Bernard Marty and Pete Bernard CNRS, Nancy, France.

Nitrogen isotopes of Kilauea Volcano, Hawaii. Collaborators are Sharp (UNM), Sutton (USGS), Hilton (Scripps).

The connection between tectonics and volatile discharges in the Himalayan region of Tibet. Collaborators are Sharp (UNM) and Dennis Newell (now LANL).

Development of mass spectrometer based instrumentation for continuous monitoring of volcanic gas emissions. Collaborator is McMurtry (U of Hawaii).

Volatiles in the Central American subduction zone. Collaborator is Hilton (Scripps). Funded by NSF but grant has expired.

Volatiles in the Southern Volcanic Zone, Chile. Collaborator is Hilton (Scripps).

Volatiles in the Izu-Bonin-Marianas subduction zone. Collaborators are Hilton (Scripps) Hauri (DTM, Carnegie) and Shaw (WHOI) supported by NSF OCE work in progress but grant finished. Write up in progress

Volatile emissions and geochemistry of lavas from Ol Doinyo Lengai Volcano, East African Rift Valley, Tanzania. Supported by UNM RAC \$4000 05/01/05 — present. Collaborators are Burnard, Marty (CNRS, France).

SO₂ flux from Anatahan Volcano, Mariana Islands as measured by MODIS (satellite based) and comparisons to ground-based measurements (with Dr. Scouderi). Supported by UNM CREATE 01/01/03 – present Manuscript in progress with student Vanessa Maier

International Workshop on the Evolution and Transfer of Magmas and Volcanic Gases (Fischer, PI) NSF Office of Internatl Science and Engineering \$18,000 03/01/06 - 02/28/07. Workshop was attended by 40 people. JVGR special volume in progress, edited by organizers

SGER: Chlorine Isotopes as Tracers of Subduction Zone Fluids (Sharp, PI; Fischer, co-PI) NSF EAR 82,163.00 06/01/06-05/31/07

Collaborative Research: The Nitrogen Isotope Systematics of the Icelandic Mantle (Fischer, PI; Sharp, Hilton co-PIs) NSF EAR-0537618 01/01/06 - 12/31/08 \$239,340.00

Collaborative Research: CO₂ Springs and travertines of the Southwestern US: Hydrologic pathways linking tectonism to water quality (Crossey, PI; Fischer, Karlstrom, co-PIs) NSF EAR-0538304 01/01/06 – 12/31/07 \$149,795.00

Joseph Galewsky, Assistant Professor

Pending proposals

Climate change impacts on New Mexico's mountain sources of water PI: W. Michener, D. Gutzler, E. Vivoni, A. Rango, J. <u>Galewsky</u> NSF EPSCoR 2008-2013; \$3 million per year statewide; in review

Hillslope erosion and its meteorological triggering in semi-arid landscapes of the Colorado Plateau PI: J. <u>Galewsky</u>, L. McFadden, G. Meyer, J. McCauliffe, L. Scuderi NSF Geomorphology 2008-2011, \$350,000; in review

Research projects

Diagnosis of subtropical humidity dynamics using tracers of last saturation (with #J. Hurley, UNM and A. Sobel, Columbia; NSF funding \$184,842 to JG)

Development of idealized atmospheric/land surface models (with J. Dudhia, NCAR; funded by UNM Dean's Summer Research Award, \$20K to JG)

Impacts of valleys on orographic precipitation (supported by NSF TeraGrid supercomputing allocations)

Works in progress

Meeting Report: "Climate over landscapes"

<u>Galewsky</u>, J., G. Roe, R.S. Anderson, G. Meyer, G. Flowers

National Center for Atmospheric Research, Boulder, Colorado, October 1-3, 2007, EOS: in press.

Orographic clouds in terrain-blocked flows: An idealized modeling study, Journal of the Atmospheric Sciences <u>Galewsky</u>, J. in review, 2008.

Orographic precipitation and the aridity of intramontane basins <u>Galewsky</u>, <u>J.</u>
Journal of Geophysical Research: in preparation (to be submitted in May 2008).

John W. Geissman, Chair and Professor

Papers in press

Neogene vertical axis rotation and development of the Mina Deflection, central Walker Lane, Nevada, in Oldow, J.S., and Cashman, P. H., eds., Walker Lane Tectonics: Boulder, CO, Petronis, M.S., Geissman, J.W., Oldow, J.S., and McIntosh, W.C., Geological Society of America Special Paper (2008)

Stratigraphic, Volcanic, and Anisotropy of Magnetic Susceptibility Data bearing on the source and transport direction of mid-Tertiary ash flow tuffs, Candelaria Hills area, west-central Nevada Petronis, M.S., and Geissman, J.W., Bulletin of Volcanology (2008).

Coordinated displacement and finite flattening on linked arrays of curved faults, Rhodes Salt Marsh basin, central Walker Lane Belt, Nevada, *in Oldow*, J.S., and Cashman, P.H., eds., Walker Lane Tectonics, Boulder Ferranti, L., Oldow, J.S., and Geissman, J.W.,

Geological Society of America Special Paper (2008).

Evolution and strain reorganization within late Neogene structural stepovers linking the central Walker Lane and northern Eastern California Shear Zone, western Great Basin: International Oldow, J.S., Geissman, J.W., and Stockli, D., Geology Review, v. 50, in press (2008).

Paleomagnetism and geochronology of sills of the Poe Mountain area, southwest Montana: Implications for the timing of fold and thrust belt deformation and vertical axis rotations along the southern margin of the Helena salient

Harlan, S.S., Geissman, J.W., Schmidt, C.J., and Whisner, S.C., Geological Society of America Bulletin, in press (2008).

Paleomagnetism of Proterozoic mafic dikes from the Tobacco Root Mountains, Southwest Montana

Harlan, S.S., Geissman, J.W., and Snee, L., Precambrian Research (2008).

Geochemical evidence of impactor for Lonar Crater, India: Solution to a century old mystery, Misra, S., Newsom, H., Shyam Prasad, M. Geissman, J., Dube, A., Sengupta, D., Meteoritics and Planetary Science (2008).

Geological Society of America Geologic Time Scale 2007, with explanation. Geissman, J.W., Walker, J.D., and Palmer, A.R.,

Proposals in review

Major Research Instrumentation: Acquisition of a Magnetic Properties Measurement System (MPMS)

Marty Kirk, UNM, Chemistry; John Geissman, Kevin Malloy, UNM, Engineering; Rob Duncan, UNM, Physics

National Science Foundation, Major Research Instrumentation \$315,000. September 1, 2008, through August 30, 2011

ICDP Workshop on the Colorado Plateau Coring Project: 100 Million Years of Climatic, Tectonic, and Biotic Evolution in Continental Cores

John W. Geissman, Gerhard H. Bachmann, Martin-Luther-Universität Halle-Wittenberg, Ronald C. Blakey, Northern Arizona University, Dennis V. Kent, Rutgers University, Wolfram M. Kürschner, Universiteit Utrecht, Paul E. Olsen, Columbia University, Jingeng Sha, Nanjing Institute of Geology and Paleontology, Nanjing, International Continental Drilling Program \$35.000, May 1, 2008, through December 1, 2008

Manuscripts in review

Complexities in the early Cenozoic extrusion of crustal fragments around the eastern Himalayan syntaxis; Geosphere

Geissman, J. W., Burchfiel, B. C., Studnicki-Gizbert, C., Akciz, S., Lianzhong, C., and Brocklehurst, S.

Electronic Journal of the Geological Society of America

Magnetic fabric and paleomagnetism of pseudotachylites in the Chiapas Massif, Mexico Molina-Garza, R.S., Geissman, J.W., Wawrzyniec, T.F., Weber, B., and Aranda-Gomez, J., Geophysical Journal International.

Paleomagnetism of the mid-Cenozoic Espinaso Formation and related rocks, central New Mexico and its bearing on crustal rotation within the Rio Grande rift Harlan, S.S., and Geissman, J.W.,
Geological Society of America Special Paper on the Rio Grande Rift,

Geological Society of Affected Special Paper of the Rio Grande Rift,

Rapid formation of large-scale rheomorphic structures in the 2.06 Ma Huckleberry Ridge Tuff, eastern Idaho

Geissman, J.W., Holm, D.K., Harlan, S.S., and Embree, G., Paleomagnetic and AMS data, Geology (2007)

Anisotropy of magnetic susceptibility, paleomagnetic, and petrographic data bearing on the emplacement of the Western Granite, Isle of Rum, NW Scotland: Insights into the origin and emplacement of felsic magma bodies

Petronis, M.S., O'Driscoll, B., Troll, V.R., Geissman, J.W., and Emeleus, C.H.,

Geological Magazine

Magnetostratigraphy of the uppermost Triassic/lowermost Jurassic Moenave Formation, Colorado Plateau

Hurley, L., Geissman, J.W., and Lucas, S.G., Correlation with the Newark Record, Geophysical Research Letters.

Manuscripts in preparation

Paleomagnetism of the Spanish Peaks igneous complex, south-central Colorado: Implications for the North American mid-Cenozoic reference paleomagnetic pole Muggleton, S. R., and Geissman, J.W., Journal of Geophysical Research.

Magnetic property evidence for local heterogeneity in mantle oxidation state, mantle xenoliths from the Rio Puerco volcanic necks, central New Mexico Callahan, C.N., Geissman, J.W., Selverstone, J., and Brearley, A.J., Geophysical Research Letters (2006)

Lathrop Wells volcanic center: geology, geomorphology, and Paleomagnetism (title approximate) DePaolo, D.J., Geissman, J.W., Perry, F. V., McFadden, L.D., Wells, S.G., Crowe, B.M., and others?

Geological Society of America Bulletin

Age and paleomagnetism of contractile structures in the Cottonwood Mountains, Death Valley area, southeast California

Snow, J.K., J.W. Geissman, and B.P. Wernicke

Elsevier, Earth Science Reviews, Wright/Troxel volume.

Paleomagnetism of the Mesoproterozoic Pikes Peak batholith, southern Front Range, Colorado, Geissman, J.W., Harlan, S.S., Feig, A.D., Precambrian Research

On the paleomagnetic signature of crystalline crust in extensional terranes J.W. Geissman intended for Tectonics

Paleomagnetic data from the Hoover Dam area document approximately 45 degrees of counterclockwise rotation related to slip along the Lake Mead Fault System.

J.W. Geissman

intended for Tectonics

Applications of Paleomagnetism in the Basin and Range province, western U.S.A., and relevance to models for crustal extension.

J.W. Geissman

intended for Reviews of Geophysics (invited).

Paleomagnetism and rock magnetism of late Miocene intrusions, Paiute Ridge, Nevada. C.D. Ratcliff, J.W. Geissman, F.V. Perry, B.M. Crowe, and P. Zeitler intended for Journal of Geophysical Research.

Partial late Paleozoic remagnetization of the Cambro-Ordovician Ignacio Formation, southwest San Juan Mountains, Colorado.

J.W. Geissman

intended for Geophysical Research Letters.

Paleomagnetism of mafic dikes in the Roberts Mountains and Cortez Range, Nevada: Implications for structural history of the northern Nevada rift.

J.W. Geissman, G.A. Acton, and M. Schneider* intended for Tectonics.

The rock magnetic record of silicic magma emplacement, Obidian Domes, California. J.W. Geissman, J.C., Eichelberger, S.S. Harlan, and C. McCabe intended for Journal of Geophysical Research

Paleomagnetic and thermochronologic evidence for footwall tilt during extensional core complex development, Mineral Mountains, central Utah.

D.S. Coleman, J.W. Geissman, J. D.Walker, J.M. Bartley, and K.V. Hodges intended for Geological Society of America Special Paper, invited.

Paleomagnetic results from Cenozoic volcanic rocks in the Walker Lane area, west-central Nevada, and their bearing on mechanics of Basin and Range extension.

J.T. Callian*, J.W. Geissman, J.S. Oldow, and R.F. Hardyman.

Further paleomagnetic results from Mesozoic plutons of the Walker Lane area, west-central Nevada, and tectonic implications.

J.W. Geissman, J.T. Callian* and J.S. Oldow Tectonophysics.

Paleomagnetism of the Jurassic Humboldt Lopolith, west-central Nevada: Results from extrusive equivalent metavolcanic rocks.

M.R. Hudson and J.W. Geissman

Geol. Soc. Amer. Bull.

Unsuccessful proposals for grants:

Collaborative Research: Late Pliocene reorganization of the central Walker Lane strain field, Western Great Basin, Nevada
John Geissman, John Oldow (Idaho), Danny Stockli (Kansas)
National Science Foundation, Tectonics
\$184,000 (UNM Component), January 1, 2008, through December, 2010.

Collaborative Research: A high-resolution middle Pleistocene paleoclimate record (MIS 14 to 10) from the Valles Caldera, New Mexico
Peter Fawcett, John Geissman, and colleagues from Northern Arizona University and University of Minnesota. Duluth

National Science Foundation, Sedimentary Geology and Paleobiology \$170,000, August 1, 2007, through July, 2009

Collaborative Research: Terrestrial Paleoenvironmental record through the Permian-Triassic transition of Texas and New Mexico

John Geissman, Paul Renne (University of California, Berkeley)
National Science Foundation, EAR, Sedimentary Geology and Paleobiology
\$136967, February 1, 2008 through January 31, 2010

Collaborative Research: Walker Lane Integrated Geological and Geophysical Lithosperic Experiment (WIGGLE)

National Science Foundation, EAR, Earthscope Science Program
Danny Stockli (University of Kansas), Randy Keller (University of Oklahoma), Hersch Gilbert
(Purdue University), John Geissman, John Oldow (University of Idaho)
178,000 (UNM component), January 1, 2008, through December, 2011

Non-sponsored research

"Generic" paleomagnetic and rock magnetic investigations of: Cenozoic volcanic rocks (Arizona, Nevada, California, New Mexico)

Lower Paleozoic plutons (New Mexico, Colorado)

Mesozoic sedimentary rocks (New Mexico, Colorado, West Texas, Nevada)

Paleozoic sedimentary rocks (Nevada, New Mexico, Colorado, Utah)

Cenozoic intrusions (Utah, Nevada, New Mexico)

Mesozoic intrusions and fault-generated pseudotachylites (Nevada, Colorado, California, Mexico)

David Gutzler, Professor

Proposal submitted, in review

Climate Change and New Mexico's High Elevation Snowpack (PI: W. Michener, UNM lead scientist: D. Gutzler)
National Science Foundation EPSCoR office
60 months, Jul 08-Jun 12 (\$3M/yr to state EPSCoR office).

New Mexico EPSCoR Research Infrastructure Proposal Development Presentation to initial statewide planning meeting, UNM, Jan 26. Planning meeting at NMSU, Las Cruces, Jun 21-22. Field trip to potential instrumentation sites in northern New Mexico, Sep 27-28. Planning meetings at New Mexico Tech, Socorro, Oct 9, Oct 25.

Manuscripts in progress [*student co-authors]

Interannual variability of tropical cyclone activity along the Pacific coast of North America D.S. Gutzler, E.A. Ritchie, A.V. Douglas and M.D. Lewis International Journal of Climatology, currently in revision.

Predicting future threats to the long-term survival of Gila Trout using a high-resolution simulation of climate change

T. Kennedy*, <u>D.S. Gutzler</u> and R.L. Leung Climatic Change, submitted for publication.

NAMAP2: A coordinated assessment of atmospheric simulations of the North American Monsoon circulation in 2004

<u>D.S. Gutzler</u>, L.N. Williams, and J.K. Schemm

J. Climate, in preparation.

Rhian H. Jones, Associate Professor

Manuscripts in press in review

Proposals submitted

Chlorine isotope distribution in chondritic meteorites: Search for multiple nebular reservoirs Principal Investigator: Z. D. Sharp Co-Investigators: R. H. Jones and A. J. Brearley NASA / Origins of Solar Systems Proposed award period: 5/01/08 to 4/30/11 Total funding requested \$228,586 (Proposal is now funded, \$148,000 for period 5/01/08 to 4/30/10)

Manuscripts in preparation

²⁶Al in plagioclase-rich chondrules in carbonaceous chondrites: Evidence for an extended duration of chondrule formation.
Hutcheon I. D., Marhas K. K., Krot A. N., Goswami J. N. and Jones R. H.
In preparation for Geochimica et Cosmochimica Acta. To be submitted Spring 2008.

Chemistry and petrology of chondrules from the Mokoia CV chondrite Jones R. H. and Schilk A. J. In preparation for Geochimica et Cosmochimica Acta. To be submitted Spring 2008.

Chondrules and matrix in Kakangari: Evidence for wide-spread reduction and sulfidization. *Berlin J., Jones R. H. and Brearley A. J.

In preparation for Meteoritics and Planetary Science. To be submitted Spring 2008.

Karl E. Karlstrom, Professor

Articles published, in press, or in review for 2008

I first-authored paper and 5 co-authored papers, an edited book, and 6 chapters are published or in press as of early 2008; 3 more co-authored papers have been submitted and are in review. There are numerous additional articles in various stages of preparation.

Assembly, configuration, and break-up history of Rodinia: a synthesis Li, Z.X., Bogdanova, S.V., Collins, A.S., Davidson, A., De Waele, B., Ernst, R.E., Fitzsimons, I.C.W., Fuck, R.A., Gladkochub, D.P., Jacobs, J., Karlstrom, K.E., Lu, S., Natapov, L.M., Pease, V., Pisarevsky, S.A., Thrane, K., Vernikovsky, V., Precambrian Research, v. 160, p. 179-210 (2008)

History of Quaternary volcanism and lava dams in western Grand Canyon based on LIDAR analysis, ⁴⁹Ar/³⁹Ar dating, and field studies: Implications for flow stratigraphy, timing of volcanic events, and lava dams
Crow*, R., Karlstrom, K.E., McIntosh, W., Peters, L., Dunbar, N.,

Crow*, R., Karlstrom, K.E., McIntosh, W., Peters, L, Dunbar, N., Geosphere, v. 4, no. 1, doi 10.1130/geo00133.1, Feb 2008, issue (2008)

Informal Geoscience Education on a Grand Scale: The Trail of Time Exhibition at Grand Canyon Karlstrom, K.E., Crossey, L.J., Semken, S., Perry, D., Gyllenhaal, E., Williams, M.L., Dodick, J., Hellmich-Bryan, J., Crow*, R., Bueno Watt*, N., and Ault, C., in press for Journal of Geoscience Education (2008)

Manuscripts submitted

Paleoproterozoic quartzite phenomenon: Age and detrital zircon data and implications for the Paleoproterozoic climate and tectonic evolution of southern Laurentia Jones*, J.V. III, Connelly, J.N., Karlstrom, K.E., and Williams, M.L., Geological Society of America Bulletin, accepted and in revision as of 1-28-08 (submitted)

Topography, the Geoid, and dynamic uplift of the Colorado Plateau Margin Coblentz, D., Van Wijk, J., Karlstrom, K.E., and Chase, C.G., Earth and Planetary Sciences Letters, submitted 12/07 (submitted)

Timing and mechanisms of basement uplift and exhumation in the Colorado Plateau - Basin and Range Transition Zone, Virgin Mountain anticline, Nevada-Arizona, in Umhoeffer and Beard, eds.,

Quigley*, M., Karlstrom, K.E., Kelley, S., and Heizler, M., Geological Society of America Special Paper, in review (submitted)

Structure and ⁴⁰Ar)³⁹Ar K-feldspar thermal history of the Gold Butte block: re-evaluation of the tilted crustal section model, in Umhoeffer and Beard, eds., Karlstrom, K.E., Heizler, M., and Quigley*, M.C.,

Geological Society of America Special Paper, in review (submitted).

Degassing of mantle-derived CO₂ and ³He from springs in the southern Colorado Plateau regionflux rates, neotectonics connections, and implications for understanding the groundwater system Crossey, L.J., Karlstrom, K.E., Springer, A., Newell, D., Hilton, D., and Fischer, T., Geological Society of America Bulletin, (submitted 12/07) (2008).

Manuscriprs in press

Perspectives on the architecture of continental crust from integrated field studies of exposed isobaric sections
Williams, M.L., Karlstrom, K.E., Dumond*, G., and Mahan, K.,
GSA Special Paper, in press (2008)

Manuscripts in review

A Geologic Overview of Eastern Grand Canyon Timmons, J.M., and Karlstrom, K.E., eds., Grand Canyon Association Monograph In review (2008)

Vishnu basement rocks of the upper Granite Gorge: continent formation 1.8 to 1.6 billion years ago, in Timmons, J.M., and Karlstrom, K.E., eds.,

Karlstrom, K.E., and Williams, M.L.,

A Geologic Overview of Eastern Grand Canyon, Grand Canyon Association Monograph In review (2008).

Faulting and Uplift in the Grand Canyon Region, in Timmons, J.M., and Karlstrom, K.E., eds., Karlstrom, K.E.,

A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph In review (2008)

The Laramide and Post-Laramide Uplift and Erosional History of the Eastern Grand Canyon: Evidence from apatite fission-track thermochronology, in Timmons, J.M., and Karlstrom, K.E., eds..

Kelley, S. A., and Karlstrom, K.E.,

A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph In review (2008).

Travertines and travertine springs in eastern Grand Canyon: What they tell us about groundwater, paleoclimate, and incision of Grand Canyon, in Timmons, J.M., and Karlstrom, K.E., eds., Crossey, L.J., and Karlstrom, K.E., 2008,

A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph In review.

Unconformities of Grand Canyon and analysis of the Great Unconformity, in Timmons, J.M., and Karlstrom, K.E., eds.,

Karlstrom, K.E., and Timmons, J.M.,

A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph In review (2008).

The Grand Canyon Unkar Group and Nankoweap Formation: Mesoproterozoic basin formation in the continental interior during supercontinent assembly, in Timmons, J.M., and Karlstrom, K.E.,

Timmons, J.M., Bloch, J., Fletcher, K., Karlstrom, K.E., Heizler, M., and Crossey, L., A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph In review (2008).

Introduction to the Monograph and Geologic Overview of Eastern Grand Canyon, in Timmons, J.M., and Karlstrom, K.E., eds., Karlstrom, K.E., Timmons, J.M., and Crossey, L.J., A Geologic Overview of Eastern Grand Canyon: Grand Canyon Association Monograph In review (2008).

Barry S. Kues, Professor

Manuscripts in preparation

The Paleontology of New Mexico [Book] B.S. Kues University of New Mexico Press, 2008

Review of "The Mountains of New Mexico" by Robert Julyan B.S. Kues New Mexico Historical Review, 2008

Manuscripts in revision

Upper Cretaceous (Turonian) decapod crustaceans from central New Mexico E. K. Toolson and B.S. Kues Journal of Paleontology

Manuscripts in review

A Cretaceous feather from the Upper Cretaceous (Lower Campanian) Point Lookout Sandstone, northwestern New Mexico
T.A. Williamson, B.S. Kues, G.S. Weissmann, T. Stidham, and S.L. Yurchyk
Journal of Vertebrate Paleontology, 2008

Early geological studies in southwestern and south-central New Mexico B.S. Kues
Geology of Southwestern New Mexico (G. Mack, ed.), New Mexico Geological Society, Field Conference Guidebook 59, 2008.

Second day road log G.Mack, K.A. Giles, and B.S. Kues Geology of Southwestern New Mexico, NMGS Field Conference Guidebook 59, 2008

Paleontology and age of the Pennsylvanian Oswaldo and Syrena Formations, Grant County, New Mexico B.S. Kues Geology of southwestern New Mexico, NMGS Field Conference Guidebook 59, 2008

Manuscripts in preparation

Early Pennsylvanian (Morrowan) faunas from the Osha Canyon Formation, Nacimiento Mountains, New Mexico
B.S. Kues
For New Mexico Geology

Micromolluscs from the Madera Group (Upper Pennsylvanian), Jemez Springs Area, New Mexico B. S. Kues and T. Yancey
For Journal of Paleontology

Middle Pennsylvanian bivalves from the Flechado Formation, north-central New Mexico B. S. Kues
For Journal of Paleontology

Other research

Continuing studies of Pennsylvanian-Permian strata and paleontology in NM; studies of Mississippian and Lower Permian brittle stars from south-central New Mexico; study of Atokan (Middle Pennsylvanian) invertebrate assemblages from the Sandia Formation in Jemez Mountains.

Grant A. Meyer, Associate Professor

Manuscripts in press or in preparation

Long-term fire history from alluvial fan sediments: the role of drought and climate variability, and implications for management of Rocky Mountain forests

Pierce, J.L., and Meyer, G.A. International Journal of Wildland Fire, v. 17, p. 1-12 (in press,

Pierce, J.L., and Meyer, G.A. International Journal of Wildland Fire, v. 17, p. 1-12 (in press 2008).

Aspect controls on hillslope geomorphology and implications for slope evolution, northeastern Arizona

Burnett, B.N., Meyer, G.A., and McFadden, L.D.,

Journal of Geophysical Research - Earth Surface (in press).

Post-glacial inflation-deflation cycles, tilting, and faulting in the Yellowstone caldera based on Yellowstone Lake shorelines

Pierce, K.L., Cannon, K.P., Meyer, G.A., Trebesch, M.J., and Watts, R. U.S. Geological Survey Professional Paper (in press).

Changes in fire activity since the Last Glacial Maximum: an assessment based on a global synthesis and analysis of charcoal data

Power, M.J., Marlon, J., Ortiz, N., Bartlein, P.J., Harrison, S.P., Mayle, F.E., Ballouche, A., Bradshaw, R., Carcaillet, C., Cordova, C., Mooney, S., Moreno, P., Prentice, I.C., Thonicke, K., Tinner, W., Whitlock, C., Zhang, Y., Zhao, Y., Anderson, R.S., Beer, R., Behling, H., Briles, C., Brown, K.J., Brunelle A, Bush, M., Camill, P, Chu, G.Q., Clark, J., Colombaroli, D., Daniels, M., Dodson, J., Doughty, E., Edwards, M.E., Fisinger, W., Foster, D., Gaillard, M.-J., Gavin, D.G., Gobet, E., Haberle, S., Hallett, D.J., Higuera, P., Hope, G., Horn, S., Inoue, J., Kaltenrieder, P., Kennedy, L., Kong, Z.C., Larsen, C., Long, C.J., Lynch, J., Lynch, B., McGlone, M., Meeks, S., Mensing, S., Meyer, G., Minckley, T., Mohr, J, Newnham, R., Noti, R., Oswald, W., Pierce, J., Richard, P.J.H., Shuman, B.J., Takahara, H., Toney, J., Turney, C.., Umbanhower, C., Vandergoes, M., Vanniere, B., Vescovi, E. Walsh, M., Wang, X., Williams, N., Wilmshurst, J., Zhang, J.H., Climate Dynamics (in press).

Beaver damming, fluvial geomorphology, and climate over the Holocene in Yellowstone National Park, Wyoning

Persico, L.P., and Meyer, G.A. Quaternary Research (in revision) Late Pleistocene and Holocene terraces of the South Fork Payette River, Idaho; controls on postglacial river incision
Pierce, J.L., and Meyer, G.A.,
In preparation for Geomorphology

Hydraulic, geomorphic, and geochemical processes in floodplain contamination from a mine tailings dam failure

Meyer, G.A. and Watt, P.M.,

In preparation for Environmental and Engineering Geoscience.

Manuscripts submitted

Hillslope erosion and its meteorological triggering in semi-arid landscapes of the Colorado Plateau NSF Geomorphology and Land Use Dynamics Program Joe Galewsky, PI; Grant Meyer, Les McFadden, Luis Scuderi, co-PIs In prep. 2007. submitted Jan. 16, 2008 (\$330,264)

Development of Graphite Target Preparation Capability at UNM for Radiocarbon Dating by Accelerator Mass Spectrometry
UNM Interdisciplinary Large RAC Grant Proposal
Grant Meyer, Zach Sharp, Felisa Smith, Keith Prufer, co-Pls
In prep. 2007, submitted Jan. 17, 2008 (\$9704)

Frechette, J.D. and Meyer, G., Holocene fire-related alluvial-fan deposition and climate in ponderosa pine and mixed-conifer forests, Sacramento Mountains, New Mexico: in preparation for The Holocene (submitted Feb. 1, 2008).

Manuscript peer review

Geomorphology (2 ms., 1/2007 and 8/2007)
Palaeogeography, Palaeoclimatology, Palaeoecology (1/2007)
New Mexico Geological Society of America Guidebook (3/2007)
Journal of Geophysical Research – Earth Surface (9/2007)
Geophysical Research Letters (10/2007)
Geological Society of America Bulletin (in progress 12/2007)
Nature (in progress 12/2007)
External examiner for PhD thesis, "The geomorphological significance of wildfires in southeastern Australia", Kerrie Tomkins, Macquarie University, Sydney (in progress 12/2007)

McFadden, Leslie D., Professor

Manuscripts in press or accepted for publication in refereed publications

Aspect-related microclimatic influences on slope forms and processes, northeastern Arizona Burnett, B., Meyer, G., and McFadden, L., For Journal of Geophysical Research-Earth Surface Processes (accepted for publication)

The influence of bedrock weathering on the response of drainage basins and adjacent alluvial fans to Holocene climates
Eppes, Martha and McFadden, L.,
(accepted for publication)

Manuscripts submitted or in review

Dendrogeomorphically derived slope and stream response to decadal and centennial scale climate variability: implications for downstream sedimentation Scuderi, L., McFadden, L., and McAuliffe, J.,

Scuderi, L., McFadden, L., and McAuliffe, J. (submitted 11/18/07)

The impact of soil properties on anthropogenic uranium distribution, Los Alamos National Laboratory, New Mexico

Watt, P. and McFadden, L.,

For Soil and Sediment Contamination.

Manuscripts in preparation

Cosmogenic nuclide dating of hoodoos and the determination of climatically-sensitive erosion of bedrock slopes McFadden, L., Gosse, J., Meyer, G., McAuliffe, J., Burnett, B., Scuderi, L (for Geology)

Impacts of rocktype variability on development of soils and slope form in the Sandia Mountains, New Mexico
Persico, L., McFadden, L., Freschette, J., New, J., and Meyer, G. (for Geology).

Geochronology of a small volume basaltic eruption center near Yucca Mountain, Nevada DePaolo, D.J., Perry, F.V., Poths, J., Heizler, M. Murrel, M., Geissman, J., Wells, S.G., and McFadden, L.D. (for submittal to the Journal of Geophysical Research).

Proposal in preparation for 2008

Hillslope erosion and its meteorological triggering in semi-arid landscapes of the Colorado Plateau Joe Galewsky, Principle Investigator, L. McFadden one of four co-principle investigators \$350,000, 9/2008 – 9/2011

Unfunded proposal submitted in 2007

Collaborative research: Cracks generated by solar heating Co-Principal Investigator
National Science Foundation, 6/ 2006 – 6/2009, \$300,000

Currently active, unfunded research projects

Studies of the soils, geomorphology and Quaternary stratigraphy and ecology of the Blue Gap area and adjacent regions, Colorado Plateau, NW Arizona

(with UNM colleagues G. Meyer, J. Galewsky, L. Scuderi, Tim Wawryzniec, E&PS graduate students, and J. McAuliffe, Desert Botanical Garden, Arizona)

Studies of soil geomorphic evolution of the landscapes of selected areas of the West Mesa in the Albuquerque area and central New Mexico in association with analysis of Paleoindian and later period archeological sites (with Dr. Bruce Huckell, UNM Anthropology Department

Studies of the mechanical weathering of surface clasts in desert by solar insolation and thermoelastic deformation (with Dr. Missy Eppes, UNC-Charlotte, and others)

Studies of the soils and geomorphic evolution of hillslopes of the western side of the Sandia Mountains and the Sevilleta Wildlife Refuge Area, central New Mexico (with G. Meyer and E&PS graduate students)

Matthew Nyman, Assistant Professor/Lecturer

Papers in progress

The role of geoscience departments in the preparation of science teachers. Amy Ellwein, John Geissman, and Les McFadden (co-authors)

Frans Rietmeijer, Research Professor

Manuscripts in press

Origin and formation of iron-silicide phases in the aerogel of the Stardust mission. F.J.M. Rietmeijer, T. Nakamura, A. Tsuchiyama, K. Uesugi, T. Nakano and H. Leroux Meteoritics and Planetary Science

A TEM study of thermally modified comet 81P/Wild 2 dust particles by interactions with the aerogel matrix during the Stardust capture process.

H. Leroux, F.J.M. Rietmeijer, M.A. Velbel, A.J. Brearley*, D. Jacob, F. Langenhorst, J.C. Bridges, T.J. Zega, R.M. Stroud, P. Cordier, R.P. Harvey, M. Lee, M. Gounelle and M.E. Zolensky

Meteoritics and Planetary Science

Comparing Wild 2 particles to chondrites and IDPs

M. Zolensky, K. Nakamura-Messenger, J.Sverdrup, F. Rietmeijer, H. Leroux, T. Mikouchi, K. Ohsumi, S. Simon, L. Grossman, T. Stephan, M. Weisberg, M. Velbel, T. Zega, R. Stroud, K. Tomeoka, I. Ohnishi, N. Tomioka, T. Nakamura, G. Matrajt, D. Joswiak, D. Brownlee, F. Langenhorst, A. Krot, A. Kearsley, H. Ishii, G. Graham, Z.R. Dai, M. Chi, J. Bradley, K. Hagiya, M. Gounelle, J. Bridges

Meteoritics and Planetary Science

Understanding the comet Wild 2 mineralogy in samples from the Stardust Mission. F.J.M. Rietmeijer 2007 Denver X-ray Conference Proceedings, Advances in X-ray Analysis

DUSTER - The collection and analyses of solid aerosols in the stratosphere.
P. Palumbo, A. Rotundi, A. Aronica, J.R. Brucato, L. Colangeli, F. Esposito, E. Mazzotta Epifani, V. Mennella, R. Battaglia, V. Della Corte, G. Ferrini, F.J.M. Rietmeijer, G. Flynn, J.-B. Renard, J.R. Stephens and E. Zona
ESA SP Proc. ESA/PAC 18th Symposium

Manuscripts submitted

 $3FeO.Al_2O_3$ is a deep metastable eutectic ferroaluminate. F.J.M. Rietmeijer, A. Pun* and J.A. Nuth III Phys. Chem. Chem. Phys.

Time, temperatures, and pressure indicated by metastable iron-sulfide nanophases in melted STARDUST aerogel F.J.M. Rietmeijer Lunar Planet, Sci. XXXIX

Refractory deep metastable eutectic vapor phase condensates evolve to amorphous, but not quite, equilibrium minerals

F.J.M. Rietmeijer, A. Pun* and J.A. Nuth and Y. Kimura Lunar Planet. Sci. XXXIX

Why isn't the Earth completely covered in water?

J.A. Nuth III, F.J.M. Rietmeijer and C.L. Marnocha
Lunar Planet. Sci. XXXIX

Evidence for hot chemistry under reduced conditions in the thermally modified STARDUST samples.

H. Leroux, F.J M. Rietmeijer, D. Jacob and M. Roskosz M. Lunar Planet. Sci. XXXIX

Comparison of cloud models for Brown Dwarfs.
Ch. Helling, A. Ackerman, F. Allard, M. Dehn, P. Hauschildt, D. Homeier, K. Lodders, M. Marley, F. Rietmeijer, T. Tsuji and P. Woitke
Proc IAU Symposium 249, Exoplanets detection, formation and dynamics

Manuscripts in preparation

Condensate formation and evolution on condensing Ca-Fe-SiO-H₂-O₂ vapor F.J.M. Rietmeijer, A. Pun* and J.A. Nuth III Icarus

Metastable equilibrium of Mg-cordierite and Mg-osumilite-type ring silicates constrained. F.J.M. Rietmeijer, A. Pun* and J.A. Nuth III J. Petrology

Mousumi Roy, Associate Professor

Papers submitted in revision

Cenozoic magmatism and rock uplift of the Colorado Plateau by warming of chemically buoyant lithosphere

Roy, M., T.H. Jordan, C. Callahan, J. Pederson, In revision, Nature, 2007 – resubmitted, March 2008

Publications in preparation

Thermal and compositional structure of the Colorado Plateau inferred from xenoliths, seismic data, and regional heatflow

*C. Callahan, Roy, M. and K.C. Condie

To be submitted, May, 2008.

Strafication of mantle fabric and anisotropy beneath strike slip plate boundaries *Tetreault, J., <u>M. Roy.</u> J. Gaherty, and L. Zhao To be submitted in May 2008.

Other research projects

Seismic anisotropy and its relation to crust-mantle coupling in the western US (with J. Gaherty and A. Lerner-Lam, Columbia University); (NSF-Earthscope; PIs: J. Gaherty, M. Roy, A. Lerner-Lam (\$118K to MR; 2006-08)

Thermal evolution of the Colorado Plateau following removal of the Farallon slab collaboration with T. Jordan (USC)
Funded by the National Science Foundation, EAR-Tectonics Program (sole PI, \$100K total, 20062008)

Crustal deformation measurements and a multidisciplinary geophysicalinvestigation of the Rio Grande Rift

(with A. Sheehan and S. Nerem, CU Boulder; A. Lowry, Utah State) EAR-Earthscope Program PIs: A. Sheehan, S. Nerem, A. Lowry, and M. Roy (\$124K to MR, \$605K total, July 2005-July 2010

Exhumation and surface uplift of the Colorado Plateau based on rock cooling and erosion from apatite fission-track and (U-Th)/He thermochronology (with co-PI's: S. Kelley, J. Pederson, and D. Stockli NSF-funding: \$47,034 to MR; 7/2004-7/2006)

River incision: Models of accompanying deformation in an elastic and viscoelastic crust. Bedrock river incision and its effects on upper and lower crustal deformation (revisiting the "tectonic aneurism").

Geodynamic implications of voluminous mid-Tertiary magmatism in the Colorado Plateau region and Sierra Madre Occidental, Mexico (collaboration with S. Kelley (NM Tech), J. Aranda (and others at CICESE, Mexico))

Jane Selverstone, Professor

Manuscripts in review/revision/near submission

Microtextural constraints on the interplay between fluid-rock reactions and deformation. Ault, A*. and Selverstone, J., Contrib. Mineral. Petrol., in review.

Fluid heterogeneities control strain accommodation mechanisms in eclogites: implications for the rheology of subducting slabs Selverstone, J., Geology, in prep.

Constraining the rate of water-releasing metamorphic reactions in subduction zones Mehl, L.Y.*, Baxter, E., and Selverstone, J., EPSL, in prep.

Magnetic properties of mantle xenoliths from the Rio Puerco volcanic necks Callahan, C.*, Geissman, J.W., and Selverstone, J., New Mexico. Geophys. Res. Letters, in prep.

Pending proposals

Scales and mechanisms of fluid migration and equilibration during the subduction cycle J. Selverstone, Z. Sharp, J.D. Barnes
National Science Foundation
\$267,130; 6/1/08-5/31/11

Collaborative research: What is the strength of low-angle normal faults? G.J. Axen (New Mexico Tech) and J. Selverstone National Science Foundation \$148,564 (UNM component); 6/1/08-5/31/11

Unsuccessful proposals

Collaborative research: How do low-angle normal faults evolve and slip? Linked physical and chemical studies of fault rocks
G.J. Axen (New Mexico Tech), A. Campbell (NM Tech) and J. Selverstone
National Science Foundation
\$111,754; 6/1/07-5/31/10

Louis A. Scuderi, Associate Professor

In press

MODIS derived NDVI Characterization of Drought-Induced Evergreen Dieoff in Western North America.

Yuhas, A., and Scuderi, L.A.
Geographical Review (Australia).

In preparation

Comparison of MODIS and COSPEC based estimates of SO2 plumes: Anatahan, Marianas Islands.

Meier, V.L., Realmuto, V., Scuderi, L.A. and Fischer, T.

To be submitted to: Journal of Volcanology and Geothermal Research.

Pinyon pine germination after the late 16th century megadrought. Scuderi, L.A.

To be submitted to Vegetation Science

Energy balance based evapotranspiration estimates utilizing real time MODIS imagery: Rio Grande Basin, New Mexico.

Scuderi, L.A. and Ellwein, A.

To be submitted to Photogrammetric Engineering and Remote Sensing

An intermodel comparison of remote sensing based evapotranspiration estimates.

Conrood, J., Scuderi, L.A., Ellwein, A., and Hendrick, J.

To be submitted to Journal of the American Water Resources Association

Accepted pending revisions

Remote Sensing of Playa lakes in western North America: Monitoring lake change resulting from climate variability in semi-arid regions.

Scuderi, L.A., Laudadio, C. and Fawcett, P.,

Quaternary Research (2008)

Dendrogeomorphically derived slope response to decadal and centennial scale climate variability:

Black Mesa, Arizona USA.

Scuderi, L.A., McFadden, L.D. and McAuliffe, J.R.,

Natural Hazards and Earth System Sciences (2008)

Zachary Sharp, Professor

Manuscripts submitted or in press

Chlorine isotope variations across the Izu-Bonin-Mariana arc.

Barnes, J.D., Sharp, Z.D. and Fischer, T.P.

Geology (submitted).

Two chloride sources in soils of the McMurdo Dry Valleys, Antarctica.

Bao, H., Barnes, J.D., Sharp, Z.D., Marchant, D.R.

J. Geophys. Res. doi:10.1029/2007JD008703 (in press).

Sulfur in the plume of the May 2003 eruption of Anatahan volcano, Mariana Islands: Sources and the formation of sulfate salts.

de Moor, J.M., Fischer, T.P., Hauri, E., Hilton, D.R., Sharp, Z.D. and Atudorei, V.

Bull. Volc. (submitted).

Origin of carbonatite parent magmas inferred from Oldoinyo Lengai volcanic gas emissions. Fischer, T.P., Marty, B., Hilton, D.R., Burnard, P., Furi, E., Palhol, F., Sharp, Z.D., Fredrerick, M. Nature Geosciences (submitted).

Aqueous and isotope geochemistry of mineral springs along the southern margin of the Tibetan plateau.

Newell, D.L., Jessup, M.J., Cottle, J.M., Hilton, D.R., Sharp, Z.D. and Fischer, T.P. Earth Planet. Sci. Lett. (submitted).

Pending proposals

Determining soil respiration rates in semiarid environments

Z. Sharp

National Science Foundation

\$235,596 (June 2008 - June 2010)

Scales and Mechanisms of Fluid Migration and Equilibration During the Subduction Cycle (co-I)

Z. Sharp

National Science Foundation

\$267,129 (June 2008 - June 2010)

Physico-chemical determinants of inhaled carbon nanotubes iocompatability (Co-I)

Z. Sharp

NIH

\$51,603 (UNM component) (October 2008 - October 2012)

Partial support for the acquisition of a Focused Ion Beam/FEGSEM for integrated mineral. and isotopic analyses of extraterrestrial materials (Co-I)

Z. Sharp

NASA

\$350,000 (April 2008 - April 2009)

Exploring Lunar Volatile Reservoirs; Analysis, Sampling, Preservation, and Curation, NASA, Z. Sharp (co-1)

NASA

\$320,490 (July 2008 - June 2011)

Nanostructured in vitro TB latency model

Z. Sharp (co-I)

NIH

\$275,000 (January 1 2009 - December 31, 2010)

Breath Test for Pseudomonas aeruginosa in CF

Z. Sharp (co-I)

NIH

\$275,000 (January 1, 2009 - December 21, 2010)

Unfunded proposal

Construction of a 14C line (co-I)

Z. Sharp

RAC

\$9000 (2008)

Gary A. Smith, Professor

Manuscripts in preparation

Sequential downstream integration of the Rio Grande through adjacent rift basins

Sean Connell* and Gary Smith

To be submitted to Geology

Publications in press

Geologic map of the El Rito quadrangle, Rio Arriba County, New Mexico

D.J. Koning and G.A. Smith

New Mexico Bureau of Geology and Mineral Resources

Open-file Geologic Map OF-GM, scale 1:24,000

Geologic map of the Squawback Ridge quadrangle, Deschutes and Jefferson Counties, Oregon

M.L. Ferns D.E. Stensland, G.A. Smith

Oregon Department of Geology and Mineral Industries Geologic Map Series, scale 1:24,000. (accepted 2002, proofs returned, holding in publication queue)

Geologic map of the Opal City quadrangle, Jefferson County, Oregon

G.A. Smith, M.L. Ferns

Oregon Department of Geology and Mineral Industries Geologic Map Series, scale 1:24,000.

(accepted 2002, proofs returned, holding in publication queue)

Unsupported research projects:

Tectonics and sedimentation of the transition from Laramide compression to Neogene extension in northern New Mexico

Stratigraphic patterns of volcanically overfilled rift basins

Stratigraphic and structural evidence for the rupture of hanging-wall hinge zones, San Luis and Española basins, Rio Grande rift, New Mexico.

Timothy Wawrzyniec, Research Scientist

External funding activities

Dr. Wawrzyniec has created a consortium of users that have access to the lidar facility housed within the Department of Earth and Planetary Sciences. Major funded projects are on going with several of these user members including the Army Corps of Engineers, the University of Oklahoma, the University of Minnesota, and the USGS. These projects, some of which are in their 2nd year of funding, bring about \$100,000 per year many of which are expected to be renewed for 2008. This has helped grow the UNM lidar lab from an initial \$60,000 investment to a major department facility with nearly \$250,000 of new equipment and supporting gear. The lab also secured funds to hire a 1/2 time research staff scientist, Jed Frechette, who aids in mission critical activities of the lab. Several funding requests are pending that will support work in Cuzco Peru, more work on the Rio Grande corridor (Bank Erosion and Levee Stability), and evaluation of micro topography on top of ancient basalt flows.

Research projects in progress

In addition to the LiDAR projects mentioned above, Dr. Wawrzyniec is developing geospatial models to evaluate sediment flux along hill-slopes near Blue Gap, Arizona. Previous work by Dr. McFadden and Dr. Scuderi, amoung others, have demonstrated extremely high erosion rates at Blue Gap over the past few centuries. We are attempting to use LiDAR based geospatial models to evaluate recently mobilized erosion volumes. In the fields of structure and tectonics, Dr. Wawrzyniec is working closely with Dr. Geissman on a range of problems. In 2006, Dr. Wawrzyniec (PI), Dr. Geissman (Co-PI) received funding to continue research in southern Mexico on the Neogene fragmentation of the Maya Block. This work continues with the collaboration of Dr. Molina-Garza of UNAM and several manuscripts are in preparation although the work is not yet completed. An unmet goal of the research is to date the timing of uplift of the Permian Chiapas Massiff (Sierra Soconosco). Dr. Wawrzyniec is also continuing his paleomagentic research along the eastern margin of the Colorado Plateau where he has organized a project to evaluate the time of deformation along the Pecos-Picuris fault zone of Northern New Mexico.

Gary Weissmann, Associate Professor

Manuscript in preparation

Influence of heterogeneity on pumping tests: are we correctly interpreting these data?, for submission to Ground Water

Weissmann, G.S. and Trahan, R.S.,

In preparation

Manuscripts submitted

Stratigraphic record of drainage basin stream capture and piracy in fluvial fan deposits at the Lawrence Livermore National Laboratory, Livermore Basin, California, USA Mikesell, L.R., Weissmann, G.S., and Karachewski, J.A., Submitted to a special publication of Geomorphology on Alluvial Fans.

A Cretaceous feather from the Upper Cretaceous (lower Campanian) Point Lookout Sandstone, northwestern New Mexico
Williamson, T.E., Kues, B.S., Weissmann, G.S., Stidham, T.A., and Yurchyk, S.L.,
Submitted to Cretaceous Research.

On-going research projects

Aquifer characterization at Lawrence Livermore National Laboratory, Livermore, California: Continued research funded by the National Science Foundation. Students currently on project include Leslie Mikesell (PhD candidate at Michigan State), Sarah Martell (MS student at Michigan State), and Ginny Rust (completed MS student at UNM). See NSF listing above for funding details.

Detailed aquifer characterization using LiDAR and high-resolution sedimentologic description. Funded through SURP and DOE-BES grants listed above. Collaboration with Tim Wawrzyniec. Several presentations completed during 2007 and publication expected to be submitted Spring 2008

Geochemical and physical aquifer property heterogeneity: a mult-scale sedimentologic approach to reactive solute transport. Funded by DOE (listed above). We are collaborating with Richelle Allen-King (University of Buffalo) and several scientists at the Pacific Northwest National Laboratory to evaluate the influence of physical and geochemical heterogeneity on movement of a carbon tetrachloride plume at the Hanford Site, Washington.

Fluvial depositional models in active continental sedimentary basins. This research is working to change the current paradigm for fluvial facies models, proposing that the current models are flawed since they were not developed in active sedimentary basins. Collaboration with A. Hartley (University of Aberdeen), G. Nichols (Royal-Holloway, London), and L. Scuderi (UNM).

5. ACTIVITIES IN PROFESSIONAL SOCIETIES

Adrian Brearley, Professor

Professional meetings attended

38th Lunar and Planetary Science Conference, Houston ,TX, 12-16th March, 2006. Presented talk, coauthored 2 talks, chaired session.

Meteoritical Society Meeting, Tuscon, AZ., August 13-17th 2007, Presented talk, chaired session.

American Geophysical Union Mtg, San Francisco, CA, 10-14 December, 2007, Presented talk.

39th Lunar and Planetary Science Conference, Houston, TX., 12-16 March, 2006

Presented talk 'Hydrothermal Alteration Behavior of Kainsaz (CO3) at Low Temperatures Under Reducing Conditions: Insights into Incipient Aqueous Alteration of Carbonaceous Chondrites.

Coauthored talk with Neyda Abreu, 'Unique Graphite and Amphibole-rich Clast in QUE 99177: An Extensively Metamorphosed Xenolith in a Pristine CR3 Chondrite.

Coauthored talk with Rena Ford, "Phyllosilicates in Two Coarse-Grained Allende CAIs: Evidence for Advanced Hydration".

Coauthored talk with Jana Berlin and Rhian Jones 'A Closer Look at Chondrules and Matrix in Kakangari: Evidence for Wide-Spread Reduction and Sulfurization.'.

Coauthored poster with Crystal Donnelly "Minor and Trace Elements in Sulfides in Reduced and Oxidized CV3 Carbonaceous Chondrites: Potential Recorders of Nebular and Parent Body Processes".

Meteoritical Society Meeting, Tucson, AZ., August 13-17th 2007

Presented talk "Distribution of Trace Elements in Sulfide and Metal in Reduced and Oxidized CV3 Carbonaceous Chondrites Determined by EPMA and SXRF."

Coauthored talk with Rena Ford "Alteration and Brecciation of a Calcium, Aluminum-rich Inclusion in the Allende Meteorite".

Coauthored talk with Jana Berlin and Rhian Jones "A Common Origin for FeO-rich Silicates in Kakangari and Enstatite Chondrite Chondrules?"

American Geophysical Union Meeting, San Franciso 10-14th Dec 2007

Presented talk: Chrysotile Nanotubes: Potential Carriers of Chlorine in Subducted Oceanic Crust.

Other activities

Associate Editor, Mineralogical Magazine
Associate Editor, Meteoritics and Planetary Science

Laura J. Crossey, Professor

Meetings attended

Rocky Mtn GSA, St. George, UT and gravels trip in SW Utah with K. Karlstrom, Tom Hanks and George Hilley. May 5-11.

Trail of Time Meetings and evaluation at Grand Canyon, May 19-26.

G- K-12 Meeting at Sevilleta, August 2-4.

Trail of Time Design Meeting, Santa Fe, August 8.

CREST workshop in Santa Fe, August 31- Sept 1.

Hydrologic Sciences Panel, Washington D.C., Sept. 20-21.

Math and Science Advisory Council Meeting, September 28.

NMGS Foundation Board meeting, Socorro, October 25.

GSA Meeting in Denver, Oct 27-31.

Grand Canyon Meetings-Trail of Time, Nov 2-3.

American Water Resouces Association Annual Meeting, Albuquerque, Nov. 13-14.

AGU Meeting in San Francisco, Dec. 9-14.

Talks presented

Gave invited seminar in the Geology Department at Louisiana State University, Baton Rouge, LA, February 1-3.

Gave invited seminar in the Geology Department at Southern Methodist University, Dallas, TX,

March 23-24. NSF Hydrologic Sciences Review Panel, Washington, D.C., March 29-30.

Gave invited seminar in the Geology Department at the University of Illinois, Champaign, IL.,

Gave invited seminar in the Geology Department at the University of Minnesota, Minn., MN,

April 11-12.
UNM/E&PS Graduation ceremony, May 12.

Invited talk at Los Alamos, Oct 15.

Filming with Discovery channel, Oct 18-20.

Society committeees

GSA Sedimentary Geology Division, Board Member, (Past Chair, spring 2007) GSA Committee on Divisions (ad hoc), 2006, 2007 American Association of Petroleum Geologists, Membership Committee (since 1989) Association for Women Geoscientists (lecturer (since 1989)

Maya Elrick, Associate Professor

Invited talks

Northwestern University, April Utah State University, January Lehigh University, November Stratigraphic Subcommission on Devonian Stratigraphy, Invited Speaker, September.

Editorial board

Geology (2004-2007) Journal of Sedimentary Research (2004-2007)

Teaching workshop

Cutting Edge Course DesignTeaching Workshop, Clinton, New York July 10-15,

Professional committees

GSA Sedimentary Geology Awards Committee (2004-2007)

Tobias Fischer, Associate Professor

Professional societies

Guest Editor of J. Volcanology Geotherm. Res. for special issue on Magmas and Gases volume related to Taiwan workshop held in April 2007 Associate editor of GSA Bulletin Member of editorial board for Journal of Volcanology and Geothermal Research Editor for the LAVCEI Commission on the Chemistry of Volcanic Gases (CCVG)

Web master for the IAVCEI Commission on the Chemistry of Volcanic Gases (CCVG)

Member of editorial board for Colombian Journal of Geology

Joseph Galewsky, Assistant Professor

Meetings attended

AMS Conference on Ocean/Atmosphere Dynamics, June 2007 European Surface Processes Meeting, June 2007 Fall AGU Conference, San Francisco, December 2007

Abstracts of talks and posters (*=invited; #=student author)

Probing ENSO influences on subtropical humidity using tracers of last saturation Hurley, J.V.#, J. Galewsky American Geophysical Union, San Francisco, CA, December 2007.

Radiative-convective land surface equilibria: An idealized modeling approach Galewsky, J. A. Ellwein #, L. McFadden American Geophysical Union, San Francisco, CA, December 2007.

Observations and modeling of water vapor isotopes from Mauna Kea, Hawaii Galewsky, J. M. Strong #, Z. Sharp American Meteorological Society Conference on Atmospheric and Oceanic Fluid Dynamics, Santa Fe, NM, June 2007.

Mountains hidden in the sky: Dynamical links between climate and topography Galewsky*, J. Fourth Annual European Surface Processes Meeting, Gwatt, Switzerland, 1 June 2007

John W. Geissman, Chair and Professor

Professional societies

Member, Steering Committee, Integrated Solid Earth Sciences (ICES)

Member, Advisory Board, Building Stronger Geoscience Departments Member, Council of the Geological Society of America Member, Annual Program Committee, Geological Society of America Chair, Publications Committee, Geological Society of America Chair, Structure and Tectonics Division, Geological Society of America Associate Editor, Tectonics, 2004 to present Associate Editor, Geological Society of America Bulletin, 2002 thru 2006 Science Editor, Eos, American Geophysical Union, 2000 to present-Member, National Science Foundation Earthscope Science Review Panel Member, American Geophysical Union "Committee of 50" University of New Mexico representative, DOSECC, Inc. Geoscience "consultant", Albuquerque Petroglyphs, U.S. Park Service Member, New Mexicans for Science and Reason, and Technical Consultant Member, Coalition for Excellence in Science Education

Rhian H. Jones, Associate Professor

Talks presented

Presented Talk: Thermal histories of CH chondrites: Reconciling the silicate and metal phases. 38th Lunar and Planetary Science Conference. Houston, TX. March, 2007.

Discussion Leader, "Chondrules: Transient heating in the protoplanetary disk". Gordon Research Conference on Origins of Solar Systems, Mount Holyoke College, MA. July 2007.

Presented talk, "A metamorphosed igneous inclusion in the Oro Grande H5 ordinary chondrite." 70th Annual Meeting of the Meteoritical Society, Tucson, AZ. August 2007.

Professional societies

Member of Meteoritical Society Council: attended council meetings in Houston, TX, March 2007 and Tucson, AZ, August 2007.

Member of the Nomenclature Committee of the Meteoritical Society.

Associate Editor of the Meteoritical Bulletin with responsibility for American meteorites.

Associate Editor of American Mineralogist.

Fellow of Mineralogical Society of America and Meteoritical Society.

Member of Mineralogical Society of Great Britain and American Geophysical Union.

Karl E. Karlstrom, Professor

Professional societies

I am active with Geological Society of America: as GSA Bulletin senior science editor, member of the Publications Committee, fieldtrip leader, topical session convener, and invited speaker

Barry S. Kues, Professor

Professional societies

Editorial Board, New Mexico Geology. Associate Curator, N.M. Museum of Natural History. Research Associate, N.M. Bureau of Geology and Mineral Resources Reviewed: 1 paper for New Mexico Geology; and a chapter in the book "America the Beautiful - the Land" (Editorial Directions, Inc.)

Consultant, Jemez Pueblo paleontological survey

One of several featured speakers on the geology of the Sandia Mountains in the hour-long KNME-TV production "The Sandias", first aired Nov. 12

Grant A. Meyer, Associate Professor

Invited talks

Fire, Climate, and Episodic Erosion in the Interior Western U.S. Cordillera: Four Corners Geological Society, Fort Lewis College, Durango, Colorado, Mar. 30, 2007.

Red Acid Everywhere: Hydrology and Impacts of a Mine Tailings Dam-Break Flood on Soda Butte Creek, Montana and Yellowstone National Park: UNM Department of Civil Engineering Seminar, Nov. 30, 2007.

See Abstracts section – invited talks indicated at GSA Annual Meeting and NSF Climate-Landscapes Workshop.

Grant proposal review

Two proposals for NSF Geomorphology and Land-Use Dynamics Program

Other

Proposed symposium for 2008 GSA Cordilleran-Rocky Mountain Meeting: "Geomorphic Responses to Holocene Climate Change in the Western USA", Las Vegas, NV (scheduled for March 21, 2008).

Leslie D. McFadden, Professor

Professional meetings attended

Geological Society of America Annual Fall Meetings (October, 2007)

Matthew Nyman, Assistant Professor/Lecturer

Invited presentations

Attended the NM Public Education Department meeting on Professional Development for Professional Developers, February 2008.

Attended the Annual Conference for Earth System Science Education Alliance, June 2008.

Frans Rietmeijer, Research Professor

Professional papers read

Challenges to understand aerogel contaminated by hypervelocity-impacted comet Wild 2 dust, Lunar and Planetary Science Conference XXXVIII, Houston, Texas

Deep metastable eutectic condensation in low-silica Al-Fe-SiO-H₂-O₂ smoke: Simple experiments, major implications, Lunar and Planetary Science Conference XXXVIII, Houston, Texas

Cometary meteors after Stardust, Meteoroids 2007 Conference, Barcelona, Spain [Invited Paper].

Comet mineralogy from the Stardust Mission: A challenge", Denver X-Ray Conference, 56th Annual Conference on Applications of X-ray Analysis, Colorado Springs, Colorado [Invited Paper].

Professional meetings attended

38th Lunar and Planetary Science Conference, Houston (TX), March 12-16 Meteoroids 2007 Conference, Barcelona, Spain, June 11-15 Denver X-Ray Conference, 56th Annual Conference on Applications of X-ray Analysis, Colorado Springs (CO), July 30-August 3, 2007.

Mousumi Roy, Associate Professor

Professional meetings attended

NSF NAVDAT Workshop (Roy, Callahan) March 2007 Spring NMGS Meeting (Callahan, Luther) April 2007 NSF Tectonics Panel Meeting, Washington D.C., (Roy) March 2007 Earthscope National Meeting (Callahan, Luther, Tetreault) March 2007 GSA Annual Meeting (Callahan) AGU Fall Meeting (Roy. Tetreault)

Jane Selverstone, Professor

Professional societies

Dana Medal selection committee for 2007-2009, Mineralogical Society of America.

Nominations committee, Volcanology-Geochemistry-Petrology section, American Geophysical Union.

Appointed to Editorial Board for Geology for 2008-2010.

Zachary Sharp, Professor

Editorship

American Journal of Science

Gary A. Smith, Professor

Invited presentations

Transforming volcanic products into the sedimentary record, Department of Geological and Environmental Sciences, Stanford University, March 13, 2007.

Timothy Wawrzyniec, Research Scientist

Invited talks

New Mexico Tech, Socorro, New Mexico, April 12th, 2007

Evaluating Hoodoo form and Process Using TLS LiDAR Data to Measure Seasonal Hillslope Modification, Black Mesa, NE Arizona

The University of Texas at Dallas, Texas, March 30th, 2007

Evaluating Hoodoo form and Process Using TLS LiDAR Data to Measure Seasonal Hillslope Modification, Black Mesa, NE Arizona

Meetings of the American Geophysical Union

Chronotopographic Analysis To Detect Small, Seasonal Hillslope Change Based On Point Cloud Data, Black Mesa Escarpment, NE Arizona; Wawrzyniec, T.F., and Frechette, J.D., December, 2007.

Gary Weissmann, Associate Professor

Meetings attended

NGWA Ground Water Summit – Albuquerque, NM, April 2007.
Alluvial Fans 2007 – Banff, Canada, Invited Keynote Speaker.
Geological Society of America National Meeting – Denver, CO, October 2007.
Session co-chair: Solute Plume Conceptual Models: Processes, Predictions, and Paradigms American Geophysical Union, Fall Meeting – San Francisco, CA, December 2007.

Manuscript reviews conducted for

Kansas Geological Survey Ground Water Water Resources Research Geosphere Vadose Journal

Proposal reviews

National Science Foundation – Hydrology division.

National Science Foundation – Surface Earth Process Section.

National Science Foundation – Sedimentary Geo and Paleobiology division.

Associate Editor

Groundwater.

Other

GSA Hydrogeology Division liaison to SEPM.

6. OTHER PROFESSIONAL ACTIVITIES

Adrian Brearley, Professor

Reviews

Reviewed scientific papers submitted to Meteoritics and Planetary Science (3), Geochimica et Cosmochimica Acta (1), American Mineralogist (1), Mineralogical Magazine (1)
Reviewed 4 proposals submitted to NASA Cosmochemistry Program.
Reviewed 4 proposals submitted to NASA Stardust Data Analysis Program
Reviewed 2 proposals submitted to NSF Instrumentation and Facilities Program
Reviewed 1 proposal submitted to the United Kingdom Particle Physics and Astronomy Research
Council

Laura J. Crossey, Professor

Reviews

Manuscripts
Geology (1)
GSA Bulletin (1)
Rocky Mountain Geology (1)
Associate Editor for Geochimica Cosmochimica Acta (2006-2009)

Proposals

National Science Foundation (3): Hydrologic Sciences, Inst. and Facilities, Low-T Geochemistry NSF Review Panel: Hydrologic Sciences

Other professional activities

Associate Editor, Geochimica Cosmochimica Acta, 2006, 2007.
National Sciences Foundation, Hydrologic Sciences Panel, 2006-2009.
Governor's Math & Science Advisory Council, 2007-2010.
New Mexico Geological Society Foundation Board, Treasurer, 2007-2009

Maya Elrick, Associate Professor

Journal and grant reviews

Palaeo-3, EPSL, Geospheres, Sedimentary Geology, PRF, NSF.

Peter J. Fawcett, Associate Professor

Reviews:

Reviewed Book Manuscript for Princeton University Press Reviewed manuscripts for: New Mexico Geology, Quaternary Science Reviews Reviewed 2 proposals submitted to the National Science Foundation, 1 proposal submitted to the Petroleum Research Fund

Invited presentations at other departments:

Lamont-Doherty Earth Observatory, Columbia University, NY, July.
Department of Earth and Planetary Sciences, University of New Mexico, September.
IGPP Climate Study Group, Los Alamos National Lab, Los Alamos NM, November.
Department of Geosciences, University of Arizona, Tucson AZ., November.

Professional maetings Attended

XVII INQUA Congress (2007): The Tropics: Heat Engine of the Quaternary, Caims, Queensland, Australia, August/Septemer.

New Mexico Geological Society Fall Field Conference, Jemez Mountains, September.

Geological Society of America Annual Meeting, Denyer CO., October.

Tobias Fischer, Associate Professor

Reviews

Reviews of 6 NSF proposals and 8 scientific manuscripts for GRL, Bull. Volc., G-cubed, JVGR, EOS.

Meeting organization/session chair

Co-organizer of MAG2007: International conference on the evolution, transfer and release of magmas and gases. Taipei, Taiwan, April 2007.

Off campus talks

Key Note speaker: International conference on the evolution, transfer and release of magmas and gases. Taipei, Taiwan, April 2007.

Seminar speaker: CNRS-CRPG Nancy, France April 2007

Talk at Chlorine conference, Yosemite National Park December 2007

Joseph Galewsky, Assistant Professor

Reviews

Reviewed NSF Proposals for Geomorphology/Land-use Dynamics program Reviewed papers for Journal of Geophysical Research, Geology, Natural Hazards, EOS

Off-campus talks

Invited seminars at Columbia University, Yale University, Purdue University, and Texas A&M University (2007)

Other professional activities

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Co-author of report to NRC on research agenda for atmospheric sciences/geomorphology community, 2007-2008 (with G. Roe, U. Washington)

Co-convenor of workshop "Climate over landscapes" at the National Center for Atmospheric Research, October 1-3 2007

John W. Geissman, Chair and Professor

Reviews of manuscripts and proposals

Reviewed proposals for National Science Foundation (14), American Chemical Society (1), The Third World Academy of Sciences (3).

Reviewed manuscripts for Journal of Geophysical Research (2), Earth and Planetary Science Letters (3), Tectonics (1), Canadian Journal of Earth Science (2), Geophysical International (2), Geology (2), Geoarcheology (1), New Mexico Geological Society (1)

Other professional activities

Adjunct or associate-type positions at other institutions: Adjunct Full Professor, University of Michigan, Ann Arbor

Other: Technician (half-time), UNM Paleomagnetism and Rock Magnetism Laboratory

Professional talks:

Variations in rock magnetic parameters in the Fort Hays Limestone, Niobrara Formation, Badito Colorado: A record of climatically controlled cycles in marine carbonate rocks? Geological Society of America Annual Meeting, October 23rd.

Continental red beds: How, why, and when can they be remagnetized, and what would Don Elston think?, Fall AGU Meeting, December 12th, San Francisco

How do vertical axis rotations of continental crust take place? Four Corners Geological Society, Farmington, NM, March 24th.

David Gutzler, Professor

Manuscript reviews

Journal of Climate (4), Geophysical Research Letters (1), Society and Natural Resources (1), Atmósfera (2), Science (1).

Grant proposal reviews

Grant proposal reviews (other than review panel assignments): National Science Foundation (2).

Proposal review panels:

NSF/NOAA/DoE interagency Drought in Coupled Models Program (DRiCOMP), June. NOAA Climate Prediction Program for the Americas, December.

Other professional activities (Invited presentations to professional audiences)

Floods, droughts, and climate variability in the American Southwest, NMSU Water Lecture, February 8.

The Governor's Task Force Report on Climate Change in New Mexico, NM Water Conference, Santa Fe. November 30.

International CLIVAR Program science guidance: VAMOS panel member [Variability of American Monsoon Systems].

World Meteorological Organization science guidance: WMO Monsoon panel member, term began October 2007.

Author, prospectus on international research priorities for weather impacts from extreme monsoon events. June.

Interagency U.S. CLIVAR Program science guidance: Phenomena/Observations/Synthesis panel (Member, three year term beginning 2005).

Co-chair, Working Group on Drought Prediction Research 2006-2008).

NOAA Climate Prediction Program for the Americas science guidance:

Scientific Steering Committee (Member, three year term beginning 2006).

Proposal review panel. December 2-5.

Invited participant in workshop on climate change adaptation (sponsored by The Nature

Conservancy), Albuquerque, October 22.

Invited participant in workshop on dendroclimatic reconstruction of streamflows in New Mexico (sponsored by U. Arizona Tree Ring Research Lab and NOAA Paleclimate Program). Albuquerque, November 2.

Rhian J. Jones, Associate Professor

Reviews

Manuscript for Geochimica et Cosmochimica Acta (1) Manuscript for Earth and Planetary Science Letters (1) Manuscript for Geology (1) Manuscript for Earth, Moon and Planets (1) Proposals for NASA / Cosmochemistry Program (6) Proposals for Science and Technology Facilities Council, U.K. (2)

Other professional activities

Created "Virtual Meteorite Museum" website in collaboration with website designer Geoff Notkin (Stanegate Studios, Tucson, AZ), and Dr. Barbara Cohen (Institute of Meteoritics, UNM). Website launched January 2007. http://epswww.unm.edu/meteoritemuseum/index.htm.

Ran teacher workshop, "Looking at the Solar System Through a Microscope", January 2007. Workshop held at the NM Museum of Natural History and Science. 28 teacher participants (K-12).

NASA, Cosmochemistry Review Panel. Group chief, August 2007.

Karl E. Karlstrom, Professor

Review activities

NSF proposals Geology GSA Bulletin Precambrian Research Other professional activities

> Editorial Board for Precambrian Research, 1990 to present. New Mexico Geologic Mapping Advisory Board, 1999 to present.

Science editor for Geological Society of America Bulletin - third year of 4-year term. This job requires about 10-12 hours per week, 52 weeks per year.

Aspen Anomaly workshop convener (CREST and LANL as sponsors)

Convener for Trail of Time weekly conference calls and occasional workshops

Invited speaker for several topical sessions at GSA National Meeting, Denver, Colorado and AGU meeting

Barry S. Kues, Professor

Editorial duties

Editorial Board, New Mexico Geology.

Associate Curator, N.M. Museum of Natural History.

Research Associate, N.M. Bureau of Geology and Mineral Resources

Reviews

Reviewed: 1 paper for New Mexico Geology; and a chapter in the book "America the Beautiful – the Land" (Editorial Directions, Inc.)

Other professional societies

Consultant, Jemez Pueblo paleontological survey
One of several featured speakers on the geology of the Sandia Mountains in the hour-long
KNME-TV production "The Sandias", first aired Nov. 12

Grant A. Meyer, Associate Professor

Undergraduate student mentoring

Assisted Paula Watt with mentoring of UNM-Gallup undergrads April Longhair and Mark Toledo in NSF-funded field studies of uranium mill tailings contamination in alluvial sediments.

Leslie D. McFadden, Professor

Peer reviews of articles and proposals

- 1 paper for Journal of Geophysical Research-Earth Surface Processes
- 1 paper for Geology
- 1 paper for Catena
- 1 paper for Earth Surface Processes and Landforms
- 1 paper for Water Resources Research

National Science Foundation proposal

Petroleum Research Foundation proposal

Antartica New Zealand Research Program proposal

Editorial activity and other service to the profession

Reviewed Candidate in Department of Geosciences at Skidmore College for Tenure and Promotion

Reviewed Candidate in Department of Sciences and Math at UNM-Gallup Branch Campus for Tenure and Promotion

Assisted Lehigh University Geology Department in Faculty Position Search in Soils/ Geomorphology/Biogeochemistry

Off-campus professional activity

Presented lecture to the Ghost Ranch Archeology Class.

Presented invited lecture to Department of Geography and Geology, University of North Carolina-Charlette

Charlotte

Invited Participant, National Science Foundation Climate and Landscape Modelling Workshop.

Matthew Nyman, Assistant Professor/Lecturer

Professional activities

Coordinator Natural Science Program

Co-Director with Dr. G. Bruce McClure (Sandia National Laboratories) of the Science Education Institute of the Southwest

Co-Director with Dr. Wanda Martin of the UNM Teachers' Institute.

Organized 3 summer courses for K-12 teachers

Organized seminar series Teachers Talk About Classroom Science

Organized SEIS Science Research Fellowship program

Frans Rietmeijer, Research Professor

Peer review of scientific papers

Advances in Geosciences-Planetary Science (1) American Mineralogist (2) Astrophysical Journal Letters (1) Earth, Moon, and Planets (20) Journal Geophysical Research (1) Meteoritics and Planetary Science (4)

Proposal reviews

NASA Sample Return Laboratory Instruments and Data Analysis Program (1)

Other professional activities

Chair of the Working Group on Astromineralogy of the International Mineralogical Association ASTROBIOLOGY Editorial board member

Member of the Scientific Organizing Committee of the Meteoroids 2007 Conference, Barcelona (Spain) June 11-15, 2007

Co-Editor submitted to "Advances in Meteoroid and Meteor Science", J.M. Trigo-Rodriguez, F.J.M. Rietmeijer, J. Llorca and D. Janches (Editors), Springer, 2008

Professional services

38th Lunar and Planetary Science Conference Program Committee Co-Chair session, STARDUST: Mainly Mineralogy, 38th Lunar and Planetary Science Conference Volunteer Foreign Language Editor for American Geophysical Union

Mousumi Roy, Associate Professor

Invited talks

Lamont-Doherty Earth Observatory, July, 2007 Los Alamos National Lab, Colloquium, Sept., 2007

Other professional service

Panelist, NSF-EAR Tectonics Reviewed for EOS, Earth and Planetary Science Letters and Geology Co-Chair, Long-term tectonics working group, Computational Infrastructure for Geodynamics (CIG)

Louis A. Scuderi, Associate Professor

Journal review

Quaternary Research, Canadian Journal of Forestry, Geophysical Research Letters, Arctic, Antarctic and Alpine Research,
Photogrammetric Engineering and Remote Sensing, Earth Interactions

Review for National Funding Organizations/National Science Foundation

Climate Dynamics, Geosciences, Solar-Terrestrial, Polar Programs, ILI-IP Equipment Grants

Editor

Quaternary Research-Special Issue Inner Mongolia

Jane Selverstone, Professor

Manuscripts reviewed

Nature, Geology, Geological Society of America Bulletin, Journal of Metamorphic Geology, Contributions to Mineralogy and Petrology, Tectonics (10)

Proposals reviewed

Swiss National Science Foundation, National Science Foundation Tectonics Program, National Science Foundation EAR-Instrumentation Program (5)

Reviewer

Reviewer of site proposal for inclusion of Surtsey Island as a UNESCO World Heritage Site Reviewer for introductory geology textbook, Freeman and Worth Publishers Other professional activities

Member, Editorial Board, Journal of Metamorphic Geology Outside evaluator of promotion package, Utah State University

Zachary Sharp, Professor

Reviewed papers for international refereed journals

International Journal of Mass Spectrometry Promotion review (Professor in S. Africa) Earth and Planetary Science Letter Rapid Communications in Mass Spectrometry

Reviewed proposals

NSF (lots!) NASA

Invited lectures

Frontiers of Geoscience Lecture (Los Alamos)

Conferences

Goldschmidt, Cologne, Germany, AGU Annual Fall Meeting

Gary A. Smith, Professor

Reviews

Reviewed research proposals for the National Science Foundation (1).
Reviewed manuscripts for: Geological Society of America Bulletin (1), Geology (1), New Mexico Geological Society Guidebook (1), Jardfeingi (Faroese Earth and Energy Directorate) Faroe Islands Exploration Conference Proceedings Volume (1).

Other professional activities

Research Associate, New Mexico Bureau of Geology and Mineral Resources

Timothy F. Wawrzyniec, Research Scientist

Invited talks

New Mexico Tech, Socorro, New Mexico, April 12th, 2007

Evaluating Hoodoo form and Process Using TLS LiDAR Data to Measure Seasonal Hillslope Modification, Black Mesa, NE Arizona

The University of Texas at Dallas, Texas, March 30th, 2007

Evaluating Hoodoo form and Process Using TLS LiDAR Data to Measure Seasonal Hillslope Modification, Black Mesa, NE Arizona

Gary Weissmann, Associate Professor

Invited presentations

University of Colorado, Department of Civil Engineering, October 2007, invited seminar speaker.

Workshop Leader, 6th Washington Hydrogeology Symposium, Workshop #4: Subsurface Heterogeneity: Why is it important, why we usually ignore it, and what to do about it, May 3, 3-hour workshop.

7. NON-TEACHING UNIVERSITY SERVICE

Adrian Brearley, Professor

Departmental service

Director, Earth and Planetary Sciences Transmission Electron Microscope and X-ray Diffraction Laboratories
Co-Associate Chair, Department of Earth and Planetary Sciences
Member – Department Facilities Committee

Laura J. Crossey, Professor

I continue to be active at all levels within the university. Most significant in terms of time commitment are the undergraduate advising for all EPS programs.

Department committee

Undergraduate Advisor: E&PS BS/BA, Environmental Science BS Undergraduate Honors Advisor Chair, Analytical Chemistry Laboratory Advisory Committee Undergraduate Committee

College of Arts and Sciences

A&S Undergraduate Committee
A&S Committee on Math & Science Education for Teachers
PROFOUND committee (undergraduate research)

University committee

Research Study Group Sigma Xi Board Member (2004-present) Women Studies Board Member (2006-2007)

Maya Elrick, Associate Professor

Departmental committees

Undergraduate Committee-Scholarship Committee Chair Analytical Geochemistry Lab Committee Minorities Recruitment Committee Graduate Admissions Committee Natural Science Search Committee

Peter J. Fawcett, Associate Professor

Department

Member, Graduate Committee Member, Computer Committee

University

Chair, CREATE Center Advisory Board Member, University Geospatial Resources Committee

Tobias Fischer, Associate Professor

Departmental

Chair: Graduate committee Member: Salary committee Coordinator, UNM-LANL Volcanology Program

University

Young Ranch Remodeling Committee, University of New Mexico.

Member: Consortium of the Americas for Interdisciplinary Science, University of New Mexico.

Joseph Galewsky, Assistant Professor

Departmental

E&PS Computer Committee (Chair 2007-2008)
E&PS Graduate Committee
E&PS Productivity Assessment Committee
E&PS Blue Planet Learning Outcomes Assessment Committee
Faculty Representative to Caswell Silver Foundation Board

John W. Geissman, Chair and Professor

University service

Chair, UNM Committee on Governance, 2005-2007 Member, UNM Honorary Degree Committee

Departmental

Chair, Department Facilities Committee, 2002-7 Chair, Department Long Range Planning Committee, 2002-7 Vehicle Committee Member, Graduate Admissions Committee

Special projects

Administrative Positions Chair, Department of Earth and Planetary Science, July, 2007-

David Gutzler, Professor

Department service

Undergraduate advisor, Environmental Science B.S. program: Spring. Computer committee: Spring, Fall.

Undergraduate committee: Spring, Fall (Chair).

University service

UNM Water Resources Program: Program committee, Spring, Fall. E&PS Green Chile presentation, "Elements of a 2007 North American monsoon prediction", March 26.

Invited lecture to UNM International Studies Institute, "Global warming and the international community", September 11.

Invited lecture to UNM Water Forum, "The disappearing snowpack of 2007", October 5.

Rhian H. Jones, Associate Professor

Departmental service

Member of Graduate Admissions Committee (Spring, Fall 2007) Member of Faculty Productivity Committee (Spring 2007) Member of Graduate Committee (Fall, 2007)

Karl E. Karlstrom, Professor

Departmental

Member, EPS Graduate Committee in 2007

E&PS vehicle coordinator

Continuing Education - lecturer for the Osher Program - #19807, Deep Time, Human Time, and Geologic perspectives: Understanding the rocks and landscapes in Grand Canyon, New Mexico, and the Southwestern U.S.: Thursdays Nov 1, 8, and 15, 2-5 PM. (20 students)

Barry Kues, Professor

University service

Member, Search Committee for new Dean of Libraries

Department service

Library Liaison
Curator of departmental fossil, mineral, rock, and thesis collections
Ad-hoc committee for outcomes assessment in EPS-101

Grant A. Meyer, Associate Professor

Departmental service

Administrative work in Department, College and University Committees
E&PS Admissions Committee Chair, Fall 2005 - present.
E&PS Departmental Long-Range Strategic Planning Committee, Spring 2002-present.

Leslie D. McFadden, Professor

Departmental service

Chairman of the Department of Earth & Planetary Sciences (through July 15, 2007) Secretary, Caswell Silver Foundation Board (through July 15, 2007)

College of Arts and Sciences service

Member, Advisory Council of the Albuquerque Teachers Institute
Member, Board of Associated Scholars, Center for the Southwest
Member (and Physical Sciences Sub-Committee Chair), University Core Curriculum and Core
Course Assessment Committee

Matthew Nyman, Assistant Professor/Lecturer

Departmental Service

Member Earth and Planetary Sciences Undergraduate Committee Steering committee for NSF-funded Noyce Fellowship program

Aurora Pun, Adjunct Assistant Professor

Departmental service

Ad hoc committee for Outcomes Assessment Program and Pilot Plan Development, member Geology Museum exhibit, Tucson Gem and Mineral Show, Tucson, Arizona, February 7-12, 2007. Acquisition of specimens for the Geology Museum.

Mousumi Roy, Associate Professor

Department service

Search Committee for the Hydrologist Faculty Position (F07, S08) Graduate Admissions committee (F07, S08) Computer Committee (served as Chair in Spring 2007) Grad Advisor (F07) Unix/Linux system administration (all of CY 2007)

Ad-hoc committee on diversity - organized undergraduate pizza outreach event to encourage participation in research.

University service

Arts and Sciences College Research Advisory Committee.

Louis A. Scuderi, Associate Professor

Administrative duties

Director, Center for Rapid Environmental Assessment and Terrain Evaluation (CREATE). Supervise staff (2) and graduate students (6). CREATE 1 Grant Closeout (March 2007) CREATE 2 Annual Report (October 2007)

Departmental service

Field Computational Equipment, Committee Chair Graduate Committee, Member Faculty Assessment Committee, Member

Jane Selverstone, Professor

Departmental committees

Graduate committee, chair (Spring 07); member of Graduate Committee (Fall 07) Graduate advisor (Spring 07) Oversight committee for departmental Analytical Chemistry lab Associate Chair (Fall 07)

University committees

Faculty and Staff Benefits committee (through 8/07)
Arts and Sciences Tenure and Promotion Committee for 2007-2008

Other service

Presented talk at Success in the Classroom conference ("Using clickers in large classes: turning a skeptical professor into a believer")

Attended UNM Responding to Diversity workshop, 11/7/07

Zachary Sharp, Professor

University

Committee for Promotion to Full Professor (Chairman)
Faculty Senate
Academic Freedom and Tenure Committee
2007 Sevilleta LTER REU Faculty Mentor

Departmental Committees

Instrumentation and Facilities (chair) Geochemistry Laboratory Committee Graduate Admissions Committee
Teaching review for two faculty (Galewsky and Jones)

National/International

National Res. Council Postdoctoral Fellowship Committee (4 times/yr, once in Washington DC) NSF panelist – EAR Instrumentation and Facilities 11/06 NSF panelist – EAR Graduate Research Fellowship Program (meets in 07, but readings and reviews in 06)
Outside reviewer for Full Professor promotion (S. Africa)

Gary A. Smith, Professor

Department service

Undergraduate Committee, Dept. of Earth and Planetary Sciences
Collections Committee, Dept. of Earth and Planetary Sciences
UNM Geology Museum exhibit, Tucson Gem and Mineral Show, Tucson, Arizona, February 1013, 2007. Acquisition of specimens for the Geology Museum.
Member of the Board, Caswell Silver Foundation
Co-convened "Success in the Classroom: Sharing Practices that Work," February 2007.
Faculty Senate Teaching Enhancement Committee
Accreditation Task Force, Criterion 3 Committee (Chair, Criterion 3b Subcommittee)
Title V Faculty Committee
Mentoring Institute Advisory Committee
Search Committee, Mentoring Institute Director
Chief Information Officer's Strategy 1 Task Force
IT Cabinet (alternate member from the Provost Office)

Timothy F. Wawrzyniec, Research Scientist

In addition to responsibilities as Lecturer, Dr. Wawrzyniec maintains two critical programs for the Department of Earth and Planetary sciences, which are the Rock Cutting facility and the Departments new field tablet computer (Geopads) collection. Both facilities are multi-user facilities that require constant maintenance and regular supervision to keep the equipment functioning for faculty, staff, and students. Dr. Wawrzyniec also serves on the Department computer committee where works with other committee members to advance the utilization of computer technology in research and instruction within the Department of Earth and Planetary Sciences. He also serves on a Arts & Sciences committee investigating the application of GIS technology across University programs.

Gary Weissmann, Associate Professor

Department committees

Hydrology Search Committee, Chair Graduate Acceptance Committee Analytical Laboratory Facilities Committee

University committees

Research Allocation Committee (RAC) - Fall 2006-present.

8. SCHOLASTIC HONORS AND FELLOWSHIPS

Adrian Brearley, Professor

Invited Distinguished Lecturer, International Summer School in Planetary Sciences, Kobe, Japan, July 16-20, 2007

David Gutzler, Professor

Research semester awarded by College of Arts and Sciences, Fall.

Mousumi Roy, Associate Professor

Continuing in 2007: NSF-ADVANCE, Marie-Tharp Fellowship - Columbia University, Lamont-Doherty Earth Observatory, NY; (period: 2006-2008)

Jane Selverstone, Professor

2006-2007 Outstanding Teacher of the Year Award, University of New Mexico

9. SABBATICALS AND TRAVEL

Adrian Brearley, Professor

Travel

- National Synchrotron Light Source, Brookhaven National Laboratory to carry out synchrotron XRF analyses, March 26-30, 2008.
- Visiting Scientist Glenn T. Seaborg Institute, Lawrence Livermore National Laboratory, May 14-18, 2007.
- Visiting Scientist, Glenn T. Seaborg Institute, Lawrence Livermore National Laboratory, Dec 11-12, 2008.

Laura J. Crossey, Professor

Travel/Field trips

- Big Maria Mountains research, January 12-14.
- Mount Taylor Quadrathalon (we won overall mixed team... go UNM!), February 17.
- Big Marias research trip, March 11-18.
- Taught EPS Advanced Field Geology course, June 5-26.
- Filming for National Geographic documentary (with UNM students), June 5-13.
- CREST research, July 26-29.
- Black Canyon of the Gunnison trip, August 10-14.
- Filming for National Geographic documentary on Rocky Mountains; local areas, August 30-September 2.
- FLC freshman class (25 students, 7 visiting scientists) fieldtrip to Grand Canyon, September 14-16.
- Fieldtrip with Graham Begg, October. 5-6.
- Field trip to Soda Dam, NM, October 10.
- Springerville with MS student Eileen Embid; Defiance uplift trip with Brandon Dixon, October 12-14.
- Fieldtrip to Sevilleta LTER w/ MS student Amy Williams, October 20.
- Rio Verde trip to Barnhardt Canyon, November 22-25.
- Trail of Time, South Rim, December 18-20.
- Arizona trip, Salt Springs and Lake Mead with MS student Jennifer Lopez-Pearce, December 24-31.

Peter J. Fawcett, Associate Professor

- Lamont-Doherty Earth Observatory, Columbia University, New York, July 18-20.
- Sydney and Cairns Australia, July 25-August 4.
- Los Alamos New Mexico NMGS Fall Field Conference, September 19-22.
- Denver, CO., GSA Annual Meeting, October 28-31.
- Los Alamos NM, IGPP Climate Study Group, November 8.
- Tucson AZ., University of Arizona Dept. Geosciences, November 15-17.

Joseph Galewsky, Assistant Professor

Travel

Scientific visitor at the Mesoscale and Microscale Meteorology Division, National Center for Atmospheric Research, Boulder, Colorado, July 2007.

John W. Geissman, Chair and Professor

Summer teaching

University of Michigan Camp Davis, Geological Sciences 440, Advanced Field Geology, June 23-July 15.

Travel

- Geoframe Meeting (Invited), St. Louis, February 2-5.
- GSA Publications Committee Meeting, Boulder, February 24-25.
- Annual Program Committee meeting, Geological Society of America Headquarters, Boulder, March 10-11.
- GEPON Meeting, Boulder, March 22-24.
- Farmington, Four Corners Geological Society Lecture, March 24.
- Field work, northern New Mexico, April 7-8.
- Alumni Advisory Board meeting, University of Michigan, April 21-23.
- Council Meeting, Geological Society of America Headquarters, Boulder, April 28-30.
- New Mexico, southern Colorado, UNM Introductory Field Geology course, May 14 June 3.
- · Field work, north-central New Mexico, June 10, 11.
- Wyoming, University of Michigan, Field Camp, June 18 July 11.
- Field sampling, Montana, Idaho, Colorado, July 28 August 6.
- Fieldwork, southern Colorado, August 14-16.
- Tectonics and Topography Field trip, September 8-17, E&PS 523.
- Guest Lecturer, University of Kansas, September 28-30.
- Alumni Advisory Board Meeting, University of Michigan, Ann Arbor, October 5-8.
- Geological Society of America Annual Meeting, Phildelphia, October 21-26.
- National Science Foundation, Earthscope Science Review Panel, October 31 November 3.
- · Asssociation of Earth Science Editors Meeting, San Diego, November, 7-8.
- San Francisco, AGU Fall Meeting, December 9-14.

David Gutzler, Professor

- EPSCoR meeting and NMSU Water Lecture presenter, Las Cruces NM, February 7-8.
- Proposal review panel for interagency Drought in Coupled Models Program, Washington DC, May 7-9
- American Geophysical Union Joint Assembly, Acapulco, Mexico, May 21-25.
- World Climate Research Programme Workshop on Seasonal Climate Prediction, Barcelona, Spain, June 2-7.
- EPSCoR Meeting, Las Cruces NM, June 20-22.
- Connecting People to Rivers, raft trip with OSE personnel and state legislators Chama River, July 13-15.
- US CLIVAR summit meeting, Annapolis MD, July 22-25.

- NOAA/NSF Mountain Hydroclimatology Workshop, Boulder CO, October 17-19.
- Proposal review panel for NOAA Climate Prediction Program for Americas, Washington DC, December 2-5.

Rhian H. Jones, Associate Professor

Travel

- 38th Lunar and Planetary Science Conference, Houston, TX. March 2007.
- Gordon Research Conference on Origins of Solar Systems, Mount Holyoke College, MA. July 2007.
- 70th Annual Meeting of the Meteoritical Society, Tucson, AZ., August 2007.
- NASA, Cosmochemistry Review Panel. Baltimore, MD., August 2007.

Karl E. Karlstrom, Professor

- Big Maria Mountains Research, January 12-14.
- E&PS 307 fieldtrip, January 27.
- E&PS 307 fieldtrip, February 10.
- · Mount Taylor Quadrathalon, February 17.
- Cal State Long Beach invited talk, February 18-19.
- GSA Publications Committee meeting in Boulder, March 2-4.
- E&PS 307 fieldtrip, March 10.
- Big Marias research, March 11-18,
- EarthScope National Meeting- Monterey, California, March 27-30.
- Backhoe trip to Grand Junction with graduate student M. Sandoval, April 19-22.
- La Madera Ouad mapping, April 28.
- Gravels trip in SW Utah with L Crossey, Tom Hanks and George Hilley, May 5-11.
- Trail of Time meetings and evaluation at Grand Canyon, May 19-26.
- Taught EPS Advanced Field Geology course, June 5-26.
- Filming for National Geographic documentary (with UNM students), June 5-13.
- CREST research, July 26-29.
- G- K-12 meeting at Sevilleta, August 2-4.
- Black Canyon of the Gunnison trip, August 10-14.
- Filming for National Geographic documentary on Rocky Mountains, August 30-Sept 2.
- CREST workshop in Santa Fe, August 31- Sept 2.
- FLC freshman class fieldtrip to Grand Canyon, Sept 14-16.
- Ores and Orogenesis meeting in Tucson-led fieldtrip and chaired session, Sept. 20-27.
- Fieldtrip with Graham Begg, Oct. 5-6.
- Invited talk, New Mexico State, Oct 10.
- Springerville with MS student Eileen Embid; Defiance with Brandon Dixon, Oct 12-14.
- Invited talk at Los Alamos, Oct 15.
- · Filming with Discovery channel, Oct 18-20.
- Led GSA fieldtrip to Black Canyon of Gunnison, Oct 24-26.
- GSA meeting in Denver, Oct 27-31.
- Grand Canyon meetings, Trail of Time, Nov 2-3.
- Rio Verde trip to Barnhardt Canyon, Nov 22-25.
- AGU meeting in San Francisco, Dec. 9-14.
- Arizona trip, Salt Springs and Lake Mead with MS student Jennifer Lopez-Pierce, Dec 24-31.

Barry S. Kues, Professor

Sabbatical Leave, Spring 2007

Travel

- NMGS Executive Committee Meeting, Socorro, January 19.
- NMGS Executive Committee Meeting, Socorro, April 12.
- NMGS Spring Meeting, Socorro, April 13.
- NMGS Publications Committee Meeting, Socorro, June 1.
- NMGS Executive Committee Meeting, Socorro, June 29.
- NMGS Fall Field Conference, Los Alamos, September 19-22.
- Field research, La Ventana, NM, October 1.
- Field research, Silver City area, October 20-21.

Grant A. Meyer, Associate Professor

Travel

- Science Education Institute of the Southwest (SEIS) workshop for teachers, "Climate Change and Landscapes", April 14, 2007.
- Yellowstone Association Institute course for general public, "Shaping the Northern Yellowstone Landscape", Aug. 6-8, 2007.
- Field work in Yellowstone National Park, Holocene beaver activity and effects on small streams, August 4-5, 2007.
- Numerous other short field research trips to Rio Chama, Sacramento Mountains, Sandia Mountains, and etc.

Leslie D. McFadden, Professor

- Several day-long field trips to the NSF LTER site at the Sevilleta Wildlife Refuge to review results of graduate student research, January through November.
- Several day-long field trips to the Sandia Mountains associated with research I am supervising that involve several graduate students, January through November.
- Presented invited talk, Department of Geography and Geology, University of North Carolina -Charlotte, North Carolina, February 9-12.
- Field work in northeast Arizona involving studies of Holocene landscape evolution, June 1-3.
- Visit to Mockingbird Gap archeological field school site to present soil science overview, July 10.
- Presentation to Ghost Ranch Archeology Seminar Class, Ghost Ranch, NM, August 2.
- Participation in NSF-supported Climate and Landscape Modeling Workshop, Boulder, Colorado, September 30 – October 2.
- Participation in Geological Society of America Annual Fall Meeting, Denver, Colorado, October 27-30.
- Field work near Baker, California, Mojave Desert, December 8-10.

Frans Rietmeijer, Research Professor

Travel

- The 38th Lunar and Planetary Science Conference Program Committee, Houston, TX, January 15-18
- 38^h Lunar and Planetary Science Conference, Houston, TX, March 12-16
- Meteoroids 2007 Conference, Barcelona, Spain, June 11-15
- Denver X-Ray Conference, 56th Annual Conference on Applications of X-ray Analysis, Colorado Springs (CO), August 1-2
- STARDUST Mineralogy sub-team meeting, Tucson, AZ, August 12

Mousumi Roy, Associate Professor

Travel

- Lamont-Doherty Earth Observatory, Columbia University, February, 2007
- CU Boulder, March, 2007
- U Kansas, March 2007
- Washington, DC, -NSF Panel Meeting, March 2007
- Earthscope National Meeting (2 students + postdoc), March 2007
- Lamont-Doherty Earth Observatory, Columbia University, May, 2007
- Lamont-Doherty Earth Observatory, Columbia University, July, 2007
- LANL, September 2007
- Fall AGU Meeting, December 2007

Jane Selverstone, Professor

Travel

San Francisco: Attended SAFOD sample selection party and AGU Meeting, December 9-11, 2007.

Zachary Sharp, Associate Professor

Travel

Field work in Costa Rica, ~2 weeks w/ D. Breecker in New Mexico.

Gary A. Smith, Professor

- Attended Tucson Gem and Mineral Show, Tucson, Arizona, February 9-14.
- Attended New Mexico Higher Education Assessment and Retention Conference, Albuquerque, NM. February 22-23.
- Attended General Education and Assessment: Engaging Critical Questions, Fostering Critical Learning, American Association of Colleges and Universities, Miami, FL, March 1-3.

- Visit with geoscience faculty and faculty development staff at Stanford University, Palo Alto, CA. Delivered seminar presentation in Department of Geological & Environmental Sciences, March 13.
- Geologic mapping, El Rito quadrangle, New Mexico, June 5-15.
- Professional Organization for Development in Higher Education Network, Annual Meeting, Pittsburg, PA., October 25-28.

Timothy F. Wawrzyniec, Research Scientist

Travel

Dr. Wawrzyniec teaches structural geology and intrabasinal tectonics to energy industry professionals. Recent classes have been offered directly to PEMEX in its offices in Villahermosa Mexico.

Gary Weissmann, Associate Professor

- Canada Alluvial Fans 2007 Meeting, Keynote Address, June 2007: Banff.
- Hanford, WA DOE research project, August 2007.
- Denver, CO GSA Annual Meeting, October 2007.
- San Francisco, CA AGU Fall Meeting, December 2007.

10. PUBLIC SERVICE

Laura J. Crossey, Professor

Public service

Soccer Referee, USSF Grade 6, NM State Referee, NM State Cup referee, NISOA Collegiate Referee (1997-current), NM State High School Referee.

Maya Elrick, Associate Professor

Community service

Geoscience education presentations in elementary schools AGI International Science Fair Judge, Albuquerque

Peter J. Fawcett, Associate Professor

Public service

Science Judge for the Intel International Science and Engineering Fair, Albuquerque NM (May 2007).

Interviewed by reporters for the Albuquerque Journal.

Joseph Galewsky, Assistant Professor

Public service

First science user of New Mexico's Encanto supercomputer, featured in press release from New Mexico Department of Information Technology and picked up in statewide media outlets.

John W. Geissman, Chair and Professor

Public service

Alumni Advisory Board, University of Michigan

Worked with Career Enrichment Center, APS, to establish "Geology of New Mexico", which has now started

Geoscience Advisor, Albuquerque Petroglyphs National Monument committee.

Geologic field excursion leader, miscellaneous Elementary school groups

Participant, Jefferson Middle School, Special Educational Events Day

Participant, Rio Rancho High School Career Days

Member, Coalition for Excellence in Science Education

David Gutzler, Professor

Invited presentations to nonspecialist audiences

Planning in the face of uncertainty: Weather and water, NM Water Dialogue annual meeting, Albuquerque, January 12.

21st century climate change projections: Challenges for water management in New Mexico, All-Pueblo ITEST Science/Technology summit, Santa Ana Pueblo, April 18.

Global warming and climate change in high latitudes, KNME/New Mexico Zoological Society, April 21.

Climate change and water demand in Albuquerque, Albuquerque/Bernalillo Co. Water Utility Authority, August 22.

Climate change and water resource management, League of Women Voters Albuquerque, Bernalillo Co., September 18.

Environmental health in an era of pronounced climate variability and change, keynote address to New Mexico Environmental Health Conference, Albuquerque, October 17.

Science Advisor to NM Environment Department and Office of the State Engineer, New Mexico Climate Change Initiative.

Presented testimony on climate change in New Mexico to the state legislature's Radioactive and Hazardous Materials Committee, Santa Fe, July 12.

Contributing author and editor for brochure on climate change, distributed to "town hall" meetings statewide, August.

Climate change presentation to Office of State Engineer personnel, Santa Fe, October 23.

Climate change presentation to New Mexico Finance Authority annual meeting, Sandia Pueblo, October 23.

Climate change presentation to Governor's Blue Ribbon Task Force on Water, Albuquerque OSE office, October 24.

Guest Interviewee on climate change, KUNM Childrens Hour, January 6.

Panelist, NMPIRG discussion on global warming, UNM SUB, February 1.

Panelist, KUNM Town Hall on Global Warming, February 18.

Interviewee on La Niña and the 2007/08 winter forecast for the Southwest, University of Arizona, November 6.

Numerous interviews throughout the year for regional newspapers and radio and television stations regarding summer rainfall, El Niño/La Niña, drought, global warming, and other weather-related and climate-related topics.

Rhian H. Jones, Associate Professor

Public service

Identified suspect meteorites and gave tours of the Meteorite Museum to several visiting groups.

Karl E. Karlstrom, Professor

Public service

We made major progress in 2007 towards establishing the Trail of Time at Grand Canyon - which will be one of the world's largest geoscience exhibitions.

We led a press tour with 7 Dutch reporters to write articles on the filming of the Grand Canyon documentary (January 12-15, 2008).

Filming for TV documentaries; all of these are significant outreach efforts and provide National/International visibility for UNM.

National Geographic Channel Naked Science- Grand Canyon (filming in June 07 for release on February 11, 2008).

National Geographic Channel Naked Science- Rocky Mountains (filming in August/September 07 for release on February 12, 2008).

Discovery Channel- Fearless Planet- Grand Canyon (filming in October 07 for release in December 07.

Barry S. Kues, Professor

Public service

Half hour on-air interview on the Geology Museum and paleontology in New Mexico, KKIM radio, November 20.

Identified geological specimens and answered geological questions for the public.

Grant A. Meyer, Associate Professor

Public service

Guest lecturer in E&PS and ENVS classes, UNM-Gallup.

Answered miscellaneous inquiries on geological matters for the general public.

Leslie D. McFadden, Professor

Public service

Member, Coalition for Excellence in Science Education (CESE)
Responded to several requests for advice and assistance from the public concerning issues related to soils and geology.

Matthew Nyman, Assistant Professor/Lecturer

Public service

Public service activities are listed under professional activities since a portion of my work involves working with K-12 teachers.

Aurora Pun, Adjunct Assistant Professor

Attended Tucson Gem and Mineral Show, Tucson, Arizona, February 7-12, 2007.

Mousumi Roy, Associate Professor

Public service

Spoke to the Albuquerque Geological Society on ongoing work measuring rates of deformation in the Rio Grande Rift using GPS, June 2007
Participated in National Geographic Channel documentary "Naked Science" episode on the Rocky Mountains, Sept 2007

Jane Selverstone, Professor

Public service

Grand Awards Category Judge, Intel International Science and Engineering Fair, May 2007 Participated in Autism Day at the state legislature, January 2007

Timothy F. Wawrzyniec, Research Scientist

Dr. Wawrzyniec is currently serving as the co-editor for the Newsletter to the Structural Geology and Tectonics Division Newsletter of the Geological Society of America. He is also serving as an Associate Editor for Geosphere, a web-based scientific journal produced by the Geological Society of America.

A. GRADUATE PROGRAMS AND STUDENT SCHOLARSHIPS (Calendar Year 2007-2008)

SUMMARY OF THE GRADUATE PROGRAM

The total number of graduate students in the Department in Fall, 2007 was 48, a number that has not changed substantially over the past decade or so, since the Department agreed to make certain that each and every graduate student was provided a sustainable financial aid package for a realistic time period (e.g., two years for a M.S., student, and four years for a Ph.D., student with a M.S., degree). As of the Spring of 2008, again well 50% (30 of 48) of the graduate students were women, a continuation of a trend that began during the last decade. Also, about 50 percent of the graduate students are in the doctoral program. Data summarizing our graduate program are included in the Table 2 and other lists (i.e. scholarship and award recipients) included in this section. Notably, for Fall, 2008, the Department has 62 graduate students, 38 of whom are women, and 28 of whom are in the Ph.D., program.

The last several annual reports have emphasized that the Department of Earth and Planetary Sciences regards the education and training of graduate students as modern scientists as important and integral teaching and research functions. Through classroom, laboratory, and field experiences, graduate students acquire the mentoring, expertise, and skills required to become successful professional scientists in many employment opportunities, including industry, environmental and geological consulting companies, government organizations, and academia. Notably, the job opportunities in the broad realm of the geosciences are excellent and continue to grow (e.g., Geologist Salaries at Record Highs, 2008, geology.com; In the Geosciences, Business is Booming, 8 August, 2008, Science). Individualized teaching opportunities in a broad range of undergraduate level laboratory sections, and opportunities to present the results of their graduate research at professional earth science meetings and in numerous publications all further enhance interpersonal skills and abilities of graduate students to discuss their knowledge of and research in the geosciences in a range of settings and situations.

Considerable evidence shows that the graduate program continues to be quite strong. Again, during the 2007-2008 academic year, many of our students won prestigious national fellowships or research awards, from sources such as the Geological Society of America, American Association of Petroleum Geologists, and Sigma Xi. In addition, the Department again received a large number of applications to the Graduate Program (over 60), another measure of the quality of our program. At least the top half of these applicants have outstanding academic records, and ALL of them receive several competing offers from top Earth Science Departments elsewhere in the nation. Nevertheless, we continue to have good success attracting quality students to the Department, for Fall, 2008, some 60/50 percent of the applicants to whom we made TA or RA offers ultimately accepted and entered our program.

As might be expected from graduate students of this caliber, they have also succeeded in publishing numerous papers in many journals, some as senior authors and some in very prestigious journals in the earth sciences. They are also co-authors on numerous published abstracts. Such student co-authors are indicated by an asterisk in papers included in section III.

TABLE 1. Bachelor's, Master's and Doctoral Students Degrees, Fall, 2007-Spring, 2008.

Doctoral Student (2008)

Daniel O. Breecker Matthew F. Kirk Kate E. Zeigler

M.S. Students (2007)

Leah R. Johnson Euan C. Mitchell

M.S. Students (2008)

Ryan S. Crow

Bachelor of Science (2007)

Timothy A. Lite II Michael Petersen Peter Van Patten

Bachelor of Science (2008)

Brandon S. Dixon Mitchell R. Dunaway Alex Gibbs Melissa Noel Gill Susan Meyers Mark El Poindexter Eric L. Tegtmeier Lynda R. Walls

Bachelor of Science in Environmental Science (2007)

Mariel Tribby

Bachelor of Science in Environmental Science (2008)

Michael S. Cling Joshua J. Gallegos Patrick H. Higgins Doreen Jameson Stephen B. Teet

TABLE 2. Department of Earth and Planetary Sciences - Summary of Graduate Student Admissions, Fall 2007-2008.

			L L 2007 GI RADUATE AP				}	· ·	
APPLICA	APPLICANTS TOTAL		IITTED	% AD	MITTED	ACC	CEPTED		MITTED/ EPTED
42	MS	15	MS	36%	MS	6	MS	40%	MS
24	PHD	13	PHD	54%	PHD	7	PHD	54%	PHD
66	TOTAL	28	TOTAL	42%	TOTAL	13	TOTAL	46%	TOTAL
FEMALE A	APPLICANTS								
13	MS	9	MS	69%	MS	6	MS	67%	MS
17	PHD	8	PHD	47%	PHD	5	PHD	63%	PHD
30	TOTAL	17	TOTAL	57%	TOTAL	11	TOTAL	65%	TOTAL

			L L 2008 GI RADUATE AP				3			
APPLICANTS TOTAL ADM		IITTED	% AD	MITTED	ACC	CEPTED	% ADMITTED/ ACCEPTED			
29	M.S.	11	M.S.	40	M.S.	6	M.S.	55	M.S.	
27	Ph.D.	12	Ph.D.	44	Ph.D.	6	Ph.D.	50	Ph.D.	
56	TOTAL	23	TOTAL	41	TOTAL	15	TOTAL	65	65 TOTAL	
FEMA	LE APPLICAT	NTS								
16	M.S.	6	M.S.	38	M.S.	4	M.S.	67	M.S.	
12	Ph.D.	5	Ph.D.	42	Ph.D.	5	Ph.D.	100	Ph.D.	
28	TOTAL	11	TOTAL	39	TOTAL	9	TOTAL	82	TOTAL	

TABLE 3. Department of Earth and Planetary Sciences - Graduate Student Enrollment, Fall 2007-2008.

FALL 2007 GRADUATE STUDENTS								
FEMALE	M.S.	13						
MALE	M.S.	6						
FEMALE	PH.D		17					
MALE	Рн.D.		12					
		TOTAL	48					

SPRING 2008 GRADUATE STUDENTS								
FEMALE	M.S.		22					
MALE	M.S.		12					
FEMALE	Рн.D.		16					
MALE	Рн.D.		12					
		TOTAL	62					

Many Graduate and Undergraduate students were supported by scholarships, fellowships, and other awards during the 2007-2008 year in fact are mentioned in the UNM Foundation. During the 2007-08 year, the total value of fund awards was well over \$50,000.00). Many scholarships are derived from various funds that have been established for this purpose by alumni and other friends of the Department. The Department augments these awards with travel scholarships that partially offset the expenses of traveling to professional meetings (and often provides free use of vehicles to these meetings), and other scholarships supporting use of the analytical instruments and other research expenses. Many students, of course are also the recipients of funds from the University, as well as prestigious research awards fund organizations like the Geological Society of America. Recipients of these awards are listed below.

Graduate and Undergraduate Scholarships and Awards

Geology Alumni Fellowship Fund

Dan Breecker Justin Dodd Devin Gaugler Jack Grow Catrina Johnson Ara Kooser Anthony Salem Kirsten Sanders Mark Tyra Amy Williams	Ashley Edelman James Hulka Elizabeth Nichols Mel Strong Andy Yuhas	Eileen Embid John Hurley Elizabeth Premo Ben Swanson Stephanie Yurchyl
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Harry and Mabel Leonard Scholarship

Karen Balduini	Bruce Bergeson	Holly Buehler	Barbara Culp
Brandon Dixon	Alex Drue	Zachary Gallegos	Nicolas George
M. Noel Gill	Angelica Gurule	Andrew Jochems	Anna Keener
Alexandra Kirk	Caitlin LaChance	Renee Martinez	Ian Moore
Tessia Robbins	Roxane Skalski	James Tabinski	Glenn Tortalita
Antonio Truiillo	William Woodruff	Adam Zimmerman	

General Thomas Campbell Award

Jake Baggerman	Christopher Chavez	Gwendolen Cockrell	Calli Feerer
Zachary LaPointe	Melanie Locke	James McAdams	Noel Nix
Timotheus Noger	Alex Resovsky	Laura Van Alst	

James Drew Pfeiffer Memorial Award

Alexandra Kirk

Outstanding Student of the Year Award

Stuart A. Northrop Award (William Woodruff)
Sherman A. Wengerd Award (Nicolas George)
J.P. Fitzsimmons Award (Linda Dreeland)
V.C. Kelley, Oustanding Field Geologist (Melissa Noel Gill)
Roger Y. Anderson Award (Tessia Robbins)
Oustanding Environmental Science Graduate (Patrick Higgins)
New Mexico Geological Society, Lucille Pipkin Senior Scholarship (Linda Dreeland)

Other Graduate and Undergraduate Student Awards

New Mexico Geological Society, Lucille Pipken Book Scholarship

Zachary Gallegos

Levi Lementino

Stephen Soltero

Albuquerque Gem and Mineral Club Scholarship

William Woodruff

New Mexico Geological Society, Fall Field Conference Scholarship

Ian Moore

William Woodruff Kate Zeigler Linda Donohoo-Hurley

Ashley Edelman

Bachelor of Science Departmental Honors – Senior Thesis

Brandon S. Dixon, Spring, 2008 — "Precambrian Basement of the Defiance Uplift: Possible Correlation to the Uncompandere Quartzite and Influences of Basement Fabric on Later Tectonism." Advisor: Dr. Karl E. Karlstrom.

Joshua J. Gallegos, Spring, 2008 – "Geochemistry and Ecology of CO₂-Rich Bubbling Springs Along the Tijeras Fault". Advisor: Dr. Laura J. Crossey.

Patrick H. Higgins, summa cum laude, Spring, 2008 – "An Index of the Onset of the North American Monsoon Season in Central New Mexico." Advisor: Dr. David Gutzler.

Timothy A. Lite II, Fall, 2007 - "Aquifer Characterization of the Hanford 200 West Site, Washington." Advisor: Dr. Gary Weissmann.

Stephen B. Teet, cum laude, Spring, 2008 – "Understanding the Effects of ET on Shallow Groundwater Geochemistry: Baseline Data for the Middle Rio Grande of New Mexico." Advisor: Dr. Laura J. Crossey.

Eric L. Tegimeier, cum laude, Spring 2008 – "Origin of Breccias Near the Santa Fe Impact Structure: Tectonic, Impact, or a Bit of Both?" Advisor: Dr. Horton Newsom.

Graduate Student Scholarship and Awards

Outstanding Master of Science Student

Ryan S. Crow

Outstanding Doctor of Philosophy Student

Daniel O. Breecker

Albert M. Kudo Outstanding Teaching Assistant

Travis Naibert

Outstanding Beginning Teaching Assistant

Melissa Halick

Bethany Theiling

Jean-Luc Miossec Memorial Scholarship

Ben Swanson

Vincent C. Kelley Memorial Scholarship

Jana Berlin

Leah Roberts

Rodney C. Rhodes Memorial Scholarship

Ashley Edelman

Alexander and Geraldine Wanek Scholarship

Nicholas Engdahl Mel Strong Jack Grow

James Hulka

Elizabeth Nichols

Jerry Harbour Memorial Endowed Scholarship Fund

Caitlin Callahan

Justin Dodd

Sherman A. Wengerd Travelling Fellowship

Melissa Halick

Bethany Theiling

Graduate Degrees Awarded

The following students received M.S. and Ph.D. degrees in Earth and Planetary Sciences, Fall 2007 and Spring, 2008 (no summer degrees are listed). Thesis/dissertation titles and faculty advisors are also indicated.

Master of Science

Ryan S. Crow, Spring, 2008 - "History of Quaternary Volcanism and Lava Dams in Western Grand Canyon Based on Lidar Analysis, ⁴⁰Arf ²⁹Ar Dating, and Field Studies: Implications for Flow Stratigraphy, Timing of Volcanic Events, and Lava Dams." Advisor: Dr. Karl E. Karlstrom.

Leah R. Johnson, Fall 2007 - "A Speleothem Record of Tropical Climate Variability: Examining the Role of the Low Latitudes in Global Climate Dynamics." Advisor: Dr. Yemane Asmerom.

Euan C. Mitchell, Fall, 2008 - "Volatile Chemistry, and Nitrogen Sources and Fluxes, in Subduction Zones: Insights from the Izu-Bonin-Mariana Arc." Advisor: Dr. Tobias Fischer.

Doctor of Philosophy

Daniel O. Breecker, Spring, 2008 – "Investigating Desert Soil Processes Using the Stable Isotope Composition of Soil Carbon Dioxide." Advisor: Dr. Zachary Sharp.

Matthew F. Kirk, Spring, 2008 -- "Experimental Analysis of Arsenic Mobility in Iron- and Sulfate-Reducing Environments," Advisor; Dr. Laura J. Crossey.

Kate E. Zeigler, Spring, 2008 — "Paleomagnetism and Magnetostratigraphy of the Upper Triassic Chinle Group, Chama Basin, North-Central New Mexico." Advisor: Dr. John W. Geissman.

Outcomes

Study in the Department's graduate programs prepares students for a wide variety of careers in the geosciences and related fields. Below are listed the positions obtained by Ph.D. and M.S. students who graduated in 2007-2008:

Ph.D.

- Daniel O. Breecker -- NSF Earth Sciences Postdoctoral Fellowship 2008-2009, Department of Earth and Planetary Sciences. Assistant Professorship UT Austin (2009).
- Matthew F. Kirk Accepted a postdoctoral research assistant position with collaborators at Amherst College and the University of Massachusetts studying microbial and geochemical aspects of methane production in sedimentary basins.
- Kate E. Zeigler Contract Geologist, New Mexico Bureau of Geolog and Mineral Resources, Socorro, New Mexico.

M.S.

- Ryan S. Crow In Ph.D. Program in the Department of Earth and Planetary Sciences, University
 of New Mexico.
- Leah R. Johnson In Ph.D. Program in the Department of Earth and Planetary Sciences, University of New Mexico.
- Euan C. Mitchell In Ph.D. Program in the Department of Earth and Planetary Sciences, University of New Mexico.

A. DONATIONS TO DEPARTMENT (Calendar Year 2007-2008)

DONATIONS TO DEPARTMENT

July 1, 2007 to June 30, 2008 Fiscal Year

Geology Chair Account

Cabot Oil and Gas Corporation
Los Alamos High School
RBC Dain Rauscher
Gorham Charitable Foundation
Leon Silver
John D. Bloch
Richard Ford
James Lee Martin
Anne Celeste Tillery
Theodore Bornhorst
William L. Chenoweth
Jane Pedrick Dawson
Robin E. Bloomfield
John M. Lucas

Duane M. Moore
Charles Mike Hulgren
Nancy L. Robinson
James W. Caylor
Crista S. Carroll
Harvey R. DuChene
Joyce Whelchel
Stephen Ralph Maynard
Rodney Charles Ewing
Teresa Marie Royek
Elaine S. Brouillard
Leslie D. McFadden
David L. Homan
John G. Kuhn
Birgit Krause Landin

Frank Pazzaglia
Rima Petrossian
Michael L. Pierce
John Lee Berkley
Dawn Marie Martin-Miller
Brian L. Salem
Paul V. Burger
Carol Jane Treadwell-Steitz
Stephen F. Elston
Jonn Stephen Allexan
James M. Bisbee
Jennifer E. Edmunson
Richard H. Chin
Lenore R. Pardee

Harding Pegmatite Mine

Field Institute of Taos Los Alamos High School Chamisa School PTO University of North California Western New Mexico Geology Club Stephen Harper Bruce W. Morrissey Elizabeth Pittman William W. Anderson James A. Barton John H. Burris Pam K. Caudron Meredith S. King Norman Ray Greiner William F. Hickey Hilary H. Criollo John Burris Charles A. Gifford, Jr. Morgan, Jr. Deborah Wojtowics Dean Allum Duane M. Moore Susan B. Buckey

Sherman & Florence Wengerd Traveling Fellowship

Henry F. Pomeroy, Jr. DeWayne A. Miller, Jr.

Douglas Brookins Memorial Scholarship

Jeffrey Bernard West

Geology Museum and Collections

Tucson Gem and Mineral Society, Inc. Anonymous

APPENDIX I MUSEUM AND HARDING PEGMATITE LOG 2007-2008

	Geology Museum Register									
	JULY 1, 2007 – JUNE 30, 2008									
DATE	ORGANIZATION	GRADE	# OF STUDENTS	#OF ADULTS						
7/19/07	VISTA MONTE CIETO SENIORS	ADULTS		12						
7/19/07	MONTE VISTA SUMMER	1 ST 5 TH	30	3						
7/24/07	UPPERBOUND & EMBREY-RIDDLE	9 [™] −12 [™]	30	6						
JULY, 20	007 TOTAL		60	21						
	NO VISITS FOR THE MONTH OF AUGUST									
AUGUST	, 2007 TOTAL		0	0						
9/18/07	Oñate elem.	20	6							
SEPTEM	BER 2007 TOTAL		20	6						
10/03/07	MONTE VISTA ELEM.	1 ST - 2 ND	6	1						
10/10/07	MONTE VISTA ELEM.	1 ST -2 ND	6	1						
10/16/07	KIT CARSON ELEM.	4 TH	60	20						
10/17/07	MONTE VISTA ELEM.	$1^{ST}-2^{ND}$	6	i						
10/18/07	LAMERCED ELEM.	5 [™]	90	15						
10/19/07	MONTE VISTA ELEM.	1 ST -2 ND	22	8						
10/23/07	MOUNTAIN VIEW ELEM.	$1^{ST}-2^{ND}$	125	13						
10/23/07	MOUNTAN VIEW MID.	6 [™]	115	10						
10/23/07	MOUNTAIN VIEW ELEM	$1^{ST}-2^{ND}$	6	1						
10/26/07	BERNALILLO MID. SCH.	7 ^{тн}	50	10						
10/31/07	MONTE VISTA ELEM.	1 ST -2 ND	6	1						
остовен	R, 2007 TOTAL		492	81						
11/16/07	GIRLS SCOUTS OF ALBUQ.		6	4						
11/19/07	BOSQUE MID. SCH.	8 [™]	17	2						
11/20/07	MANZANO MESA ELEM.	4 TH	40	6						
11/28/07	BOSQUE MID. SCH.	8 TH	16	2						
11/30/07	SAN ANTONIO ELEM.	3 RD	10							
NOVEMBE	er, 2007 total		89	17						
12/03/07	LOS LUNAS HIGH	9 [™] 12 [™]	22	3						
12/04/07	BOSQUE MID. SCH.	8 TH	17	2						
12/05/07	LOS LUNAS HIGH SCH.	$9^{TH} - 12^{TH}$	22	3						
12/05/07	BOSQUE MID. SCH.	8 TH	17	2						
12/06/07	BOSQUE MID. SCH.	8 TH *	<u>15</u>	2						
DECEMBE	r, 2007 total		93	12						

	Geology Museum Register JULY 1, 2007—JUNE 30, 2008								
DATE	ORGANIZATION	GRADE	#OFSTUDENTS	#OF ADULTS					
1/25/08	UNM NEWMAN CENTER	ADULTS	10	2					
1/28/08	HOPE CHRISTIAN SCH.	5 ^{тн}	. 24	10					
JANUAR	ry, 2008 total		34	12					
2/15/08	ALBUQ. COMM. COOP.	3 RD 4 TH	25	5					
2/22/08	TRINIDAD MID. SCH.	TRINIDAD MID. SCH. $6^{TH} - 8^{TH}$ 40 5							
2/25/09	AMY BIEHL HIGH SCH. 9 TH -12 TH 80 2								
2/26/08	ROCK HOUND CLUB	ADULTS		10					
FEBRUA	ry, 2008 total		145	- 22					
3/17/08	DOUBLE EAGLE ELEM.	10							
3/19/08	LALUZ DEL MONTE	7 TH	25	5					
MARCH,	2008 TOTAL		75.	15					
4/17/08	EDWARD GONZALES ELEM.	3 RD - 4 TH	60	8					
4/18/08	UNM GERMAN 204	ADULTS	8	1					
4/25/08	PERALTA ELEM.	3 RD	60	10					
APRIL, 2	008 total		128	19					
5/02/08	SANTO DOMINGO ELEM.	3 RD	20	3					
5/09/08	DEVARGAS MID. SCH.	6 ^{тн} — 8 ^{тн}	14	3					
5/20/08	VENTURA RANCH	2 ND	48	10					
5/20/08	ARMIJO ELEM.	3 RD - 4 TH	20	3					
MAY, 200)8 TOTAL		102	19					
6/18/08	BUILDING BRIDGES	3 RD – 6 TH	40	5					
6/24/08	S.R. MARMOM ELEM.	3 RD	40	10					
JUNE, 20	08 TOTAL		80	15					
GRAND TO	OTAL		1,318	239					

UNIVERSITY OF NEW MEXICO

DEPARTMENT OF EARTH AND PLANETARY SCIENCES

HARDING PEGMATITE MINE

Visitors - 2007 - 2008

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UNIVERSITY OF NEW MEXICO

DEPARTMENT OF EARTH AND PLANETARY SCIENCES

HARDING PEGMATITE MINE

Visitors - 2007 - 2008

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UNIVERSITY OF NEW MEXICO DEPARTMENT OF EARTH AND PLANETARY SCIENCES HARDING PEGMATITE MINE

	HARDING PEGMATITE MINE								
DATE	NUMBER OF : VISITORS	2007-2008 COLLEGE//UNIVERSITEW/OTHER SCHOOLS							
7/02/07	1	UNIVERSITY OF OKLAHOMA, SCHOOL OF GEOLOGY, NORMAN, OKLAHOMA							
7/06/07	19	FIELD INSTITUTE OF TAOS, TAOS, NEW MEXICO							
7/10/07	1	UNIVERSITY OF OKLAHOMA, SCHOOL OF GEOLOGY, NORMAN, OKAHOMA							
7/10/07	2	UNIVERSITY OF NEW MEXICO, ALBUQUERQUE, NEW MEXICO							
8/25/07	22	FORT LEWIS COLLEGE, DURANGO, COLORADO							
9/04/07	6	MAINE'S PASSE, EL PRADO, NEW MEXICO							
9/20/07	16	SAN JUAN COLLEGE, (MINERALOGY CLASS), FARMINGTON, NEW MEXICO							
9/22/07	19	WESTERN NEW MEXICO, (GEOLOGY CLUB), SILVER CITY, NEW MEXICO							
10/04/07	13	UNIVERSITY OF NEW MEXICO, LOS ALAMOS BRANCH, (E&PS 105L) NEW MEXICO							
10/15/07	49	CHAMISA ELEMENTARY SCHOOL, LOS ALAMOS, NEW MEXICO							
10/25/08	8	UNIVERSITY OF NEW MEXICO, TAOS BRANCH, (BLUE PLANET), NEW MEXICO							
10/27/07	10	WESTERN TEXAS A&M UNIVERSITY, (ROCKS, MINERALS CLASS), CANYON TEXAS							
10/30/07	8	LOS ALAMOS HIGH SCHOOL (GEOLOGY CLASS), NEW MEXICO							
10/06/07	15	SAN JUAN COLLEGE (MINERALOGY CLASS) FARMINGTON, NEW MEXICO							
11/01/07	7	TAOS SKI VALLEY, TAOS, NEW MEXICO							
11/06/07	21	LOS ALAMOS HIGH SCHOOL, (GEOLOGY CLUB), NEW MEXICO							
11/07/07	4	FARMINGTON HIGH SCHOOL, FARMINGTON, NEW MEXICO							
11/18/07	6	UNIVERSITY OF NEW MEXICO, TAOS BRANCH, (NATURAL SCIENCES CLASS), NEW MEXICO							
2/25/08	5	COLORADO COLLEGE – GY313 UNDERGRADUATE METAM. PETROLOGY CLASS, COLORADO SPRINGS, CO.							
3/19/08	10	UNIVERSITY OF IOWA, GEOSCIENCE DEPT., IOWA CITY, IOWA							
3/20/09	7	PRINCETON UNIVERSITY, DEPT., OF GEOSCIENCES, PRINCETON, NEW JERSEY							
4/15/08	15	NEW MEXICO HIGHLANDS UNIVERSITY, LAS VEGAS, NEW MEXICO							
5/24/08	21	UNIVERSITY OF SOUTH ALABAMA, ALABAMA							
6/03/08	30	NORTH CAROLINA, GEOLOGY FIELD COURSE, GREENVALLE, NORTH CAROLINA							
6/05/08	20	UNIVERSITY OF FLORIDA, DEPT., OF GEOLOGY, GAINESVILLE, FLORIDA							
6/16/08	8	UNIVERSITY OF NEW MEXICO, NATURAL SCIENCES 101, ALBUQUERQUE, NEW MEXICO							
6/20/08	8	UNIVERSITY OF NORTH CAROLINA, GEOLOGY FIELD COURSE, NORTH CAROLINA							
6/26/07	3	TWO PACKS ASSOCIATION, WHITELAND, INDIANA							
2007 <u>-2008</u> 17	16 - 18 54 - 18 ft	a Courter // University // Other Visitors House							

ANNUAL REPORT

Department of Economics University of New Mexico

July 1, 2007 - June 30, 2008

Robert P. Berrens Chair

THE ANNUAL REPORT OF THE DEPARTMENT OF ECONOMICS

July 1, 2007 - June 30, 2008

Robert P. Berrens, Chair

1. Significant Developments During the 2007-08 Academic Year

The Department was pleased to hire a new tenure-track, Assistant Professor in April, 2008; T. Scott Findley (PhD, Colorado State University), specializes in Public Finance and joins the department as of the Fall 2008 semester.

In January, 2008, Professor Robert O.Valdez joined the faculty as a tenured full professor, under a secondary appointment (0.0 FTE); His primary appointment is in the Department of Family and Community Medicine, and he also serves as the Executive Director of the Robert Woods Johnson Foundation Center for Health Policy

Associate Professor Kate Krause won the 2008 UNM Outstanding Teacher Award. Kate is a very deserving winner.

Professor Brookshire was on sabbatical in Mexico for Fall, 2007 and Spring, 2008 semesters, where his work included completion of two new book proposals.

In April 2008, our Department Administrator of the last 3.5 years, Angela Kammen, left the Department to take a staff position in the School of Public Administration. Michelle Durham was hired in May, 2008 as our new Department Administrator.

A new Academic Advisor, Cate Hart joined us for the beginning of Fall 2007 semester and worked in the Department until the end of Spring 2008 semester, when she decided to return back to Oklahoma. Shoshanna Handel was hired in Summer 2008 to take over as the new Academic Advisor.

In April, 2008 Robert Berrens was selected by Dean Brenda Claiborne as the new Chair of the Department of Economics, beginning a four year term in July 2008. Former Department Chair, Professor Phil Ganderton, will be serving as the Interim Associate Dean for the College of Arts and Sciences in 2008-2009, and well as the Director of the BAMD program. Other Economics faculty members who were appointed to administrative positions include Professor Richard Santos serving as Chair of Spanish and Portuguese (2008-2009), and Professor Christine Sauer serving as the Director of the International Studies Institute (three-year term).

In April, 2008, lead by the Nepal Study Center (NSC) and Professor Alok Bohara, the Department helped host a contingent from Katmandu University (KU). The visit helped extend efforts on creating a memorandum of understanding outlining potential research and learning linkages and collaborations between UNM and KU.

In May, 2008, the Department passed a new Strategic Plan (on file with the College of Arts and Sciences), in response to a university-wide initiative. The Department also began implementing a new Graduate Handbook in 2007, reflecting several changes in graduate exams.

For 2007-2008, the Department of Economics continued to sustain the relatively high levels of both total student credit hours (SCH), and dollar-weighted student credit hours (weighted SCH) seen over the last few years, and relative to the early 2000's (e.g., more than five years ago). Using numbers from the Provost's office ("School-College Forecast Tool A&S) for 2007-2008 (all terms): Unrestricted SCH (graduate + lower division + upper division): =13,310=(967+8,952+3,391). For SCH in the five year period, from 2003-2004 to 2007-2008, the net period growth was 5.66%, with a compound annual growth rate of 1.39%. Weighted SCH=\$2.811.909.54=(967*\$637.15+8.952*\$133.77+3.391*\$294.39). For weighted SCH in the five-year period, from 2003-2004 to 2007-2008, the net period growth was 11.16%, with a compound annual growth rate of 2.68%. To summarize, it is estimated that the Department of Economics generated more than \$2.8 million in state formula funding for the courses it taught in 2007-2008 (which does not include tuition and fees generated). For the period from 03/04 to 07/08, our total SCH and dollar-weighted SCH grew, by 1.39% and 2.68% annually (compound annual growth rate). While there is some year-to-year variation, these figures are consistent with increasing trends in the number of majors and the number of graduate students in the department (see table below).

2. Significant Plans and Recommendations for the Near Future

Assistant Professors Jennifer Thacher will be completing the Tenure and Promotion review during the 2007-2008 academic year.

The department is one of several participating in a potential faculty recruitment (with appointment in a College of Arts and Sciences department) associated with the Center for Alcoholism, Substance Abuse and Addictions (CASAA). Assistant Professor Kristine Grimsrud is serving as the department representative on the recruiting committee.

The department continues with the Success Initiative including a Success Economics 106 class taught by Dr. Kate Krause, with 9 associated laboratory/recitation sessions to be taught by 3 graduate assistants, 2 of which are funded under the Success program. Dr. Melissa Binder will continue to teach the Success Economics 105 course, with similar student training and support.

The department is initiating efforts on Outcomes Assessment under the leadership of Associate Professor Binder (Undergraduate Director) and Professor Chermak (Graduate Director)

The department continues to increase our connections and engagement with the RWJ Center for Health Policy. For 2008-2009, we will have 6 PhD Doctoral Fellows, and 1 Dissertation Fellow in our PhD program receiving support from the Center. In addition, three faculty members (Professor Alok Bohara, Associate Professor Kate Krause, and Assistant Professor Matias Fontenla) have had research proposals funded by the Center (all with additional research assistant [RA] support for graduate students. We will continue to develop our relationships with this Center and its innovative programs.

Economics Faculty will continue to produce new knowledge and support graduate students through successful research grant application and awards. 10 graduate students, excluding those [8] supported by the RWJF Center, will be supported by funded research in Fall 2008, with a similar number expected for Spring 2009. The department will continue to host two different centers, the Nepal Study Center (NSC) [Professor Alok Bohara, Director] and Science Impact Laboratory for Policy and Economics (SILPE) [Professor David Brookshire, Director], which both have current grant funded research for 2008-2009. Multi-year grant activities include, a set of long-running (9 years) joint venture research agreement with the USDA's Forest Service's Rocky Mountain Research Station (Professor Berrens and Assistant Professor Thacher), and a significant new grant with the American Water Works Association (Assistant Professor Thacher and Professor Chermak)

3. Publications

Dr. Robert Berrens:

Prante, T., J. Thacher and R. Berrens. 2007. "Evaluating Coasean Bargaining Experiments with Meta-Analysis." *Economics Bulletin*, 3(68):1-13.

Prante, T., J. Thacher, D. McCollum and R. Berrens. 2007. "Building Social Capital in Forest Communities: Revealed Preference Analysis of New Mexico's Collaborative Forest Restoration Program." *Natural Resources Journal*, 47(4): 50 pages.

Li, H., T. Grijalva, and R. Berrens. 2007. "Economic Growth and Environmental Quality: A Meta-analysis of Environmental Kuznets Curve Studies." *Economics Bulletin* 17(5):1-12,

Mozumder, P., and R. Berrens. 2007. "Inorganic Fertilizer Use and Biodiversity Risk: An Empirical Investigation." *Ecological Economics*, 62:538-543.

Mozumder, P., C.M. Starbuck*, R. Berrens, and S. Alexander. 2007. "Lease and Fee Hunting on Private Lands in the U.S.: A Review and Synthesis of Economic and Legal Issues." *Human Dimensions of Wildlife*, 12(1):1-14.

Nepal, M., A. Bohara and R. Berrens. 2007. "Investigating the Impact of Social Networks on Household Forest Conservation in Rural Nepal." *Land Economics*, 83(2): 174-191.

*Mozumder, P., and R. Berrens. 2007. "Investigating Hypothetical Bias: Induced Value Tests of the Referendum Voting Mechanism with Uncertainty." *Applied Economics Letters*, 14(10):705-709.

Dr. Melissa Binder:

Binder, Melissa. 2007. Providing Leadership for the Livable Economy. Energy Conservation Division, New Mexico Environment Department. (Report.)

Binder, Melissa. 2007. Student Achievement in New Mexico Charter Schools. Prepared for the New Mexico Coalition for Charter Schools, Albuquerque, N.M. (Report.)

Binder, Melissa. 2007. "The Cost of Providing Universal Secondary Education in Developing Countries." In Cohen, Joel E., David E. Bloom, and Martin Malin eds. Educating All Children: A Global Challenge. (Cambridge, MA: The MIT Press.)

Dr. Alok Bohara:

Mitchell, Neil, Alok K. Bohara, Mani Nepal, Nejem Raheem, "The Contribution of the Agent of Human Rights Violations: A Cross-Country Analysis" *Policy Studies Journal*, Volume 36, No. 1, February 2008, pp. 1-18, (July, 2007).

Nepal, M., A. Bohara and R. Berrens. 2007. "Investigating the Impact of Social Networks on Household Forest Conservation in Rural Nepal." *Land Economics*, 83(2): 174-191.

Talberth, John and Alok K. Bohara. "Economic Openness and Green GDP" *Ecological Economics*, Volume 64, Issue 2, 15 December 2007, Pages 433-44.

Dr. David Brookshire:

Re-Published in The Stated Preference Approach to Environmental Valuation, Volume I, Foundations, Initial Development, Statistical Approaches, Editor, Richard Carson:

- i. "The Valuation of Aesthetic Preferences, Journal of Environmental Economics and Management, Vol.. 3, 1976, (with B. Ives and W. Schulze).
- ii. "Valuing Public goods: A Comparison of Survey and Hedonic Approaches,", American Economic Review, 72, 1982, (with M. Thayer, W. Schulze, and R. d'Arge).
- iii. "Valuing Environmental Commodities: Some Recent Experiments," Land Economics, Vol. 57, 1981 (with R. d'Arge and W. Schulze).

Dr. Don Coes:

"Income Distribution in Brazil and China: Evaluating Absolute and Relative Economic Growth", *Quarterly Review of Economics and Finance*, Vol. 48, No. 1-2.

Dr. Matias Fontenla

Noriega, Antonio and Matias Fontenla (2007), Infraestructura Publica y Crecimiento Economico en Mexico, *El Trimestre Economico*, vol. LXXIV (4), 296, October, pp. 885-900.

Fontenla, Matias and Fidel Gonzalez, (2007) "Self-fulfilling and Fundamental Banking Crises: A Multinomial Logit Approach" *Economics Bulletin*, Vol. 6, No. 17 pp. 1-11.

Dr. Kristine Grimsrud:

G. Aldrich, K. Grimsrud, J. Thacher, and M. Kotchen (2007). Relating Environmental Attitudes and Contingent Values: How Robust are Methods for Identifying Preference Heterogeneity? *Environmental and Resource Economics* 37(4): 757-775.

Dr. Jennifer Thacher:

- *Prante, T., J. Thacher and R. Berrens. 2007. "Evaluating Coasean Bargaining Experiments with Meta-Analysis." *Economics Bulletin*, 3(68):1-13.
- *Prante, T., J. Thacher, D. McCollum and R. Berrens. 2007. "Building Social Capital in Forest Communities: Revealed Preference Analysis of New Mexico's Collaborative Forest Restoration Program." *Natural Resources Journal*, 47(4): 50 pages.
- E. Morey, J. Thacher, E. Craighead (2007). Patient Preferences for Depression Treatment Programs and Willingness To Pay for Treatment. *Journal of Mental Health Policy and Economics* 10(2): 73-85. (Survey)
- G. Aldrich, K. Grimsrud, J. Thacher, and M. Kotchen (2007). Relating Environmental Attitudes and Contingent Values: How Robust are Methods for Identifying Preference Heterogeneity? *Environmental and Resource Economics* 37(4): 757-775.
- M. Weber, V. Tidwell, and J. Thacher. Interactive Physical and Economic Model for Exploring Riparian Restoration Options: Application to the Middle Rio Grande. Sandia Report SAND2008-0250. Printed January 2008. Sandia National Laboratories, Albuquerque, NM 87155 and Livermore, CA, 94550.

4. Outside Professional Activities

Dr. Robert Berrens:

Served as Associate Editor, Water Resources Research.

"Investing in Sustainability." Invited Seminar (R. Berrens), Michigan Technological University, Houghton, MI.; April, 2008.

*Prante, T., M. Jones, J. Little, M. McKee and R. Berrens. "Only You Can Prevent Wildfires? The Effectiveness of Policy to Induce Risk Mitigating Expenditures" "Western Forest Economists 43rd Annual Meeting, May 5-7, 2008 Welches OR. (Presented by Prante).

Jones, M., M. McKee, J. Little, T. Prante* and R. Berrens. "Neighborhood Externalities and Private Averting Behavior for Forest Fire Risk." Southern Economic Association Annual Meetings, New Orleans, LA Nov., 19-21, 2007 (Presented by Jones).

Mozumder, P., R. Helton*, and R. Berrens. "Provision of a Wildfire Risk Map: Informing Residents in the Wildland Urban Interface." Southern Economic Association Annual Meetings, New Orleans, LA Nov., 19-21, 2007 (Presented by Mozumder).

Shepherd, C., K. Grimsrud, and R. Berrens. ADeterminants of National Fire Plan Fuel Treatment Expenditures: A Revealed Preference Analysis for Northern New Mexico." Human Dimensions of Wildland Fire Conference (International Association of Wildland Fire), Fort Collins, CO October 23-25, 2007 (presented by Shepherd).

Dr. Melissa Binder:

Beyond Primary: Making the Case for Universal Secondary Education." Council on Foreign Relations. Washington, DC. December 2007. (Invited.)

"Hispanic Students and the NM Lottery Scholarship." Board of Hispanic Caucus Chairs. Santa Fe, NM. November 2007. (Invited Presentation.)

Dr. Alok Bohara:

Served as editor. Himalayan Journal of Development and Democracy (HJDD), and Liberal Democracy Nepal Bulletin (LDNB)

Coordinated and helped organize the Second Annual Himalayan Policy Research Conference (35thSouth Asian Conference at the U. of Wisconsin), Nepal Study Center, University of New Mexico, Madison, October 19, 2007.

Member of the editorial board, Proceedings and Paper Abstracts of the First Annual Himalayan Policy Research Conference (36th South Asian Conference at the U. of Wisconsin), Nepal Study Center, University of New Mexico Madison, October 11, 2007

Dr. David Brookshire:

"Ecosystem Valuation", Illinois Nature Conservancy Economics Symposium, 50th Anniversary Event, Chicago, Illinois 10/2007.

"Integrated Science, Modeling, and Ecological Valuation for Decision-making in the Upper San Pedro Basin, AZ and Middle Rio Grande, NM" USGS and other agency conference on <u>Valuing Ecosystem Services for Decision Making: Developing a Research Agenda</u>, Denver Co, 10/2007, (D. Brookshire, D. Goodrich and J. Calhoun)

Dr. Janie Chermak:

"Market Power, Price Volatility, and Market Mechanisms in Water Markets Under Prior Appropriations," with R.H. Patrick, presented at the American Water Resources Association Annual Conference: Albuquerque, NM: October 12-15, 2007.

"Interdisciplinary Water Resource Modeling: When Economics and Hydrology Interact," with V.C. Tidwell, D.S. Brookshire, L. Malczynski J. Thacher, K. Grimsrud, J. Roach, and J. Hansen, presented at the American Water Resources Association Annual Conference: The American Water Resources Association Annual Conference: Albuquerque, NM: October 12-15, 2007.

Organized an AERE session at the annual AEA meetings, January 2008. "Extensions and New Applications of the Hotelling Model.

Dr. Matias Fontenla:

"All Banking Crises Are Not Created Equal," Latin American Econometric Society, Bogota, October 2007.

"Liquidity Provision and Banking Crises with Heterogeneous Agents," Society of Economic Dynamics, Prague, 2007.

"Capital Flows and the Financial System." Southwestern Social Science Association meetings, 2007.

Dr. Kristine Grimsrud:

Chair, session at Southwestern Economic Association Meeting, 2007. "Interdisciplinary Water Resource Modeling: When Economics and Hydrology Interact," with J. Chermak, V.C. Tidwell, D.S. Brookshire, L. Malczynski J. Thacher, J. Roach, and J. Hansen, presented at the American Water Resources Association Annual Conference: The American Water Resources Association Annual Conference: Albuquerque, NM: October 12-15, 2007.

Dr. Richard Santos:

Served on Editorial Board, Review of Higher Education.

"Understanding and Addressing the Obesity Epidemic in Latino Communities." Chaired and organized Panel discussion, Siglo XXI Conference, Inter-University Program for Latino Research, Austin Texas, 2007.

Dr. Christine Sauer:

"When and Why Seigniorage Changes for New Members in the European Union." Western Economic Association International Conference, Seattle, June 29 – July 3, 2007.

Discussant, Western Economic Association International Conference, Seattle, June/July 2007.

Co-organizer of the first UNM Summer School at Schloss Dyck in Germany (July 6 to August 1, 2008): program design (curriculum, guest lectures, local excursions, field trips, etc.), advertising, student recruitment, pre-departure orientation sessions, development of a new course "Germany and the EU: History and Current Issues" (Econ/Pols 478).

Dr. Jennifer Thacher:

- D. Brookshire, A. Brand, J. Thacher*, M.Dixon, K. Benedict, S. Stewart, M. McIntosh, J. Stromberg, D. Goodrich, C. Broadbent, K. Lansey, and G. Izon. Using Survey Methods to Value the Impact of Changes in Water Level: the San Pedro Riparian Natural Conservation Area. Invited lecture for Community and Regional Planning graduate course in Natural Resources Planning. April 8, 2008. University of New Mexico, Albuquerque, NM.
- Binder, M., J. Chermak, K. Krause, and J. Thacher*. Faculty Compensation and Preferences: Can Differences in Job Preferences Help Explain Why Men and Women are Paid Differently? CSWEP session on Education and Occupational Choice, American Economic Association. New Orleans, LA. January 4, 2008.
- Brookshire, A. Brand, J. Thacher*, M.Dixon, K. Benedict, S. Stewart, M. McIntosh, J. Stromberg, D. Goodrich, C. Broadbent, K. Lansey, and G. Izon. Using Survey Methods to Value the Impact of Changes in Water Level: the San Pedro Riparian Natural Conservation Area. Annual Fall UNM Water Forum. October 5, 2007. University of New Mexico, Albuquerque, NM.
- "Interdisciplinary Water Resource Modeling: When Economics and Hydrology Interact," with J. Chermak, V.C. Tidwell, D.S. Brookshire, L. Malczynski J. Thacher, K. Grimsrud, J. Roach, and J. Hansen, presented at the American Water Resources Association Annual Conference: The American Water Resources Association Annual Conference: Albuquerque, NM: October 12-15, 2007.
- D. Knowler*, T. Sawatsky, J. Thacher. Assessing Heterogeneity in the Social Capital Characteristics of Developing Country Communities: A Case Study from Baja California Sur, Mexico. Canadian Association for Latin America Caribbean Study Congress Vancouver, British Columbia. June 6, 2008.
- D. Knowler, T. Sawatsky, J. Thacher*. The Influence of Social Capital on Nature-Based Tourism Development in Baja, Mexico: A Latent-Class Analysis. Department of Economics, University of New Mexico, May 2, 2008.

5. Research Grants and Contracts Funded

The department received the following grants to fund faculty and graduate research during this academic year. Total of \$1,767,151.89

US Forest Service

"Attitudes, Beliefs, and Values towards National Forests and National Forest Management" Berrens, R., Thacher, J. \$58,301.04
July 2007 – June 2008
Year 3 Funding - continued from Year 2

US Forest Service

"A Continuing Research into Understanding Behavioral and Economic Responses to Forest Restoration Programs in the Southwest"
Berrens, R, Thacher, J.
\$60,171.78
July 2007 – June 2008
Year 2 Funding

US Forest Service

"Economic Analyses in Support of National Forest Planning" Berrens, R., Thacher, J. \$43,795.97 July 2007 – June 2008 Year 3 Funding

SAHRA

"Sustainability of Water Resources in Semi-Arid Regions" Brookshire, D., Litvak, M. \$556,771.13 July 2007 – June 2008 10 Year Project, is Funded Each Year 2009 will be Year 10 of funding

USGS - SILPE

"Science Impact Laboratory for Policy & Economics (Category 1 Center/Institute)" Brookshire, D. \$109,473.66 July 2007 – June 2008 Year 4 Funding

EPA-Birds

"Integrated Modeling and Ecological Valuation"

Brookshire, D., Thacher, J.

\$241,742.69

July 2007 - June 2008

Year 4 Funding

Sandia National Labs - MIMBRES

"Decision Support Modeling to Aid in Design of Water Banks for New Mexico"

Brookshire, D.

\$15,379.62

July 2007 - June 2008

Year 2 Funding

US Department of Agriculture - Weeds

"Strategic Behavior, Informational Asymmetries, and Spatial Variations in Invasive Species Management on Ranching Lands: An Evaluation of Incentives for Russian Knapweed and Yellow Starthistle"

Chermak, J., Thacher, J., Grimsrud, K., & Krause, K.

\$147,718.80

July 2007 - June 2008

Year 2 Funding

US Department of Agriculture - Reducing Methane

"Reducing Methane and CO2 From Natural Gas Industry Activity"

Chermak, J.

\$4,320.00

July 2007 - June 2008

Year 2 Funding

US Department of Agriculture - Black Canyon

"Valuation of Riparian, and Aquatic Resources, Black Canyon of the Gunnison National Park"

Chermak, J. \$54,924.00

September 2007 - June 2008

Year 1 Funding

US Department of Agriculture - Drought

Sub-Contract with University of Nebraska

"Drought Risk, Impact, and Mitigation Information System"

Chermak, J.

\$49,846.00

July 2007 - June 2008

Year 2 Funding

National Science Foundation

"Public Welfare Values of Acequia Irrigation" Krause, C., Nejem Raheem – Doctoral Dissertation \$9,611.94 July 2007-August 2007

MDRC

"A demonstration of Performance Based Scholarship" Krause, C., Binder, M. \$37,500.00 April 2008-July 2008

Water Resources Research Institute (WRRI) — New Mexico State University "Predicting Land Use Change and its Effect on Nonpoint Source Pollution" Thacher, J. \$11,801.19
April 2008-July 2008

American Water Works Association

"Setting Water Utility Investment Priorities: Assessing Customer Preferences and Willingness to Pay"
Thacher, J.
\$352,149.00
January 2008-July 2008

6. Student Information

Bachelor of Arts Degrees Conferred

Bachelor of Arts degrees conferred in 2007-2008 academic year:

Salvador Alfaro Ayala

Tyler M. Ash

Mark A. Baca

Julie E. Ball

Matthew T. Barnes

Marc J. Benelli

Aaron B Bernabe

Margaret S. Brunette

Brian G. Buffington

Kyle J. Burns

Stephanie C. Chu

Zhenzheng Ding

Johnny L. Flores

Gesere F. Furneri

David O. Gay

Chester D. Gore

Robert J. Grimes

Kathleen M. Jefferson

Jessie L. Keefe

Hyunji Kim

Emily J. Lappin

Gregory J. Levee

Xiaoyang Li

Sarah E. Logan

Troy W. Lowe

Daniel F. Marquez

Michael S. McCool

Carrie A. McCulloch

Gregory T. McCullough

Michael F. McNeil

Eugene L. Mitchem

Kevin A. Morrow

Catherine M. Nemeth

Sang Hyup Park

Daniel R. Pavlakovich

Garth A. Reid

John L. Riordan

Steven M. Saavedra

Ross S. Seeger

Lindsey G. Sheffield

Margaret A. Stamp Masson H. Suliman April D. Thompson Michael A. Tideman Maricela I. Trujillo Michael J. Vigil Robert H. Wilson

Master of Arts Degrees Conferred

Masters of Arts degrees conferred in 2007-2008 academic year:

Steven J. Archambault Joe V. Church Rebecca L. Gutierrez Hari Bahadur Rishma M. Khimji Christopher R. Kiolbasa Alejandro J. Prera Yan Qiu

Doctoral Degrees Conferred (Committee Chair)

Doctor of Philosophy degrees conferred in 2007-2008 academic year:

Gwendolyn Aldrich

Co-Chairs - Dr. Janie Chermak, Dr. Jennifer Thacher, Members: Dr. Robert Berrens and Dr. Richard Adams

Tyler C. Prante

Chair - Dr. Robert Berrens; Members: Dr. Jennifer Thacher, Dr. Alok Bohara and Dr. Michael McKee

Nejem Raheem

Co-Chairs – Dr. Jennifer Thacher, Dr. Katherine Krause; Members: Dr. Donald Coes and Dr. Jose Rivera

Jose H. Saloio

Chair- Dr. Janie Chermak; Members: Dr. Robert Berrens, Dr. Kristine Grimsrud and Dr. Bruce Thompson

J. Raymond Stuart Award

Craig Broadbent Jason Hansen

Gerald Boyle Memorial Award

Jason Hansen

Dean's Dissertation Scholarship Jason Hansen

Distinguished Alumnus:
John Oetzel, Chairperson, Department of Communication and Journalism BA, 1989 Economics
University of New Mexico

Number of Majors										
Academic Year	•	Graduate								
1987-88	132	40								
1988-89	N/A	44								
1989-90	74	N/A								
1990-91	133	41								
1991-92	121	43								
1992-93	103	49								
1993-94	97	57								
1994-95	88	48								
1995-96	72	48								
1996-97	86	54								
1997-98	124	40								
1998-99	115	44								
1999-2000	147	39								
2000-2001	112	34								
2001-2002	118	38								
2002-2003	141	45								
2003-2004	131	49								
2004-2005	135	54								
2005-2006	123	59								
2006-2007	174	65								
2007-2008	245	62								

Fall Credit Hours by Course Level: 1996-2007

Tan Credit Hours by Course Devel. 1990-2007												
	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007
100	261	2694	3048	3684	4161	4272	4245	4365	5034	4101	4446	4314
200	2802	105	87	192	309	270	333	231	279	309	261	276
300	1410	1659	1365	1011	858	690	867	753	900	937	1053	1133
400	234	220	192	281	127	208	123	327	122	153	169	203
500	314	227	192	212	212	267	348	338	407	358	442	387
600	84	108	0	123	115	105	90	78	54	72	66	84
Total	5105	5015	4884	5503	5782	5812	6036	6092	6796	5930	6437	5930

Spring Credit Hours by Course Level: 1996-2007

	Spring Creat Hours by Course Level. 1990-2007											
	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007
100	0	0	0	2874	3303	3558	3639	4035	4263	4026	4197	3768
200	3168	3033	2652	195	261	0	0	0	27	0	0	33
300	2055	1440	1506	1368	1488	888	1167	1164	999	1089	1068	1194
400	176	221	228	174	149	159	106	125	203	290	213	307
500	283	299	264	270	204	172	202	247	325	333	309	330
600	117	78	75	117	123	111	91	102	87	69	66	70
Total	5799	5071	4725	4998	5528	4888	5205	5673	5884	5807	5853	5702

END ANNUAL REPORT

Department of Economics University of New Mexico

July 1, 2007 - June 30, 2008

Robert P. Berrens Chair

ANNUAL REPORT DEPARTMENT OF ENGLISH

July 1, 2007—June 30, 2008

David Richard Jones, Chair

During academic year 2007-08 our department's faculty and students distinguished themselves in the manner of English departments nationally by many achievements, both ordinary and extraordinary. They published and presented their scholarly and creative works in a wide variety of venues, staged influential public events for campus and city communities, won two of three major teaching awards given by UNM, hired exciting new faculty devoted to extending our reputation in minority American literatures, placed our PhD graduates in estimable positions across the country, promoted meritorious professors from within our own ranks, established relations with other departments and colleges in an effort to spread professional literacy, and became an on-campus leader in outcomes assessment. Notes on these various achievements will be included below and in attached reports from program directors.

But the year will be remembered for some time to come as the period when a controversy within the Creative Writing program tore the department apart to a degree unprecedented in its last forty years. When an anonymous letter revealed the presence of a tenured professor on a website devoted to questionable sexual practices, some colleagues within the program began a campaign to have her ousted either from her position or from teaching creative writing. Disagreement over this issue eventually spread across the department, involving faculty of quite different disciplines, ages, and genders as well as students, particularly those in the new MFA program of which the department was deservedly proud. Deliberations and decisions by an independent investigator, the Chair, the Dean, the Associate Provost, the Provost, the University Counsel, and the President did not settle the issue in the minds of some faculty. City and campus newspapers feasted on the controversy. The Director of Creative Writing resigned. She and some other faculty refused to cooperate with a new Director or even to teach in the program. Eventually, the Provost assigned the department a conflict-resolution facilitator in hopes of stimulating movement forward. By the end of the summer of 2008, the creative writing faculty remained harshly divided, and its disturbed students considered what this controversy would mean for their professional futures. And in September 2008, I resigned as department Chair.

The damage done by this controversy went well beyond the extraordinary incidents noted above, impeding several initiatives that became impossible in the face of internal division and adverse publicity. Stillborn was a plan for a major new development program, including newsletters to alumni, fundraising efforts, and public events that would make the English Department appear an attractive and vital operation. So was a plan to spread awareness of new pedagogies, learning outcomes, and assessment through our faculty in order to make us a better teaching department and a campus leader. And efforts to hire in the coming year, including a replacement for the Joseph M. Russo Chair in Creative Writing, were stopped by administrative insecurity over the department's public profile. So the controversy within and around Creative Writing not only harmed the department in an obvious negative sense but killed a number of initiatives that promised to increase the unit's prestige and productivity.

All the more reason to celebrate the remarkable achievements of this year.

Significant Achievements

For a department undergoing a crisis, we were remarkably busy and successful during 2007-08. Here is a short list of significant events.

<u>Civil Rights Symposium.</u> On September 27-28, 2007, under the directorship of Assistant Professor Michelle Hall Kells, the university celebrated a Civil Rights Symposium with the title "40 years of Community Activism, 1967-2007: Civil Rights Reform, Then and Now." More than 700 students and others from campus and community attended two full days of panels, lectures, and social events designed to recall the history of civil rights activism in New Mexico and the nation. Keynoters came from Hawaii, Ohio, and Texas. Political and social leaders from the campus, state, and nation feted local civil rights activist Vicente Ximenes, who later in the year received an honorary doctorate on our department's recommendation.

19c Lecture Series. Organized by another Assistant Professor, Aeron Hunt, this three-part lecture series in October and November brought outstanding scholars to campus for lectures on "Science, Technology, and Aesthetics in the Nineteenth Century." This lecture series represented the collective work of the binational Nineteenth Century Group, which presented department papers by faculty and students through the year, but these public lectures on Darwin, photography, and telegraphy made many people on and off campus aware of the English department's intellectual leadership.

Teaching Awards. In the late spring, Gary Harrison was named the Presidential Teaching Fellow for 2008-2010, the highest teaching honor UNM bestows, and Greg Martin was named one of two Outstanding Teachers of the Year. English faculty have won these awards in the past, but the picture of our professors winning two of the three major teaching awards given in a single year testified to our department's commitment to quality teaching at undergraduate and graduate levels.

Scholarly achievements. A number of professors distinguished themselves with articles, books, conference papers, and research scholarships through the year. Three specially distinguished colleagues during this year were Carmen Nocentelli, who won a prestigious, yearlong research fellowship at Chicago's Newberry Library to complete her research on Euro-Asian contacts during the Early Modern period; Gary Scharnhorst, who published another in a series of nearly two dozen books, this one a biography of the American journalist Kate Field that received national attention, including a long notice in the New York Times Sunday book review; and David Dunaway, whose revised and expanded biography of Pete Seeger led to a national book tour, Dunaway's appearance on a PBS documentary, multiple quotations in a New Yorker profile of Seeger, and a series of very prominent lectures, including one at the Library of Congress.

Hosting ADE Summer Seminar West. Each year the Association of Departments of English holds two summer seminars, traditionally "East" and "West," at which chairs and graduate directors of English departments nationwide convene for four days to discuss current trends, crises, and hopes in the profession. In June 2008, with the financial sponsorship of the College of Arts and Sciences, UNM cohosted this event with Arizona State University at La Fonda Hotel in Santa Fe. Jesse Alemán appeared on a plenary panel about the multiculturalism of American literature. Graduate Director Gary Harrison co-directed a series of workshops and events for graduate directors from across the nation and gave a presentation. All told, the event put UNM's English Department in the national spotlight.

Personnel

During 2007-08, the Department hired Kadeshia Matthews (jointly with Africana Studies) and Kathleen Washburn as new Assistant Professors in African American and Native American literature respectively. At the same time, we brought on board Philip Tietjen as Lecturer, made Scarlett Higgins a half-time, tenure-track Assistant Professor, moved Aeron Hunt from half- to full-time Assistant Professor, promoted Michelle Hall Kells to Associate Professor with tenure, and promoted Hector Torres to Full Professor. We were unable to receive funding to continue Levi Romero as a Lecturer.

Among the items on our hiring wish-list was a new faculty member who could serve as a director of WAC or other outreach writing programs, but numerous requests to search this position did not receive approval.

Program Directors included Gary Harrison as Director of Graduate Study, Carolyn Woodward in her final year as Director of Undergraduate Study, Sharon Oard Warner as Director of Creative Writing until she resigned in March, and Chuck Paine (Fall) and Scott Sanders (Spring) in the post of Director of Rhetoric and Writing. Sanders also served throughout the year as Director of Professional Writing and Internships. Lecturer Erin Lebacqz worked during 2007-08 as Associate Director of First-Year Writing.

Strategic Planning

In August and September 2007, at a departmental retreat and several follow-up meetings, the English Department adopted a series of goals for the years ahead:

- 1. Reconsider the nature and position of literary studies
- 2. Engage UNM's and New Mexico's majority-minority population
- 3. Expand our innovative pedagogies
- 4. Engage the UNM, civic, and state communities
- 5. Create a serious "development" program
- 6. Improve the department's internal intellectual climate

Our ability to make progress on these goals was distinctly limited by the dissension and public controversies rocking the department. Some of the initiatives, such as the development program, became impossible under the circumstances.

For some years, the future of literary study in our department (#1) has constituted a kind of identity crisis, with the American literature faculty seeing their specializations and directions with considerable clarity while the British literature faculty suffers from shrinking numbers, a changing academic climate, and an inability to prioritize or cut away from the 1000 years of literary history for which those professors feel responsible. The department saw several organized discussions on this situation, especially in the early part of the year, and the revision in the Master's program in literature reflected changing ideas, especially among the younger faculty. But no hard or conscious prioritizing decisions were made.

We did expand our innovative pedagogies. Individuals in various programs continued to make exciting changes in how they teach, and the department's teaching corps has perhaps never been more aware of the various options open to them through online, enhanced, hybrid, and other formats. Where we did not succeed was in organizing the department as a whole to become conscious of these pedagogical changes and engage in a serious debate about them.

During the same retreat and its aftermath, the department proposed four specific initiatives, three of them program-specific:

- 1. Institute annual graduate student "self-assessment"
- 2. Survey the undergraduate population: majors and others
- 3. Study equitable distribution of graduate assistantships among groups
- 4. Make the "mission" more conscious

We achieved a measure of success with these proposals. We instituted the graduate student self-assessment and made much progress in how to distribute graduate assistantships. The Undergraduate program was unable to accomplish a survey. It is difficult to see how the year's events helped with the clarification of our mission.

Programs

Perhaps the most innovative and industrious groups during 2007-08 was the Rhetoric and Writing faculty, and Scott Sanders' report outlines their many activities. In particular, the group worked hard on a group of initiatives under the rubric "Student Success"; extended our reach into computer-assisted learning by purchasing laptop computers on a rolling cart for use in various classrooms; increased the number of online and hybrid courses; and clarified their learning outcomes and the procedures for measuring them. A notable success came when Sanders arranged funding from the Anderson School of Management to support English TAs helping ASM faculty "teach with writing." This conspicuous WAC-oriented initiative may be a model for further expansion in the years to come.

The Graduate Program managed an historic revision of the MA in Literature, abandoning a set book-list examination for a considerably more modern approach. It also instituted a new self-assessment system in hopes of helping students make better progress toward degrees and become more self-aware of their programs of study. Graduate Director Gary Harrison, aided by many faculty, managed a coup in PhD job placement. Of four emerging PhDs in our job-assistance program, three received numerous MLA interviews, campus visits, and job offers, and the fourth delayed her graduation and job-search for a year. In addition, a graduate from a few years ago found excellent employment within the state.

The Undergraduate Program implemented a new outcomes assessment program for literary studies, increased its use of travel funding to spur talented undergraduates to do library research, and worked to increase the inter-student communication within our large body of majors.

The Creative Writing Program, for reasons alluded to above, filed no report concerning the past year, but certainly 2007-08 saw many faculty and students achieve meaningful recognition in publishing and other professional enterprises. The Taos Summer Writers Conference expanded its operation from seven to nine days in its tenth year of operation.

Reports from Undergraduate, Graduate, and Rhetoric and Writing directors are attached to the copy of this report in the Chair's office.

DEPARTMENT OF FOREIGN LANGUAGES AND LITERATURES ANNUAL REPORT JULY 1, 2007-JUNE 30, 2008

Submitted by Professor Natasha Kolchevska, Chair, September 28, 2008

FACULTY MILESTONES:

Lorna Brau (Japanese) was awarded tenure and promoted to Associate Professor.

Lorenzo Garcia (Ph.D., Classics, University of California at Los Angeles,) and Tania Ivanova-Sullivan (Ph.D., Russian Linguistics, Ohio State University) were hired as tenure-track Assistant Professors.

Rajeshwari Vallury (French) and Carmen Nocentelli (Comparative Literature/Cultural Studies; 1/2 time appt. in FLL) passed their mid-probationary reviews.

Monica Cyrino (Classics) and Stephen Bishop (French) were on subbatical during Fall semester, 2007.

Lisha Zhu (M.A. University of Iowa) was hired as a full-time lecturer in Chinese.

Natasha Kolchevska agreed to serve an additional two-year term as Department Chair.

FACULTY PRODUCTIVITY

FLL's 12.5 full-time tenure track faculty had a productive year in terms of books, articles and conference presentations. Faculty members published three books, 14 articles, and 2 reviews; in addition, earlier publications by Classics faculty were favorably reviewed by their peers. In addition, faculty presented 17 professional papers or invited talks at regional and national conferences and other venues. Three faculty members received outside grants for teaching and research.

PUBLICATIONS

Books:

Brau. Lorna

(author) Rakugo: Performing Comedy and Cultural Heritage in Contemporary Tokyo. Lanham, MD: Lexington Books, 2008. 257 pages.

Cyrino, Monica

(editor) Rome, Seuson One: History Makes Television. Blackwell, 2008. 272 pages.

Lindsey, Byron (emeritus)

(co-editor) Routes of Passage: Essays on the Fiction of Vladimir Makanin. Tatiana Spektor, co-editor. Bloomington, IN: Slavica Publishers, 2008, 206 pages.

Articles, Book Chapters, Encyclopedia Entries:

Baackmann, Susanne

"Symptomatic Bodies. Fascism, Gender and Hans Bellmer's Dolls." In Value Art Politics. Criticism, Meaning, and Interpretation after Postmodernism. Jonathan Harris, ed. Liverpool: University of Liverpool Press, 2007, 181-219.

Bishop, Stephen

"Hallucinatory Mimicry and the Quest for an Identity à l'Orient." *Dalhousie French Studies* 77 (Winter 2006): 117-27.

Le déterreur, Légende et vie d'Agoun'chich, Mohamed Khair-Eddine, Yahia, pas de chance, and Nabile Farès. Entries in Dictionnaire des pays du Maghreh; Ambroise Kom, ed., 2007, 15 pages.

Brau, Lorna

"New Plots and Playful Schemes: Shukô in Radugo, Japanese Comic Storytelling," Text and Presentation (2007): 23-34.

Cheek, Pamela

"The Festival of Incest in *Le paysan perverti*," in Special Issue: New Perspectives on Retif de la Bretonne." *Symposium* (Fall 2006, Vol. 60 Issue 3): 134-145.

Cyrino, Monica

"Helen of Troy." In *Troy: From Homer's Iliad to Hollywood Epic*. M. Winkler, ed. Oxford: Blackwell Publishing, 2007, 131-146.

"Atia and the Erotics of Authority," in *Rome, Season One: History Makes Television Rome, Season One: History Makes Television.* Monica Cyrino, ed. Blackwell, 2008, 130-140.

Ivanova-Sullivan, Tanya

"Lost in Between: The Case of Russian Heritage Speakers," Liudmila Isurin, coauthor, *Heritage Language Journal*, 6(1), Spring 2008: 72-104.

Kolchevska, Natasha

"Circles of Hell, Circles of Life: Two Responses to Violence in Gulag Memoirs," in *Times of Trouble: Violence in Russian Literature and Culture*, M. Leavitt and T. Novikov, eds., Madison: U. of Wisconsin Press, 2007, 222-235.

Lindsey, Byron

Entries: "Dagestan" and "Vladimir Makanin" in *Encyclopedia of Contemporary Russian Culture*, E. Smorodinskaya, E. Evans-Romaine, H. Goseilo, eds.: London and New York, Routledge, 2006.

Nocentelli, Carmen

"Discipline and Love: Linschoten ad the Éstado da India." in *Rereading the Black Legend: The Discourses of Religious and Racial Difference in the Renaissance Empires*, W. Mignolo, M. Greer, and M. Quilligan, eds. Chicago: U. of Chicago Press, 2007, 205-24, 373-74.

"The Erotics of Mercantile Imperialism: Cross-Cultural Requitedness in the Early Modern Period." *J. of Early Modern Cultural Studies* (Spring 2008), 134-152.

Putnam, Walter

"Captive Audiences: A Concert for the Elephants in the Jardin des Plantes." *TDR* 51:1, thematic issue on Animals and Performance, Una Chaundhuri, ed. (Spring 2007): 154-161.

Reviews:

Monica Cyrino

Book Review of *The Complete Elegies of Sextus Propertius*, translated by Vincent Katz (Princeton UP, 2004). *International Journal of the Classical Tradition* (14.1/2, Summer 2007): 258-261.

Film Review of Frank Miller's 300." Amphora (6.1 2007): 1, 4-5.

Reviews of books by FLL faculty published previously:

Cyrino, Monica S.

Big Screen Rome, Oxford: Blackwell Publishing, 2005, Reviewed in: Classical Review (October 2007) by J. Paul

Smith. Warren

Satiric Advice on Women and Marriage, University of Michigan Press, 2005. Reviewed in Bryn Mawr Classical Review (2007.04.41) by V. Rogen

Conference papers and invited talks:

Susanne Baackmann

Paper presented at national conference: "Thomas Demand's Projections of Violent Histories." German Studies Assn., Dan Diego, CA, 7-10 October 2007.

Lorna Brau

"Paper at national conference: "The Gendered Palate: Women and Girls in Japan's Culinary Comic Books." Popular Culture Assn., Albuquerque, NM. 13-16 February 2008.

Invited talk: "A Brief Introduction to Rakugo." "An Afternoon of Rakugo and Daikagura," sponsored by the Japan Foundation, Tufts University, Boston, MA, July 15, 2007.

Invited talk: "The Storyteller's Apprentice: Situated Learning in Rakugo," at the Japanese Language School, Middlebury College, Middlebury, VT, July 10, 2007.

Monica Cyrino

Paper at international conference: "Aphrodite, Virgin Huntress: Bows and Eros in the Homeric Hymn to Aphrodite." Conference Title: Aphrodite Revealed: A Goddess Disclosed, University of Reading, Reading, UK. 8-9 May, 2008.

Paper at national conference: "Black Hills Blue: Classical Allusion in HBO's Deadwood." Classical Assn. of the Middle West and South. University of Arizona, Tucson, AZ. 16-19 April 2008.

Invited talk: 'Beware the Brides of March: Caesar's Women in HBO's Rome.' Invited lecture for the Classics Symposium on Women and Spectacle in Late Republican Rome, Hollins University, Roanoke, VA. 13 March 2008.

Invited talk: "Big Love and Power: the Women of HBO's Rome." Altman Humanities Scholars-in-Residence Symposium on Film, History and Classical Antiquity, Miami University, Oxford, OH. 10-13 February 2008.

Lorenzo F. Garcia

Paper at national conference: "Telling Time in the *Ilitad*: The Decay of Ships and the Semantics of 'Rotting'." American Philological Assn. Chicago, IL. 3-6 January, 2008.

Tanya Ivanoya-Sullivan

Paper at national conference: "The delimitative prefix *pro*- in Russian." American Assn. of Teachers of Slavic and Eastern European Languages." Chicago, IL. 27-30 December 2007.

Carmen Nocentelli

Paper at national conference: "Early Modern Race, Early Modern Sexuality: Intersections." Renaissance Society of America, Chicago, IL., April 2008.

Paper at national conference: "Sexing Race, Race-ing Sexuality." Symposium in honor of Stephen Orgel, Stanford University. Palo Alto, CA, 28-29 March 2008.

Paper at national conference: "Negotiating Whiteness: Hollandophobia in 17th Century England." Modern Language Association, Chicago, IL, December, 2007.

Paper at national conference: "The 'haughty Spaniard" and the 'cruel Dutch': Ethnic Identity in Restoration England." Aphra Behn Society, Albuquerque, NM. October 2007.

Walter Putnam

Paper at international conference: "The Colonial Subject on Display: Savage Bodies, Civilized Minds." Journee d'Etude at the Centre for African Post-Colonial Studies, University of Johannesburg. Johannesburg, South Africa, 19 November 2007.

Katrin Schroeter

Paper at national conference: "The Real and Authentic in the Field of Vision: Florian Henckel von Donnersmarck's *The Lives of Others*." Pacific Modern Language Assn. Bellingham, WA, 2-4 November 2007.

Warren Smith

Paper at international conference: "Authors' Self-Introductions in Narrative," International Conference on the Ancient Novel. Lisbon, Portugal, 21-25 July, 2008.

Awards and Grants:

Natasha Kolchevska received an award of \$98,769 from the STARTALK program, funded by the National Security Agency, to conduct Summer Institutes for High School students in Arabic and Chinese. These were held during the month of June, 2008. The Arabic Institute enrolled 15 students, and the Chinese 14.

Carmen Nocentelli received a Meyers Fellowship from the Huntington Library in support of her book project. *Islands of Love: Race. Sexuality and the Eurasian Encounter.* Dr. Nocentelli also received the Douglas J. Canfield Award for postgraduate scholarship for her article on "The Erotics of Mercantile Imperialism," which was published in the *J. for Early Modern Cultural Studies* in Spring 2008.

Walter Putnam received a UNM Research Allocations Committee (RAC) grant for \$3978 in support of his research on a forthcoming book, *The Colonial Animal*.

Off-campus service to the profession:

Lorenzo Garcia served as Vice-president for the state of New Mexico for the Committee for the Promotion of Latin, as well as serving as Vice-President for New Mexico for the Committee for the Promotion of Latin.

Natasha Kolchevska continued to serve on the executive board of the Association of Women in Slavic Studies.

Warren Smith served as an outside reviewer for The Ohio State University Press.

TEACHING:

The Department of FLL taught a full range of undergraduate and graduate courses, graduating 48 undergraduates in seven different language and area studies programs (Asian Studies, Classical Studies, French, German, Languages, Russian, Russian Studies). In addition, seven MA degrees were awarded in French, German Studies and Comparative Literature/Cultural Studies.

The Department continues to improve its offerings in the less-commonly taught languages with the hiring of a full-time lecturer in Chinese (Zhu) and a tenure-track linguist (Ivanova-Sullivan).

While it would seem that overall enrollments were down almost 10%, all of that drop can in fact be attributed to one fact: Prof. Cyrino was on sabbatical during the fall of 2007 and did not teach her core classes, which enroll between 300 and 800 students. In addition, two sections of accelerated French were not taught during the summer of 2007.

For the first time in many years, Modern Languages 101 was offered as it was initially conceived—as an introduction to the languages taught in the Department. The pilot class was very successful, enrolling at its capacity of 50 students.

FLL continued to refine its assessment instruments, and faculty members Ali, Kolchevska and Peters-Newell attended national conferences and workshops for training in assessment and language teaching methodology.

German Summer School:

The 33rd session of the German Summer School took place at Taos Ski Valley from June 24 to July 25, 2008. A record number of 49 students (the highest since 1999) attended this year's program. The German Summer School did not only sustain its 51% increase in student numbers from 2006-2007 but was able recruit additional students as well. Among these were 17 undergraduate and graduate students from UNM. This is the second year in a row that such a high number of students from UNM attended, and but one of the undergraduate students from UNM declared German or Foreign Languages as their major. This impressive number, given the small size of the program, testifies to the growth of the German program and the strength of FLL. Out-of-state participants included 11 students from our consortium partner. California State University at Long Beach, 11 students from Texas, and 4 students from Northern Arizona University. The program also showcases UNM on a broader level. The remainder of the students came from universities across the country and from as far away as Johns Hopkins University.

This year's program focused on the topic "Freedom and Democracy in German speaking Cultures" since 2008 marked the anniversary of several revolutions in German speaking countries from the 18th century to recent German left-wing terrorism, thus ensuring coherence of the curriculum. Three full-time faculty, four half-time faculty, and four Teaching Assistants guaranteed the success of the program. For the first time in ten years the summer school secured financial support from the Swiss government, which it used to invite one faculty member and one guest lecturer from Switzerland. Besides financial support from UNM (\$27,000) the program received grant money from the Max

Kade Foundation (\$ 30,000), the Goethe Institute Germany (\$ 7,700), and the Taos Ski Valley (\$3,000). The generous contributions of these supporters, UNM's ongoing support of the GSS, and the high number of students attending ensured a balanced budget.

In recognition of its outstanding record as one of the few total immersion German language programs in the country, GSS was featured in the August/September 2008 issue of German Life, the biggest national magazine for the German community in the USA.

Student news:

Seven FLL undergraduates graduated with honors: Elaine Abrams (summa cum laude in Languages), Ian Canaris and Erin Ebnother-Perry (summa cum laude in German), Matthew Kriteman (magna cum laude in Russian Studies). Israel McMullin (magna cum laude in Classical Studies), John Smeltzer (magna cum laude in French, and Keith Woodell (summa cum laude in Classical Studies).

One M.A. candidate, Julie Redekopp, graduated with distinction in Comparative Literature/Cultural Studies.

Walced Mahdi, a graduate student in the CL/CS program, received a grant to conduct research on Middle Eastern film in Los Angeles, CA.

Five graduate students presented the results of their thesis research at the FLL Graduate Symposium in May 2008.

Outreach and public lectures (all free and open to the public):

- On November 8, 2007, FLL sponsored a lecture by Prof. Phillip Watts, Chair, Dept. of French, Univ. of Pittsburgh on "France 1957: Responses to a Legacy of Torture."
- On November 9, 2007, the CL/CS program in FLL presented an interdisciplinary
 panel on "What is Memory?" Participants included Susanne Baackmann (FLL),
 Eleni Bastea (UNM School of Architecture), Melissa Bokovoy (History), Greg
 Martin (English) and Achim Oberst (Religious Studies). The panel was
 moderated by Pamela Cheek from FLL and attracted 50-60 students and faculty.
- The CL/CS program in FLL sponsored an interdisciplinary spring lecture series with the following speakers:
 - Feb. 6, 2008: Jonathan Harris, University of Liverpool, Art History/ Architecture Dept. Chair: "Writing Off American Photography: Documentary, Narrative and Representations of the US in Crisis from the Great Depression to Hurricane Katrina"
 - Feb. 25, 2008: Craig Williams, City University of New York and University Graduate Center, Dept. of Classics: "When a Dolphin Loves a Boy: Ancient Narratives of Erotic Love between Animals and Humans"
 - March 24, 2008 Christopher Reed, Penn State University. English Dept.:
 "Bachelor Japonistes: Dissident Masculinities in 19th Century
 - April 10, 2008 Linda Schulte-Sasse, Macalester College, German Studies,
 Chair: "If only to Nest with the Fagle: Love Letters to Adolf Hitler."

These talks sought to engage scholars, students and community in a broad range of topical and historical cultural issues. Attendance ranged from 10 to 30.

- With the support of the French Ministry of Foreign and European Affairs, and others, FLL brought a series of 5 recent French films to campus in March and April 2008. Attendance ranged from 25 to 40 at each showing.
- FLL co-sponsored lectures and conferences with a number of UNM units, including the International Studies Institute, the Dept. of English, and the Law School.

Staff:

No major staff changes.

New or ongoing initiatives:

- · Recruit for a German tenure track position.
- Reduce language class sizes to improve student retention and success, and to conform to guidelines set by the Assn. of Departments of Foreign Languages.
- Increase number of contact hours to 5 per week for students in beginning and intermediate levels of those languages designated as critical by the Department of Defense, Arabic, Chinese and Russian, as well as Japanese.
- Strengthen recruitment efforts for FLL graduate programs.
- Expand study abroad programs sponsored by FLL and its faculty, including programs to Kazan, Russia and Egypt
- Requalify for STARTALK grant to continue to offer summer institutes in the critical areas of Chinese and Arabic languages to high school students.

Department of Geography July 1, 2007 to June 30, 2008 Olen Paul Matthews, Chair

Developments During the Academic Year

Overview: A substantial turnover in department faculty members occurred in the last year. The Department is now at six tenure track positions. The Department continued with its planning efforts during the year culminating in our Academic Program Review. The Department is in agreement with the review and looks forward to implementing their recommendations.

Academic Program Review: The review and planning process in the Department took place over a two year period. During the 2005-06 academic year the Department went through a process of strategic planning. Three outside consultants were brought in to advise us. This process identified a new emphasis for the Department. The Geography Department's new direction brings the Department into the center of the discipline at the intersection between human geography, physical geography, and geographic information science. During the 2006-07 academic year the Department developed an implementation plan. The plan included revisions to the strategic plan, a complete revision of graduate and undergraduate programs, planning for a minor and graduate certificate in GI Science, an assessment plan, a facilities plan and resource needs assessment, faculty and course staffing plans, a governance document, and plans to improve campus and community visibility. The implementation plan was the focus of the academic program review. The members of the review team were George Hepner (Univ. of Utah), Burrell Montz (Binghamton Univ.), Judy Olson (Michigan State Univ.), Susan Tiano (U. New Mexico, Sociology). In general the review was very positive, and the Department is in agreement with the recommendations.

New Mexico Geographic Alliance: The New Mexico Geographic Alliance continues its outreach to K-12 teachers in New Mexico. The Alliance continues its operations through a National Geographic emergency maintenance grant.

Speaker series: This year's public lectures were presented on the following topics:

Dr. John Newman Carr -- The Political Grind: The Role of Youth Identities in the Municipal Politics of Public Space.

Dr. Matthew Clark -- Remote Sensing of Latin American Land Cover at Local to Regional Scales.

Dr. Kristina Rodriguez Czuchlewski -- Microwave Imaging of Landscape Disturbances.

Dr. Chris Duvall -- Villages, fruit, and apes in Mali: Assessing human effects on ecosystem structure.

Dr. Benjamin Timms -- The Political Ecology of Lenca Relocation from Celaque National Park, Honduras.

Dr. Elizabeth (Libby) Wentz -- The Urban Environmental Monitoring, 100 cities, at ASU.

Plans and Recommendations for the Near Future

Implementation of Program Review Recommendations: The Academic Program Review Team had recommendations which the Department is in process of implementing. The recommendations are included below:

- 1) Continue the strong departmental leadership by recruiting from outside UNM a department chair with expertise in environmental management/GIScience.
- Reduce the scope of courses of the departmental curriculum and increase the depth of course offerings with a structured, sequenced curriculum in environmental management and GIScience at the undergraduate and graduate levels.
- 3) Increase the technical and administrative support for the department with a second (preferably full time) office staff person, a computer lab technical person, and a person to handle undergraduate and graduate advising.
- 4) Provide additional funding of laboratories for physical geography and GIScience in terms of equipment, software licensing and support, and additional teaching assistant positions.
- 5) Identify tenured/tenure track geography faculty to be responsible for course lecture/lab coordination, teaching assistant orientation, training and oversight.
- 6) Create a hiring plan for 2-3 additional faculty members in the department's new focus areas. At least eight or nine faculty are the minimum to provide a competitive master's degree program, especially one with scientific and geospatial technical emphases.

Some of these recommendations can be implemented without additional resources. Those the Department will implement during the 2008 - 09 academic year. Some recommendations require resources beyond the Department's means. Discussions will take place with the Dean to determine which can be implemented and their priorities. A complete redesign of the BA, BS, and MS degrees will take place.

New Faculty: The Department is recruiting a new Department Chair this year. This was the number 1 priority of the Review Team.

Appointments of Faculty/Staff

The Department added two Assistant Professors last year. Chris Duvall has a specialty in biogeography, nature and society, and geographic techniques. Melinda Benson is a lawyer with a specialization in natural resources and environmental management. In addition, Karl Benedict was added as a Research Assistant Professor and Director of EDAC. Dr. Benedict has a PhD in Anthropology and a specialization in GI Science.

Separations of Faculty/Staff

Danielson Kisanga resigned from his Lecturer III position, and his contract was not renewed. The resignation was effective in July 2008. Dr. Kisanga took a teaching position at the University of Miami, Ohio.

Publications of the Department and Faculty

Benson, M. H.

Review of book chapter "Academic Publishing," for Aspiring Academics: A Resource Book for Graduate Students and Early Career Faculty, Upper Saddle River, NJ: Prentice-Hall. (2008).

Cullen, B.

"A Case Study of New Businesses in Albuquerque, New Mexico, Papers of the Applied Geography Conference, Vol. 30, 50-58, 2007.

"The Impact of Two Disasters: A Comparison of the Los Alamos Fire and the North Carolina Flood," Issues in Geographical Marginality (chapter in e-book), IGU (2007).

Duvall, C.S.

Human settlement ecology and chimpanzee habitat selection in Mali. *Landscape Ecology*. 23(6): 699-716 (2007).

Human settlement and baobab distribution in southwestern Mali. *Journal of Biogeography* 34(11): 1947-1961(2007)

Baobab tree (*Adansonia digitata* L.) growing at cliff base in Mali [photograph]. *Journal of Biogeography* 34(11) (2007).

Lane, M.D.

Lane, K. Maria D. (2008) Review of Derek Hayes, *Historical Atlas of the United States* (Berkeley: University of California Press, 2007) for H-Net (historical geography network).

Lane, K. Maria D. (In press) "Astronomers at Altitude: Mountain Geography and the Cultivation of Scientific Legitimacy," in *High Places: Cultural Geographies of Mountains and Ice*, eds.

Denis Cosgrove and Veronica della Dora (I.B. Tauris Publishers).

Lane, K. Maria D. (Under contract) Geographies of Mars: Scientific Authority and Cultural Meaning in the Red Desert Landscape, University of Chicago Press.

Matthews, O.P.

Matthews, Olen Paul, and Dan St. Germaine, "Boundaries and Transboundary Water Conflicts", <u>Journal of Water Resources Planning and Management</u>, Vol. 133, pp.386 – 396 (2007).

Zandbergen,P.

Zandbergen, P.A. 2008. Exposure of US Counties to Atlantic Tropical Storms and Hurricanes, 1851-2003. Natural Hazards, published online May 30, 2008.

Zandbergen, P.A. 2008. Comments on Boone et al., "Validation of a GIS facilities database: Quantification and implications of error". Annals of Epidemiology, 18(10):823-824.

Zandbergen, P.A. 2008. Applications of Shuttle Radar Topography Mission elevation data. Geography Compass, 2(5):1404-1431.

Zandbergen, P.A. 2008. Geocoding school and student's home addresses: Zandbergen responds. Environmental Health Perspectives, 116(8):A330-A331.

Zandbergen, P.A. 2008. A comparison of address point, parcel and street geocoding techniques. Computers, Environment and Urban Systems, 32(3): 214-232.

Zandbergen, P.A. 2008. Positional accuracy of spatial data: Non-normal distributions and a critique of the National Standard for Spatial Data Accuracy. Transactions in GIS, 12(1): 103-130.

Chakraborty, J. and P.A. Zandbergen. 2007. Children at risk: Measuring racial disparities in potential exposure to air pollution at school and home. Journal of Epidemiology and Community Health, 61:1074-1079.

Zandbergen, P.A. and J.W. Green. 2007. Error and bias in determining exposure potential of children at school locations using proximity-based GIS techniques. Environmental Health Perspectives, 115(9):1363-1370.

Outside Professional Activities

Benson, M. H

Presentations:

"Geologic Carbon Capture and Sequestration: Law and Policy Considerations." Presentation at the Research and Applications in Climate and Energy Workshop. University of Wyoming (January 2008)

"Law on the Landscape: How Policy Choices and Legal Designations Shape the Meaning of Place." Presentation at the symposium The Red Desert: Among Dead Volcanoes and Living Dunes: A Public Conversation about the Importance of Place. University of Wyoming (September 2007)

Cullen, B.

Presentations:

A Recipe for Success: The Case for Albuquerque, NM, AAG Meetings, Boston(April 2008).

A Case Study of New Businesses in Albuquerque, New Mexico, Applied Geography Conference, Indianapolis(October 2007).

Some Hazards of Entrepreneurship: A Case Study of Albuquerque's New Businesses, IGU Commission on The Global Challenge and Marginalization, Hokkaido, Japan (August 2007).

National and International Service:

Member, AAG Committee on Affirmative Action and Minority Status (2007 – 2009).

Member, AAG Committee on Membership (2007 2009).

Board of Directors, Applied Geography Conferences (1997-2009).

Steering Committee, Commission on "The Global Challenge and Marginalization", International Geographical Union, (2004-2008).

Editorial Board, Scottish Geographer, 2005-2009.

Associate Editor, Southwestern Geographer, 1997-2009.

Duvall, C. S.

Presentations:

"Using trees (not stumps) to prove that deforestation has occurred". Refereed Presentation: Nature Matters Conference: Materiality and the More-than-Human in Cultural Studies of the Environment. York University, Toronto, Canada, October 25-28, 2007.

"A Maroon legacy? Sketching the historical geography of live fences in Latin America". Invited Lecture: Center for the Advanced Study of International Development Seminar Series, Michigan State University, East Lansing, MI. October 5, 2007.

"Settlement ecology and chimpanzee habitat in Mali". Association of American Geographers

104th Annual Meeting, Boston, MA, April 15-19, 2008.

International Service:

Member, Great Ape Section, Primate Specialist Group, Species Survival Commission, International Union for the Conservation of Nature (2003-2009).

Awards:

J. Warren Nystrom Dissertation Award, Association of American Geographers (2008).

Lane, M.D.

Presentations:

- "Workshop of Regional Studies." Department of Regional Studies in Humanities and Social Sciences, National Hsinchu University. Hsinchu, Taiwan. May 28, 2008.
- "Urban-Rural Relationship in the American Southwest." Department of Regional Studies in Humanities and Social Sciences, National Hsinchu University. Hsinchu, Taiwan. May 23, 2008.
- "The Historical Geography of Water Management in the Rio Grande Valley, New Mexico." Department of Regional Studies in Humanities and Social Sciences, National Hsinchu University, Hsinchu, Tajwan. May 22, 2008.
- "Water, Science, Humans: Adventures of the Hydrosocial Cycle I." Invited panelist, Annual Meeting of the Association of American Geographers, Boston, MA: April 2008.
- Gilbert, J., Gill, T.E., Borrok, D., Frey, B., Hertel, T., Lane, M., Bleiweiss, M., Lehmann, C., and Gay, D., "Geochemistry and Potential Playa Sources of the January 7, 2008 Southwestern New Mexico 'Milky Rain.' International Conference on Salt Lake Research. Salt Lake City, UT: May 11-16, 2008.
- "Explorations and Uncertainties: Science, Law and New Mexico's Rio Grande Valley." Annual Meeting of the Association of American Geographers. Boston, MA: April 2008.
- Gilbert, J., Gill, T.E., Borrok, D., Frey, B., Hertel, T., Lane, M., Bleiweiss, M., Lehmann, C., and Gay, D., "Geochemistry and Potential Playa Sources of the January 7, 2008 Southwestern New Mexico 'Milky Rain.'" Annual Meeting of the New Mexico Geological Society. Socorro, NM: April 2008.
- "Intersections of Authority: Science, Law and the Management of Water Resources in New Mexico's Rio Grande Valley." Annual Meeting of the Southwestern Division, Association of American Geographers. Bryan, TX: November 3, 2007.
- "The Cartography of Uncertainty in New Mexico's Rio Grande Valley: Land Use, Water Rights, and Identity Conflict, 1907-1917." Annual Meeting of the American Studies Association. Philadelphia, PA: October 11, 2007.

Matthews, O. P.

Presentations:

Manipulation, Suppression, and Misrepresentation—The Seven Year Crusade for Environmental Reform and Public Land Development. AAG Annual Conference, Boston (2008).

Panel on Water Rights and Water Marketing, AWRA Conference, Albuquerque (2007).

National Service:

Chair – Scientific Freedom and Responsibility Committee, Association of American (2006 - 2009)

Member, Association of American Geographers, Endowment Trust Committee (2005 - 2008).

Member, Model State Water Code Task Committee, American Society of Civil Engineers (2008).

Member, Shared Use of Transboundary Water Resources Task Committee, American Society of Civil Engineers (2008).

Zandbergen,P.

Presentations:

Chakraborty, J. and P.A. Zandbergen. 2007. Children in the City: Racial/Ethnic Disparities in Air Pollution Exposure at School and Home. Annual meeting of the Southeastern Division of the Association of American Geographers. November 18 – 20, 2007. Charleston, SC.

National Service:

Co-founding Editor of Crime Mapping: A Journal of Research and Practice, 2008 - present.

Outside Sponsored Research

Benson, M.H.

Co-project investigator with Dr. Fred Ogden, Department of Civil & Architectural Engineering. "Integrated Management of Groundwater and Surface Water Resources: Investigation of Different Management Strategies and Testing in a Modeling Framework." Funded by the University of Wyoming Water Research Program (March 2007 to February 2010) Award \$140.248.

Co-project investigator with Dr. Scott N. Miller, Assistant Professor, Department of Renewable Resources; Dr. Fred Ogden, Professor, Department of Civil & Architectural Engineering; and Dr. Roger Coupal, Associate Professor, Department of Agricultural and Applied Economics. "Integrating Coalbed Natural Gas Science and Management: Lessons Learned and Ways Forward." Funded by the U.S. Department of Energy (June 2006 to September 2008). Award \$183,915.

Lane, M.D.

Intersections of Authority: Science, Law and the Management of Water Resources in New Mexico's Rio Grande Valley (Standard Research Grant)," Award No. 0750115, PI: K. Maria D. Lane, Funding Agency: National Science Foundation, Science and Society Program, Duration: June 2008 - May 2010, Award: \$132, 412

"Geographies of Mars: Science, Site and Sensation", PI: K. Maria D. Lane, Funding Agency: AAUW Educational Foundation, Award: American Fellowship for Short-Term Publication, Duration: July 2007-August 2007, Award: \$6,000

Matthews, O.P.

Matthews, Olen Paul, Eagle Vision Extension, NSF \$40,000 (June 2007 -- December 2007)

Matthews, Olen Paul, PI. with Kim Seidler, New Mexico Geographic Alliance Maintenance Grant, National Geographic Society, \$50,000 (2005 - 08).

Matthews, Olen Paul, PI on Subcontract. "Eagle Vision: *Employing Geographic Information Technologies in Indian Schools and Communities*," NSF Information Technology Experiences for Students and Teachers Program (ITEST), Comprehensive Projects for Students and Teachers. Subcontract for \$192,000 (2004 – 2007-Ended August 2007).

Zandbergen,P.

National Science Foundation. Reverse geocoding, geographic masking and geospatial privacy. Principal Investigator. 2008-2011. \$121,980.

New Mexico Department of Energy, Minerals and Natural Resources. New Mexico energy trends database. Co-Principal Investigator. PI is Andrea Mammoli, University of New Mexico. 2008. \$49,989.

Canadian International Development Agency. Capacity building of civil society in water resources management in São Paulo State, Brazil. 2002 – 2008. Co-Principal Investigator with Ellie Perkins, York University. \$750,000 (Canadian).

Department of History

Annual Report, 1 July 2007-30 June 2008

By: Patricia Risso, Chair

1. Significant developments during the academic year Faculty

Department of History faculty and graduate students continued to excel in teaching, research, and service. Several have won prestigious awards and recognitions. The highlights: Linda Hall was promoted to the rank of distinguished professor and is working on two book projects. Professor Margaret Connell-Szasz was named (Jan. 08) a Fulbright Senior Scholar. Her book Scottish Highlanders and Native Americans: Indigenous Education in the Eighteenth Century Atlantic World was published by the University of Oklahoma Press, 2007. Timothy Graham was promoted to the rank of full professor. He published a co-authored book (with Raymond Clemens) in Fall, 2007: Introduction to Manuscript Studies (Cornell University Press). The book is likely to become the standard in its field. Andrew Sandoval-Strausz was promoted to the rank of associate professor and published Hotel: An American History, in a well illustrated edition by Yale University Press, Fall, 2007. (Hotel just won a major award that will be in next year's report.) Professor Virginia Scharff served as president of the large and influential Western Historical Association (WHA) and will deliver the presidential address in Oct. 2008.

A sampling of other faculty accomplishments: Distinguished Professor Paul Hutton published an article, "Silver Screen Desperado: Billy the Kid in the Movies," in the New Mexico Historical Review in 2007. For that article, he won both the prestigious Billington Prize from the Western Historical Association and the Wrangler Award from the National Cowboy Museum and Western Heritage Center in Oklahoma City. Assistant Professor Thomas Sizgorich published the lead article (part of his second monograph project) in one of the foremost journals of our discipline, the American Historical Review. Assistant Professor Eliza Ferguson published the lead article in a special issue on the history of domestic violence in the prestigious Journal of Women's History. With a grant from the UNM College of Arts & Sciences, Associate Professor Sam Truett coorganized a collaborative Arizona-New Mexico Borderlands/Environment Field Institute in Summer, 2007, with faculty from the University of Arizona, Arizona State University, and New Mexico State University, as well as UNM, Professors Connell-Szsasz and Jason Scott Smith won money from the department's Shoemaker Endowment for research, and Professor Sandoval-Strausz also won Shoemaker funds to develop a workshop that will bring in outside scholars for discussions of ongoing research projects in the coming year.

Cathleen Cahill and Andrew Sandoval-Strausz, a married couple in the department, became parents of fraternal twins in May, 2008, to the delight of everyone.

Graduate Students

Faculty committees awarded three major graduate student fellowships that were presented at our departmental graduation ceremony in May 2008. John White was awarded the Phillips Fellowship to fund completion of his dissertation. Sonia Dickey won

the Woodword Memorial Fellowship for dissertation research/writing on a Southwest topic. Kent Blansett won the first ever Timothy D. Moy Teaching Fellowship for his excellence as a graduate teaching assistant. A departmental, honorary Masters degree was awarded posthumously to Scott Hudson, who was very close to finishing his degree when he died of cancer in April 2008. Most of our recent PhD recipients (2007-2008) have found academic employment: James Barrera Chad Black, Lincoln Bramwell, Erik Loomis, James Martin, Amy Scott, Bradley Shreve, and Tiffany Thomas-Woodard. Recent PhD Bradley Shreve received a national award, the Everhart, for an article he published in the *New Mexico Historical Review*.

2. Significant plans and recommendations for the near future

As indicated in the Appointments and Separations categories below, during the past fiscal year, we lost five faculty members. With our two new faculty hires, that leaves us with a deficit of three faculty members overall. Our priorities remain, in alphabetical order: ancient, medieval, history of science & technology.

We are struggling to comply with the requirements of outcomes assessment, a struggle made more difficult with the loss of Asst. Prof. Nancy McLoughlin, who was our point person on this ongoing project.

We begin the process of self evaluation in Fall 2008, and will do our Academic Program Review in Spring 2009, with outside evaluators scheduled to visit us in Fall 2009.

3. Appointments to faculty (none to staff)

Two new faculty members will join us effective 18 August 2008. Erika Monahan (PhD 2007, Stanford) will be teaching Russian and European history. Sarah Cornell (PhD 2008, New York University) will be teaching 19th c. US history, including slavery and Civil War.

4. Separations of faculty (none of staff)

- 1. Associate Professor Timothy Moy died tragically 22 July, 2007.
- Professor Cynthia Radding resigned effective 1 July 2008 to accept a Distinguished Professorship in the Department of History, University of North Carolina, Chapel Hill.
- 3. Associate Professor Jennifer Nez Denetdale resigned effective 1 July 2008 to accept a position in the Department of History, Northern Arizona University.
- 4. Assistant Professor Nancy McLoughlin resigned effective 1 July 2008 to accept a position in the Department of History, University of California, Irvine.
- Assistant Professor Thomas Sizgorich resigned effective 1 July 2008 to accept a
 position in the Department of History, University of California, Irvine.

5. Faculty Publications, CY 2007

Judy Bieber

Book chapter: "Imperial Brazil." in Thomas Holloway, ed., A Companion to Latin American History (London:Blackwelll, 2007): 42-68.
Continues...

Book review: Alida C. Metcalf, Go-betweens and the Colonization of Brazil, 1500-1600, Luso-Brazilian Review, 44:1 (2007): 177-179.

Melissa Bokovov

Encyclopedia article: "Roma," in <u>Encyclopedia of Women in World History</u>, ed., Bonnie Smith. New York: Oxford University Press, 2007).

Cathleen D. Cahill

Book review: Antoinette Burton, ed., Archive Stories: Facts, Fictions, and the Writing of History (Duke Univ. Press, 2006) in Journal of Anthropological Research, 63 (2007): 405-407.

Eliza Ferguson

Lead journal article: "Domestic Violence by Another Name: Crimes of Passion in Fin-de-Siècle Paris," in *Journal of Women's History* 19:4 (Winter 2007): 12-34.

Timothy C. Graham

Book: *Introduction to Manuscript Studies*, co-authored with Raymond Clemens (Cornell University Press, December 2007) xvi + 301 pages.

Elizabeth Q. Hutchison

Book review: Steve Stern, Battling for Hearts and Minds: Memory Struggles in Pinochet's Chile, 1973-1988 (Durham, NC: Duke University Press, 2006) in the American Historical Review 112 (4): 1243-4.

Paul A. Hutton

Article in refereed journal: "Silver Screen Desperado: Billy the Kid in the Movies, "New Mexico Historical Review, 82 (Spring 2007): 149-220.

Short piece: "Camels Go West," Wild West, 20 (December 2007): 40-47

Short piece: "True Comics" True West, 54 (Nov/Dec 2007): 30-40

Short piece: "Dreamscape Desperado Redux," New Mexico Magazine, 85 (May 2007): 70-72

Short piece: "Dreamscape Desperado: Who Remembers Billy the Kid?" *True West*, 54 (May 2007): 50-59

Short piece: "Kit Carson's Ride," Wild West, 19 April 2007): 28-37

Patricia Risso

Book review: Claire Jowitt ed., *Pirates? The Politics of Plunder, 1550—1650* (Palgrave MacMillan, 2007) in the International Journal of Maritime History (Dec. 2007): 485-486.

Enrique Sanabria

three short encyclopedia articles:

"Antonio Buero Vallejo," *Encyclopedia of Modern Drama*, edited by Gabrielle Cody and Evert Sprinchorn (New York: Columbia University Press, 2007). Continues...

"Benito Pérez Galdós," *Encyclopedia of Modern Drama*, edited by Gabrielle Cody and Evert Sprinchorn (New York: Columbia University Press, 2007).

"Ramón del Valle-Inclán," *Encyclopedia of Modern Drama*, edited by Gabrielle Cody and Evert Sprinchorn (New York: Columbia University Press, 2007).

Four book reviews:

- Stanley G. Payne, The Collapse of the Second Spanish Republic, 1931-1939, in Choice: Current Reviews for Academic Libraries, Vol. 44, no. 7 (March 2007): 1234.
- Wayne Bowen, Spain during World War II, in Choice: Current Reviews for Academic Libraries, Vol. 44, no. 10 (June 2007): 1819.
- Barbara Keys, Globalizing Sport: National Rivalry and International Community in the 1930s, Vol.45, no. 1 (September 2007): 137.
- Christopher Storrs, *The Resilience of the Spanish Monarchy*, 1665-1700, Vol. 45, no. 3 (November 2007): 356.

Andrew Sandoval-Strausz

Book: Hotel: An American History (New Haven: Yale University Press, 2007), 375 pages.

article in refereed journal: "Homes for a World of Strangers: Hospitality and the Origins of Multiple Dwellings in America," *Journal of Urban History* 33 (2007): 933-964.

Virginia Scharff

Short piece: "The Cosmopolitan World of Owl Woman and William Bent," coauthored with Carolyn Brucken, *Convergence*, Fall 2007, pp. 24-31.

Jason Scott Smith

Book review: Alan Lawson, A Commonwealth of Hope: The New Deal Response to Crisis, in Business History Review 81 (autumn 2007): 591-593.

Ferenc Szasz

Article in referereed journal: "Atomic Heroes and Atomic Monsters: American and Japanese Cartoonists Confront the Onset of the Nuclear Age, 1945-80" (With Issei Takechi) *The Historian* 69 (Winter 2007): 728-752.

Three book reviews:

- Royden Loewen, Two Mennonite Communities and Mid-Twentieth-Century Rural Disjuncture (U III Press) in Montana 57 (Spring 2007): 80-81
- Carl Abbott, Frontiers Past and Future: Science Fiction and the American West (U Kansas Press) in Pacific Historical Review (May 2007): 336-337.
- Tracy Fessenden, Culture and Redemption, Religion, the Secular, and American Literature (Princeton Univ. Press) in Choice (June 2007) 44/5490: 190 words.

- 6. Outside professional activities of staff members. Not applicable
- 7. Outside sponsored research and outside sponsored public history projects
- 1. Associate Professor Durwood Ball
- Consultant, *The Navajo Long Walk*, Film Documentary, KUED Public Television, Salt Lake City, Utah (interviewed in Salt Lake City, 17 April, 2007)
- Consultant, *The Long Walk*, RadioWest, KUER Public Radio, Salt Lake City, Utah (interviewed 20 November 2007)
- 2. Associate Professor **Melissa Bokovoy**, consultant and author of case study on Yugoslavia, funded by the Center for History and New Media, George Mason University, and the National Endowment for the Humanities. Project title: The Fall of Communism in Eastern Europe Web Project. http://chnm.gmu.edu/1989

Participant in three Symposiums (international public history project)

- "Whose Hero? (Re)Defining War Dead in the Interwar Kingdom of Serbs, Croats, and Slovenes." Paper. Sacrifice and Regeneration: The Legacy of the Great War in Eastern Europe." University of Southampton, UK. September 2007
- "Yugoslavia," Paper and Presentation, "The Collectivization of Agriculture in Communist Eastern Europe: Comparison and Entanglements from the 1930s to the 1980s, Workshop organized by Constantin Iordachi, Central European University, Budapest / Arnd Bauerkämper, Berliner Kolleg für Vergleichende Geschichte Europas. Budapest, June 2007. Part of two part workshop
- "Exhibiting the War: Photographing the Wars of National Liberation, 1912-1918." The Commemoration of the Great war in East-central Europe, 1918-1939: A Workshop. Central European University, Budapest. March 2007.
- 3. Professor Timothy C. Graham

Director and sole presenter, half-day workshop (public history): "The Medieval Manuscript" at the annual conference of the Arizona Center for Medieval and Renaissance Studies, Arizona State University, February 15, 2007.

- 4. Distinguished Professor Paul Hutton,
- a. consultant and on-air commentator, "Kit Carson" on American Experience WGBH Boston for PBS
- b. on-air commentator, "Billy the Kid" episode of Wild West on BBC.
- 5. Professor Virginia Scharff, Mellon Fellowship, Huntington Library, Jan.-May, 2007. residential research grant, \$8,000.
- 6. Regents Professor **Ferenc Szasz**, organizer and director, short course on "The Origins of the Atomic Age," at the Trinity Site, funded by the National Science Foundation.

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Annual Report Department of Linguistics 2007-2008 William Croft, Professor and Interim Chair

1. Significant developments during the academic year 2007-2008.

The State Legislature continued funding of the Navajo Language Program that was initiated through Legislative Priority funding in its 2007 session. The Legislative funding authorized in the 2008 session totaled \$100,000.

Dr. Phyllis Wilcox was promoted to Full Professor, and received a Service Recognition Award for her thirty years' service to the University.

Dr. Catherine Travis was promoted to Associate Professor with tenure.

Dr. Sherman Wilcox received a Service Recognition Award for his twenty years' service to the University.

Nancy Montoya, Department Administrator, received a Service Recognition Award for her twenty years' service to the University.

Dr. William Croft gave invited Plenary Lectures in Suzhou, China and Chicago, Illinois, and was an invited speaker to conferences and lecture series in the USA, the Netherlands, Italy and Canada.

2. Significant plans and recommendations for the near future.

The Department prepared to advertise for a tenure-track position in Navajo Linguistics.

The Department prepared a detailed Self-Study in preparation for its Academic Program Review. The External Committee for the Academic Program Review (Prof. Diane Brentari, Purdue University; Prof. Doris Payne, University of Oregon; and Prof. Sally Rice, University of Alberta; along with the internal member, Prof. Natasha Kolchevska, Department of Foreign Languages and Literatures) visited the Department in October 2007 and prepared its Report in November 2007. The Department prepared a response to the Report of the External Review Committee of the Academic Program Review, and will prepare an Action Plan emerging from the Academic Program Review.

The Department prepared a Strategic Plan, which will inform its Action Plan.

3. Appointments to faculty/staff.

Jessica Slocum was appointed as Administrative Assistant III effective December 3, 2007.

4. Separations of faculty/staff.

Felisha Herrera resigned as Administrative Assistant III, effective August 31, 2007.

5. Publications of individual faculty/staff in calendar year 2007.

Axelrod, Melissa

J. Gómez de García, and J. Lachler, with S. Burke (eds.). *Abáachi Mizaa Ł<u>áo</u> Ilkee' Shijai: Dictionary of Jicarilla Apache*. By W. Phone, M. Olson, and M. Martinez. Introduction and Grammatical Sketch by M. Axelrod. Albuquerque: University of New Mexico Press. 475 pp.

"Grammatical sketch of Jicarilla Apache." In M. Axelrod, J. Gómez de García, and J. Lachler, with S. Burke (Eds.), *Abáachi Mizaa Łáo Ilkee' Shijai: Dictionary of Jicarilla Apache*. By W. Phone, M. Olson, and M. Martinez. Albuquerque: University of New Mexico Press. Pp. 9-80.

"Design and use of the Dictionary." In M. Axelrod, J. Gómez de García, and J. Lachler, with S. Burke (Eds.), *Abáachi Mizaa Łáo Iłkee' Shijai: Dictionary of Jicarilla Apache*. By W. Phone, M. Olson, and M. Martinez. Albuquerque: University of New Mexico Press. Pp. 1-5.

Bybee, Joan

"Diachronic linguistics." In D.Geerearts and H. Cuyckens (eds.), *The Oxford Handbook of Cognitive Linguistics* (pp. 945-987). Oxford: Oxford University Press.

Review of Adele E. Goldberg, Constructions at work: the nature of generalization in language. Journal of Child Language, 34.3, 692-697.

With J. McClelland. "The gradience of gradience: a reply to Jackendoff." *The Linguistic Review*, 24.4, 437-455.

Croft, William

"Construction grammar." In D. Geeraerts and H. Cuyckens (eds.), *The Oxford Handbook of Cognitive Linguistics* (pp. 463-508). Oxford: Oxford University Press.

With M. Bowerman. "The English lexical causative alternation." In M. Bowerman and P. Brown (eds.), Crosslinguistic perspectives on argument structure: implications for learnability (pp. 279-307). Mahwah, New Jersey: Lawrence Erlbaum Associates.

- "Language." In G. Sica (ed.), The Language of Science, http://www.polimetrica.eu/site/?p=94. Milano: Polimetrica.
- "Linguistic selection: an utterance-based theory of language change," reprinted with a postscript. In V. Evans, B. K. Bergen, and J. Zinken (eds.) *The Cognitive Linguistics Reader* (929-966). London: Equinox.
- "Logical and typological arguments for Radical Construction Grammar," reprinted. In V. Evans, B. K. Bergen, and J. Zinken (eds.) *The Cognitive Linguistics Reader* (638-673). London: Equinox.
- "Intonation units and grammatical structure in Wardaman and English." Australian Journal of Linguistics, 27, 1-39.
- "Beyond Aristotle and gradience; a reply to Aarts." Studies in Language, 31, 409-430.
- "Typology and linguistic theory in the past decade: a personal view." *Linguistic Typology*, 11, 79-91.
- With M. Vihman. "Phonological development: toward a 'radical' templatic phonology." *Linguistics*, 45, 683-725.
- "The origins of grammar in the verbalization of experience." Cognitive Linguistics, 18, 339-382.

Morford, Jill

With M. Adam, W. Iversen, and E. Wilkinson. "Meaning on the one and on the other hand: Iconicity in native vs. foreign signed languages." In E. Tabakowska, C. Ljungberg, and O. Fischer (eds.), *Insistent Images*, (pp. 209-225). Amsterdam: Benjamins.

With S. Wilcox. "Empirical methods in signed language research." In M. Gonzalez-Marquez, I. Mittelberg, S. Coulson, and M. J. Spivey (eds.), *Methods in Cognitive Linguistics*, (pp. 173-202). Amsterdam: Benjamins.

With N. Trudeau, A. Sutton, E. Dagenais, and S. de Broeck. "Construction of graphic symbol utterances by children, teenagers, and adults: The impact of structure and task demands." *Journal of Speech, Language and Hearing Research*, 50, 1314-1329.

Smith, Caroline

"Prosodic accommodation by French speakers to a non-native interlocutor." In J. Trouvain and W. Barry (eds.). Proceedings of the 16th International Congress of Phonetic Sciences, Saarbrücken, Germany, 1081-1084.

Travis, Catherine E.

"Genre effects on subject expression in Spanish: Priming in narrative and conversation." Language Variation and Change, 19(2), 101-135.

Wilcox, Phyllis

Executive producer, *Linguistics Terminology Explained in ASL* (original videotape 1996). Burtonsville, MD: Sign Media, Inc.

Review of A. Mindess, T. K. Holcomb, D. Langholtz, and P. Moyers, Reading Between the Lines: Intercultural Communication for Sign Language Interpreters. Sign Language Studies, 8(1), 94-103.

"Constructs of the Mind: Cross-linguistic Contrast of Metaphor in Spoken and Signed Languages." In E. Pizzuto, P. Pietrandrea and R. Simone (eds.). *Verbal and Signed Languages: Comparing Structures, Constructs and Methodologies*. Berlin: Mouton de Gruyter.

Wilcox, Sherman

With J. Morford. "Empirical methods in signed language research." In M. Gonzalez-Marquez, I. Mittelberg, S. Coulson, and M. J. Spivey (eds.), *Methods in Cognitive Linguistics*, (pp. 173-202). Amsterdam: Benjamins.

"Routes from gestures to language." In E. Pizzuto, P. Pietrandrea, and R. Simone (eds.), Verbal and Signed Languages: Comparing Structures, Constructs and Methodologies. Berlin: Mouton de Gruyter.

With David F. Armstrong. *The Gestural Origin of Language*. Oxford: Oxford University Press.

6. Outside professional activities of staff members.

Melissa Axelrod was engaged in native language revitalization projects in several local New Mexico communities, including the Jicarilla Apache Nation, Nanbé Pueblo, Picuris Pueblo, and Sandia Pueblo, and outside New Mexico with the Grupo de Mujeres por la Paz in Guatemala.

William Croft served on the editorial boards of three book series and four professional journals, served as a referee for journals in linguistics, philosophy, cognitive science and mathematics, and reviewed grant proposals for funding agencies in the USA, the United Kingdom and Denmark.

Jill Morford acted as a reviewer for the Journal of Speech, Language and Hearing Research and Applied Psycholinguistics.

Karen Naughton served as a member of Strategic Planning Committee for the Deaf Culture Center.

Bonnie Rudy was actively involved in local, state and national deaf community organizations (American Sign Language Teachers Association, National Association for the Deaf, Conference of Interpreter Trainers, Community Outreach Program for the Deaf, Deaf Culture Center).

Josephine Santiago was active in the Registry of Interpreters for the Deaf (RID).

Barbara Shaffer served as a reviewer for the Journal of Interpretation, Language Policy and Oxford University Press.

Caroline Smith acted as a reviewer for Phonology, Journal of Phonetics and the International Congress of Phonetic Sciences.

Catherine Travis served as a reviewer for Intercultural Pragmatics, Compass and Studies in Language and the National Science Foundation.

Phyllis Wilcox served as Chair of the New Mexico Mentoring Board, was on the external review board for the Department of Communication Sciences and Disorders at the University of New Hampshire at Durham, and served on the editorial board of Sign Language Studies.

Roseann Willink acted as consultant, interpreter and translator for two documentary films on Navajo weaving, "Weaving Worlds" and "Woven Ways".

Phyllis Wilcox, Roseann Willink and Paul Platero participated in the 2007 Civil Rights Symposium at UNM.

7. Outside sponsored research.

Melissa Axelrod

Nanbé Tewa Language Revitalization, \$203,840, National Science Foundation, continuing.

Collaborative Research: Ixil Mayan, \$160,000, National Science Foundation, continuing.

Jill Morford

Center for Visual Language and Visual Learning, \$581,945, National Science Foundation (5-year grant)

Caroline Smith

Dissertation grant for Ana Medina-Murillo, \$10,957, National Science Foundation

8. Students' professional activities.

Fellowships and Awards

Tavish Brown received the 2007 Robert W. Young scholarship for undergraduates, and Melvatha Chee received the 2007 Robert W. Young scholarship for graduates.

Ruth Cisneros (M.A. student) received a Popejoy Fellowship.

Dan Sanford (Ph.D. student) won the 2007 Helmut Esau prize for his paper "Metaphor and phonological reduction in English idiomatic expressions" at the LASSO conference.

Agripino Silveira (Ph.D. student) was awarded a Ph.D. fellowship from the Latin American and Iberian Institute.

Michele Kiser (Ph.D. student) received a graduate fellowship from the State of New Mexico.

Fernanda Canever, a visiting student, was one of seven winners in the "Oral Presentation" category at the Undergraduate Research and Creativity Conference at UNM.

Jillian Klenck, a Signed Language Interpreting major, received the George A. Kaseman Endowed Memorial Scholarship.

Masters Theses

Melvatha Chee, "Acquisition of Navajo verbs"

Doctoral Dissertations

Andrew Lavelle, "Metonymy: a Peircean semiotic categorization and typologization in relation to other tropes and sign types"

Christopher Shank, "Figurative language, transitivity, and the development of epistemicity: a cognitive linguistic case study of the English verbs of tactile perception"

9. Undergraduate and Graduate Study in the Department of Linguistics

Undergraduate Students 2007-2008

80 students are registered as Majors in Linguistics. 58 students are enrolled in the B.S. degree in Signed Language Interpreting. 8 students are enrolled as Navajo Minors.

Graduate Students 2007-2008

The Department of Linguistics has 20 students in the M.A. program and 21 students in the Ph.D. program. In addition, we have 16 students in the Educational Linguistics Doctoral Program jointly administered with the College of Education.

Admissions 2007-2008: 15 M.A. and 13 Ph.D. students were offered admission.

10. Graduates from the Department of Linguistics

Bachelor of Science in Sign Language Interpretation 14 graduates

Bachelor of Arts in Linguistics 5 graduates

Master of Arts in Linguistics 4 graduates

Doctor of Philosophy in Linguistics 2 graduates

Doctor of Philosophy in Educational Linguistics 2 graduates

11. Events sponsored by the Department of Linguistics

Colloquium Series

Terry Jantzen (University of Manitoba), "Two uses of space: discourse functions of static and rotated vantage point space in ASL"

Hongxiao Wang (Chang'an University, PR China), "Time is water: a metaphorical conceptualization of time in Chinese"

Beth Leonard (University of Alaska), "Deg Xinag traditional narratives and indigenous education: a learner's perspective on translation and interpretation"

Dan I. Slobin (University of California, Berkeley), "Learning to speak or to sign: issues of modality and linguistic typology"

Joan Bybee (University of New Mexico), "Exemplar models for language"

Peggy Speas (University of Massachusetts - Amherst), "Sentence structure in context: Navajo direct discourse complements"

Dedre Gentner (Northwestern University), "Why we're so smart"

Paul Platero (University of New Mexico), "Navajo NPs: missing or not?"

Jürgen Streeck (University of Texas, Austin), "Pragmatics and ecologies of gesture at work"

Other Sponsored Presentations

Navajo Program

Herbert Benally (Diné College), "Saad (word) as it relates to the creation, organization, and movement of the universe and how it reflects that organization and movement from the Navajo perspective"

College of Arts and Sciences Department of Mathematics and Statistics Annual Report 2007-2008

Jens Lorenz, Interim Chair

The Department of Mathematics and Statistics continued to meet the demands of its broadly defined missions in education, research, and service during the 2007-2008 academic year.

1. Significant Developments during the Academic Year, 2007-2008

- Including multiple year funding, our research funding was approximately \$6,035,126 for 2007-2008; this is a slight decrease from \$6,255,426 last year. We are particularly grateful for NSF funding in the amount of \$750,000.00 to support our Mentoring through Critical Transition Points (MCTP) program. This program, designed to attract students to our graduate program, started successfully in Summer 2008.
- Total 21-day enrollment for the AY was 14,427 students, a small decrease over the
 previous AY total of 14,705 students. There were 7,242 students enrolled fall
 semester, 6,175 students enrolled spring semester, and 990 students enrolled in
 summer session.
- The Department of Mathematics and Statistics awarded a total of 44 BS degrees, 24 MS degrees, and 2 Ph.D. degrees for AY 2007-2008.
- In the spring of 2008, Dr. Janet Vassilev and Dr. Dimiter Vassilev took over the promotion of the UNM Mathematics Contest from Dr. Michael Nakamaye and Lecturer Cathy Gosler, with permanent funding (\$16,000 per year) from the Public Service Company of New Mexico Foundation. Prizes, including books, cash, and scholarships, were awarded at a banquet for 2007 contest winners. William McCallum gave a general interest lecture on "The History of the Quadratic Formula" in connection with the contest. We took advantage of the statewide high school PNM-UNM Math Contest mailings and sent flyers about our web site to high school teachers. We anticipate that this will help teachers state-wide prepare their students for UNM. Our finals from past years are on our web site so that teachers and students will know UNM's expectations.

2. Plans and Recommendations

• In spring 2008 the academic program of the department was reviewed by Irene Gamba, University of Austin, Sastry Pantula, NC State and V.M. Kenkre, UNM. We would like to implement the recommendations of the review team. In particular, we would like to add faculty (tenure track and lecturers) to support our mission in research and education.

3. Appointments to Faculty/Staff

- Luis Cisneros and Guadalupe Lozano, post-docs, and Luis Mata and Winston Crandall, visiting professors, taught upper-level courses for us the academic year of 2007-2008. We had a total of 30 Part-Time Instructors who taught 85 sections in fall 2007, and 28 Part-Time Instructors who taught 61 sections in spring 2008.
- Dimiter Vassilev, Assistant Professor of Mathematics, Michele Guindani, Assistant Professor of Statistics, and Yan Lu, Assistant Professor of Statistics were hired in August 2007. Dr. Janet Vassilev was hired as a Lecturer in April 2007, and started August 2008.
- Stephen Lau was hired in March 2008 and is expected to start in the fall of 2008.
- Gabriel Huerta was awarded a Regent's Lectureship.
- Roxanne Littlefield was hired for the position of Coordinator, Program Advisement, in June 2008.

4. Separations

- Dr. Kryzstof Galicki, Professor, passed away on September 27, 2007.
- Donna George, Coordinator of Program Advisement, left the department in May 2008.
- Department Administrator Linda Livingston left the department in May 2008.

5. Faculty Publications and Creative Works

Aceves, Alejandro

A. B. Aceves (2007) Localization and trapping of light in one and two dimensional periodic structures, Wave Motion 45/1-2 48-58.

Bedrick, Edward

Passell, H.D., Dahm, C.N., and Bedrick, E.J. (2007). Ammonia modeling for assessing potential toxicity to fish species in the Rio Grande, 1989-2002, Ecological Applications, 17(7), 2087-2099.

Malloy, E. J., Bedrick, E. J., and Goldsmith, T. (2007). Diagnostics for the Scale of Functional Predictors in Generalized Linear Models, Technometrics, 49, 480-489.

Tentori, F., Hunt, W. C., Rohrscheib, M., Zhu, M, Stidley, C. A., Servilla, K., Miskulin, D., Meyer, K. B., Bedrick, E. J., Johnson, H. K., and Zager, P. G. (2007). Which Targets in Clinical Practice Guidelines are Associated with Improved Survival in a Large Dialysis Organization?, Journal of American Society of Nephrology, 18: 2377-2384.

Bredow, S., Falgout, M.M., March T.H., Yingling C.M., Malkoski S.P., Aden J., Bedrick E.J., Lewis J.L., Divine K.K. (2007). Subchronic inhalation of soluble manganese induces expression of hypoxia-associated angiogenic genes in adult mouse lungs, Toxicology and Applied Pharmacology, 221: 148-157.

Albers L.L., Migliaccio L., Bedrick E.J., Teaf D., Peralta P. (2007). Does epidural analgesia affect the rate of spontaneous obstetric lacerations in normal births?, Journal of Midwifery Womens Health, 52(1):31-6.

Martin SB, Mosquera-Caro MP, Potter JW, Davidson GS, Andries E, Kang H, Helman P, Veroff RL, Atlas SR, Murphy M, Wang X, Ar K, Xu Y, Chen IM, Schultz FA, Wilson CS, Harvey R, Bedrick E, Shuster J, Carroll AJ, Camitta B, Willman CL. (2007). Gene expression overlap affects karyotype prediction in pediatric acute lymphoblastic leukemia. 21(6):1341-4.

Boyer, Charles

C P. Boyer, K. Galicki and L. Ornea, Constructions in Sasakian Geometry, Mathematische Zeitschrift 257 (4) (2007) 907-924.

Buium, Alexandru

A. Buium, *Correspondences, Fermat quotients, and uniformization*, in: Groupes de Galois arithmetiques et differentiels, Seminaires et Congres 13, Societe Mathematique de France, (2007), 70-89.

Coutsias, Evangelos

Efficiency of Rotational Operators for Geometric Manipulation of Chain Molecules Chaok Seok and E.A. Coutsias, Bulletin of the Korean Chemical Society, 28(10), p.1705-1708, (2007).

Algorithmic Search for Flexibility using Resultants of Polynomial Systems. Robert H. Lewis and E. A. Coutsias, pp. 68-79. Automated Deduction in Geometry: 6th International Workshop, Pontevedra Spain, August 31- September 2, 2006, Revised Papers. Series: Lecture Notes in Computer Science, Vol. 4869 Sublibrary: Lecture Notes in Artificial Intelligence Botana, Francisco; Recio, Tomas (Eds.) Springer, Berlin, 2007.

Ellison, James

A New Model for the Strong-Strong Beam-Beam Interaction. New Journal of Physics 9, (2007) 32 p.1-20 J.A. Ellison, A. Sobol and M. Vogt.

Polarization Fields and Phase Space Densities in Storage Rings: Stroboscopic Averaging and the Ergodic Theorem. Physica D 234, (2007) p.131-149 J.A. Ellison and K. Heinemann.

Self-Consistent Computation of Electrodynamic Fields and Phase Space Densities For Particles on Curved Planar Orbits. Invited paper in Proceedings of PAC 2007, Albuquerque, p.899-903 (2007) J.A. Ellison, G. Bassi, K. Heinemann, M. Venturini and R. Warnock.

Gilfeather, Frank

Gilfeather F, Hamine V, Helman P, Hutt J, Loring T, Lyons CR, Veroff R, Learning and modeling biosignatures from tissue images. Computers in biology and medicine, vol 37, (2007), 1539-52.

Guindani, Michele

J.A. Duan, M. Guindani, A.E. Gelfand (2007), Generalized Spatial Dirichlet Process Models, Biometrika, 94, 4, 809-825.

A.E. Gelfand, M. Guindani, S. Petrone, *Bayesian nonparametric modelling for spatial data using Dirichlet processes* (with discussion) in J. M. Bernardo, M. J. Bayarri, J. O. Berger, A. P. Dawid, D. Heckerman, A. F. M. Smith and M. West (eds), Bayesian Statistics 8 (2007). Oxford: Oxford University Press.

Hagstrom, Thomas

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6. Outside Professional Activities of Staff Members

Gail Mercer, Administrative Assistant III graduated from the Management Academy in February 2008.

Sterling Coke was named IT Agent for the College of Arts and Sciences.

Department of Philosophy College of Arts and Sciences Annual Report July 1, 2007 to June 30, 2008 Submitted by John Taber, Chair

1. Significant developments during the academic year 2007-08

Interest in Philosophy as a major among undergraduates continues to be strong. According to Office of the Registrar statistics the Philosophy Department had 81 Philosophy majors, 27 English-Philosophy majors, and 5 Economics-Philosophy majors in Spring of 2008, equaling a total of 113 majors across all programs. Moreover, 19 students list Philosophy as a second major and 31 students in University College list Philosophy as their intended major. Seventeen students graduated with B.A.'s in Philosophy in Fall, 2007, and sixteen in Spring, 2008.

Two new students were admitted to the Ph.D. program (with full financial aid) and four to the M.A. Meanwhile, three students (John Hartnett, Walter Wietzke, and David Burns) attained their M.A. degrees (Wietzke in summer, 2007). John Hartnett was accepted to the Philosophy Ph.D. program at the University of California, San Diego. In Spring term Mark Ralkowski was awarded the Ph.D. degree, with distinction.

Two of our Ph.D. students, Carolyn Thomas and Mark Ralkowski, received the Susan Deese Roberts Teaching Assistant of the Year Award in the spring.

Christian Wood received the Barrett Dissertation Fellowship in the spring. The Department voted to award the Barrett Dissertation Fellowship to Allison Hagerman for the coming Spring, 2009.

No faculty took sabbaticals last year. Prof. Adrian Johnston was on junior research leave in the fall and Prof. Mary Domski in the spring.

There were no retirements or resignations.

Two new faculty were hired at the level of assistant professor: Dr. Paul Livingston (Ph.D., University of California, Irivine), formerly of Villanova University, and Dr. Paul Katsafanas, who earned his Ph.D. in Philosophy from Harvard University in August, 2008. Prof. Livingston works in metaphysics, philosophy of language, the history of analytic philosophy, philosophy of science, and phenomenology. Prof. Katsafanas specializes in ethics. He will also participate in the BA/MD program, teaching their capstone seminar in bio-medical ethics.

Prof. Domski successfully passed her mid-probationary review.

The Department continued to use funds from a grant received from the New Mexico State Legislature in 2005 to renovate its library. (The remaining funds must be spent by the end of this fiscal year.)

The Department co-sponsored the Summer Seminar on Buddhism at Jemez Springs in June, together with the UNM Religious Studies Program and the Rinzai-ji Zen Center. The featured speakers last year were Alan Wallace, of the Santa Barbara Institute for Consciousness Studies, Mark Siderits, of Illinois State University, Paula Arai, of Louisiana State University, and David Riggs, of Oberlin College.

The Department sponsored its sixth annual Philosophy Student Conference on the theme "Philosophy and Its History" in November. The keynote speaker was Donald Rutherford, of the University of California, San Diego.

Over the course of the year, but especially during the summer, the Department worked on the self-study for its upcoming Academic Program Review, with the visit of the outside review team scheduled to take place Oct. 13-15, 2008.

Perhaps the highlight of the year was the Brian O'Neil Memorial Lecture, which has delivered by the famous European philosopher Slavoj Žižek in November. The lecture was well publicized, and over four hundred people from UNM and the wider community attended. (The talk was held in Woodword Auditorium.)

The complete list of speakers for the year, including UNM faculty, is as follows:

September 21, Friday	Mary Domski, University of New Mexico, The
	Mathematical Character of Descartes' Early Metaphysics.

October 26, Friday	Anthony Steinbock, Southern Illinois University at
	Carbondale, Mysticism, Religious Experience, and the
	Overtime of Friday

Question of Evidence

November 2, Friday Nancy Bauer, Tufts University, What is to Be Done With Austin?

Brian O'Neil Lecturer

November 30, Friday

Slavoj Žižek, International Director of the Birkbeck
Institute for the Humanities, Birkbeck College, University
of London, Fear Thy Neighbor as Thyself, will begin at 7
PM inWoodward Hall, Room 101

Friday, January 25 Paul Livingston, Villanova University, Frege on the Context Principle, Psychologism and Sense

Friday, February 8	Erica Stonestreet, University of Michigan, Self-Creating Reasons
Monday, February 11	Todd Hedrick, Georgetown University, The Role of Law in Habermas' Theory of Democracy: Complement, Substitute, or Saboteur?
Friday, February 22	Steven Levine, The New School for Social Research, Truth and Moral Validity: On Habermas' Domesticated Pragmatism.
Friday, February 29	Agnieszka Jaworska, Stanford University, Moral Psychology in Practice: Lessons from Alzheimer's Disease and the 'Terrible Twos'.
Friday, April 4	Frederick Neuhouser, Barnard College, Columbia University, Rousseau and the Problem with Self-Love (Amour-propre).
Friday, April 11	Mark Jenkins, Johns Hopkins University, What's Wrong with Wolf on What's Wrong with Williams and Frankfurt.
Wednesday, April 16	Paul Katsafanas, Harvard University, From Philosophical Psychology to Ethics.
Friday, April 18	Birgit Kellner, University of Vienna, Austria, Critical Attitudes Towards External Reality in South Asian Buddhist Thought - Some Perspectives.
Friday, April 25	Heiki Kovalainen, Univesity of Tampere, Finland, Thought and Life: Emersonian Aspirations for Unity.

Plans and recommendations

The O'Neil Lecturer this year is the equally distinguished Hilary Putnam, Prof. Emer., Philosophy, Harvard University.

The Department plans to propose to the College that Philosophy 156, Reasoning and Critical Thinking, be developed as a course that will partially satisfy the university undergraduate writing requirement, possibly substituting for English 102. We would like to modify the course to meet that need, increase the number of sections offered and, correspondingly, the number of Philosophy TA's required to teach them.

2. Appointments to faculty/staff

Profs. Paul Livingston and Paul Katsafanas (see above).

3. Separations from faculty/staff

In August, 2007, Sandy Robbins, Departmental Administrator since 1988, retired. Theresa Lopez, formerly of the College of Arts and Sciences, joined the Department as its new Administrator at the end of August.

4. Publications of faculty

Burgess, Andrew J.:

"Irony as Ethical Argumentation in Kierkegaard." Proceedings of the Sixth Conference of the International Society for the Study of Argumentation. Ed. Franz H. van Eemeren, J. Anthony Blair, Charles A. Willard, Bart Barssen. Amsterdam: Sic Sat, 2007. pp. 185-191

"Kierkegaard's Rhetoric and Aesthetics against the Background of Kant, Schlegel and Hegel." Eds. Ján Liguš and Lucia Rákayová. *Kierkegaard and Great Philosophers*. Acta Kierkegaardiana, vol. 2. Mexico City, Barcelona, Šal'a: Sociedad Iberoamericana de Estudios Kierkegaardianos, University of Barcelona, Kierkegaard Society of Slovakia, 2007. pp. 11-22.

Bussanich, John

review of: Emilsson (E.K.) *Plotinus on Intellect*. Pp. viii + 232. Oxford Clarendon Press, 2007. £35. ISBN: 978-0-19-92817-1. *Classical Review* 58.2 (2008): 439-441.

Domski, Mary

"Evolving maths": Review of Peter S. Rudman, *How Mathematics Happened: The First 50,000 Years* (Prometheus Books, 2007). *Endeavour* (2008) 32: 39-41.

Russell Goodman:

"Two Genealogies of Action in Pragmatism," *Cognitio* (Brazil) v. 8 no. 2, July-December, 2007, pp. 213-22.

"Some Sources of Hilary Putnam's Pragmatism," in Following Putnam's Trail: On Realism and other Issues,, ed., M. Monroy and C. Cancela. Amsterdam: Rodopi 2008.

Hayes, Richard P.

Review of James Duerlinger, Indian Buddhist Theories of Persons: Vasubandhu's Refutation of a Theory of a Self," H-Net Buddhist Scholars Information Network, h-buddhism@h-net.msu.edu, February, 2007

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Johnston, Adrian

book: Žižek's Ontology: A Transcendental Materialist Theory of Subjectivity, Evanston: Northwestern University Press, 2008.

Livingston, Paul

book: Philosophy and the Vision of Language (London: Routledge, 2008)

"Wittgenstein, Kant, and the Critique of Totality," Philosophy and Social Criticism 33:6 (2007): 691-715.

Thomson, Iain

"On the Advantages and Disadvantages of Reading Heidegger Backward: White's *Time and Death*," *Inquiry* 50.1 (2007): 103-20.

5. Outside professional activities of staff members

Becker, Kelly

APA Pacific Division Program Committee Referee for Erkenntnis, Australian Journal of Philosophy and other journals

Burgess, Andrew

Co-Chair, Steering Committee, Kierkegaard, Religion, and Culture Group, American Academy of Religion

Bussanich, John

paper, "The Triumph of the Archaic: Peter Kingsley's Interpretation of Parmenides & Empedocles," American Academy of Religion national meeting, San Diego, November 2007.

Co-Editor, Ancient Philosophy Board of Directors, International Society for Neoplatonic Studies Referee, Cambridge University Press

Domski, Mary

"Locke and Kant on Synthesis and Imagination in Mathematics" (*refereed*) HOPOS, The International Society for the History of the Philosophy of Science Seventh Biennial Congress, 18-21 June 2008, Vancouver, British Columbia

"The God of Geometry, The God of Matter" (refereed &HPS1: First Conference in Integrated History and Philosophy of Science, 11-13 October 2007, Center for Philosophy of Science, University of Pittsburgh

"Newton as Historically-Minded Philosopher" (*refereed*) Newton and/as Philosophy (URL = http://www.leidenuniv.nl/philosophy/NAAP2007/), 21-25 June 2007, Leiden University, The Netherlands

Co-organizer, Southwest Seminar for Early Modern Philosophy

Goodman, Russell

"'Experience' and the Republic: Emerson, Plato, Heidegger, and Cavell," Conference on Stanley Cavell and Literary Criticism, University of Edinburgh, Scotland, May 7-9, 2008.

Hayes, Richard

Associate Editor, Journal of Indian Philosophy

Johnston, Adrian

paper: "Formalization and Materiality: A Round-Table Discussion with Alain Badiou," University of California at Los Angeles and CalArts, Los Angeles, California, 2008.

paper: "Being Underdetermined: Natural Denaturalization and the Freudian-Lacanian Body," *International Society for Psychoanalysis and Philosophy* (foundational meeting), Catholic University of Louvain, Louvain, Belgium and University of Paris VII: Denis Diderot, Paris, France, 2008.

paper: "Psychoanalysis, Politics, and Utopia," Emory Psychoanalytic Institute, Department of Psychiatry and Behavioral Sciences, Emory School of Medicine, Emory University, Atlanta, Georgia, 2007.

Executive committee, Affiliated Psychoanalytic Workgroups
Editorial board, International Journal of Žižek Studies
Referee for Continental Philosophy Review, Journal for Lacanian Studies, and several other journals

Kalar, Brent

"Beyond Apollo and Dionysus: Nietzsche's Other Early Concept of Aesthetic Experience," American Society for Aesthetics Annual Meeting, Los Angeles, CA, November 7-10, 2007

paper: "Cavell and the Rationality of Criticism," Conference: Stanley Cavell and Literary Criticism, University of Edinburgh, Scotland, May 7-9, 2008.

Taber, John

paper: "Kumārila's Buddhist Opponents in the Śūnyavāda Chapter," for panel on Svasamvedanā (Self-Awareness), chaired by Birgit Kellner, International Association of Buddhist Studies Conference, Atlanta, GA, June 29, 2008

invited lecture: "Some Main Characteristics of Indian Philosophy," Dean's Lecture, St. John's College, Santa Fe, New Mexico, September 7, 2007

invited lecture: "The Doctrine of the Eternality of Language in Indian Philosophy," Department of South and Southeast Asian Studies, University of California, Berkeley, March 11, 2008

Associate Editor, Journal of Indian Philosophy

Thomson, Iain

paper, "Heidegger's Phenomenology of Death in *Being and Time*," Philosophy Departmen colloquium, Indiana-Purdue University, Fort Wayne, Indiana, 11 October 2007

"Heidegger on Ontotheology: The History that We Are," J. Glenn Grey Colloquia Series, Philosophy Department, Colorado College, Colorado Springs, Colorado, 7 February 2008.

Referee for International Journal of Philosophical Studies and various other journals.

6. Outside Sponsored Research

Grant from the National Science Foundation to Mary Domski (PI) to conduct a pilot study for a program to train Philosophy graduate students and engineering students to team-teach courses on engineering ethics in area colleges (\$100,000). Two Philosophy Ph.D. students, Laura Guerrero and Tara Kennedy, are currently supported by this grant.

John Taber

Chair, Philosophy Department

Jun July 19/3/08

DEPARTMENT OF PHYSICS AND ASTRONOMY July 1, 2007 to June 30, 2008

Professor Bernd Bassalleck, Chair

Significant Developments

The most significant developments during the 07/08 academic year include the hiring of one new tenure-track faculty member: Assistant Professor Rouzbeh Allahverdi, who works in theoretical particle and particle-astrophysics/cosmology. He came to us from the Perimeter Institute in Waterloo/Ontario/Canada. With him we had 29 tenure-stream faculty members during 07/08, including Profs. McIver (Interim VPR) and Duncan (Director of the Institute for Advanced Studies at LANL). Professor Dinesh Loomba underwent successful tenure & promotion review during 07/08, resulting in tenure and promotion to Associate Professor, effective with the 08/09 academic year. Assistant Professors Ylva Pihlstroem and JM Geremia underwent successful mid-probationary reviews during 07/08. For other personnel changes (faculty & staff), see the separate sections below.

Reorganization and better functioning of the departmental office staff has been a high priority in recent years, and significant progress had already been achieved prior to this year. At the same time it must be mentioned that unfortunately the demands on our departmental admin staff imposed by our upper administration continue to increase, without giving the department sufficient resources. Complaints about inconsistent and sometimes even contradictory responses from different branches of our upper administration (to questions by departmental staff about processes or procedures) have also reached new levels. In general, this department shares the recently strongly expressed, College-wide concern that our admin staff is rapidly approaching a breaking point.

Further progress has been and continues to be made in the area of cross-training among our office staff. As mentioned last year, during 06/07 the clear need for an additional staff member for grant support (pre- and post-award) and some accounting help was identified. Funding for this new position for 07/08 was secured out of salary savings in consultation with the Dean, and a successful search was completed at the end of 2007, see later. Unfortunately corresponding salary support for this vital new position in the current year (08/09) is not available in A&S, and therefore the position is currently 100% supported by the departmental overhead account. Clearly securing A&S support for this position is one of our top priorities in the near future.

As in previous years, Banner has remained a source of considerable frustration for many, from staff to faculty in their role as instructors and as researchers.

After our departmental overhead account became debt-free as of July 1, 2004 we've been able to easily fulfill our start-up commitments to new faculty hires this year as well

as remaining start-up obligations. In addition, a healthy carry-forward on this account will hopefully enable other meaningful investments in the future.

Overhead return to the department has remained healthy. For CY01/02/03/04/05/06 the departmental overhead allocations were \$159k/190k/192.5k/165.5k/180k/171k. (For CY02 and 03 the numbers represent averages, correcting a mistake in the allocation made in summer 2003). Starting in summer 2008, i.e. with FY09, OVPR has of course shifted to a rather different model of "live" F&A allocation, based on ongoing research expenditures and not retroactive based on the previous calendar year's expenditures - although our College still took the CY07 expenditures into account for our allocation. In the end, our FY09 allocation (total estimated amount) of \$163.6k is very much in line with other recent years. In the present, VERY difficult funding climate (for most subfields of the physical sciences) these numbers signify at least an ongoing research vitality of our department. The remaining problem of the debt of our Institute for Astrophysics (IfA), accumulated while reporting to Deans prior to Dean Dasenbrock, has not yet been addressed any further.

Triggered by UNMH expansion plans, in spring 2008 serious planning started for a new building for our department, with a most likely location on main campus and possibly with the incorporation of Regener Hall facilities from the very beginning, although none of those decisions have been finalized yet. The needs assessment for our research and teaching mission, as well as the initial programming phase for a new building proceeded at a remarkable pace during spring & summer of 2008.

Future Plans

We continue to rely on our 2004 departmental Long Range Plan (mentioned in previous Annual Reports) for new faculty hiring decisions, and this plan has served us very well indeed. Over the last several years we've actually made good progress in filling several of our top priority slots in different subfields. Apart from achieving at least a certain critical mass (thanks to multiple hires) in radio-astronomy and in optical biophysics, we hired the aforementioned theorist (Rouzbeh Allahverdi) in fall 2007, after which we remain committed to a couple additional hires in theoretical physics. We continue to remain interested in and to look for targets of opportunity along the lines of joint hires with other entities, whether at UNM or via the National Labs.

The retirement of Lecturer II John Caffo in May 2008 and the departure (for a position at Cornell) of Lecturer III Kathy Dimiduk in summer 2008 left a gaping hole in our teaching roster. In both cases significant and increasing bureaucratic burdens in the teaching of large introductory classes at UNM contributed very significantly to the departure of these two outstanding Lecturers. Replacing them as soon as possible is clearly one of our top priorities, and one search has been approved and is presently ongoing.

In spring 2008 we decided it is time for a revision of our aforementioned departmental Long Range Plan, and we're committed to see this new planning effort through during

the 08/09 academic year. The serious and rather fast-paced, ongoing planning for our new building was already mentioned above.

New Appointments

Our one new tenure-track faculty hire for 07/08 has already been mentioned. Monica Fishel, our aforementioned new grant support staff member, started on January 2nd, 2008. With support by the College of A&S and the School of Engineering a half-time Student Program Coordinator position for our graduate program in Optical Science & Engineering was newly created and filled by Alisa Gibson on October 1, 2007. In addition, a new accountant, Patrick Newman, started on April 1, 2008, taking over from Betty Fry, see below.

Separations/Retirements/Deaths

As already indicated, Lecturer II John Caffo retired in May 2008, and Lecturer III Kathy Dimiduk left us in summer 2008, both very sorely missed. In addition, at the end of the 07/08 academic year Professor Jack McIver (Interim VPR) left UNM for the position of VP for Research at the University of Idaho and Professor Rob Duncan left to assume the Vice Chancellorship for Research at the University of Missouri in Columbia/MO. Our accountant Betty Fry retired effective April 30, 2008, and our Student Program Coordinator, Roxanne Littlefield, left for a position in the Math department effective June 6, 2008.

Graduation Statistics

Between the summer semester 07 and the spring semester 08, the department graduated 14 BS in Physics (4 women among them), 6 BS in Astrophysics (3 women), 3 BA in Physics & Astrophysics (1 woman), 13 MS in Physics (no women), 7 MS in Optical Sciences & Engineering (2 women), 5 PhD in Physics (1 woman), and 3 PhD in Optical Sciences & Engineering (1 woman). This represents a very large graduating class for us. In fact, the undergraduate degrees are a clear record for this department, with 23 total.

Outside Sponsored Research and Publications

Research efforts in the department remain strong. For FY08, funding for new and existing/continuation/renewal grants in the department (including Institutes and Centers housed in the department, such as the Center for Advanced Studies, the Institute for Astrophysics, the NM Center for Particle Physics, and the Consortium of the Americas for Interdisciplinary Science) amounted to \$6.6M. For comparison, the corresponding amounts for FY02/03/04/05/06/07 were \$6.4M/\$5.3M/\$6.0M/\$8.8M/\$7.7M/\$5.8M, respectively. The total number of awards received in FY03/04/05/06/07/08 was 54/51/54/56/41/47, respectively. Some of the fluctuations in the total award \$s is simply a consequence of large grants not happening every year. Overall grant activity has certainly remained healthy, especially considering the significant ongoing federal funding hurdles for the physical sciences.

The overhead return to the department is perhaps more meaningful than the numbers just cited, because it is based on actual expenditures during a given year. Those returns were already listed in the first section of this report. Another meaningful number is the total grant spending, (i.e. total direct costs plus overhead). For FY05/06/07/08 those numbers were \$6.6M/\$6.7M/\$6.1M/\$7.0M, respectively.

Publications in refereed journals, as well as conference contributions and proceedings, invited talks, etc. by faculty members of this department are much too numerous to list here - suffice it to say that well over one hundred papers were published in refereed journals alone.

Awards, Special Grants or Contracts, and Special Events

In November 2007 we learned that our graduate students Sharon Meidt and Paul Thorman were awarded NM Space Grant Scholarships for 2008, in Sharon's case for the second year in a row.

In April 2008 graduate student Daniel Bender won the best poster prize at the Photonics West conference in SanJose.

In May 2008 Research Professor David Emin was among those selected by the editors of APS (American Physical Society) journals in the first group of APS "Outstanding Referees". During the same month graduate student Benji Lewis won a PhD thesis award at Brookhaven National Lab, for experimental particle physics work performed there as a UNM PhD student.

Also in May 2008 our Lecturer Mickey Odom was presented with the William P. and Heather W. Weber Award for outstanding performance and dedication to teaching by our College of A&S. In addition, Professor Trish Henning was elected Vice Chair of the US Square Kilometer Array Consortium, a very large, planned radio-astronomy research facility.

And at the end of June 2008 Professor John McGraw was named one of the recipients of the College of A&S 2008 Teaching Excellence Awards, in recognition of his many years of contributions through the quality, breadth, and impact of his astronomy teaching activities.

Thanks to financial support by the LANL Institute for Advanced Studies we were able to acquire a nice video conferencing setup in fall 2007. This is now routinely used for the transmission of seminars and colloquia to and from LANL as well as from the National Radio Astronomy Observatory in Socorro.

Special Departmental Service & Outreach Contributions

As in previous years, we again participated in various UNM recruitment activities such as Senior Day, Hispanic Student Day, School-to-World Day, Star Scholar's Reception, etc. Our Campus Observatory was staffed (including one faculty member) for public night viewing every Friday evening during the academic year, weather permitting of course - a very long established tradition of our department, in collaboration with the Albuquerque Astronomical Society. In addition, we continued our tradition of Open Houses for prospective graduate students (every spring we invite the best domestic applicants, expenses paid), as well as for high school students and first or second year undergraduates already at UNM. These Open Houses include research laboratory tours and interactions with various faculty members.

Last, but not least, it is worth pointing out that after last year's chairing of the important Research Study Group by Prof. Carl Caves, in FY08 Professor John McGraw assumed the important role of co-Chair of the newly formed ERAC (Executive Research Advisory Committee).

ANNUAL REPORT

DEPARTMENT OF POLITICAL SCIENCE

July 1, 2007 through June 30, 2008 Mark Peceny, Chair

I. SIGNIFICANT DEVELOPMENTS

A. UNDERGRADUATE PROGRAM

The department graduated 153 majors, including six students who received departmental honors: Rachel N. Fredman, Angelina L. Gonzalez-Aller, and Christopher H. Miller were awarded Summa Cum Laude, Caleb L. Franzoy and John E. Smeltzer were awarded Magna Cum Laude, and Deborah J. Baker was awarded Cum Laude. The annual commencement ceremony was held in Ballrooms B & C of the Student Union Building and attended by over 425 students and guests. Bernalillo County Clerk and UNM Political Science alumnus, Margaret Toulouse-Oliver was the commencement speaker.

Senior honors student, John E. Smeltzer, received the Clauve Outstanding Senior award. He also won a Fulbright Scholarship to study voter mobility issues at McGill University in Montreal.

B. GRADUATE PROGRAM

The department awarded M.A. degrees to Benjamin J. Bonin, Yury Bosin, Philip E. Hultquist, and James M. Romero.

Matt Ingram presented part of his dissertation research at the Federal University of Pernambuco (UFPE), in Recife, Brazil, at the invitation of Prof. Ernani Carvalho (Dept of Social Sciences).

Michele Leiby conducted field work in Peru on wartime sexual violence. Her paper "Sexual Violence as a Strategic Weapon of War" was accepted for publication in International Studies Quarterly.

Kimberly Nolan-Garcia presented two papers at the MPSA conference in Chicago: "Transnational Actors and Labor Rights Enforcement in the North American Free Trade Agreement" and "Linking Trade and Labor Standards: Labor Rights Provisions in the US Generalized System of Preferences."

Nick Rowell presented "The Post-Liberation Theology Church, Human Rights and Civil War in Latin America," at The Paul Henry Institute Symposium on Religion and Politics at Calvin College in Grand Rapids, Michigan. He also accepted a full-time teaching position at St. Gregory's University in Shawnee, Oklahoma.

John Todsen was nominated for the Susan-Deese Roberts Teaching Assistant of the Year award.

Diana Walters studied in the ICPSR Summer program at the University of Michigan. The Robert Wood Johnson Foundation Center for Health Policy sponsored her trip.

Awards:

Jason Morin, along with Professors Rocca and Sanchez, received the "Best Paper on Latino Politics" award at the WPSA meeting this March.

Albert Palma received a Fulbright scholarship to study in Brazil.

Yann Kerevel, Jason Morin, Ron Nikora, and Albert Palma each received a Graduate Fellowship from the Office of Graduate Studies.

Diana Walters and Kimberly Henderson received Robert Wood Johnson Foundation Ph.D. Fellowships.

Benjamin Bonin, Justin Delacour, Tali Gluch, John Todsen, and Eric Wallace received New Mexico Graduate Scholarship Awards from the College of Arts & Sciences.

Matthew Ingram and Kimberly Nolan-Garcia received Ph.D. Fellowships from the UNM Latin American and Iberian Institute.

Six new students were admitted to our graduate program for the 2007-2008 academic year. The department currently has 5 M.A. students and 29 Ph.D. students enrolled.

C. INSTITUTE FOR PUBLIC POLICY

The Institute for Public Policy was transferred from the Department of Political Science to the Institute of Public Law. Both Institutes are under the Directorship of Paul Biderman.

D. SPEAKERS

Lonna Atkeson

"External Efficacy and Hurricane Katrina to be presented at the American Political Science Association, Boston, Massachusetts." August, 2008.

"Election Auditing," to be presented at the American Political Science Association, Boston, Massachusetts August 2008.

"Voter Attitudes toward Voter Identification," presented at the Midwest Political Science Association, April 2-4, 2008, Chicago, Illinois.

"New Barriers to Participation: An Examination of the Application of Voter ID Laws in New Mexico's 2006 Election" presented at the American Political Science Association, August 29-September 2, 2007, Chicago, Illinois, with Lisa Bryant, Kyle Saunders, Thad Hall, R. Michael Alvarez.

Ellen Grigsby

Panel Chair, "Pre-Law Advising: Beyond the Basics." Drexel University College of Law, Philadelphia, PA, September 22, 2007.

"Tragedy as a Teacher of Liberal Complexity." Paper presented at the American Political Science Association Annual Meeting, Chicago, IL, September 1, 2007.

Wendy Hansen

"Is There a Democratic Peace in Trade Conflict?," with Jeffrey Drope, presented at the Annual Meeting of the American Political Science Association Conference in Chicago, September 2007.

Kathy Powers

Treaty Nestedness and Complex Security Institutions: The Case of the CIS and Russia. (with John P. Willerton, Tatiana Vashchilko, Mikhail Beznosov, and Gary Goertz). Presented at the Annual Meeting of the American Political Science Association, Chicago. September.

Michael Rocca

"The Position Taking Value of Bill Sponsorship in Congress" (with Stacy Gordon). Presented at the Western Political Science Association Meeting, San Diego, CA March 19-22, 2008.

Chair, "Comparative Legislative Politics" panel at the Western Political Science Association annual meeting, San Diego, CA March 19 – March 22, 2008.

"Rally Killers? Congressional Response to Presidential Action during the Iraq War" (with Mark Peceny). Presented at the American Political Science Association, Chicago, IL August 30 – September 2, 2007.

Chair, "Polarization, Realignment and Partisan Change" panel at the American Political Science Association annual meeting, Chicago, IL, August 30 – September 2, 2007.

Andrew Ross

"Estranged Liberals: An Exceptional European Experiment and American Exceptionalism." A paper presented at the 49th Annual Convention—"Bridging Multiple Divides"—of the International Studies Association, San Francisco, CA, 26-29 March 2008.

Discussant, panel on "The ESDP Yesterday and Today," at the Sixth Pan-European International Relations Conference—"Making Sense of a Pluralist World"—of the Standing Group on International Relations, European Consortium for Political Research, University of Turin, Italy, 12-15 September 2007.

"Global Governance, Security Governance, and an Imperious United States." A paper presented at the Symposium on "Security Governance Meets Great Power Gambit: Clashes and Prospects," Swedish National Defence University, 25-26 October 2007, Stockholm.

"The Political Economy of the U.S. Grand Strategy Debate Revisited," with Peter Dombrowski. A paper presented at the 2007 Annual Conference of the International Security and Arms Control Section of the American Political Science Association and the International Security Studies Section of the International Studies Association on "Global Security Challenges: When New and Old Issues Intersect," Montreal, 19-20 October 2007. Co-sponsored by the McGill University of Montreal Research Group in International Security (REGIS) and the Department of Political Science, McGill University.

"Military Transformation and the Defense Industry," with Peter Dombrowski. A paper presented at the Conference on "The State-of-the-Art in the Global Defense Industry: Implications for the Revolution in Military Affairs (RMA)," S. Rajaratnam School of International Studies, Nanyang Technological University, Singapore, 1-2 November 2007.

Gabriel Sanchez

with Jason Morin, "The Impact of Descriptive Representation on Latino Group Consciousness." Presented at the South Western Political Science Association Conference in Las Vegas, Nevada, March 2008.

"The Impact of Ethnicity on Attitudes Toward Health Care Reform in New Mexico." Co-authored with Richard Santos, WISER Conference on Latino Public Policy, University of Washington, Seattle, WA, April 2008

"Latinos, Blacks, and Black Latinos: Competition, Cooperation, or Indifference?" Co-authored with Matt Barreto, Invited Presentation, Texas A&M University, College Station, TX, April 2008.

"Latinos, Blacks, and Black Latinos: Competition, Cooperation, or Indifference?" Co-authored with Matt Barreto, Latino National Survey Conference, Cornell University, Ithaca, New York, November 2007.

"Voter ID Requirements and the Disenfranchisement of Latino, Black and Asian Voters." Co-authored with Matt Barreto and Stephen Nuno, Annual Meeting of the American Political Science Association, Chicago, Illinois, September 2007.

"Is Perception Reality? An Investigation of the Presence and Source of Perceived Discrimination Toward and Among Latinos." Co-authored with Jessica Lavariega Monforti, Annual Meeting of the American Political Science Association, Chicago, Illinois, September 2007.

Chair and Discussant for "Changing the Rules: Causes and Consequences" panel at Western Political Science Association Conference, March 2008.

Chair and Discussion for Latino and Latino Political Incorporation and Mobilization" panel at the Southwestern Political Science Association Conference, March 2008

William Stanley

"Hard Lessons from a Disappointing Success Story: United Nations Peacebuilding Strategy in Guatemala." Latin American Studies Association International Congress, Montreal, Canada, September 6, 2007. "Hard Lessons from a Disappointing Success Story: United Nations Peacebuilding Strategy in Guatemala," American Political Science Association Meetings, Chicago, Illinois, August 31, 2007.

E. INTERNSHIPS

Nine outstanding undergraduates worked as Congressional Interns in Washington, DC, during the academic year. Ana Benjamin, Stephanie Chu, Laura Davidson, Joseph Dworak, Colin Owens, Lillian Prince, Elinor Rushforth, Kelly Seibert, and Toni Shirley lived in Washington, DC, working as Congressional Interns while enrolled as full-time UNM students.

Thirteen junior and senior students were selected to serve one-week internships during the 2007 New Mexico Legislative session, working as junior professional staff assigned to individual legislators. Under the direction of Dr. Lonna Atkeson, the Legislative Internship Program provides a unique opportunity for our students to observe the policy-making process and for UNM to showcase our students to the Legislature.

Thirty-two undergraduates were placed as interns in public agencies, political campaigns, office of elected officials, and voluntary organizations. Under the direction of Dr. Ellen Grigsby, the program gives students practical experience in the application of political science theories while receiving course credit.

F. SCHOLARSHIPS AND FELLOWSHIP AWARDS

The department awarded nine undergraduate scholarships and five graduate research fellowships this year.

G. RESEARCH CONTRACTS AND GRANTS

The department's total in active and pending contracts and grants is \$520,000 including on-going studies funded by the National Science Foundation, PEW Charitable Trusts, and the Robert Wood Johnson Foundation on how attribution of blame shapes preferences in policy-making, reproductive health policy, and conflict-induced displacement and understanding the causes of flight.

H. FACULTY HONORS AND APPOINTMENTS

I. William Stanley was appointed Gallegos Lecturer in Political Science for 2007-2008. Political Science Lecturer, Peter Kierst was nominated for UNM Outstanding Lecturer of the Year. Michael Rocca was nominated for UNM Outstanding Teacher of the Year. Gabriel Sanchez was awarded a UNM Faculty of Color Faculty Excellence Award. Gabriel Sanchez and Michael Rocca, along with graduate student Jason Morin, were awarded the "Best Paper on Latino Politics" award at the WPSA meeting this March.

II. SIGNIFICANT PLANS

A. CURRICULUM DEVELOPMENT

The Center for Security, Technology, and Policy, a collaborative venture of UNM and Sandia National Laboratories, awarded grants in the amount of \$5,000 for projects that teamed faculty from sciences and engineering with faculty from the social sciences and humanities. The grants were developed as support of jointly taught interdisciplinary undergraduate and graduate courses that highlight the relationship between public policy and science and technology.

The Robert Wood Johnson Center for Health Policy at UNM, started with an initial commitment of \$18.5 million, was established to train the next generation of Latino and Native American Political Scientists, Economists, and Sociologists to become leaders in national debates about health policy. The Department of Political Science looks forward to working with our colleagues in the Social Sciences and in the Public Health program to develop curriculum in the field of health policy and politics to prepare our RWJF graduate fellows for successful careers in the discipline.

B. RECRUITMENT

Political Science looks forward to hiring a scholar of health policy and politics funded by the Robert Wood Johnson Foundation endowment. We also anticipate the opportunity to hire a scholar of Latin American Politics to maintain our national reputation of excellence in the study of Latin American Politics. We are

also in the early stages of planning to raise money for an endowed professorship in the study of Hispanic Politics in honor of Chris Garcia, a national leader in the study of Latino politics and former President of the University of New Mexico.

III. APPOINTMENTS TO FACULTY/STAFF None

IV. SEPARATIONS OF FACULTY/STAFF

Eric S. McLaughlin, Assistant Professor Amelia Rouse, Research Scientist III

V. PUBLICATIONS

Atkeson, Lonna R.

with Timothy Krebs, "Press Coverage in Mayoral Elections: Is there a Gender Bias?" *Political Research Quarterly* 61 (2): 239-53.

with Kyle L. Saunders, "Voter Confidence: A Local Matter?" PS: Political Science & Politics 40(October):655-660.

with Nancy Carrillo, "More is Better: The Impact of Female Representation on Citizen Attitudes Toward Government Responsiveness," *Gender and Politics* 3(1): 79-101.

"Voter Decision-Making on the Heels of Iowa," in The Western Presidential Primary, University of Utah.

with Lorraine Tafoya, "Close, but Not Close Enough: Democrats Lose Again by the Slimmest of Margins in New Mexico's First Congressional District," In War Games: Issues and Resources in the Battle for Control of Congress, edited by David Magleby and Kelly Patterson, Boulder: Paradigm Publishers.

with Kyle L. Saunders, "Voter Confidence: A Local Matter?" In *Democracy in the States: Experiments in Elections Reform*, Washington DC: Brookings.

"The 2006 New Mexico Election Administration Voter Report," University of New Mexico.

"The 2006 Colorado Election Administration Voter Report," typescript, University of New Mexico.

Contributor The New Mexico Capitol Report, Edited by Harold Morgan.

with Alvarez, R. Michael, Delia Baker, Thad E. Hall, Andrew D. Martin, Amicus Curae Social Science Brief to the US Supreme Court, Crawford v. Marion City Election Board.

with R. Michael Alvarez, Thad E. Hall, Lisa A. Bryant, Yann Kereval, Morgan Llewyllen, David Odegaard, "The 2008 New Mexico Post Election Audit Report," typescript, University of New Mexico."

Butler, Christopher K.

with Tali Gluch, and Neil J. Mitchell, "Security Forces and Sexual Violence: A Cross-National Analysis." Journal of Peace Research 44(6): 669-687.

with Mary J. Bellman and Oraz Kichiyev, "Assessing Power in Spatial Bargaining: When is There Advantage to Being Status-Quo Advantaged?." *International Studies Quarterly* 51(3): 607-623.

"Prospect Theory and Coercive Bargaining." Journal of Conflict Resolution, 51(2): 227-250.

Book review of *The Perils and Promise of Global Democracy* by Kristin M. Lord, *Political Psychology* 28(6): 811-13.

Book review of The Perils and Promise of Global Democracy by Kristin M. Lord, Political Psychology 28(6): 811-13.

"Copping Turf: The Psychology of Territorial Claims." With Philip Hultquist. Presented at the annual meeting of the American Political Science Association, Chicago, IL, August 30 - September 2, 2007.

"Social Dilemmas and Strategic Prospect Theory." Presented at the annual meeting of the International Society of Political Psychology, Portland, OR, July 4-7, 2007.

Grigsby, Ellen

"William Blackstone," "Natural Law," "Elizabeth Cady Stanton," Tinker v. Des Moines Independent Community School District," and "Virginia Declaration of Rights" in *Encyclopedia of the United States Constitution*, Ed. David Schultz. New York: Facts on File. Inc. 2007.

Hochstetler, Kathryn A.

Greening Brazil: Environmental Activism in State and Society. Durham, NC: Duke University Press. (Paperback 2007) Coauthored with Margaret E. Keck

Can Civil Society Organizations Solve the Crisis of Partisan Representation in Latin America? Latin American Politics and Society 50, 2: 1-32. With Elisabeth Jay Friedman

Representação, Partidos e Sociedade Civil na Argentina e no Brasil [Representation, Parties and Civil Society in Argentina and Brazil]. *Caderno CRH* (Brazil) 21, 52: 47-66. With Elisabeth Jay Friedman (editorreviewed)

Creative Approaches to Preserving Biodiversity in Brazil and the Amazon. To be included in Saving Biological Diversity: Balancing Protection of Endangered Species and Ecosystems, ed. R. Askins, G. Dreyer, G. Visiglio, and D. Whitelaw. New York: Springer, 177-186. With Margaret E. Keck

The Multi-level Governance of GM Food in Mercosur. In *The International Politics of Genetically Modified Food: Diplomacy, Trade, and Law,* ed. R. Falkner. Hampshire, UK: Palgrave MacMillan, 157-173.

Matthew M. Taylor, Judging Policy: Courts and Policy Reform in Democratic Brazil. Stanford: Stanford University Press, 2008. Law and Politics Book Review 18, 19.

Javier Auyero, Routine Politics and Violence in Argentina: The Gray Zone of State Power. Cambridge: Cambridge University Press, 2007. Perspectives on Politics 6, 2: 396-397.

Krebs, Timothy B.

Coauthored with David B. Holian. 2007. "Competitive Positioning, Deracialization, and Attack Speech: A Study of Negative Campaigning in the 2001 Los Angeles Mayoral Election." American Politics Research 35:123-149.

with Oraz Kichiyev, "New Mexico." In Annual Western States Budget Review. Salt Lake City, UT: Center for Public Policy and Administration, University of Utah.

Powers, Kathy

"The Globalization of Reparations Movements," NAACP Special Edition July-August, 2nd edition.

Rocca, Michael S.

With Gabriel Sanchez, "The Effect of Race and Ethnicity on Bill Sponsorship and Cosponsorship in Congress." *American Politics Research* 36: 130-152. 2008.

with Gabriel Sanchez and Joseph Uscinski. "Personal Attributes and Latino Voting Behavior in Congress." Social Sciences Quarterly 89: 392-405. 2008.

"Non-Legislative Debate in the House of Representatives." American Politics Research 35: 489-505. 2007. Ross, Andrew L.

"A Progressive European Union, a Problematic United States: An Exceptional Experiment Contends with American Exceptionalism" in Kjell Engelbrekt and Jan Hallenberg, eds., *The European Union and Strategy: An Emerging Actor* (London and New York: Routledge, 2008).

Sanchez, Gabriel R.

with F. Chris Garcia, Moving (into) the Mainstream?: Latinos in or out of the U.S. Political System, Pearson: *Prentice Hall*. Upper Saddle River, New Jersey, 462 pages. 2007.

with Michael Rocca, "The Effect of Race and Ethnicity on Bill Sponsorship and Cosponsorship in Congress." *American Politics Research.* 36:1, pgs. 130-152, January 2008.

with Michael Rocca and Joe Uscinski. "Personal Attributes and Latino Voting in Congress." Social Science Quarterly. 89:2, pgs. 392-405, June 2008.

"Latino Group Consciousness and Perceptions of Commonality With African Americans." Social Science Quarterly. 89:2, pgs. 428-444, June 2008.

Sierra, Christine M.

Coauthored with Pei-te Lien, Dianne Pinderhughes, and Carol Hardy-Fanta. "The Voting Rights Act and the Election of Nonwhite Officials." PS: Political Science & Politics, Vol. XL, No. 3 (July 2007): 489-494.

Kate Nash. "Clinton, Obama Top Richardson Among Hispanics." The Albuquerque Tribune, July 18, 2007. Internet posting, http://www.abqtrib.com/news/2007/jul/18/clinton-obama-beat-richardson-hispanics/

Stanley, William D.

"Multiple Transitions and Interim Governance El Salvador and Guatemala," for *Interim Governments: Institutional Bridges to Peace and Democracy?* Karen Guttierri and Jessica Piombo, eds., pp. 123-146. Washington, D.C.: United States Institute of Peace Press, 2007.

"Business as Usual? Justice and Policing Reform in Postwar Guatemala," in *Constructing Justice and Security After War*, Charles T. Call, ed., pp. 113-155. Washington, D.C.: United States Institute of Peace Press, 2007.

Book review of Landscapes of Struggle: Politics, Society, and Community in El Salvador, Aldo Lauria-Santiago and Leigh Binford, eds., in Hispanic American Historical Review, Vol. 87, Issue 4, November 2007, pp. 768-770.

"Struggles for Democracy in Latin America," book review of *The Last Colonial Massacre* by Greg Grandin and *Freedom of Expression in El Salvador*, by Lawrence Ladutke, *The Journal of Third World Studies*, Vol 24, No. 2 (Fall 2007), pp. 241-245.

VI. NOTEWORTHY OUTSIDE PROFESSIONAL ACTIVITIES OF FACULTY Department editorial board memberships

Served as officers or members of key committees in national or regional professional organizations Lonna Atkeson

American Political Science Association Member, 2007 APSA Sullivan Award Committee (Best Graduate Student Paper), Public Opinion and Voting Behavior

Member, 2007 APSA Best Paper Award Committee Elections, Public Opinion and Voting Behavior Council Member, Political Organizations and Parties, 2006-2008

Chair, Committee on Undergraduate and Graduate Methods, Society for Political Methodology, 2006-2007 Section Chair, Elections, Voting Behavior and Public Opinion, 2007

Chair, Emerging Scholar Award, Political Parties and Organizations Section, American Political Science Association, 2007

Christopher Butler

Reviewer for the National Science Foundation, the American Political Science Review, Conflict Management and Peace Science, Economic Inquiry, European Union Politics, Foreign Policy Analysis, International Organization, International Studies Perspectives, International Studies Quarterly, the Journal of Conflict Resolution, the Journal of Politics, the Journal of Peace Research, the Journal of Theoretical Politics, Marketing Science, Perspectives on Politics, Political Research Quarterly, and Water Resources Research.

Kathy Hochstetler

Associate Editor, Journal of Politics in Latin America Advisory Council, Inter-American Foundation Editorial board, Global Environmental Politics National Screening Committee, U.S. Student Fulbright Program, Brazil Brazilian Studies Association, Executive Committee, 2006-2010

Timothy Krebs served as Book Review Editor, Urban Affairs Review, and as Chair, Urban Data and Research Committee, Urban Politics Section of the American Political Science Association.

Christine Sierra served as a committee member for the College-Level Examination Program (CLEP) Social Sciences and History Examination Committee.

Selected invited presentations by faculty

Lonna Atkeson

"The Evolution of the Presidential Nominating System," Keynote Speaker, Fulbright Fellowship Seminar, US State Department, March 14, 2008, Bernalillo, New Mexico

"Racing to the Front: The Influence of Presidential Primary Frontloading on Presidential Primary Turnout" at "Reforming the Presidential Nomination Process" hosted by the Department of Political Science, University of Iowa, Iowa City, Iowa, January 3-4, 2008.

"Voter Confidence: The Micro Experience," presented at the First Tuesday Forums on American Democracy and Elections at the University of Arizona, Department of Political Science, October 2, 2007.

"New Barriers to Voter Participation: An Examination of New Mexico's Voter Identification Law," University of Arizona, October 2, 2007.

Ellen Grigsby

Civitas International, Texas and New Mexico Law-Related Education Delegation, San Jose, Costa Rica.

Kathryn Hochstetler

Bellagio Study and Conference Center, Bellagio, Italy Centro Brasileiro de Análise e Planejamento (CEBRAP), São Paulo, Brazil (2) Foro Uruguayo de Desarrollo Sustentable, Montevideo, Uruguay German Institute of Global and Area Studies (GIGA), Hamburg, Germany Brazilian Studies Association Plenary Session, BRASA VIII

Androw Poss

Invited participant, Second Annual Teaming Conference of the Institute for Advanced Studies at Los Alamos National Laboratory and the New Mexico Consortium, 22-23 May 2008, New Mexico State University, Las Cruces, NM.

Invited participant, "WMD Threat Forecasting Methods Workshop," Defense Threat Reduction Agency, ASCO, 7-8 May 2008, Lorton, VA.

Invited participant, Strategic / Nuclear Workforce Summit, Defense Threat Reduction University, Defense Threat Reduction Agency, Kirtland AFB, NM, 13 December 2007.

Invited participant, "40th Anniversary Safeguards Symposium," Los Alamos National Laboratory, Los Alamos, NM, 16-17 July 2007.

Other professional activities off-campus or community and public service

Lonna Atkeson

KOAT Primary Nightly News & Election Report, Primary Election Expert, June 3, 2008.

Meet the Press, Divisive Primary Research Discussed by Tim Russert, April 1, 2008

PBS Interview, In Focus: New Mexico Politics, March 2008, KNME

PBS Interview, The Line: Super Tuesday, February 5, 2008, KNME.

PBS Interview, The Line: January 21, 2008.

Kathryn Hochstetler

Brazilian Studies Association Executive Committee

Editorial board, Global Environmental Politics

National Screening Committee, U.S. Student Fulbright Program, Brazil

Andrew Ross

Organizer and Chair, "New Mexico Nuclear Study Group—A Roundtable," 83rd Annual Meeting—
"Meeting Today's Challenges Through Collaborative Science, Engineering, and Technology"—American
Association for the Advancement of Science, Southwestern and Rocky Mountain Division, University of
New Mexico, Albuquerque, NM, 9-12 April 2008.

Organizer and participant, "Busting Through: Interdisciplinary Research and Education at the University of New Mexico—A Roundtable," 83rd Annual Meeting—"Meeting Today's Challenges Through Collaborative Science, Engineering, and Technology"—American Association for the Advancement of Science, Southwestern and Rocky Mountain Division, University of New Mexico, Albuquerque, NM, 9-12 April 2008.

Gabriel Sanchez

Member Law School Minority Pipeline Committee

Member of Hispanic Heritage Month Committee

Presenter, UNM New Faculty Orientation

Faculty Steering Committee Member for Peer Mentoring of Graduate Students of Color

Faculty Advisor for UNM student group, UNM Bigs (Affiliate of Big Brothers and Sisters of

New Mexico)

Co-Chair, RWJF and McNair Undergraduate Research Conference

Contributed to "Hispanic Facts and Figures for the Nation" report as part of Hispanic Heritage Month

Committee

Served on Panel entitled "Academic Job Search," sponsored by Career Services

Conducted television interview with Channel 13 News (Super Tuesday Segment)

Presentation "Social Inequalities in US" given to the pre-Medical Student Organization

Christine Sierra

College-Level Examination Program (CLEP) Social Sciences and History Examination Committee

William Stanley

"Global Warming," at Zuni Elementary School, Albuquerque, NM

"El Salvador: Counterinsurgency Success or Dumb Luck?." Santa Fe Institute

Served on departmental, college, or university committees or held administrative positions outside the department

Lonna Atkeson

Senate Graduate Committee, Fall 2006-present

Chair, University Honorary Degree Committee, AY 2007-08

Christopher Butler

Outcomes Assessment Coordinator, 2008-.

Departmental Honors Advisor, 2007-9.

Member of the Department's Undergraduate Committee, 2007-8.

Member of the Department's Executive Committee, 2007-8.

Chair of the National Phi Kappa Phi Study Abroad Grants Selection Committee, 2007-10.

Wendy Hansen

Member, Graduate Committee, Department of Political Science, UNM, 2007-2008.

Kathryn Hochstetler

Grants and Awards Committee, Latin American Studies Interdisciplinary Committee on Latin American Studies Graduate Committee, Department of Political Science

Timothy Krebs

Graduate Advisor

Mark Peceny

Chair, Department of Political Science
Interim Director, Institute for Public Policy
International Studies Institute Board
Steering Committee, Robert Wood Johnson Foundation Center for the Study of Health Policy at UNM

Michael Rocca

Executive Committee Undergraduate Committee

Andrew Ross

Public Policy Capabilities Working Group

Gabriel Sanchez

Member, Undergraduate Committee

Christine Sierra

"The November Elections, The New Congress, and Iraq: A Panel Discussion," panel participant, Student Union Ballroom, University of New Mexico, January 26, 2007.

William Stanley

Secretary, Executive Committee and Faculty Concilium, LAII, 2005-2007 (elected position)

VII. SPONSORED RESEARCH

Wendy Hansen

Reseach Allocation Committee University of New Mexico, \$8000, Understanding the Social Costs of Forced Migration: A Study of the Impact of Civil War on Displaced Nepali Women, Summer 2008.

Gabriel Sanchez

UNM Robert Wood Johnson Foundation Interdisciplinary Research Grant, 2007; \$20,000.

VIII. OUTSIDE-SPONSORED RESEARCH

Lonna Atkeson

2007-2009 Pew Charitable Trusts, Make Voting Work Initiative, "Lessons for All in Determining Voter Intent and Election Integrity: A 2006 Post Election Audit Study of New Mexico's Optical Scan Ballots," with R. Michael Alvarez, Thad E. Hall and Maggie Toulouse Oliver, co-funded by the Bernalillo County Clerk and the New Mexico Secretary of State (\$202,926)

2007-2008 Pew Charitable Trusts, Make Voting Work Initiative, "Auditing DRE Machines in Utah" with R. Michael Alvarez and Thad E. Hall. (\$87,523)

2007 National Science Foundation, (SES-0553081), Supplemental: "Who's to Blame? Public Perceptions of the Aftermath of Hurricane Katrina" with Cherie Maestas (\$12726)

Christine Sierra

Ford Foundation, "Gender and Multicultural Leadership: The Future of Governance" (\$680,000).

ANNUAL REPORT - Academic Year 2007-2008

DEPARTMENT OF PSYCHOLOGY

Ronald Yeo, Chair

[Report Submitted by Jane Ellen Smith and Ronald Yeo]

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I. Department Information and Achievements

A. Departmental Administration and Structure

The Department continued with the administrative structure adopted in 1995. Ronald Yeo, who began serving as Chair on 5/15/04, finished out the last year of his 4-year term on July 31, 2008. He decided that he preferred to return to research full-time rather than serve a second 4-year term. Jane Ellen Smith took over as the new Chair on August 1, 2008. The Department's major administrative committee, the Planning and Policy Committee, consisted of the Department Chair, the Associate Chair for Graduate Education, Tim Goldsmith, the Associate Chair for Undergraduate Education, Gordon Hodge, and the heads of the Department's five areas of study. These areas and their respective heads were: Clinical (Jane Ellen Smith; Sarah Erickson), Cognition, Brain, Behavior (Vince Clark), Evolutionary/Developmental (Steven Gangestad), Quantitative (Harold Delaney), and Health Psychology (Bruce Smith). After considerable discussion, the department voted to stop taking new students into the Quantitative area, thereby removing it as a specialization.

As in past years, the governance and functioning of the department relied heavily on a number of faculty members who served effectively on important departmental committees. Particularly noteworthy was the very important and time-consuming work of the Graduate Admissions Committee (chaired by **Steve Gangestad**). The Graduate Admissions Committee was faced with the task of selecting the very best applicants from a pool of 196. Outstanding graduate students are essential to any good research department, and the Admissions Committee is to be commended for its work in recruiting an impressive class of new students.

The Department benefited again this year from the Quad-L Trust, which was endowed through the UNM Foundation by the late Professor Emeritus **Frank Logan**. The Quad-L Library supported by this Trust not only facilitates the study of the psychology of learning, but also provides a meeting place for students' defenses of their graduate degrees. Derek Hamilton serves as faculty advisor for the Quad-L Library.

The Psychology Department also began to reap the benefits of a new trust established by the late Emeritus Professor Robert G. Grice. These funds are divided into 5 categories: (1) a library fund (to support the growth and development of our students as researchers), (2) a colloquium series (to bring in external speakers who are likely to collaborate on research projects), (3) psychology graduate student support (primarily to help cover the tuition of students who are not otherwise covered as part of their support), (4) graduate fellowships in psychology (to recruit outstanding students for the graduate program in psychology), and (5) research enhancement for faculty projects (to allow for the generation of pilot data for grant applications and to provide matching funds for grants). During this past academic year we accessed money in the first two categories. The faculty voted to use the library fund to remodel two rooms into a computer library for graduate students and honors students. It will be fully functional in Fall 2008.

B. Faculty

New Hires

Drs. Kent Hutchison and Angela Bryan joined our faculty in Fall 2007. Both of them came to us from the Department of Psychology at the University of Colorado in Boulder. Dr. Hutchison is a clinical psychologist who is invested in improving addiction treatments. To develop more effective pharmacotherapies, he is studying medications that target basic neurobiological and behavioral mechanisms involved in the development or maintenance of addiction. He is examining vulnerability to addiction and factors associated with beneficial responses to a given treatment by studying genetic factors that might explain individual variation in the same basic neurobiological and behavioral mechanisms that influence the etiology of addiction. Dr. Bryan is a social psychologist who studies health behavior, particularly in the area of sexual risk reduction in populations at risk for HIV. She also is interested in the promotion of physical activity, and her research focuses on the assessment of differential psychological and physiological responses to exercise, and the possible genetic and biological substrates of those responses. All of her health research is aimed at developing models that guide the design, implementation, and evaluation of theory-based and empirically targeted behavior change interventions. Drs. Hutchison and Bryan are each the PIs on multiple NIH grants.

Promotions

Two faculty members were successful when they came up for tenure and promotion this year: **David Witherington** and **Geoffrey Miller**. They are both in the Evolutionary/Developmental area. *Congratulations!*

Research Activities

The research activities of the faculty are summarized in Appendices A-C. It is particularly noteworthy that this year our extramural funding exceeded over 8.9 million dollars (see Appendix B). This is certainly an extraordinary accomplishment, both in terms of the absolute level of funding achieved for a department of our size and in terms of the breadth of topics under study. We are hopeful that we can continue this high level of funding in the future. Appendix C provides a list of faculty and a list of their publications for the year. Last year the faculty published an average of 4.4 scientific papers per FTE. Clearly our faculty continues to excel in their research activities and to be productive in terms of publishing and presenting their work at professional meetings.

By whatever metric one might wish to apply, the faculty of the Department of Psychology is very good. However, a persistent threat to the quality of our faculty is salary inequity, and the real threat of losing faculty to other universities as a result. The salaries of some of our faculty are as much as 20% below national and regional norms. The minor average salary increase this year (3%) did not alter our standing with respect to peer institutions. It will take several successive years of salary increases before our faculty is compensated at a level comparable to their peers. While this problem is fully acknowledged by the central administration, more needs

to be done. There should be no doubt that the highest priority for the Department is to see faculty salaries increased to the level of regional norms immediately and to the level of national norms in the near future. This is the only way to preserve the excellence of our Department.

Awards

Jane Ellen Smith received the university's highest teaching award (2007-2009): The Presidential Teaching Fellowship. Steven Verney received the 2007-2008 Outstanding Faculty of Color Award; an award given by the Project for Peer Mentoring Graduate Students of Color to faculty who demonstrate excellence in teaching, research, mentoring, and service.

Sabbaticals

Fall 2007 = Jane Ellen Smith; Spring 2008 = Sarah Erickson

Research Faculty Positions

There were a number of other individuals within UNM and the professional community of Albuquerque who made major contributions to our teaching, training and research missions. Foremost among these are our three visiting faculty members: Milton Strauss, Janis Anderson, and Jose Navarro Guzman.

Research faculty status is granted to individuals who have excellent research records, provide research opportunities for our students, and receive extramural funding. Four years ago the Department decided to expand our list of affiliated research faculty for several reasons. These arrangements extend the range of research opportunities for our students, increase opportunities for collaborative and interdisciplinary research, and increase the amount of extramural funding generated by the Department. The corresponding increase in the indirect costs returned to the Department provides additional research support to our faculty and students and, in a self-perpetuating manner, facilitates the generation of additional extramural funding. The Department is indeed pleased with its affiliation with our research faculty, and we intend to add to that list in the future.

The department's research faculty for 2007-2008 are: Drs. Janis Anderson, Rob Anderson, Catherine Baca, Peder Johnson, Vanessa Lopez-Viets, William Miller, John Moulton, and Scott Tonigan.

Dr. Scott Tonigan (CASAA) was promoted to Research Professor this year. He contributes much to the department and the university (currently is chair of the university's IRB Committee).

Letters of Academic Title

Individuals with Letters of Academic Title typically are professionals from the community (or neighboring institutions) who contribute to the department, such as through research collaborations, teaching, or clinical supervision. (see Appendix D). The individuals who received

a title from our department in the last year were: Drs. Sarah Feldstein-Ewing, Francesca Fibley, Alyssa Forcehimes, Erin Milligan, and Brian Shelley.

A number of psychologists and researchers from other universities, other departments within the university, and from the community further enriched our educational programs by presenting research colloquia to our faculty and students. These individuals and the titles of their presentations are listed in Appendix E.

C. Graduate Education

Current Graduate Students

A total of 86 graduate students (all areas) are currently enrolled in the department. This year, the department awarded 9 Ph.D. degrees. The names of the degree recipients along with the titles of their dissertations and the names of their faculty advisors can be found in Appendix F. This brings the total of Ph.D. degrees awarded by the department to 349. In addition, the department awarded 14 Master of Science degrees this year. These degree recipients along with the titles of their theses and faculty advisors are also listed in the second half of Appendix F.

The faculty used the criteria and guidelines that were revised several years ago to evaluate each student's research productivity and degree progress. This exercise proved very useful in that each of the major areas gained a clear picture of their students' progress and were able to give specific feedback to each student. Based on this evaluation process, it is clear that our graduate students continue to be very active in both research and teaching.

Admissions

The department received 196 highly qualified applicants to the graduate program for AY 2007-2008. The Graduate Admissions Committee under the leadership of **Steve Gangestad** continued its efforts to attract the very best applicants to our graduate program. As part of this effort, **Jane Ellen Smith** again coordinated the annual Open House for visiting applicants (March 7th). After a full day of interviewing, visitors and their graduate student hosts were treated by the department to a New Mexican dinner at El Pinto. Everyone's efforts paid off inasmuch as we were able to admit 11 highly qualified students to our program this year. These students, their areas of study, and their advisors are listed in Appendix H.

Student Funding

Fortunately, the department was able to provide some financial support to all graduate students who requested aid and were in good standing. In part, this was due to the availability of research assistantships made possible by extramural funding obtained by the faculty, as well the availability of research and clinical positions outside the department. However, most of the students who received aid in our department worked as teaching assistants (TAs). This presented a problem because the ratio of the number of courses needing TAs to the number of TAs funded creates an excessive workload for our TAs. The department simply has not received sufficient

TA/GA funding to cover its needs. Moreover, TA stipends are too low relative to our peer institutions. This places us at a real disadvantage in trying to compete with other institutions for recruiting the best graduate students.

Another emerging problem is difficulty in covering tuition for our graduate students who are supported through mechanisms other than our TA/GA budget. For example, some students are funded outside of the department on grants as research assistants, but the grants do not have tuition built into the proposals. We are trying to remedy this for the future by making sure that all grantees know to include tuition (and health insurance) as an expense in future proposals that potentially involve graduate students. In the meantime we have made every attempt to cover the outstanding tuition from our overhead account.

New Clinical Graduate Assistantship

Dr. William Miller and his wife, Kathy Jackson, established a new GA position for a clinical student working with "the poorest of the poor". The position currently can fund a student for 10 hours per week, but eventually it will fund students at 20 hours/week. For this first year community agencies were invited to cover the cost of the remaining 10 hours/week (approximately \$10,000) for a student. Solid offers to cover this cost were received from Samaritan Counseling and New Mexico Solutions. The clinical faculty selected Samaritan Counseling for this first year, and plans were made to have interested students interview at Samaritan

Awards

Each year the department's Awards Committee selects winners of two awards for clinical graduate students: the Garland Award (for work with adolescents or families), and the Rosenblum Award (for work with children or families). This year's winners were: Garland (awarded Oct. 2007): Melissa Gerstle Rosenblum (awarded Oct. 2007): Mary Bancroft

Teaching Award: Jennifer Crichton Harriger was awarded the 2007-2008 Susan Deese-Roberts Outstanding Teaching Assistant Award.

The Haught Endowment went to Narimar Arfai this past year. His mentor is Vince Clark. The Haught lecture award recipient was Katherine Akers. Her mentor is Derek Hamilton.

Robert Wood Johnson Awards: Three of our graduate students received RWJ Fellowships: Julia Austin (Jane Smith), Jen Bennett (Steve Verney), and incoming student Alexis Ortiz (Bruce Smith). Impressively, three of the four RWJ awards this year were given to Psychology students.

Clinical Internships

The clinical students who applied for internships this past year did extremely well. The students

and their internship sites are:

April Brown Lightsey: Eastern Virginia Medical School, Norfolk, VA.

John Dencoff: Southern Arizona VA Healthcare System, Tucson, AZ. Brandi Fink: Michael E. DeBakey VA Medical Center, Houston, TX

Laura Lundy: UNM School of Medicine, Adult Neuropsychology, ABQ, NM.
Lauren Parks: UNM School of Medicine, Pediatric Neuropsychology, ABQ, NM.

Diversity Organization (DO!)

The Diversity Organization (DO!) had several events this past year, including an Anti-Oppression workshop for faculty and students run by a local multicultural trainer, Andrea I. Quijada, and a potluck held at **Dr. Kamilla Venner's** house on January 25th, 2008.

Academic Program Review

In the spring of 2007 our entire department underwent an academic program review, the first since 1995. The major issues raised by this report were discussed in last year's annual report. The overall conclusion reached by the review committee was that our department was doing a good job given the constraints of having very limited financial resources. In brief, the concerns were: (1) faculty understaffing in several important content areas, (2) clinical training limitations posed by the outdated department's outpatient training clinic, and (3) the extremely low ratio of faculty to undergraduate students.

The department's response to the concerns raised by the committee was discussed in several faculty meetings during Fall 2007 and Spring 2008. The Chair drafted a written response and circulated it among the entire faculty. The final response was then submitted to the Dean. The Chair presented the department's response during a university action plan meeting in June 2008.

The major issues regarding graduate education raised by our Academic Program review were:

1. The Psychology Department Clinic, which is the primary training facility for our clinical Ph.D. students, is inadequate. The report referred to the building as "old and dilapidated," and stated that it could not accommodate a clinical science model. The report also said, "Adequate space for the Clinic, whether via relocation or substantial remodeling and expansion, should be regarded as an urgent ethical imperative, beyond the evident pedagogical and public-service appeal of such an upgrade."

Department's Response:

The Chair, the Clinic Director (Dan Matthews), and the AGORA director (Molly Brack) worked hard throughout much of the year to either find a new "home" for the clinic and AGORA, or to receive approval to undergo major remodeling. There were many false starts, as buildings that initially were identified as appropriate and available eventually turned out to be unavailable. Finally in June 2008 a plan was approved to move both the clinic and AGORA into a building on Sigma Chi. Over \$250,000 in

renovations for the building was approved. The plan is to move into this building sometime during the Fall 2008 semester.

2. The department's areas of specialization may be neither viable nor in line with the advertised strengths of our graduate training:

Department's Response:

This was addressed in several areas. We do not have a separate Developmental specialization any more. The new Evolutionary/Developmental area is in need of a faculty member to bridge the two areas. This was identified as our top hiring priority. With regard to the question about the Cognition, Brain, and Behavior area, there are many faculty members within this area who do, in fact, have substantive connections in terms of research interests (e.g., between cognitive issues and imaging). As far as the Quantitative area: the difficult decision to discontinue this specialty area of graduate training was made.

3. Concerns were raised about the diversity of our faculty, and the fact that the university does not have an established program aimed at hiring faculty from underrepresented groups.

Department's Response:

Much work was done this past year through the dean's and provost's office to obtain approval for a special opportunity hire of an identified ethnic minority faculty. We were informed that the request was not going to get approved this year. In terms of a question raised about the senior faculty's participation in the department's Diversity Organization, the senior faculty made a commitment to become more active. Finally, we submitted a faculty development proposal to the American Psychological Association's Center for Ethnic Minority Recruitment, Retention and Training (CEMRRAT). The proposed faculty development program was aimed at a coordinated effort to enhance the climate to better recruit and retain minority faculty, further incorporate diversity in the teaching of undergraduate and graduate students, and increase multicultural sensitivity in clinical situations.

4. Questions were raised regarding whether our graduate students were receiving optimal training for teaching their own courses.

Department Response:

We have struggled with the issue of whether to re-institute a requirement for graduate students to take a "How to Teach" course prior to teaching. We are cautious about adding more requirements, thereby potentially further lengthening the time to complete our graduate degree. This will be re-visited, as both graduate students and faculty alike are concerned about this issue.

5. Some students requested more training in professional issues.

Department Response:

Rather than add a full-length course, several workshops will be offered regularly now. The clinical area already offered two new workshops on how to supervise and how to do psychological consultations, and our university IRB committee members offered one on IRB issues. A workshop on cross-cultural issues was offered, and a grant-writing workshop is planned.

American Psychological Association Accreditation of Clinical Program

The Clinical Psychology Program within the department was up for review by the Committee on Accreditation of the American Psychological Association (APA) during the Spring of 2007. Although the site visit by APA occurred on April 19-20, 2007, we did not receive an initial response until July of 2007. At that time the Committee on Accreditation requested additional information, which was submitted in two separate letters on August 3rd and September 21st 2007. On November 19, 2007 we received a letter from the Committee on Accreditation which basically stated that our accreditation status could be at risk if certain corrective steps were not taken. A report that addressed each of the concerns was prepared by the DCT (Jane Ellen Smith) and submitted to APA on February 14, 2008 (see Appendix G). The main issues addressed in the report were:

1. The committee was questioning our program's commitment to the accreditation process.

Department's Response:

Although we recently had changed from a scientist-practitioner to a clinical science model, we stressed to APA that we remained highly invested in APA accreditation.

2. There was concern that some of the graduate courses that were cross-listed with undergraduate courses were possibly not being taught at a graduate level.

Department's Response:

A policy was adopted in Fall 2007 which outlined the procedure for making sure that distinct requirements existed for graduate students in cross-listed classes.

3. The question was raised as to whether all students were receiving broad and general coverage of both the biological aspects and the affective aspects of behavior areas.

Department's Response:

Instead of giving students the choice from among several biologically-based courses, they are now required to take one specific course: Biological Bases of Behavior. We outlined the various required courses in which the affective aspects of behavior were covered.

4. The committee did not see any assurances of coverage of the theories and methods of consultation and supervision:

Department's Response:

We added 2 new workshops to cover these areas. The psychological consultation workshop was taught for the first time (Spring 2008) by Drs. Levensky, Kersh, and Brooks from the Behavioral Medicine Unit at the VA. The Supervision workshop was taught (Spring 2008) by Dan Matthews.

5. The program was asked to clarify the minimal level of achievement it requires for students to satisfactorily progress through the program, and the manner in which these requirements are communicated to students.

Department's Response:

A comprehensive matrix was created in which all of the requirements and the means for satisfying them are outlined.

6. The Psychology Clinic was questioned once again about its ability to adequately serve as a training facility, due to its need for renovation:

Department's Response:

(see response under Academic Program Review section)

7. The committee asked to see any new policies on student conduct and termination, and on grievances, reviews, and remediation.

Department's Response:

A new policy was written and adopted for student conduct and termination, and the grievance policy was modified and approved.

8. Current data was requested regarding our graduates' performance on the Examination for the Professional Practice in Psychology.

Department's Response:

An examination of the most recent data for this exam (2006) showed that our graduates were performing extremely well; 1.31 standard deviations above the national average. When compared to the average scores of graduates of the top 10 clinical psychology doctoral programs, our students' performances were commensurate with them.

The final report noted numerous **strengths** of the Clinical Psychology Program as well. Representative comments include:

- 1. "The program is commended on its thoughtful efforts with respect to the recruitment and retention of diverse faculty and students"
- "The program has implemented a thoughtful plan for assuring its students are exposed to and gain experience in diversity issues as they relate to research and practice in clinical psychology"

- "This program follows the clinical science model with clearly articulated goals and objectives"
- 4. "Faculty appear to be active professionally and serve as excellent role models for the program's students"
- "Students are of excellent quality and interests appropriate to the program's clinical science model"
- "The program environment appears supportive and students are treated with courtesy, respect, and ethical sensitivity"

On May 8th 2008 we received the excellent news that our Clinical Psychology Program had been awarded full accreditation; the maximum of 7 years. At the same time, APA requested updates about: (1) progress toward getting a new outpatient training clinic, (2) ensuring that all graduate courses are taught at the graduate level, and (3) ensuring broad and general coverage of the Psychological Consultation and the Supervision workshops that we offered for the first time in Spring 2008.

The Annual Report of the Clinical Program to APA is included (Appendix G).

D. Undergraduate Education

Undergraduate Majors/Minors

Stated simply, the undergraduate education productivity of the Department's faculty and staff is enormous and among the highest in the College. As of the Spring 2008 semester, the Psychology Department had a total of 1260 undergraduates with a declared major in psychology who were admitted to a major college. This is a 40% increase over the prior decade despite having the same number of FTE. The number of majors and minors per FTE = 52.1; the mean for Arts and Sciences without Psychology is 11.8. A total of 247 bachelor's degrees were awarded. The Department offers a wide variety of courses, ranging from introductory psychology to advanced courses in learning and memory, cognition, clinical/abnormal psychology, developmental psychology, social psychology, evolutionary psychology, quantitative methods, and cognitive/behavioral neuroscience. Our students are exposed to some of the best lecturers at the University and have access to advanced laboratory courses in which they design experiments and gain "hands-on" research experience with human and non-human subjects.

Psychology Honors Program

The flagship for quality education in our Department remains our Psychology Honors Program, which has been in existence for over 30 years. This program, which culminates in the student completing a year-long research project, has been especially attractive to Psychology majors who go on to pursue graduate work in Psychology. Appendix H lists our 2007-2008 honors students along with the titles of their theses and the names of their faculty supervisors. Harold Delaney continued as the instructor for the Junior Honors Seminar, and Eric Ruthruff was the Senior Honors instructor. The recipient of the Outstanding Honors Thesis award was Christina

Klauber (mentor = David Witherington), and the Outstanding Honors Student was Glory Emmanuel (mentor = Harold Delaney).

Baccalaureate Addiction Counselor (BAC) Program

Progress was made in further developing the department's new Baccalaureate Addiction Counselor (BAC) Program. **Drs. Terri Moyers, Barbara McCrady, and Jane Ellen Smith** are working together on this program. The program will not be officially started until approximately Fall 2009.

Graduation

For the 18th consecutive year, the Department hosted a spring commencement ceremony for its graduating students. The commencement address, which was delivered by Professor Jane Ellen Smith, was entitled, "Getting Mileage out of Memories". To conclude her talk, Dr. Smith showed a brief DVD that was shot by Psi Chi, and which captured favorite campus scenes/events, as well as segments of interviews of graduating seniors sharing their memories of UNM. For the first time we also had a student from our honors program speak; Christina Klauber. Previous addresses have been delivered by David Witherington, Michael Dougher, Frank Logan, William Gordon, Samuel Roll, John Gluck, Henry Ellis, William Miller, Kristina Ciesielski, Mark McDaniel, Dennis Feeney, Richard Harris, Robert Sutherland, Harold Delaney, and Lynette Cofer. Department Administrator, Trish Aragon-Mascareñas, organized the ceremony and she and her staff handled all of the arrangements. Counting the faculty, the graduates, their families and friends, almost a thousand people attended the ceremony. Needless to the say this is a huge and costly (over \$3,400) undertaking for the Department, but judging by the very positive comments from both the graduates and faculty, it is well worth the expense and effort.

Academic Program Review

The major issues regarding <u>undergraduate education</u> raised by our Academic Program review were:

1. We have too many undergraduate students for the size of our faculty. The report said, "That Psychology is carrying a load nearly 5 times higher than its peer departments in the College is quite striking."

Department's Response:

We again submitted a request to hire a Developmental Psychologist; preferably one with expertise in Evolutionary Psychology. We also requested an "open" hire in experimental psychology, as we believed that a broader search would increase our chances of a minority hire. Our request to hire was denied. We also agreed that all instructors would use WebCT for class grades, starting in Fall 2008. This will allow us to evaluate the impact of minority status and college entry ACT scores on students' educational experience. We hope to be able to add more writing assignments to our courses at various levels, but we definitely need more TA assistance in order to do so. Finally, we requested a staff position for a coordinator of the large Introductory

Psychology class. Our plan was to use this line to free up 4 TA lines, and in turn these 4 TAs would be transferred to Psych 302 so that they could help with the scientific writing portion of that class. The position was not funded, nor did we receive any additional TA lines.

2. The department's and the college's academic advising activities were not reaching enough students. The report specifically stated, "The University needs better ways to inform students about the advisors that they need to see for various purposes and at different stages in the undergraduate career."

Department's Response:

Our department advisors now visit each 200-level course each semester so that they can make brief presentations on degree requirements, psychology advisement hours, website navigation, and career opportunities. We also have added a section to our website called, "Frequently asked questions".

3. The Psychology Building, Logan Hall, is inadequate for current uses. It is too small already, and there is certainly no room for growth.

Department's Response:

Although our request to remodel Logan Hall and to add a new Community Behavioral Health addition (Psychology Clinic, Agora, and CASAA) was a high priority last year, it is no longer on the list of UNM building plans. However, we did receive \$150K from our Capital Request Proposal add a security system to our animal research facility and to refurbish animal surgery rooms.

E. Staff

Unfortunately the biggest staff news for the year was the very sudden passing of our main Administrative Assistant, Mary Justus. The department took a huge "hit" when it lost Mary, as she was extremely well-liked. The entire department (staff, faculty, and graduate students) misses her greatly. Although a make-shift memorial has been set up to honor her, we have yet to decide about a permanent way to remember Mary.

The Department of Psychology continues to benefit from an extremely competent support staff. The core administrative support staff (Stan Bennett, Trish Aragon-Mascareñas, Carol-Ann Griffin, Jeani Sarosy, and Kim Larrañaga) skillfully handles the basic functions essential to the day-to-day operations of the Department. These people get the department's administrative work done competently and efficiently. Trish Aragon-Mascareñas moved from her position as Student Advisor to Department Administrator when Candice Blashak retired in September 2007 after many years of service in the Psychology Department and the university. Stan Bennett (Department Financial Administrator), a very experienced and capable administrator, has been handling increasingly more grants in recent years. Carol-Ann Griffin assists Stan Bennett in accounting, finance, and grants, as well as coordinating with the MIND Institute and CASAA. Jeani Sarosy expertly advises students, and manages all communications with the Office of Graduate Studies (OGS) and the Department of Arts and Sciences. Kim Larrañaga started as

Administrative Assistant in the Fall of 2007. She helps organize the schedule of classes, develops much of the annual report, and tracks faculty publications. The department's core staff is truly outstanding.

Our research support staff again includes Gilbert Borunda, Senior Lab Animal Technician, Ector Estrada, Animal Research Coordinator, Patrick Sharp, Research Engineer. Our veterinarian is Dr. Kevin O'Hare. The outstanding experience, skills and efforts of these individuals are invaluable and facilitate a wide range of research activities in our department. The department is very appreciative of their important contributions.

The success of the Psychology Clinic is due in large measure to the dedication of Dan Matthews, who has served as the Clinic Staff Director for more than 20 years. Dan continues to be assisted in his duties by Wanda Sharts, the Administrative Assistant.

F. Space

As has been highlighted in the Department's Annual Report for the past 17 years, our department is not well accommodated by its current space allocation. We need a new building or a significant addition to the existing building. Currently, we have insufficient staff space in order to function optimally, and more importantly, insufficient research laboratory space. Unfortunately, during the past few years we have had to continue to convert graduate student offices into faculty research space. Even with this, we do not have sufficient, suitable research space in the building to accommodate the high level of faculty research activity that has been attained in recent years. The size of our current building places severe limitations on our ability to grow and to reach our full potential as a department. The department's request for an addition has been acknowledged on the University's Capital Projects list. As noted earlier, our American Psychological Association (APA) accreditation review specifically noted the inadequacies of the Psychology Department Clinic. These space issues remain a priority for our long-term development.

APPENDIX A

DEPARTMENT OF PSYCHOLOGY SUMMARY STATISTICS

	AY	AY	AY	AY	AY
	2003-2004	2004-2005	2005-2006 .	2006-2007	2007-2008
Faculty Information					
Voting Faculty (total) Professors Associate Professors Assistant Professors Budgeted FTE Faculty Visiting Faculty	24 11 5 7.5 7 22.5	22 9 5 7.5 21.5	21 . 7 5 9 19.4 1	22 7 5 10 20.06 1	25 7 7 11 20.47 1
Research Activities Books and Articles Extramural Support General Information	71	72	93	109	123
	8,232,120.10	7,187,187.9	1 6,627,298.5	7,948,804	8,986,229
FTE Staff	12.25	12.25	12.63	12.82	12.21
Department Budget	2,228,702	2,228,702	2,261,188	2,279,177	2,436,120

APPENDIX B

DEPARTMENT OF PSYCHOLOGY CURRENT OUTSIDE-SPONSORED RESEARCH AMOUNTS THAT INCLUDE THE CURRENT YEAR 2006-2007

Catherine Baca—Principal Investigator

National Institutes of Health (NIH); "Primary Care Intervention Alcoholism"; \$146,311.00; 9/1/03-8/31/08

Angela Bryan - Principal Investigator

NIAAA—HIV Prevention Adolescents: Neurocognitive; \$595,425.00; 9/30/2007-8/31/2008 NIDA—Marijuana use, gender, adolescent HIV sexual risk; \$785,436.00; 8/1/2007-7/31/2008

Molly Brack -- NM Health AGORA Crisis Line; \$200,000.00; 07/001/2007-06/30/2008.

Steven Gangestad/Randy Thornhill—Principal Investigator

National Science Foundation; "Genetic Conflicts of Interest, Fluctuating Asymmetry, and the MHC"; \$340,883; 08/01/02-01/31/08

Timothy Goldsmith --- Principal Investigator

Federal Aviation Administration; "Structural Knowledge Analysis of Aviation Safety Reports", \$270,000.00; 4/01/07-10/08/08.

<u>Derek Hamilton</u> – NIAAA—Prenatal Ethanol, Social Behavior & Cortex; \$358,433.00; 04/17/06-03/31/08.

Gordon Hodge --- Principal Investigator

Washington University in St. Louis; "Test Enhanced Learning", \$336,900.00; 8/1/06-7/31/08.

<u>Dan Matthews</u>—District Court FAIR; \$101,384.00; 07/01/07-06/30/08.

Barbara McCrady - Principal Investigator

Clarity; Enhance the Safety of Children Affected by Parental; \$8,171.00: 01/01/2008-09/29/2012.

William Miller-Principal Investigator

National Institute on Drug Abuse (NIDA); Clinical Trial Network"; \$881,536.05; 9/01/2003-8/31-2007

National Institute on Drug Abuse (NIDA); "Clinical Trial Network"; \$1,405,798.40; 9/1/2003-8/31/2007

Johnson Foundation; "Innovator Award Process"; \$105,879.46; 12/15/2003-12/31/2007 National Institute on Alcohol Abuse and Alcoholism (NIAAA); "Combine Year 8"; \$261,258.12; 9/1/2004-8/31/2007

Theresa Moyers-Principal Investigator

National Institute on Alcohol Abuse and Alcoholism (NIAAA); "How does MI Reduce Alcohol?"; \$185,174.73; 9/16/02-8/31/07

Loyola University; "Trauma Center Brief Intervention" (subcontract); \$24,303.00; 8/21/2006-07/31/2012

NIDA; Testing Theory-Based Training; \$1,138,532.00; 07/30/07-06/30/11.

Bruce Smith--- Principal Investigator

Sandia National Laboratories; "The Role of Emotion Regulation in Decision Making and Action in Critical Situations", \$40,000; 10/1/06-9/30/07.

Akaysha Tang - Principle Investigator

Sandia National Laboratories; "Construction, Extraction, and Validation of Human Brain prints From High-Density EEG"; \$349,999; 2/15/06-9/30/08.

J. Scott Tonigan-Principal Investigator

National Institute on Alcohol Abuse and Alcoholism (NIAAA); "Transtheoretic Model of AA Rel"; \$187,072.00; 04/15/04-03/31/09.

National Institute on Alcohol Abuse and Alcoholism (NIAAA); "Therapeutic Mechanisms in AA"; \$179,456.00; 08/01/07-04/30/09.

United States Department of Health & Human Services (DHHS)/National Institute on Drug Abuse/National Institutes of Health (NIH); "A Transtheoretic Model"; \$323,379.23; 4/15/04-3/31/09

National Institute of Health (NIH); "AA Social Dynamics"; \$131,792; 9/30/06-8/31/11

Kamilla Venner—Principal Investigator

NIDA; "Zuni MI/CRA Project"; \$433,932.00; 9/30/07-7/31/08.

Michael Villanueva—Principal Investigator National Institute on Alcohol Abuse and Alcoholism (NIAAA); "Zuni Pueblo Veteran Project"; \$120,258.87; 3/15/01-7/31/07

Steven Verney—U of COL – Native Investigator's Development Program; \$74,915.00; 07/01/06-12/31/07.

APPENDIX C

FACULTY PUBLICATIONS

DEPARTMENT OF PSYCHOLOGY

UNIVERSITY OF NEW MEXICO

AY 2007-2008

BUTLER, KARIN M.

McDaniel, M.A., Howard, D., & Butler, K.M. (2008). Implementation intentions facilitate prospective memory under high attention demands. Memory & Cognition, 36, 716-724.

BRYAN, ANGELA

Broaddus, M.R., & Bryan, A. (2008). Consistent condom use among juvenile detainees: The role of individual differences, social bonding, and health beliefs. AIDS and Behavior, 12, 59-67.

Webster, G.D., Bryan, A., Crawford, C.B., McCarthy, L., & Higgins, B.G. (2008). Lineage, sex, and wealth as moderators of kin investment: Evidence from inheritances. Human Nature, 19, 189-210.

Nierman, A.J., Thompson, S.C., Bryan, A., & Mahaffey, A. (2007). Gender role beliefs and attitudes toward lesbians and gay men in Chile and the U.S. Sex Roles, 51, 61-67.

Hutchison, K.E., Allen, D., Jepson, C., Lerman, C., Benowitz, N., Stitzel, J., Bryan, A., McGeary, J., & Haughey, H.M. (2007). CHRNA4 and tobacco dependence: From gene regulation to treatment outcome. Archives of General Psychiatry, 64, 1078-1086.

Lenton, A.P., Bryan, A., Hastie, R., & Fischer, O. (2007). We want the same thing: Projection in judgments of sexual intent. Personality and Social Psychology Bulletin, 33, 975-988.

Helstrom, A., Hutchison, K.E., & Bryan, A. (2007). Motivational enhancement therapy for high-risk adolescent smokers. Addictive Behaviors, 32, 2404-2410.

Webster, G.D., & Bryan, A. (2007). Sociosexual attitudes and behaviors: Why two factors are better than one. Journal of Research in Personality, 41,917-922.

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APPENDIX D

LETTERS OF ACADEMIC TITLES

NAME	TITLE	ORGANIZATION
Paul Amrhein	Adjunct Associate Professor	Montclair State, New Jersey
Lisa Arciniega	Clinical Associate	VA Medical Center
Michael Bogenschutz	Adjunct Professor of Psychology	University of New Mexico, Psychiatry
J. Brooks	Clinical Associate	VA Medical Center
Diane Castillo	Clinical Associate	VA Medical Center
Elizabeth Dettmer	Adjunct Assistant Professor	VA Medical Center
Sarah Feldstein-Ewing	Adjunct Research Assistant Professor	The MIND Research Network
Francesca Fibley	Research Assistant Professor	University of Colorado at Boulder, Psych
Alyssa Forcehimes	Research Assistant Professor	University of New Mexico-CASAA
James Gillies	Clinical Associate	VA Medical Center
Nancy Handmaker	Adjunct Professor of Psychology	Self-employed
Faith Hanlon	Research Assistant Professor of Psych	VA Medical Center
Brian Kersh	Clinical Associate	VA Medical Center
James Kroger	Adjunct Assistant Professor of Psych	New Mexico State University
Milton Lasoski	Clinical Associate	VA Medical Center
Eric Levensky	Clinical Associate	VA Medical Center
June Malone	Clinical Associate	VA Medical Center
Erin Milligan	Assistant Professor	
Ella Nye	Clinical Associate	VA Medical Center
Kathleen Padilla	Clinical Associate	VA Medical Center
E. Pare-Blagoev	Adjunct Assistant Professor of Psych	The MIND Research Network
Brian Pilgram	Clinical Associate	VA Medical Center
Jennifer Rielage	Clinical Associate	VA Medical Center
Donald Rossi	Adjunct Professor of Psychology	New Mexico Department of Education
Joseph Sadek	Clinical Associate	VA Medical Center
Evelyn Sandeen	Clinical Associate	VA Medical Center
Brian Shelley	Research Assistant Professor	UNM Center for Life
Rex Swanda	Clinical Associate	VA Medical Center
Ursina Teuscher	Adjunct Assistant Professor of Psych	University of California, San Diego
Robert Thoma	Research Assistant Professor of Psych	VA Medical Center
Lorraine Torres-Sena	Clinical Associate	VA Medical Center
Virginia Waldorf	Clinical Associate	VA Medical Center

APPENDIX E

DEPARTMENT OF PSYCHOLOGY COLLOQUIA AY 2007-2008

Colloquium Presented By

Philip Dale, Professor Chair of Speech and Hearing Sciences University of New Mexico

Rex Jung, Research Scientist MIND Research Network Department of Neurosurgery University of New Mexico

Dan Slobin, Professor Psychology and Institute of Human Development University of California, Berkeley

Martin Muller, Assistant Professor Department of Anthropology University of New Mexico

Paul Andrews, Post-Doctoral Researcher Institute of Psychiatric and Behavioral Genetics Virginia Commonwealth University

Joan Bybee, Distinguished Professor Department of Linguistics University of New Mexico

Randy Thornhill, Distinguished Professor Department of Biology University of New Mexico

Dedres Gentner, Professor Department of Psychology Northwestern University (Joint Colloquium with UNM Linguistics Department)

Colloquium Title

"The role of the environment for language and literacy development: The perspective from twin research" February 1, 2008

"Towards a neuroscience of creativity" February 15, 2008

"Learning to speak or to sign: Issues of modality and linguistic typology" February 22, 2008

"Acculturation in psychological "Sexual coercion among chimp March 3, 2008

"The social and cognitive functions of depression" March 24, 2008

"Exemplar models of language" April 4, 2008

"Infectious diseases and diversity across the globe in values, languages, and religions" April 11, 2008

"Why we're so smart" April 25, 2008

Gerardo Villarreal Department of Psychiatry University of New Mexico "Structural and functional neuroimaging studies in post-traumatic stress disorder" May 2, 2008

APPENDIX F

DOCTORAL DEGREES AWARDED AY 2007-2008

DEPARTMENT OF PSYCHOLOGY

NAME	TITLE OF DISSERTATION .	ADVISOR
Katherine Akers	"Retrograde Amnesia for the Morris Water Task Following High Frequency Stimulation of the Perforant Path: Influence of Memory Age and State of Memory Activation"	Derek Hamilton
Mikyta Daugherty	"A Randomized Trial of Motivational Interviewing with College Students for Academic Success"	William Miller
Rebecca England	"The Neural Correlates of Personality: An MRI Study"	Ron Yeo
Denise B. Ernst	"Motivational Interviewing as Conducted by Personal Nurse Coaches"	William Miller
Jennifer Harrington	"The Effectiveness of Thought Control Versus Acceptance-Based Interventions for Chronic Rumination"	Michael Dougher
Wendy Johnson	"Beyond "What Works": A Meta-Analysis of Substance Abuse Treatments for Prison Populations"	William Miller
Denise Lash	"Predicting Dietary Behavior Change in Overweight and Obese Medical Patients"	Jane Ellen Smith
Paul G. Lesnik	"A Developmental Event-Relation FMRI Study of Inhibition Using a GO/NO-GO Task"	Kristina Ciesielski
Matthew Sutherland	"Assessment of Brain Activity During a Stroop Task Using High-Density EEG"	Akaysha Tang

MASTER'S DEGREES AWARDED AY 2007-2008

DEPARTMENT OF PSYCHOLOGY

NAME	TITLE OF THESIS	ADVISOR
Gregory Beatty	"Response Time Variability, Functional Magnetic Resonance Imaging Signal Changes, and Event-Related Potential"	Vince Clark
Jennifer Bernard	"Social Relationships as a Mediator Of the Effects of Alexithymia on Mental Health"	Bruce Smith
Cheryl Bryan	"Locomotor Experience and Its Role in Infants' Understanding of Others Intentions"	David Witherington
April Brown	"Neurometabolic Variance and Cognitive Functioning After Traumatic Brain Injury In Children"	Ron Yeo
Paulette Christopher	"Using a Tripartite Scoring Structure for The Hospital Anxiety and Depression Scale to Enhance the Prediction of Cardiac Rehabilitation Outcomes"	Bruce Smith
Matthew Euler	"Schizophrenia and Developmental Instability"	Ron Yeo
Timothy V. Hoyt	"The Effects of Emotion — and Event- Focused Writing Tasks on the Trauma Narratives of High-and Low- Negative Affect Individuals"	Elizabeth Yeater
Christopher Jenkins	"Quantitative and Subjective Measurement Of Rhythmic Performance Abilities in a Musically Untrained Sample"	Geoffrey Miller
Travis Johnson	"Negative Contrast and Spatial Navigation In Orbito-frontal and Pre-Limbic/ Infra/Limbic Leasioned Rats: A Single Dissociation"	Derek Hamilton

Jenny Rinehart	"The Effects of Attractiveness on Sexual Risk Perception"	Elizabeth Yeater
Ilanit Tal	"Creativity, Intelligence, Personality And Mating Success"	Geoffrey Miller
David Tomasik	"Non-Automatic Emotion Perception In a Dual-Task Situation"	Eric Ruthruff
Erin Tooley	"Coping Flexibility in Women With Fibromyalgia"	Bruce Smith
Alisha Wray	"Examining the Reinforcing Properties Of Making Sense of Behavior"	Mike Dougher

APPENDIX G

American Psychological Association Commission on Accreditation Annual Report Summary Report for the Doctoral Program in Clinical Psychology at University of New Mexico (000938) For the Reporting Period: 9/1/2007 to 8/31/2008

Total Number Who Applied to the Program:	121
Total Number Who Were Offered Admission to the Program :	9
Applied for an Internship for 2008 - 2009 :	5
Were placed in an Internship for 2008 - 2009 :	5
Number of Degrees Awarded in 2007-2008:	4
Average Number of Years to Complete Program:	7
Total Number of Currently Enrolled Students:	53
Number of Archived Students:	31
African American-Black:	1
Caucasian:	40
Hispanic-Latino:	9
Asian:	0
American Indian - Alaska Native:	1
Multi-Ethnic:	2
Not Reported:	0
Canadian:	0
Male:	10
Female:	43
Minority Students:	13

Students under the Americans with Disabilities Act:	1
Foreign National Students:	1
Member of Professional or Research Society :	36
Author or Co-Author of Papers or Workshops at Professional Meetings :	26
Author or Co-Author of Articles in Professiona or Scientific Journals:	24
Involved in Grant-Supported Research:	32
Involved in Teaching:	16
Involved Part-Time in Supervised Practicum Training on or off Campus :	25
Average GPA:	3.64
Total Number of Students Reported:	53
Average GRE scores (Verbal + Quantitative):	: 1289
Total Number of Students Reported:	53
Graduate Semester-hour Equivalent Credits:	3
Average Intervention and Assessment Hours:	623
Average Support Hours:	288
Average Supervision Hours:	255
African American-Black:	0
Caucasian:	10
Hispanic-Latino:	0
Asian:	0
American Indian - Alaska Native:	2

Multi-Ethnic:	0
Not Reported:	0
Canadian:	0
Male:	5
Female:	7
Core Program Faculty:	12
Other Program Faculty:	0
Other Contributors:	0
Member of Professional or Research Society:	12
Author or Co-Author of Papers or Workshops at Professional Meetings:	12
Author or Co-Author of Articles in Professional or Scientific Journals :	12
Recipient of Grants or Contracts :	9
Involved in Undergraduate Teaching:	10
Involved in Masters Teaching:	12
Involved in Doctoral Teaching:	12
Involved in Research Supervision :	12
Involved in Professional Service Supervision :	10
Engaged in Delivery of Professional Services :	3

APPENDIX H

GRADUATE STUDENTS ACCEPTED FOR AY 2007-2008

NAME	ADVISOR	AREA
Alyson Cavanagh	Jane Ellen Smith	Clinical
Nicholas Gaspelin	Eric Ruthruff	Cognition, Brain & Behavior
Brenna Greenfield	Kamilla Venner	Clinical
Kevin Hallgren	Barbara McCrady	Clinical
Sarah Hile	Sarah Erickson	Clinical
Haun Jiang	Akaysha Tang	Cognition, Brain & Behavior
Xiaoshen Jin	David Witherington	Developmental
Anne Lippert	Kent Kiehl	Cognition, Brain & Behavior
Alexis J. Ortiz	Bruce Smith	Clinical
Shirley Smith	Kent Hutchison	Clinical
Ying Zhang	Akaysha Tang	Cognition, Brain & Behavior

APPENDIX I

SENIOR HONOR THESES AY 2007-2008

DEPARTMENT OF PSYCHOLOGY

STUDENT	THESIS TITLE .	FACULTY SPONSOR
Cindy Cosper	Using Personal Strengths Writing to Increase Well-Being in Women with Fibromyalgia	Bruce W. Smith, Ph.D.
Mandira Feldvebel	What Do Faces Tell You? Social Cognition in 7-12-year-old Children With Cerebral Palsy	Mark Pedrotty, Ph.D. David Witherington, Ph.D.
Glory Emmanuel	The Effects of Thematic Mediation On Well-Being and Altruistic Behavior In College Students	Harold Delaney, Ph.D.
Xiaoshen Jin	Theory of Mind in Relational Aggression In Preschool Children	David Witherington, Ph.D.
Christina Klauber	Anthropomorphism in Children's Stories: Preference and Retention For Stories With Animal Versus Human Illustrations	David Witherington, Ph.D.
Flannery Merideth	Mental Practice-Does It Improve Performance?	Eric Ruthruff, Ph.D.
Lochlin Farrell	The Role of Cognitive Biases in the Interpretation of Abstract Scientific Theories	Steve Gangestad, Ph.D. Eric Ruthruff, Ph.D.
Aldeboran Noel Rodriguez	Absence of "Gratton Effect" in Children Performing a Variant of the Stroop Word-Color Interference Task Suggests Immaturity of the Cingulate-Prefrontal Cortex Networks	Kristina Ciesielski, Ph.D.
Shirley Mae Smith	Subcortical Volumetric Measures of Brain Matter and the Correlation to Mood Functioning in Normal Adults	Rex Jung, Ph.D.

David Ruhl

Cerebellar-Thalamic Contributions to Ro Executive Dysfunction in Schizophrenia

Robert Thoma, Ph.D.

DEPARTMENT OF SOCIOLOGY

College of Arts and Sciences

University of New Mexico

ANNUAL REPORT

JULY 1, 2007-JUNE 30, 2008

Dr. Beverly Burris, Department Chair

DEPARTMENT OF SOCIOLOGY JULY 1, 2007-JUNE 30, 2008

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DEPARTMENT OF SOCIOLOGY JULY 1, 2007-JUNE 30, 2008

Significant Developments and Professional Activities during the Academic Year 2007-2008

Departmental

Dr. Felipe Gonzales was named Associate Dean for Faculty of the College of Arts and Sciences, and Dr. Beverly Burris replaced him as Interim Chair of the Sociology Department (August 2007).

On October. 5, 2007 the department held an all-day retreat at the Hotel Albuquerque in Old Town. At this retreat, important changes to our graduate program were discussed, as well as modifications of our undergraduate curriculum.

Dr. Lisa Broidy

- Director, UNM Institute for Social Research (ISR), Summer 2006-present.
- Director, NM Statistical Analysis Center (NMSAC), Spring 2006-present. University of New Mexico, Institute for Social Research.
- Phillip Hoke National Publication Award, 2007. Justice Research and Statistics
 Association. Awarded to the New Mexico SAC for its report: Travel to Violence.
- Program Committee, Member, 2007-2008. American Society of Criminology.
- Homeland Security Committee, Chair, 2007-2008. Justice Research and Statistics Association.
- College of Arts and Sciences Research Advisory Committee, Member. Fall 2007present.
- Advisory Committee, member, Arts and Sciences, Review of University Research Process. Spring 2007.
- Advisory Committee, member, Institute for Public Policy, Department of Political Science. Spring 2007-present.
- Institutional Review Board. University of New Mexico. Member: Fall 2006-present.
- Ex-offender Review Committee. University of New Mexico. Member: Spring 2006present.
- Member, New Mexico Death Review Team, Fall 2004-present.

- Research/Evaluation Consultant. June 2007-present. University of New Mexico,
 Department of Chemical Engineering. National Science Foundation REU and IGERT grants (PI: Abhaye Dayte).
- Research/Evaluation Consultant, January 2007-present. New Mexico State Attorney General's Office. Department of Justice Grant to Promote Uniform Enforcement of Domestic Violence Orders of Protection.

Invited Presentations:

- Broidy, Lisa and Cameron Crandall. Barriers and Facilitators in the Enforcement of Domestic Violence Orders of Protection.
 - a. Presented May 2008 to the Task Force Meeting for the New Mexico Attorney General's Office Grant to Encourage Enforcement of Domestic Violence Orders of Protection.
 - b. Presented September 2008 to the Chief Justice of the NM Supreme Court.
- Albright, Danielle and Lisa Broidy. 2008. Results of the New Mexico Gang Survey.
 Presented to the New Mexico Drug Enforcement Advisory Committee (January, 2008).
 Project Safe Neighborhoods Task Force (March, 2008) and New Mexico Gang Conference (May, 2008).
- Broidy, Lisa and Cameron Crandall. March, 2008. Best Practices for Enforcing Domestic Violence Orders of Protection: Evaluating New Mexico Law Enforcement Policy and Practice. Task Force Meeting for the New Mexico Attorney General's Office Grant to Encourage Enforcement of Domestic Violence Orders of Protection.
- Broidy, Lisa and Danielle Albright. 2008. Deterring Domestic Violence: Evaluating the Comparative Success of Arrest and Protective Orders. Presentation to the Second Judicial District Court, Domestic Violence Division (February 2008) and to the District Court FAIR program (May, 2008).

Presentations at Professional Meetings:

 Botchkovar, Ekaterina, Lisa Broidy, November 2007. Parenting, Self-Control, and Alcohol Abuse: The Case of Russia Presented at the Annual Meetings of the American Society of Criminology. Atlanta, Georgia.

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- Daday, Jerry, Lisa Broidy, Dale Willits. November, 2007. Institutional-Anomie, Political Corruption and Homicide Rates. Presented at the Annual Meetings of the American Society of Criminology. Atlanta, Georgia.
- Krull, Amy, Jerry Daday, Lisa Broidy, Cameron Crandall, and Kristine Denman, November 2007. Comparing Household and Non-household Violent Victimization of Females. Presented at the Annual Meetings of the American Society of Criminology. Atlanta, Georgia.
- Broidy, Lisa, Tim Wadsworth, Kristine Denman, Danielle Albright. October, 2007.
 Deterring Intimate Partner Violence: Comparing the Effectiveness of Arrest versus
 Protective Orders. Presented at the Annual Meeting of the Justice Research and Statistics Association. Pittsburgh, PA.
- Albright, Danielle, Lisa Broidy, Tim Wadsworth, Kristine Denman, Jacob Stowell. Travel to Violence. October, 2007. Presented at the Annual Meetings of the Justice Research and Statistics Association. Pittsburgh, PA.

Dr. Beverly Burris

"Restructuring the Academic Workplace," paper presented at the 2007 ASA Meeting, New York, NY, August, 2007.

Dr. Robert Fiala:

Outcomes Assessment Reports:

Goals and Learning Objectives for all Sociology Programs

Dr. Jane Hood

Honors and AKD

Four students completed Soc. 399 in Spring 2008:

One of these students graduated in May in psychology and so was unable to complete our honors program. However, that student, Brent D. Jordan, was selected with his advisor, Dr. Geoffrey Miller, to receive the Ig Nobel award (during the first week of October) for their research on the effect of ovulatory cycles on erotic dancers' tips. These awards are given for research that first makes one laugh and then gets one to think. Brent is a McNair Scholar and is completing a second BA while applying to graduate programs in evolutionary psychology.

The other three students are each working on their theses and plan to graduate with honors in May 2009. Brent and one or more of his class mates will be submitting proposals to the Pacific Sociology Association where they will present their research in April 2009.

Alicia Schock presented the results of her research on disaster behavior at the Pacific Sociology meetings in Portland Oregon (April 12 2008). Her travel was supported by a grant from AKD as well as college honors funds. Alicia will be making final revisions on her thesis before graduating in May 2009.

Tamara Adlesperger completed her honors thesis on single mothers and education in May 2007 and graduated with departmental honors at the magna cum laude level.

Taina Colon completed her honors thesis on labor law violations in December 2007 and graduated magna cum laude then.

AKD

Under the able leadership of Alicia Schock and Joanna Miller, our AKD chapter recruited 10 new members in Fall 2007 and 16 in Spring 2008. These new members were inducted at dinner ceremonies at the Student Union Building that were attended by proud friends and family.

Jane Hood's presentations:

Presenter with Nancy Lopez, Discipline & Public Health: Dynamics of Race, Class, Gender and Special Education in a Diverse NM School District, August 15 2008, Robert Wood Johnson Center colloquium.

Presenter: "Using the most-least exercise in heterogeneous gender courses," American Sociological Association (August 2008: Boston, MA).

Presenter (with Nancy Lopez): "The discipline gap in public high schools." PSA (April 12 2008: Portland, OR)

Dr. Roberto Ibarra

Associate Director for the Social Sciences, Robert Wood Johnson Foundation Center for Health Policy at the University of New Mexico.

Fall 2007 to present - Medical Sociologist Search Committee, Chair

UNM Faculty Senate - Sociology, Political Science and Economics depts. representative

UNM Faculty Senate Undergraduate Committee

Presentations:

"New Directions for Campus Diversity and the Impact on Funded Research," Workshop for the 2008 Southwest Annual Conference for the American Society for Engineering Education-Gulf-Southwest Section (ASEE-GSW), hosted by the University of New Mexico School of Engineering, Albuquerque, NM, March 26-28, 2008.

"A Place to Belong: The Library as Prototype for Context Diversity." Keynote presentation for the Annual Conference of the Iowa Chapter of the Association of College and Research Libraries (ILA/ACRL), Activating Advocacy: the Many Roles of Academic Libraries, St. Ambrose University, Davenport, IA, March 3, 2008.

"Context Diversity and the Community of Practice." Keynote presentation for Project IMPACT (Improving Minority Paths to Achievement Through Community Transformation). Western Connecticut State University, Danbury CT, February 11, 2008.

"Women, Minorities, and Interdisciplinarity: Transforming the Research Enterprise," Invited workshop participant, funded by Barnard College, Columbia University and the Social Science Research Council; The Earth Institute at Columbia University, November 12-13, 2007.

"Toward A Vision for the 21st Century Professoriate," Invited workshop participant, The Carnegie Foundation for the Advancement of Teaching, Stanford CA, October 25-27, 2007.

Dr. Nancy Lopez

Invited or Refereed Abstracts and/or Presentations at Professional Meetings

2008 PSA "Discipline Gap"

2008 -Hegemonic and Common Sense Understandings of Social Race in U.S. Schools: From The Supreme Court to High School Classrooms CENTER FOR LAW, SOCIETY AND CULTURE AT UC-Irvine, THE PARADOXES OF RACE, LAW AND INEQUALITY IN THE UNITED STATES.

2008 Toward and Intersectional Approach to Educational Disparities Pomona College, February 27.

2008 Presenter, Latino Male Dropout, Schooling and Masculinity Latino Male Education Project. The Ford Foundation. New York, NY. Jan. 17.

2008 Presenter, The Discipline Gap: Disparities in High School Discipline by Race, Class, Gender, and Special Education Status: A Preliminary Research Report, with Jane Hood.

2007 Panel Organizer �AfroLatinidad� Association of Black Sociologists, New York, NY, August. Paper Presenter. Dominicans and the Question of Race, New York, NY August 8-11.

2007 Organizer. Regular Session. Race, Gender, Class and Education. American Sociological Association, New York, NY, August 11-14.

2007 Antiracism in a Bilingual Classroom in the Southwest Latino Section Roundtable. American Sociological Association, New York, NY, August 11-14.

Panelist, Black Expo Panel at the African American Cultural Center, NM Expo, Friday, August 24, 2007.

Guest speaker, KOB-TV, Channel 13, Panel Discussion led by Mike Powers, on pending proposed break-up of Albuquerque Public School into Smaller Districts, aired Tuesday, March 28, 2007.

Guest speaker, KANW, 89.1 FM, Panel discussion on the pending proposed break-up of Albuquerque Public School into Smaller Districts, Monday, March 27, 2007.

Other Presentations

2007 Peer Mentoring for Graduate Students of Color, Panel Discussion, Succeeding in Graduate School, June 7th

2007 First Annual Symposium, Preparing for College: Enrolling, Educating and Advancing Latinos, Workshop Facilitator, sponsored by Raul Yzaguirre, Executive Director and Presidential Professor of Practice at The Center for Community Development and Civil Rights, Phoeniz, AZ, June 21-22.

2007 Race Matters Conference, Second Annual, New Mexico Voices for Children, co-presenter and workshop fac ilitat or on Racialization Processes in Education, May 30th

2007 Community Building in the Classroom, Teaching for Democracy, Second Annual Success in the Classroom: Sharing Practices that Work, Office of Support for Effective Teaching (OSET), February 16th.

UNM University Service

Chair, SHRI Education Taskforce, May 2008
Committee Member, UNM Faculty Grievance Taskforce, Spring 2008
Steering Committee, Office of Institutional Diversity,
Fall 2007-present
Robert Wood Johnson Recruitment Committee, Summer 2007-present

Dr. Christopher Lyons

Ronald E. McNair and Research Opportunity Scholars Program, Application Evaluator. Robert Wood Johnson Foundation Awards Committee, Member. S '08
Assessment Research and Report for Introductory Sociology.

Outside Professional Activities:

- Lyons, Christopher J. and Becky Pettit. 2008. "Employment Discontinuities and Wage Declines: Race Differences in the Cumulative Effects of Incarceration." Paper presented at the National Poverty Center Workshop on Incarceration, Race, and Poverty, Ann Arbor.
- Lyons, Christopher J. and Becky Pettit. 2008. "Employment Discontinuities and Wage Declines: Race Differences in the Cumulative Effects of Incarceration." Paper presented at the annual meetings of the Population Association of America, New Orleans.
- Kreager, Derek, Christopher J. Lyons, and Zachary Hays. 2007. "Condos, Coffeeshops and Crime: Urban Revitalization and Seattle Crime Trends." Paper presented at the annual meetings of the American Society of Criminology, Atlanta.
- Hirsh, Beth and Christopher J. Lyons. 2007. "Social Status, Workplace Context, and Perceptions

of Race Discrimination." Paper presented at the annual meetings of the American Sociological Association, New York.

Ross L. Matsueda and Christopher J. Lyons. 2007. "A Multilevel Theory of Hate Crime." Paper presented at the annual meetings of the American Sociological Association, New York.

Dr. Phil May

Wayne S. Fenton Undergraduate Research Education Award for Significant Achievement, The National Institute of Mental Health, November, 10, 2007.

Dr. John Roberts

A & S Junior Promotion and Tenure Committee 07/-08

Examining the modern history of interaction between social science and physics "Invited presentation at "There a Physics of Society?" Workshop, Santa Fe Institute.

Dr. Andrew Schrank

Awards: Gorham Foundation/Latin American and Iberian Institute, Globalization and Popular Protest in Contemporary Latin America: A Colloquium Series, 2007-2008, \$4,500. Co-sponsor with Kathryn Hochstetler, Department of Political Science, University of New Mexico. Fall 2007

Offices and committees: Co chair of the Political Economy Section of the Latin American Studies Association (2007-8); program committee member for the Society for the Advancement of Socio Economics annual meetings (2008); organizer for Regular Sessions on Globalization (ASA 2008); board member Politics & Society (2008-) and Latin American Politics & Society (2007-); ICLAS and LAII Executive Committee member at UNM (2007-8); undergraduate and hiring committees in Dept. of Sociology (2007-8); external faculty/workshop leader, European School on the New Institutional Economics, Cargese, Corsica, May 20 08.

Invited talks:

Green Capitalists in a Purple State: Sandia National Laboratories and the Renewable Energy Industry in New Mexico. Presented at the Great Transformations Workshop, University of California, Berkeley, California, June 21, 2008.

Measures and Quantitative Methods Applied to Institutions. Presented to the European School on New Institutional Economics, Cargese, France, May 21, 2008.

What should institutions do: Protect private property or disseminate knowledge? Presented at the workshop on Institution Building, Development, and Social Transformation in Latin America and the Caribbean, University of Havana, Havana, Cuba, March 25, 2008.

* International Labor Standards and National Regulatory Agencies: U.S. Influence, European Models, and Latin American Outcomes. Presented at the *Institute for Research on Labor and Employment, University of California at Los Angeles, Los Angeles, California, February 21, 2008.**

Labor regulation. Presented to the Global Production Networks and Decent Work Research Group, International Labour Organization, Cambridge, Massachusetts, January 13, 2008.

Building/Re -Build ing State Capacity: Complement or Alternative to Private Monitoring Efforts? Presented at the Just Supply Chains Workshop I: Monitoring. . .And Beyond, Massachusetts Institute of Technology, Cambridge, Massachusetts, January 12, 2008.

Conceptualizing and Measuring Institutions. Presented at the 2nd workshop on Measuring Law and Institutions, University of Paris X, Paris, France, December 14-15, 2007.

Idea Gaps and Industrial Extension in Latin America: The Dominican Republic in Comparative Perspective. Department of Sociology, Emory University, Atlanta, Georgia, October 25, 2007.

Conferences:

Labor Inspectors in the CAFTA Countries: Cosmetic, Costly, or Constructive? Presented at the 27th International Conference of the Latin American Studies Association, Montreal, Canada, September 7, 2007.

Anatomy of Network Failure. Presented at the 102nd Annual Meeting of the American Sociological Association, New York, New York, August 14, 2007. Co-authored with Josh Whitford, Columbia University.

Professionalization and Probity in the Patrimonial State: Labor Law Enforcement in the Dominican Republic. Presented at the 102nd Annual Meeting of the American Sociological Association, New York, New York, August 13, 2007; as well as the 20th Annual Meeting of the Society for the Advancement of Socio-Economics, San Jose, Costa Rica, July 23, 2008.

Dr. Susan Tiano

Co-Chair, Governor Richardson's Poverty Reduction Task Force Acting Director, Latin American and Iberian Institute (LAII)

Evaluator, NIH-funded program, Minority Access to Research Careers (MARC), UNM, June 2006 to present

Evaluator, NIH-funded program, Initiatives for Minority Student Development (IMSD), UNM,
 February 2005 to present

UNM committee service:

- · Human Subjects Institutional Review Board
- · Grants and Awards Committee, LAII (Chair)
- · Academic Program Review Team, Department of Geography
- Senior Promotion Committee, College of Arts and Sciences

Dr. Maria Velez

- a. Mellon Advisory Committee
- b. Member of the Steering Committee for Racial Democracy, Crime and Justice Network housed at The Ohio State University
- Program Chair for American Society of Criminology's section on Race, Immigration and Crime
- -- Sociology/Criminology Internship Coordinator Currently there are 9 students in the field and registered for Sociology 488. Students are placed at US Attorney's office (N=1), District Attorney's office (N=3), Bernalillo County Metropolitan

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Court (N=1), Bernalillo County Juvenile Detention Center (N=2), the US Department of Energy (N=1) and the Education Bureau of the Corrections Department of the State of New Mexico (N=1). Contacts are continually sought and the program continues to grow.

Outside Professional Activities: including conferences attended, papers presented

- vélez, María B. and Christopher Lyons. 2008. "The Long Term Consequences of Bank
 Disinvestment on Neighborhood Homicide: An Analysis of Albuquerque Neighborhoods
 (1990 2006). Racial Democracy, Crime and Justice Network Summer Workshop.
- b. Vélez, María B. 2008. "The Implications of a Foreign Born Community for Community Homicide Levels." University of Washington Institute for the Study of Ethnicity, Race and Sexuality, Conference on Issues Facing the Latino Community.

Dr. Howard Waitzkin

Program Director for the New Mexico Mentorship and Education Program in mental health services research, funded by the National Institute of Mental Health (NIMH).

Audiovisual/ teaching materials

Website on Latin American Social Medicine, funded by U.S. National Library of Medicine (http://hsc.unm.edu/lasm), 2000-2008; initiated successful joint effort with the University of Guadalajara, Mexico, 2005-2008.

Departmental and University Service

Search Committee for Professor of Medical Sociology under the Robert Wood Johnson Foundation Center on Health Policy.

In the faculty general internal medicine clinic at the University of New Mexico Hospital, I have seen patients during two ½-day sessions per week.

In 2007, I have consulted on the development and implementation of courses in health sciences, UNM – Taos campus.

I have participated in UNM's training program on mediation and faculty dispute resolution and currently serve as a designated mediator.

At UNM I frequently participate as an invited speaker in courses and conferences in sociology, anthropology, and Latin American studies.

I continued to collaborate in the development of the new B.A.-M.D. Program, designated as the

highest UNM priority for legislative funding. I taught the first integrative seminar for freshman students, titled "Contours of Health in New Mexico"; planning began in 2005.

I continued to serve in planning and as a core faculty member in the new National Center for Health Policy at the University of New Mexico, funded by the Robert Wood Johnson Foundation in January 2007. This Center emphasizes training, research, and policy analysis to address the needs of Latino, American Indian, and other underserved populations.

Dr. Richard Wood

Sponsored and co-led a 20-day international travel seminar for 17 UNM students in Guatemala (Dec 2007-Jan 2008)

Service on Committees:

University-wide:

UNM Committee on Governance

College-level:

College Assessment Review Committee (substantial work on outcomes assessment)

Search Committee: New director of Religious Studies, led to hire of new full professor in Dept of Sociology (Sharon Erickson Nepstad)

Served as outside review committee member for 3rd year review of Dr. Alyosha

Goldstein, American Studies Department, UNM

Service to profession:

Reviewed book manuscripts for University of Chicago Press (Joseph Palacios), University of California Press (David Smilde), Oxford University Press (Sharon Nepstad).

Reviewing for journals:

Active reviewer for America Journal of Sociology, Sociology of Religion, City and Community and Mobilization, and other professional sociological journals.

Other:

Primary person from UNM (along with Sachi Isobe from A&S Development Office) involved in raising \$2 million for an endowed chair.

Outside Professional Activities: including conferences attended, papers presented. 2007:

Primary sponsor and organizer of major international meeting of 30 leaders from 18 nongovernmental organizations from Jordan, Syria, Egypt, and Saudi Arabia (plus the United Nations Development Program's regional offices): Web Access for Civil Society

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Organizations, at the Royal Scientific Society in Amman, Jordan (November 2-7, 2007).

"Innovation the Religious Studies at a Public University" overview of UNM Religious Studies Program presented as part of day-long workshop on The Religion Major and Liberal Education (American Academy of Religion Annual Meeting, San Diego, Nov, 2007).

"A Deeper Self: Community-Based Learning and the Lifelong Vocation to Solidarity" paper presented at Callings: Fostering Vocation Through Community-Based Learning," a conference at Santa Clara University (San Jose, CA: March 2007).

DEPARTMENT OF SOCIOLOGY JULY 1, 2007-JUNE 30, 2008

APPOINTMENTS AND SEPARATIONS

Dr. Maria Velez was hired as a Lecturer to teach the Criminology major. Her husband, Dr. Wayne Santoro, was hired as a Lecturer in the department.

Dr. Tim Wadsworth left the department to take a position at the University of Colorado, Boulder. Dr. Nelson Valdes retired from the department.

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FACULTY PUBLICATIONS

Dr. Lisa Broidy

- Daday, Jerry, Lisa Broidy, and Cameron Crandall. (2008). Emergency Department Utilization among Victims and Offenders Involved in Non-Lethal Violence. Social Science and Medicine. 66:1197-1206.
- Charles Tittle, Lisa Broidy and Mark Getz. (2008). Strain, Crime and Constingencies.
 Justice Ouarterly. 25:283-312.

Dr. Robert Fiala

2008. Robert Fiala. "La Ideologia Educative y et Curriculo Escolar." Pp. 47-98 en

El Conocimiento Escolar En Una Perspectiva Historica Y Comparativa. Buenos Aires: Grancia.

Dr. Roberto Ibarra

July 2007 Final report to the Ford Foundation on research project: <u>Creating an American</u> Research University for the 21st Century: <u>Multicontextuality and Higher Education</u>—Funded by the Ford Foundation; Higher Education, Knowledge and Religion Section. (1,100 pages).

Dr. Nancy Lopez

Book Reviews:

Latina Activists Across Borders by Milagros Pena, Duke University Press, 220pp, National Women Studies Association Journal, (2008).

The Dominican Americans, Encyclopedia of Race, Ethnicity and Society, SAGE Reference Project, Richard Schaeffer, editor, 2008.

Dr. Christopher Lyons

Lyons, Christopher J. 2008. "Individual Perceptions and the Social Construction of Hate Crime." Social Science Journal 45(1): 107-131.

Lyons, Christopher J. 2008. "Hate Crime." In *Encyclopedia of the Culture Wars*, edited by Roger Chapman. Armonk, New York: M.E. Sharpe (in print).

Lyons, Christopher J. 2007. "Community (Dis)Organization and Racially Motivated Crime." American Journal of Sociology 113(3): 815-63.

Pettit, Becky and Christopher J. Lyons. 2007. "Status and the Stigma of Incarceration: The Labor Market Effects of Incarceration by Race, Class, and Criminal Involvement." Pg. 203-226 in Barriers to Reentry? The Labor Market for Released Prisoners in post-Industrial America, edited by Shawn Bushway, Michael A. Stoll and David F. Weiman. New York: Russell Sage Foundation..

Dr. Philip May

Colleen M. Adnams, Pharyn Sorour, Wendy O. Kalberg, Piyadasa Kodituwakku, Mariechen D. Perold, Anna Kotze, Sean September, Bernice Castle, J. Gossage, and Philip A. May. "Language and literacy outcomes from a pilot intervention study for children with fetal

alcohol spectrum disorders in South Africa." Alcohol, Vol 41:403-414, 2007.

Mauro Ceccanti, Primavera Alessandra Spagnolo, Luigi Tarani, Maria Luisa Attilia, Luciana Chessa, Rosanna Mancinelli, Michel Stegagno, Guido Francesco Sasso, Marina Romeo, Kenneth L. Jones, Luther K. Robinson, Miguel Del Campo, J. Phillip Gossage, Philip A. May, H. Eugene Hoyme. "Clinical delineation of fetal alcohol spectrum disorders (FASD) in Italian children: comparison and contrast with other racial/ethnic groups and implications for diagnosis and prevention." Neurosci Biobehav Rev, Vol 31:270-277, 2007.

Anne E. Kovas, Bentson H. McFarland, Michael G. Landen, Adriana L. Lopez, and Philip A. May. "Survey of American Indian Alcohol Statutes, 1975-2006: Evolving Needs and Future Opportunities for Tribal Health." <u>Journal of Studies on Alcohol and Drugs</u>, Vol. 69(2): 183-191, 2008.

Philip A. May, Joseph H. Miller, Karen A. Goodhart, Olivia R. Maestas; David Buckley, Phyllis M. Trujillo, and J. Phillip Gossage. "Enhanced Case Management to Prevent Fetal Alcohol Spectrum Disorders in Northern Plains Communities." <u>Maternal and Child Health Journal</u>, on line in Dec., 2007, printed version in press.

Philip A. May, J. Phillip Gossage, Anna-Susan Marais, Loretta Hendricks, Cudore Snell, Barbara G. Tabachnick, Chandra Stellavato, David G. Buckley, Lesley Brooke, and Denis L. Viljoen. "Maternal Risk Factors for Fetal Alcohol Syndrome and Partial Fetal Alcohol Syndrome in South Africa: A Third Study." <u>Alcoholism: Clinical and Experimental Research</u>, Vol. 32(5): 738-753, 2008.

Randall Starling, Jason Blankenship, Philip A. May, and Gill Woodall. Problem Gambling in New Mexico:1996 and 1998. <u>International Journal of Mental Health and Addiction</u>, (on line version available, June, 2008), hard copy version, in press.

Alfredo S. Aragón, Giovanna Coriale, Daniela Fiorentino, Wendy O. Kalberg, David Buckley, J. Phillip Gossage, Mauro Ceccanti, Elisha R. Mitchell, and Philip A. May. "Neuropsychological Characteristics of Italian Children with Fetal Alcohol Spectrum Disorders." <u>Alcoholism: Clinical and Experimental Research</u>, (in press, November, 2008).

Alfredo S. Aragón, Wendy O. Kalberg, David Buckley, Barbara G. Tabachnick, Lindsey M. Barela, and Philip A. May. "Neuropsychological Study of FASD in a Sample of American Indian Children: The effects on processing simple versus complex information." <u>Alcoholism: Clinical and Experimental Research</u>, in press, December, 2008).

Jason Blankenship, Randall Starling, W. Gill Woodall, and Philip A. May. "Gambling Trends in the State of New Mexico." <u>International Journal of Mental Health and Addiction</u>, (in press).

Dr. Aki Roberts

Roberts, A. (2008). The influence of incident and contextual characteristics on crime clearance of non-lethal violence: A multi-level event history analysis. Journal of Criminal Justice 36: 61-72.

Roberts, A. (2008). Explaining differences between homicide clearance rates in Japan and the United States. Homicide Studies 12: 136-145.

Dr. Wayne Santoro

Santoro, Wayne A. 2008. "The Civil Rights Movement and the Right to Vote: Black Protest, Segregationist Violence, and the Audience." Social Forces 86:330-361

Dr. Andrew Schrank

Sugars political by-product: The Caribbean Basin Initiative. Globalizations 5 (2) 2008.

Toward Managed Flexibility: The Revival of Labour Inspection in the Latin World.

International Labour Review /148 (1) 2008/. /Co-authored with Michael Piore,
Massachusetts Institute of Technology.

Asian Industrialization in Latin American Perspective: The Limits to Institutional Analysis. Latin American Politics and Society 49 (2):2007.

Dr. Maria Velez

Vélez, María B., Ana L. Campos, and Stephan Arndt, and. 2008. "City's Racial Composition Shapes Treatment Center Characteristics and Services." *Journal of Ethnicity and Substance Abuse* 7(2):188-199.

Dr. Howard Waitzkin

a. Published articles

Yager J, Waitzkin H, Parker T, Duran B. Educating, training, and mentoring minority

faculty and other trainees to conduct mental health services research. <u>Academic Psychiatry</u> 2007;31:146-151.* (solicited article for cluster of short research development program descriptions)

Waitzkin H, Jasso-Aguilar R, Iriart C. Privatization of health services in less developed countries: an empirical response to the proposals of the World Bank and Wharton School. International Journal of Health Services 2007;37:205-227.* †

- Getrich C, Heying S, Willging C, Waitzkin H. An ethnography of clinic "noise" in a community-based, promotora-centered mental health intervention. Social Science & Medicine 2007; 65: 319-330.* †
- Perry M, Williams RL, Wallerstein N, Waitzkin H. Social capital and health care experiences among low-income individuals. <u>American Journal of Public Health</u> 2008; 98: 330-336.*
- Waitzkin H, Schillaci M, Willging CE. Multi-method evaluation of health policy change: An application to Medicaid managed care in a rural state. <u>Health Services Research</u> 2008; 43: 1325-1324.* †
- Willging C, Waitzkin H, Nicdao E. Medicaid managed care for mental health services: The survival of safety net institutions in rural settings. <u>Qualitative Health Research</u> 2008; 18: 1231-1246.*

Waitzkin H, Iriart C, Buchanan H, Mercado F, Tregear J, Eldredge J. The Latin American Social Medicine Database: A Resource for Epidemiology. <u>International Journal of</u> Epidemiology 2008; 37: 724-728.* †

b. Books, book chapters

Waitzkin H. Political economic systems and the health of populations: historical thought and current directions. In: Sandro Galea, ed. <u>Macrosocial Determinants of Health</u>. New York: Springer, 2007.* †

Waitzkin H. Latin American social medicine. In: Heggenhougen K, et al., eds. Encyclopedia of Public Health. Oxford, UK: Elsevier, 2008, in press.* †

Waitzkin H, Layon AJ. Critical care medicine: what place in a national health system? In: Gabrielli A, Layon AJ, Yu, eds. <u>Critical Care. 4th Edition</u>. Philadelphia: Lippincott Williams & Wilkins, 2008, in press.* †

Waitzkin H. Recipe for chilequiles. In: Merhy E. Médicos na Cozinha [Doctors in the

<u>Kitchen</u>]. Campinas, Brazil: Campinas Medical Association, 2003 (http://www.sindimed.org.br, accessed March 24, 2007); revised 2008 (http://www.sindimed.org.br/MedicosNaCozinha/receitas.aspx?code=7&receita=31&pesqu isa=waitzkin, accessed September 19, 2008.

Dr. Richard Wood

Articles in refereed journals:

Wood, Richard L. 2007. "Thinking Culturally about Politics: Habits 20 Years Later and 20 Years Hence, Sociology of Religion 68:2 (Summer 2007).

Chapter in edited volume:

Wood, Richard L. 2007. "Higher Power: Strategic Capacity for State and National Organizing," in *Transforming the City: Community Organizing and the Challenge of Political Change*, Marion Orr (ed.); Lawrence, KS: University of Kansas Press.

Other publications:

Wood, Richard L. 2007. "Jewish Social Ethics, American Synagogues, and the Repair of the World," reflections on the Research Consultation on Synagogues and Social Justice. On-line publication to be posted at the "Synagogue 3000" website: http://www.synagogue3000.org/(Summer).

Wood, Richard L. 2007. "American Habits: Robert Bellah and Cultural Reformation" in Christian Century (September 4, 2007, pp. 33-37).

Wood, Richard L. 2007. "Challenging the University," on-line essays for the Ignatian Center for Jesuit Education, Santa Clara University. http://www.scu.edu/ignatiancenter/cblconf/community_connections_wood_response.cfm

> DEPARTMENT OF SOCIOLOGY JULY 1, 2007-JUNE 30, 2008

CONTRACTS AND GRANTS

Dr. Lisa Broidy:

 Schools and Crime. Principal Investigator: Lisa Broidy. Grant from Justice Research and Statistics Association. March 15, 2008- September 25, 2008. (\$20,000).

Sociology -B.Burris-2007/2008

- Evaluating the Career Pathways Initiative. Principal Investigators: Lisa Broidy and Christopher Lyons. Grant from New Mexico Department of Corrections. March 2008-February 2009. (\$50,000).
- Weed and Seed Year 4 Evaluation Project. Principal Investigators: Lisa Broidy. Grant from City of Albuquerque. October 2007-September 2008. (\$20,000).
- Project Safe Neighborhoods Anti-Gang Initiative. Principal Investigator: Lisa Broidy.
 Grant from State of New Mexico/Department of Justice. September 2007-August 2008.
 (\$49,500).
- Deterring Domestic Violence: Using Case Level Abstraction to Improve our Understanding of the Deterrent Effects of Domestic Violence Orders of Protection Principal Investigators: Lisa Broidy and Tim Wadsworth. Bureau of Justice Statistics/JRSA. July 1, 2007-June 31, 2008. (\$59,094).

Dr. Christopher Lyons

"Employment Discontinuities and Wage Declines: Race Differences in the Cumulative Effects of Incarceration." Christopher J. Lyons (PI) and Becky Pettit. *University of Michigan National Poverty Center*, May 2007 – August 2008. (\$15,000, direct costs)

Dr. Richard Wood

Web Access for Civil Society Initiatives (October 2006 to October 2008 \$949,200) Principal investigator; grant funding for coordinating project in Jordan, Syria, Egypt, and Saudi Arabia, focused on the internet as a communications tool in civil society. Primary focus on Islam and democracy, human rights, and women's empowerment. Supports six UNM graduate students, including two in the Department of Sociology (Anwar Ouassini and Mozafar Banihashemi). U.S. Department of State.

Nexus: Religion in the Public University (August 2005 to May 2008, two grants for total of \$55,989) Principal investigator; grant funding for public events on religion in American society, supporting a sociology graduate student Stacy Keogh and eight major UNM-based public events. The Louisville Institute.

Islam and Democracy (March 2003 to June 2008: \$156,451)
Principal investigator; support of UNM Sociology doctoral student Mozafar

Banihashemi's work on the Middle East Middle East Program, Cooperative Monitoring Center, Sandia National Laboratories, U.S. Department of Energy

Dr. Nancy Lopez

2007-2008 Sociological Initiatives Foundation, \$15,000, Disciplinary Discretion in a Diverse Albuquerque High School: A Study of Racial, Ethnic and Gender Disparities, co-principal investigator, Dr. Jane Hood, UNM Institute for Social Research, Albuquerque, NM.

2007-2008 -Discipline in a Diverse High School, \$10,000, co-principal investigator, Dr. Jane Hood, The Robert Wood Johnson Foundation, Center for Health Policy, June 2007.

2007-2008 New Mexico Public Education Department, \$12,000, Indian Education in New Mexico, 2025 co-principal investigators, Qualitative Team: Drs. T ed Joj ola, Mary Belgarde, Tiffany Lee, Carlotta Bird, Beverly Singer and Heather Townsend; Quantitative Team: Drs. Dely Alcantara, Melissa Binder, April 2007.

Dr. Phil May

"A Trial of FAS Prevention and Diagnosis Among American Indians." NIAAA, May 1, 2004 - April 30, 2009. \$8,427,060. 2 UO1 AA 11685-06-10.

"New Mexico Access to Research Careers in Mental Health." National Institute of Mental Health. July 1, 2005 - June 30, 2010. \$1,391,623. 2-T34-MH19101-16-20.

"FAS Prevention in South Africa: A Trial of the IOM Model, September 30, 2006 - September 29, 2011. \$6,028,274. R01 AA15134.

"A Multisite Neurobehavioral Assessment of Fetal Alcohol Spectrum Disorders," NIAAA, September 30, 2007 - September 29, 2012. Part of the International Collaborative Initiative on Fetal Alcohol Spectrum Disorders (CIFASD). Co-Principal Investigator with Sarah Mattson, San Diego State University, Subcontract: \$959,490, U01 AA14834.

Dr. Jane Hood

Sociology -B.Burris-2007/2008

Robert Wood Johnson Foundation: "Disciplinary discretion in a diverse Albuquerque high school: a study of racial, ethnic, and gender disparities" (with Nancy Lopez: 2007-2008. \$10,000 to support one graduate assistant.).

Dr. Howard Waitzkin

Program Director, National Institute of Mental Health, 1 R25 MH60288, "New Mexico Mentorship and Education Program," \$323,822 over 2 years, funded 1999-2001; refunded for \$484,890 over 3 additional years, 2002-2005; assigned "high program priority" by NIMH National Advisory Mental Health Council; refunded for \$1,232,029 over 5 years, 2005-2010.

Consultant, National Institute of Mental Health, 1R01 MH076084-01, "Multi-Method Ethnographic Assessment of Behavioral Health Reform in New Mexico," \$449,072 (year 1), 2005-2010 (Cathleen Willging, Behavioral Health Research Center of the Southwest, Pacific Institute for Research and Evaluation, Principal Investigator).

Project participant, recipient, US Department of Education, Undergraduate International Studies and Foreign Language (UISFL), Title VIA program, awarded to UNM Latin American and Iberian Institute, \$2,500, 2006-2007, purpose: to develop and implement an international component with focus on Latin America for Health, Medicine, and Human Values 101 (BA-MD Program) (Cynthia Radding and Kimberly Gauderman, co-Principal Investigators).

Principal Investigator, National Institute of Mental Health, 1 R01 MH083028, "Community Based Participatory Research on Depression in Rural Primary Care," 2009-2012, under review.

Principal investigator, Robert Wood Johnson Foundation Center for Health Policy, University of New Mexico, "The County as the Fundamental Unit of Health Access in the United States," \$12,400, 2008.

Dr. Maria Velez and Dr. Christopher Lyons:

"The Long-term Consequences of Bank Disinvestment on Neighborhood Crime: An Analysis of Albuquerque Neighborhoods (1990-2006)." Maria B. Velez (PI) and Christopher J. Lyons. UNM Robert Wood Johnson Foundation, June 2008-August 2008. (\$10,000, direct costs)

DEPARTMENT OF SOCIOLOGY JULY 1, 2007-JUNE 30, 2008

GRADUATES

Spring 2007:

Brenda Green, M.A. Thesis: "'Carving our own niche': Arab American Women's Discourses of Gender Ideals in Marriage."

Criminology B.A. graduates: 48 Sociology B.A. graduates: 37

Fall 2007

Deepta DasGupta, M.A.Thesis: "Effects of Single Motherhood on Odds of Remarriage."

Criminology B.A. graduates: 36 Sociology B.A. gradiates: 17

Summer 2007

Elizabeth Erbaugh, Ph.D. Dissertation: "Queering anti-violence politics: the Queer Women's Project and community organizing against LGBTIQ intimate partner violence."

David Gordon, M.A. Thesis "The impact of gangsta rap radio on urban homicide rates."

Criminology BA graduates: 10 Sociology BA graduates: 9

DEPARTMENT OF SOCIOLOGY JULY 1, 2007-JUNE 30, 2008

DEPARTMENT LECTURES AND PRESENTATIONS

2007-2008 Student/Faculty Presentation Series

09/14/07: Caleb Bush

Assistant Professor of Sociology and History, UNM-Gallup

"Land, Livestock, and Labor: The 'Net of Incorporation' in the History of Mining, Stock Reduction, and Wage Work on the Navaio Reservation"

09/28/07: Nelson Valdes

"The Cuba-L Direct Project"

10/26/07: Jeff Nowaki

"A Race-Specific Examination of the Effects of the Tennessee v. Gamer Decision on Police Use of Deadly Force."

11/09/07: Stacy Keogh

"Religion, Democracy, and Community Organizing in Central America"

11/30/08: Aki Roberts and Christopher Lyons

"Victim-Offender Racial Stratification and Crime Clearance by Arrest: Reassessing the Relevance of Black's Theory of the Behavior of Law"

02/22/08 Maria Velez

"Community Organizations, Residential Bank Loans, and Reductions in Homicide: An Analysis of Chicago Neighborhoods"

03/06/08 (in cooperation with the Sociology Department and Religious Studies)

Kraig Beverlein

Assistant Professor of Sociology

University of Arizona

"Protesting in a Foreign Land: Why Latinos Participated in the 2006 Immigrant Rights Protests"

03/14/08 Nancy Lopez and Jane Hood

"Hear no evil, See no evil: Barriers to politically sensitive research"

03/28/08

Brenda Green

"Liberation via Islam?: The Interplay of Religion and Ethnicity in Muslim Arab American Women's Gender Ideals"

04/04/08 Billy Ulibarri

"Anti-trafficking or Anti-women? A closer look at anti-trafficking policy."

04/11/08 Niame Adele

"The human potential movement takes on the challenges of late modernity"

04/23/08 Lisa Broidy and Dale Willits

"Institutional-Anomie, Political Corruption, and Homicide Rates"

DEPARTMENT OF SPANISH AND PORTUGUESE

CHAIR: TEY DIANA REBOLLEDO

DEPARTMENT ADMINISTRATOR II: ROSARIO JOHNSON

ANNUAL REPORT

JULY 1, 2007 – JUNE 30, 2008

I. TEACHING FACULTY AND STAFF

A. TENURED AND TENURE TRACK FACULTY

Spanish

Anthony J. Cárdenas Professor
Enrique Lamadrid Professor
Tey Diana Rebolledo Professor

Kimberle López Associate Professor Miguel López Associate Professor Associate Professor Judy Maloof Kathryn McKnight Associate Professor Associate Professor Susan Rivera Rena Torres Cacoullos Associate Professor Mirta Alejandra Balestra Assistant Professor María Dolores Gonzales Assistant Professor

Mary B. Quinn Eleuterio Santiago-Díaz Assistant Professor
Assistant Professor

Catherine Travis

Assistant Professor

Portuguese

Margo Milleret Associate Professor
Leila Lehnen Assistant Professor

B. VISITING PROFESSORS

Miriam Alves Anna Nogar

C. LECTURERS

Deanna Cornejo-Patterson Vanessa Fonseca Andrea Juárez-Gutiérrez

Socorro Lara Patricia Rosas-Lopátegui Noemí López

D. EMERITUS PROFESSORS

John Bergen Garland Bills

Rubén Cobos Pelayo Fernández

Rosa Fernández Dick Gerdes

Angel González

Tamara Holzapfel Raymond MacCurdy

Alfred Rodríguez Jon Tolman

E. TEACHING ASSISTANTS Ph.D.

Erin Amason-Montero Elena Avilés

David Briggs F. Manuel Burgos-Trujillo Maria Conklin Héctor Contreras-López

Vanessa de Veritch Teresa Dovalpage

Jennifer Dumont Evelyn Durán-Urrea

Adrienne Gonzales

Lorena Galván-Valenzuela

Kiley Guyton

Alena Johnson

M.A. Spanish

Carlos Alvarez

Sonva Barela

Marcus Flores

Arturo Hernández

Lilia Martínez

Juan Romero

Alma Valdez M.A. Portuguese

Fernanda Bartolomei

Erlinda Gonzales-Berry

Sonia Hicks-Rodríguez

Theodore Walker

Daniel Arbino

Anne Benscoter

Elizabeth Herring

Karina Peña

Aaron Salinger

Juan Carlos González

Sonia Balasch

Verónica Calvillo María de Abajo

José Duarte

Jorge Estrada

Sara Guengerich Carmen Holguín-Chaparro

Damián Wilson

Angela Arenivar

David Criddle

Jonathan Harrell-Naranjo

Noemí López

Whitney Purvis

Hiram Smith

Lígia Bezerra

Michele Henrique

ARTS AND SCIENCES INTERDEPARTMENTAL TEACHING ASSISTANTS

Angela Cárcamo

Economics

José García Macías

Jeremy Lehnen

Latin American Studies

Graduate Assistant/Webmaster

Pablo López Oro

Ana María Martínez-Rodríguez

Economics

Ana Medina-Murillo

Linguistics

Carson Morris

History

Stephanie Knight

Elvira Pichardo

Anthropology

Misty Ring

Latin American Studies

Francisco Salazar

History

Simoni Valadares

Benjamin Waddell

Luciana Zilberman

F. OFFICE STAFF

Rosario Johnson

Department Administrator II

Martha Hurd

Graduate Administrative Assistant II

Katharine E. Merrill

Department Administrative Assistant II

Vanessa Vander Galien

Language Instruction Administrative Assistant II

G. WORK STUDY STAFF

Norma Castillo

Anthony Orton

Leobarda Zacarias

Brenda Herrera

H. DEGREES AWARDED

Summer 2007

MASTER OF ARTS IN SPANISH

Angela Gonzales

MASTER OF ARTS IN PORTUGUESE

Ricardo Moreira - Thesis Title:

Globalizacao, Consumo e identidade em "London, London ou Ajax, Brush and Rubbish" (1977) de caio Fernando Abreu e <u>La noche es virgen</u> (1997) de Jaime Bayly

BACHELOR OF ARTS IN SPANISH

Ryan Kruskamp

Miriam Perdomo

BACHELOR OF ARTS, SECOND MAJOR IN SPANISH

Margarita Avítia

Erin Burtch

David Bryant

Andrea Domínguez

Georgina García

Emilia Gutiérrez

Henry Jauregui

Michelle Orobitg

Krista Pino

Donaji Ramírez

Vincent Richards

Fall 2007

DOCTORATE IN SPANISH AND PORTUGUESE

María de Abajo,

Dissertation Title: El ambito de lo privado: crisis y transformación en las protagonistas feminas en nubosidad variable (C.M. Gaite), Atlas de geografía humana (A. Grandes), amor, curiosidad, prozac y dudas (L. Etxebarria).

MASTER OF ARTS IN SPANISH

José Alexandro Sousa

BACHELOR OF ARTS IN SPANISH

Todd Burgener

Anna Butman

Alma González

Peter Hebard

Samuel Heeter

Patrick Rahm

Natalie Smith

Andrea Varela

BACHELOR OF ARTS, SECOND MAJOR IN SPANISH

Cindy Arias Miranda Evjen

Rose García

Valerie Brewster Raquel Guerrero

Christopher Guthart

Pamela Jiménez

Bernardino Bañuelos

Emily Kelsey

Melina Leodas

Troy Lowe

Sasha Miranda

Erica Montoya

Shawn Oyer

Michael Padilla Sophia Ruser

Jennifer Piarowski Karen Russell Sonia Rivera Joanna Ryter

Natalie Smith

Jacquelyn Sandoval

Jade Torres-Morrison

Jennifer Trujillo

Spring 2008

MASTER OF ARTS IN SPANISH

Daniel Arbino

Whitney Purvis

Hiram Smith

Alma Valdez

MASTER OF ARTS IN PORTUGUESE

Lígia Bezerra

BACHELOR OF ARTS IN SPANISH

Charles Calderon

Sandra Cano

Rachelle Carreras

Armando Chávez

Marisol Encinias

Antonio González

Cheryl Gourley

Alison Grochowski

Tatiana Hernández

Maeghan McCormick

BACHELOR OF ARTS, SECOND MAJOR IN SPANISH

John Branch

Mariza Bustillos

Colleen Chávez

John Congdon

Grant Christopher

Megan Eichelberger

Emma Enriquez

Jamilee Gerzon

Lane Glover

Gabriela Gomez

Michael Green

Rachel Green

Tarun Gudz

Brittany Howell

Amber Jackson

Amelia Kahn

Casey Leo

Keeley Lowney

Nancy Luna

Andrea Madrid

Lizeth Mata

Katixa Mercier Marta Pereira Christopher Miller
Dominic Pettine

Vanessa Monge

Sylvie Reydams

Angela Romero

Ginamarie Porter Casandra Romero

Daniel Salazar

Ana Sánchez

Elizabeth Silva

Oscar Terrazas

Schuyler Thompson

Michelle N. Trujillo

Michelle R. Trujillo

Ryan Van Otten

Leon Vigil

Lauryn Waits

Alexander Woody

BACHELOR OF SCIENCE, SECOND MAJOR IN SPANISH

Christa Trujillo

BACHELOR OF ARTS IN PORTUGUESE

Keeley Lowney

III. DEPARTMENTAL HIGHLIGHTS

The Department of Spanish and Portuguese had a busy and productive year. We conducted two successful national searches for new faculty: one in Linguistics and as Coordinator of Spanish as a Second Language Program, and one in Southwest Studies. We were able to hire Dr. Julie Sykes (University of Minnesota) in the Linguistics/Coordinator position, and Dr. Anna Nogar (University of Texas-Austin) in the Southwest position. Both faculty members bring new perspectives to their discipline. We had the opportunity to have two visiting faculty members teach in the Program: Miriam Alves, a poet from Brazil, taught in the Portuguese Program, and Anna Nogar, University of Texas-Austin, was a Visiting Lecturer in the undergraduate Spanish Program.

At the same time, we had several resignations of faculty. Dr. Alejandra Balestra (Linguistics/Coordinator of Spanish as a Second Language) resigned in mid-year. We appointed Dr. Maria de Abajo as a lecturer to temporarily fill her position. Dr. Judy Maloof, on leave of absence, resigned. Many faculty were on research leave or on sabbatical leave so the department was left more short handed than usual. At the end of the Spring Semester, Dr. Tey Diana Rebolledo stepped down as Chair to return to teaching, and during the summer Dr. Kathy Mcknight served as Acting Chair. During the summer, Dr. Richard Santos, Department of Economics, was appointed Interim Chair for 2008-2009. The Department was also saddened by the deaths of two professor emeriti: Dr. John Bergan (linguistics) and poet Dr. Angel González. Both professors were long time members of the Department and will be greatly missed. We were fortunate to hire Vanessa Vander Galien as our Language Instruction Administrative Assistant II.

In terms of research, the faculty published one monograph and two edited books, eleven book chapters and articles, two encyclopedia articles, six book reviews, two creative pieces, four exhibition catalogues and compact disks. Much more scholarly work has been accepted for publication or is under review. The faculty also gave fourteen keynote or invited talks. They presented 23 papers at national and international conferences. This is considerable research activity because of the large number of students we serve, large number of service activities at departmental, university and national levels our faculty members are responsible for. Our graduate students are also productive in terms of research, publishing four articles and one creative piece. They gave five presentations at regional and national conferences.

During the year, the Department sponsored 17 talks and lectures, two symposiums, three creative readings and three workshops. This is an extraordinary amount of work for a small faculty. In addition to the work already mentioned, the Department underwent a review of its graduate and undergraduate programs. The self-study was completed in October of 2007 and the outside reviewers came in January 2008. At present the Department is preparing a response to the reviewers' evaluation.

In terms of grants and awards, Dr. Miguel Lopez received a Service Recognition Award from the UNM La Raza Student Organization. Graduate students also received several distinctions. Fernando Garavito received the Best Book Award for Political Writing for New Mexico and the Southwest for his book Praxis and Ambiguity of the Enemy: Essays on Life and Politics of the US and Latin America. Jennifer Dumont received a Latin American and Iberian Institute Ph.D. Fellowship, Kiley Guyton received a Ford Foundation Pre-Doctoral Diversity Fellowship. Students also received six travel awards from the GSA. Damián Wilson received the Susan Deese-Roberts Outstanding Teaching Assistant of the Year Award, and Sonia Hicks Rodriguez, Carmen Holguin-Chaparro and Michele Henrique were nominated for the award. María de Abajo

was voted the Outstanding Dissertation Researcher by the University of New Mexico Graduate and Professional Student Research and Creative Expression Symposium.

The Department was recognized by the Minority Graduate Student Association for Achievement in Diversity in both its undergraduate and graduate programs.

We continue to lack faculty as our student base steadily increases as it has over the last five years. Recent resignations have made the need for more faculty acute. Another perennial and urgent problem is the lack of space for Teaching Assistant offices. Because many graduate students are crowded into small offices, they have difficulty in securing privacy for meeting with and advising students and for their own study and research purposes. Faculty often share their offices with students in order to alleviate the problem. This problem has been brought to the attention of administration often but has not been alleviated. A solution to the space problem must be found soon if we are to be able to recruit and retain the best graduate students and faculty.

Finally, a significant number of undergraduate and graduate students completed their degrees. Ninety-eight students received a B.A. or B.S. in Spanish and Portuguese, nine received an M.A., and one completed her Ph. D.

A. STAFF CHANGES

Dr. Julie Sykes was hired as a Professor of Linguistics and as the Spanish as a Second Language Program Coordinator, Spring 2008, to begin Fall 2008.

Professor Anna Nogar was hired to fill the Assistant Professor position of Spanish in Southwest Literature, Spring 2008, to begin Fall 2008.

Vanessa Vander Galien was hired to be the Language Instruction Administrative Assistant, August 2007.

Dr. Emeritus John Bergen passed away, Fall 2007.

Dr. Emeritus Angel González passed away, Spring 2008.

Dr. Tey Diana Rebolledo stepped down as Chair, June 2008.

Dr. Mirta Alejandra Balestra and Dr. Judy Maloof resigned their positions, Spring 2008.

Jeremy Lehnen resigned his position as Webmaster, June 2008.

B. AWARDS

THE DEPARTMENT

- Recognized for Achievement in Diversity in both its undergraduate and graduate programs by the Minority Graduate Student Association, Spring 2008.
- Voted second Best UNM Department (after Communication and Journalism) in the UNM Student Choice Awards sponsored by the Daily Lobo, November 5, 2007.

PROFESSORS

Miguel López

Service Recognition from La Raza Student Organization, for mentoring and supporting students of color, Spring 2008.

GRADUATE STUDENTS

María de Abajo

- Voted Outstanding Dissertation Researcher by the University of New Mexico Graduate and Professional Student Research and Creative Expression Symposium, September 29, 2007.
- Received a Student Conference Award Program Travel Grant for \$600.00 from the Graduate and Professional Student Association, July 30, 2007.
- Received a Student Research Allocation Committee Grant of \$300.00 from the Graduate and Professional Student Association, July 13, 2007.

Vanessa de Veritch

- Received a Student Research Allocation Committee Grant of \$359.00 from the Graduate and Professional Student Association, Spring 2008.
- Received a Department of Spanish and Portuguese Graduate Student Association Grant of \$250.00, Spring 2008.

Jennifer Dumont

- Received the Latin American Iberian Institute PhD Fellowship of \$12,000.00, plus Tuition, 2007-2008.
- Received a Student Research Allocation Grant of \$300.00, Fall 2007.
- Received a Travel Grant of \$275.00 from the Spanish and Portuguese Graduate Student Association, Fall 2007.

Fernando Garavito

 Awarded the Best Book for Political Writing 2005-2007 for New Mexico and the Southwest for Praxis and Ambiguity of the Enemy: Essays on Life and Politics of the US and Latin America; received from the New Mexico Book Awards sponsored by Borders, the New Mexico Humanities Council and the New Mexico Book Association.

Kiley Guyton

 Received a Ford Foundation Pre-doctoral Diversity Fellowship of \$19,000.00. Three year award, 2006 - 2009.

Sonia Hicks-Rodríquez

- Received an Interamerican University Studies Institute Scholarship of \$576.00 to attend the World to World/Mundo to Mundo Literary Translation Seminar, Interamerican University Studies Institute, University of Oregon, Universidad de Querétaro, México. July 16 – 27, 2007.
- Earned "Distinguished Nominee" for the Susan Deese-Roberts Outstanding Teaching Assistant of the Year Award, 2007-2008.

Damián Wilson

 Received the Susan Deese-Roberts Outstanding Teaching Assistant of the Year Award for 2007-2008.

IV. DEPARTMENTAL ACTIVITIES

A. EVENTS

"Grants and Fellowships Available to Graduate Students of Spanish and Portuguese." September 7, 2007.

Presented by Dr. Elly Van Mil, Grants Specialist for the College of Arts And Sciences. Workshop sponsored by the Spanish and Portuguese Graduate Student Association. Held in the Ortega Hall Reading Room.

"All Nature Obeys Me: Jovita González's Environmental Writing and the Transformation of South Texas." October 4, 2007.

Presented by Dr. Priscilla Ybarra, Assistant Professor at Texas Tech University. Held in the Ortega Hall Reading Room.

"How to Study for M.A. Exams, and How to Apply to Graduate School." October 25, 2007.

Professor Miguel López gave a talk on strategies for studying for a Master Comprehensive Exam and also covered what graduate schools are looking for in a graduate application. Held in the Ortega Hall Reading Room.

"Dia de los Muertos." November 2 - 3, 2007.

The Sabine Ulibarri Spanish as a Heritage Language Program celebrated Dia de los Muertos with a variety of activities including videos, presentations, theater acts, music and more. Held in the Ortega Hall Third Floor Lounge.

"African Presence in Cuba and Brazil." November 12 - 13, 2007.

The two day event began with a scholarly talk by Professor William Luis from Vanderbilt University "Hurricanes, Magic, Science, Politics, in Cristina García's The Agüero Sisters" The presentation was followed by a screening of the film "Quilombo Country," a documentary about Afro-Brazilian communities of resistance. The second day consisted of a bi-lingual poetry reading. M.A. Candidate Michele Henrique introduced the Afro-Brazilian poets, Miriam Alves and Conceição Evaristo. The event was organized by Professor Margo Milleret and co-sponsored by the Latin American and Iberian Institute, and the departments of English, Africana Studies, American Studies and Foreign Languages and Literatures. Held in the Ortega Hall Reading Room.

"El enfoque de 'Cultural Studies'en mi evaluación de textos no canónicos de Latinoamerica y su aplicación a Southwest Studies." November 30, 2007. Presented by Dr. Elizabeth Coonrod Martínez, Professor of Spanish and Chair of Chicano Studies at Sonoma State University. Held in Ortega Hall Reading Room.

"Analyzing L2 Oral Discourse in a Latin American Literature Classroom." December 3, 2007.

Presented by Professor Joshua Thoms, candidate for the position of Coordinator for the Spanish as a Second Language Program. Held in Lab 4 of the Language Learning Center.

"The Relative Effects of Enhanced and Non-Enhanced Structured Input on L2 Acquisition of Spanish Past Tense." December 5, 2007.

Presented by Professor Silvia Peart, candidate for the position of Coordinator for the Spanish as a Second Language Program. Held in Ortega Hall Reading Room.

"A Dynamic Approach to Interaction: Synthetic Immersive Environments and Spanish Pragmatics." December 7, 2007.

Presented by Professor Julie Sykes, candidate for the position of Coordinator for the Spanish as a Second Language Program. Held in the Ortega Hall Reading Room.

"Denise Chávez's Loving Pedro Infante: The Formation of a Transnational Border." February 4, 2008.

Presented by Dr. Juanita Heredia from Northern Arizona University, and candidate for the Assistant/Associate professor of Spanish in Southwest Literature position. Held in the Ortega Hall Reading Room.

"Toward a Trans(national) Reading of Ramón "Tianguis" Pérez's Diario de un mojado." February 11, 2008.

Presented by Dr. Christina Sisk from Houston University, and candidate for the Assistant/Associate professor of Spanish in Southwest Literature position. Held in the Ortega Hall Reading Room.

"Bilocation to the Borderlands: The Peripatetic Historical Journeys of Sor María de Agreda." February 15, 2008.

Presented by Professor Anna Nogar, from University of Texas at Austin, and candidate for the Assistant/Associate professor of Spanish in Southwest Literature position. Held in the Ortega Hall Reading Room.

"The 15th Annual University of New Mexico Conference on Ibero-American Culture and Society - Heroes and Anti-Heroes: A Celebration of the Cid." February 27-29, 2008.

There were 8 sessions involving presentations from over 24 professors, and graduate students. Plenary addresses were given by Dr. Matthew Bailey of the University of Texas - Austin and Dr. Samuel Armistead of the University of California - Davis. The conference began with a reading of *Poema de mio Cid*. Professor Anthony J. Cárdenas organized the conference. Jeremy Lehnen and Kate Merrill created the conference website, promotional and conference materials. Co-sponsors include: the Latin American and Iberian Institute; College of Arts and Sciences; Instituto Cerveantes; Office of Institutional Diversity; Chicano, Hispano, Mexicano Studies; and the Institute for Medieval Studies. Held in the Ortega Hall Reading Room.

"La palabra en el sueño y en la vigilia." March 5, 2008.

Poetry of Demetria Martínez read by the author and Professor Eleuterio Santiago-Díaz; translation provided by Héctor Contreras-López and Carmen Holguín-Chaparro. Sponsored by the Spanish and Portuguese Graduate Student Association. Held in the Ortega Hall Reading Room.

"En vieques, la lucha continua: Popular Protest and Community Development in Vieques, Puerto Rico." March 6, 2008.

Néstor de Jesús Guishard, activist and community speaker presented a talk on the aftermath of a successful grassroots campaign against U.S. militarization and the challenges of community development. Event organized by Professor Eleuterio Santiago-Díaz and cosponsored by the Latin American and Iberian Institute and the Student Organization for Latin American Studies. Held in the Ortega Hall Reading Room.

"African Queens in Colonial Quarrels: Reflections from the Making of an Ibero-Atlantic Anthology." March 26, 2008.

Professor Kathryn McKnight of the Spanish and Portuguese department held a talk presented by the Feminist Research Institue. Held in the Student Union Building.

"Code Switching and Grammatical Change: Yo and I in New Mexico." March 28, 2008. Talk presented by Professors Rena Torres Cacoullos and Catherine Travis as part of the Department of Spanish and Portuguese Colloquium Series. Held in the Ortega Hall Reading Room.

"Neurosis and Masculinity in the Contemporary Argentine Novel." April 14, 2008. Presented by Dr. Idelber Avelar of Tulane University. Co-sponsors include Tey Diana Rebolledo, the Latin American and Iberian Institute and the Spanish and Portuguese Graduate Student Association. Held in the Ortega Hall Reading Room.

"Voces Femeninas, Metamorfosis." April 17, 2008.

Prose and poetry of the feminine voice. Participants included María de Abajo, Teresa Dovalpage, Leila Flores Dueñas, María Dolores Gonzales, Carmen Holguín Chaparro, Kathy McKnight, Rosalee Montoya-Read, Roberta M. Rael, Patricia Rosas-Lopátegui, Leobarda Zacarías. Sponsored by the Spanish and Portuguese Graduate Student Association Held in the Ortega Hall Reading Room.

"Un Homenaje al poeta Español: Angel González." April 19, 2008.

This event presented the opportunity for people to honor our Professor Emeritus and internationally renown poet Dr. Angel González. The evening encompassed personal testimonials of his life and readings of his poetry by friends and colleagues. A special appearance was made by singer and songwriter Pedro Ávila. The event was organized by María de Abajo, Susan Rivera and Tey Diana Rebolledo. Co-sponsors include the University of New Mexico, the Spanish Resource Center and the Instituto Cervantes in Albuquerque. Held at the National Hispanic Cultural Center.

"Border, Boderlines, Liminality and Hypens: A McOndo take on the Southwest." June 27, 2008.

Presented by Albert Fuguet, a prominent Chilean writer and co-editor of the McOndo Anthology. Held in the Willard Room in Zimmerman Library.

B. INVITED TALKS

Enrique Lamadrid

- "Travelers & Pilgrims on the Camino Real," City of Albuquerque Open Space Visitor's Center, New Mexico, January 12, 2008.
- "La nueva canción: Folk Music and Social Justice in Latin America." World Music Series, Maxwell Museum, University of New Mexico, August 2007.

María Dolores Gonzales

- "History of Spanish in New Mexico and its Revitalization." Guest Speaker at the Bilingualism and Social Work Class, Highlands University, Las Vegas, February, 2008.
- "Hispanic Elderly: Cultural and Linguistic Issues in Geropsychiatry." María Dolores Gonzales, Irene Ortiz, M.D., Yvonne Hall, M.D. Psychiatry Grand Rounds, University of New Mexico Medical School, October, 2007.

Kathryn McKnight

- "Convents, Gender and Writing in Early Modern Spain and Spanish America."
 Art History Spanish Colonial Art, invited lecture. University of New Mexico, October 30, 2007.
- "African Queens in Colonial Quarrels." Feminist Research Institute, University of New Mexico, March 26, 2008
- "A Poetic Politics", invited critical presentation of Fernando Garavito's Práctica y Ambigüedad del Enemigo. Praxis and Ambiguity of the Enemy. College of Santa Fe. October 22, 2007.

Tey Diana Rebolledo

"Beyond Infinite Divisions: Past, Present and Future in Chicana Literature" Keynote Speaker at the *Red River Conference on World Literature*, North Dakota State University, April 5-6, 2008.

Susan Rivera

"La dramática conciencia del vivir." Keynote speaker at the Festival de Poesía de Granada, Spain May 12-15, 2008.

Eleuterio Santiago-Díaz

"Raza y gramática en la escritura puertorriqueña de Nueva York: la violación de un código imperial," University of Vermont - Department of Romance Languages and Dean's Ad Hoc Diversity Committee, March 27, 2008.

Rena Torres Cacoullos

• "Variation and grammaticization: The emergence of an aspectual opposition."

- Department of Spanish and Portuguese, Ohio State University, March 4, 2008.
- "Building integrative models of linguistic change." Santa Fe Institute Workshop. Invited participant, February 17-20, 2008.
- "Code-switching: The bilingual road to convergence? Yo and I variation." Department of Spanish and Portuguese, University of Texas at Austin, April 8, 2008.
- "The empirical study of code-switching in its social and linguistics context. Automatic Approaches to Natural Language Code Switching." National Science Foundation Workshop, Clearwater, Florida. April 11, 2008.

C. FACULTY PUBLICATIONS

Anthony J. Cárdenas

Articles:

- "Bestialidad y la palabra: el parto perruno en el 'Coloquio de los perros'." Hispania. May 2008.
- "Assessing Asses and Lasses: Triangular Desire in the 1488 Spanish Esopete ystoriado." Romance Quarterly. Spring 2008
- "Lo bueno, lo feo, y lo malo: Maritornes y la desviación/diversión de la llamada 'Mirada fija masculina' en Don Quixote." En: Actas del Congreso Cervantes y su Tiempo, León 2-5 Noviembre de 2005. León: Universidad de León, 2008. 174-90.

María Dolores Gonzales

Creative publication:

Poema, "¡Ay Caray!" in Metamorfosis: Instituto Cervantes, 2008.

Enrique Lamadrid

Book edited:

El Camino Real de Tierra Adentro. With photographer Eniac Martínez, Tomás Martínez Saldaña, and Jack Loeffler. México: Instituto Nacional de Antropología e Historia, Ciudad de Chihuahua, 2007.

Book chapter:

"From Santiago at Ácoma to the Diablo in the Casinos: Four Centuries of Foundational Milagro Narratives in New Mexico." In Phillip B. Gonzales, ed. *Expressing New Mexico: Nuevomexicano Creativity, Ritual, and Memory.* Tuscon: University of Arizona Press. 2007.

Encyclopedia entry:

"The Dynamics of Myth in the Creative Vision of Rudolfo Anaya" *Children's Literature Review*, 129 (Gale Group / November 2007), ed. Tom Burns.

Exhibition catalogs:

- "Moctezuma and the Elders, the Virgin and the Bull: the Matachines Dance of Greater Mexico." In Claude Stephenson, ed. ¡Matachines! Albuquerque: Hispanic Culture Foundation, May 2008.
- Rituales de la Tierra y del Espíritu Rituals of the Earth and Spirit. The Big Read: A
 Tribute to Rudolfo Anaya Festival and Exhibit. New Paltz, NY, State University of
 New York, November 2007.

 Acequias in Practice and Spirit: a Sustainable Eco-cultural Legacy. Acequias of New Mexico Exhibit. La Ciénaga, New Mexico: El Rancho de las Golondrinas, Summer-Fall 2007.

Article review:

"The Penitente Brotherhood: Patriarchy and Hispano-Catholicism in New Mexico." with Gabriel Meléndez, New Mexico Historical Review 82, 2 (Winter 2007): 121-127.

Book reviews:

- "Brown Eyed Children of the Sun: Lessons from the Chicano Movement, 1965-1975."
 George Mariscal. Albuquerque: University of New Mexico Press, 2005. Journal of Anthropological Research 63, 2007: 300-302.
- "The Penitente Brotherhood: Patriarchy and Hispano-Catholicism in New Mexico."
 Michael P. Carroll. Baltimore: Johns Hopkins Press, 2002. Sociology of Religion 68, 3 (Fall 2007): 328-329.

Kimberle López

Book review:

Nightmares of the Lettered City: Banditry and Literature in Latin America 1816-1929 by Juan Pablo Dabove University of Pittsburgh Press, 2007. Revista de Estudios Hispánicos 42.1 (Jan. 2008): 183-85.

Encyclopedia article:

"Cannibalism," entry for *Encyclopedia of Latin American History and Culture*, ed. Joseph S. Tulchin. New York: Scribners/Gale Thompson, 2008.

Miguel López

Book:

Utopian Dreams, Apocalyptic Nightmares: Recent Narratives of Globalization in Mexican and Chicano Narrative. West Lafayette: Purdue University Press, 2008.

Book review:

La otra voz del pueblo Chicano Narrative, by Charles Tatum. Revista Iberoamericana, 72.206 (2007): 261-62

Kathryn McKnight

Book chapters:

- "Colonial Religiosity: Convents, Nuns, Witches, and Heretics." A Companion to Latin American Literature and Culture. Ed. Sara Castro-Klaren. Oxford: Blackwell, 2008.
- "The House of Trials and the Trials of Masters-Level Research." *Approaches to Teaching Sor Juana Ines de la Cruz*. Ed. Emilie L. Bergmann and Stacey Schlau. New York: MLA, 2007. 161-69.

Book reviews:

- Poéticas de la restitución: Literatura y cultura en Hispanoamérica colonial. Ed. Raúl Marrero-Fente. In Bulletin of Spanish Studies 85.3 (2008).
- Mapping Colonial Spanish America. Places and Commonplaces of Identity, Culture, and Experience. Ed. Santa Arias and Mariselle Meléndez. In Revista Iberoamericana 73.218-19 (2007): 369-74.

Margo Milleret

Article in refereed journal:

"Resources for Teaching Your Students to Behave Brazilian. Portuguese Language Journal #2 (Fall 2007). www.latam.ufl.edu/portugueselanguagejournal

Mary B. Quinn

Article:

"Handless Maidens, Modern Texts: A New Reading of Cervante's *The Captive's Tale.*" Modern Language Notes, Volume 123, Number 2, March (2008).

Tey Diana Rebolledo

Book chapter:

"Las Clavidentes. Chicana Writers and Artists, Ethnicity, Gender and Creativity." In *Expressing New Mexico. Nuevomexicano Creativity, Ritual and Memory*. Ed. Felipe Gonzales. Tucson: University of Arizona Press, 2007, 141-161.

Susan Rivera

Book edited:

Francisco Brines: Antología poética. Diputación de Granada, May 2008.

Article in referred journal:

"Luis Cernuda en la generación de 1927. Convergencias y divergencías." *İnsula, Año LXII* (Diciembre 2007): 17-19.

Eleuterio Santiago-Díaz

Book:

Escritura afropuertorriqueña y modernidad. Pittsburgh, PA: Instituto Internacional de Literatura Iberoamericana, 2007, 270 pgs.

Rena Torres Cacoullos

Article in refereed journals:

"Defaults and indeterminacy in temporal grammaticalization: the 'perfect' road to perfective" with Scott Schwenter Language Variation and Change 20.1:1-39. 2008.

D. GRADUATE STUDENT PUBLICATIONS

María de Abajo

Creative publications:

Two poemas "17 de septiembre" y "El mundo ya no es" in *Metamorfosis*: Instituto Cervantes, 2008.

Vanessa de Veritch Woodside

Article in non-refereed journal:

"Resistencia y recuperación: la historia colectiva a través de la ficción en In the Time of the Butterflies de Julia Álvarez." Divergencias: Revista de Estudios Lingüísticos y Literarios 5.2 (2007): 57-66.

http://w3.coh.arizona.edu/divergencias/current_ed/edicion_actual.htm

Selected conference proceeding:

• "Transforming the Chicano Canon: The Postmodern Aesthetic of the Contemporary Chicano Novel." Interpreting the New Mileno. Ed. José Antonio Gurpegui and M. Carmen Gómez Galisteo. Newcastle, UK: Cambridge Scholars, 2008. 263-271. From the V Congreso Internacional en Literatura Chicana: Interpreting the Nuevo Milenio. Universidad de Alcalá, Instituto de Estudios Norteamericanos. Alcalá de Henares, Spain." May 22-25, 2006.

José H. Gacía-Macías

Article in non-refereed journal:

"La interacción discursiva en un corpus de graffiti en baños de mujeres" with R. Martínez Gómez, in P. C. Abundis (Ed.), *Textos y Argumentos* (pp. 187-209): (2008) Universidad de Guadalajara & Universidad Veracruzana.

E. PAPERS READ BY FACULTY

Anthony J. Cárdenas

- "(In)scribing Medieval Women: Leonor and Teresa." The 89th American Association of Teachers of Spanish and Portuguese Annual Meeting. San Diego, California. August 2-5, 2007.
- "The Volatile Text: Enrique fi de Oliva." 61st Kentucky Foreign Language Conference.
 University of Kentucky, Lexington. April 17-19, 2008.
- "Translating, Not Interpreting, Teresa de Cartagena." 43rd International Congress on Medieval Studies. The Medieval Institute. Western Michigan University, Kalamazoo. May 8-11, 2008.

María Dolores Gonzales

"Literatura Chicana, Descolonización y Transformación: Spanish Heritage Learners." VII Congreso Internacional de Literatura Hispánica, Cuzco, Perú, March 2008.

Enrique Lamadrid

- "Picaresca Nuevomexicana: the Anti-Hero in New Mexico." The 15th Annual University of New Mexico Conference on Ibero-American Culture and Society Heroes & Anti-Heroes: A Celebration of the Cid. Albuquerque, February 27 29, 2008.
- "Cultural Commerce on the Camino Real de Tierra Adentro." Arizona State Museum, Tucson, October 5-6, 2007.
- "Acequia Activism in New Mexico" Environmental Justice and Human Rights Panel. In 40 Years of Community Activism 1967-2007: Civil Rights Reform Conference University of New Mexico, Albuquerque. September 27, 2007.

Kimberle López

- "Indigenous Past and Indian Present in Fuentes's Chac Mool and Garro's La culpa es de los tlaxcaltecas" The Other Mexicos/Los otros Méxicos" 14th Annual Mexicanist Conference, University of California, Irvine, April 10-12, 2008.
- "The Representation of Cannibalism in Brazilian Fiction and Film," Latin American Studies Association International Congress, Montreal, Canada, September 5-8, 2007.

Miguel López

- "La patria, el indio y la frontera en el feminismo literario." The Other Mexicos/Los otros Méxicos" 14th Annual Mexicanist Conference, University of California Irvine, April 10-12, 2008.
- "The Representation of Mexico City in Richard Rodríguez and Alejandro Morales" Latin American Studies Association International Congress, Montreal, Canada, September 5-8, 2007.

Margo Milleret

- "Dios Perdidos, Duas Versões: Performing Gender and Marginality on Stage and Screen." Brazilian Studies Association. Tulane University. New Orleans, Louisiana. March 2008.
- "How Evaluation Helped the Growth of the University of New Mexico Portuguese Program." Foreign Language Evaluation Project Summit. University of Hawaii. Honolulu, March 2008.

Mary B. Quinn

- "The Morisco Narrative's Hero." The 15th Annual University of New Mexico Conference on Ibero-American Culture and Society Heroes & Anti-Heroes: A Celebration of the Cid. Albuquerque, February 27 29, 2008.
- "Between History and Fiction: Moriscos and Narrative in Early Modern Spain."
 Modern Language Association, Chicago, Illinois. December 2007.
- "Hybridizing homogeneity: Narrative in post-expulsion Spain." Al-Andalus: Cultural Diffusion and Hybridity in Iberia (1000-1600), University of Wisconsin, Madison, October 2007.
- "Moriscos in Spanish Narrative." The 89th American Association of Teachers of Spanish and Portuguese Annual Meeting, San Diego, California. August 2-5, 2007.

Tey Diana Rebolledo

"Games Writers Play: Chicana Autobiography and Imagination." VII Congreso Internacional de Literatura Hispanica, Cuzco Peru, March 2008.

Susan Rivera

"Notas de un viajero." Instituto Cervantes, Casablanaca, Morocco, May 22, 2008.

Rena Torres Cacoullos

- "Dialect differences as weak complementarity in the study of grammaticization" with Scott Schwenter New Ways of Analyzing Variation 36, Workshop: New Ways of Analyzing Verbal Aspect (James Walker), University of Pennsylvanaia, October 11, 2007.
- "Code-switching and grammatical change: Yo and I in New Mexico" with Catherine Travis. University of New Mexico, Department of Spanish and Portuguese Colloquium Series. March 28, 2008.

Catherine Travis

• "Code-switching and Grammatical change: Yo and I in New Mexico" with Rena Torres Cacoullos. University of New Mexico, Department of Spanish and Portuguese

Colloquium Series. March 28, 2008.

 "Locational adverbs in non-spatial settings: The case of ahi in Columbian Spanish conversation" with Timothy Jowan Curnow. Australian Linguistic Society Annual Conference. University of Adelaide, Australia. September 2007.

F. PAPERS READ BY GRADUATE STUDENTS

María de Abajo

- "Escritoras españolas a fin de siglo." The 89th American Association of Teachers of Spanish and Portuguese Annual Meeting, San Diego, California August 2-5, 2007.
- "Escritoras españolas a fin de siglo: Crisis y transformación en las protagonistas femeninas." University of New Mexico Graduate and Professional Student Research and Creative Expression Symposium "Excellence in Academics." Albuquerque. September 29, 2007.

Vanessa de Veritch Woodside

"Negotiating a Hybrid Cultural Existence: The Fight against Americanization and the Patriarchy in Chicana Drama." *Reclaiming our Bodies, Streets, and Communities: Scholarship and Transformative Space.* University of California at Santa Barbara Graduate Student Collectiva. November 17, 2007.

Jennifer Dumont

"Testing the cognitive load hypothesis: Repair patterns in bilinguals and monolinguals" *Hispanic Linguistics Symposium*, San Antonio, Texas. November 2007.

Sonia Hicks-Rodríguez

"Género y Migración en El oro del desierto: ¿Dónde está la Nación?" The Other Mexicos/Los otros Méxicos 14th Annual Mexicanist Conference, University of California, Irvine, April 10-12, 2008.

G. OTHERS RESEARCH PROJECTS OR CREATIVE WORKS IN PROGRESS OR COMPLETED

Anthony J. Cárdenas

Articles in press:

- "The Pleasure of Textual and Iconic Artifice in Alfonso X's Cantiga 16: The Miracle
 of the Love-Sick Knight." In Robinson and Rouhil, eds. Under the Influence.
 Amsterdam: Brill.
- "Ambiguity, Aporia, Augustine and Acedia: The Greek/Roman Conundrum in the Libro de buen amor." Libro de Buen Amor Studies, edited by Paul Larson and Carlos Hawley-Colón.

Articles submitted:

- "And thus I returned to my estate in Córdoba": Geography of Power and Celestial Favor in the *Memorias* of Leonor López de Córdoba." Submitted to *Medieval Feminist* Forum.
- "The 1525 Cromberger Crónica del Cid: From Press to Lap." Submitted to Latin American and Iberian Institute Research Paper Series.

 "Cronica del muy esforçado cavallero el Cid ruy díaz campeador" Edition submitted to Papers of the Medieval Hispanic Research Seminar, Queen Mary University of London.

Conference proceedings in progress:

 Heroes and Anti-Heroes: A Celebration of the Cid. (Selected Proceedings of the 800th Anniversary Conference at the University of New Mexico, February 28-29, 2008)

Research funding:

Research Allocation Committee Grant, \$3,100.00. May 2008.

María Dolores Gonzales

Article forthcoming:

"Todavía Decimos "Nos {Los} Mexicanos": Construcción of idenity labels among Nuevomexicanos," in *Spanish of the Southwest: A Language in Transition*. Edited by Susana Rivera-Mills and Daniel Villa. Publisher: Editorial Iberoamericana/Verviet. Summer 2009.

Chapters in press:

- "The Sabine Ulibarrí Spanish as a Heritage Language Program." In Voices from the Classroom across the Nation: La Situción Actual de la Enseñanza del Español para Heritage Speakers. Eds. Maria Spicer-Escalante, María Carreira and Glenn Martinez.
- "Heritage Language: An Ancestral Gift." In New Mexico History Book. Semos Unlimited.

Book in progress:

Polishing the Gem: An Innovative Spanish as Heritage Language Program.

Enrique Lamadrid

Book forthcoming:

Juan the Bear and the Water of Life: La Acequia de Juan del Oso, with Estevan Arellano and illustrated by Amy Córdova. Albuquerque: University of New Mexico Press. Fall 2008.

Articles forthcoming:

"Indita Ballads," "Folk Drama and Performance," "Cecilio García Camarillo," and "Ernesto Antonio Mares." in *Bio-Bibliographical Dictionary of Hispanic Literature*. New York: Greenwood. Fall 2008.

Compact Disc:

 Cantos de Honor y Sacrificio: a New Mexico Legacy of Honor. Albuquerque: Peregrino Productions, 2007. Producer, recordist, annotator-notes, texts, and photo essay on enhanced CD.

Consultant:

- "John D. Robb Documentary (title not yet final)" for Colores, Kelly Kowalski, director. KNME. May 2008. Consultant, performer.
- "Villa de Alburquerque" for *Colores*, Kelly Kowalski, director. KNME Alburquerque Tricentennial Documentary. 2007. Consultant.
- "From Curandera to Chupacabra: the Stories of Rudolfo Anaya" *Colores*, Kelly Kowalski, director. KNME Documentary. Consultant and Interview. 2007.

Museum installation:

 "Nuevo México, ¿hasta cuándo? - On tour of community museums of New Mexico with National Hispanic Cultural Center. 2007-2008 Venues: Las Vegas, Highlands University; Socorro, International Camino Real Heritage Center; Española, Oñate Cultural Center; La Ciénega, Rancho de las Golondrinas.

Museum curatorial:

- "El Camino Real de Tierra Adentro: Photographs by Eniac Martinez." Guest Curator.
 City of Albuquerque Open Space Program, January 2008.
- "Nuestra Música Festival VIII" Lensic Performing Arts Center, Museum of Spanish Colonial Art Santa Fe, April 19, 2008. Festival curator, producer, master of ceremonies.

Kimberle López

Articles submitted:

- "Governing Juana: Madness and the Manipulation of Power in Three Spanish American Plays on Juana la Loca," with Angela Marino Segura. Submitted to Latin American Theater Review.
- "Revisiting La locura de amor," with Angela Marino Segura. Submitted to Estreno: Cuadernos del Teatro Español Contemporáneo.

Critical anthology in progress:

- Carnal Fantasies: Cannibalism in Latin American Culture.
- Introduction to Carnal Fantasies: Cannibalism in Latin American Culture.

Articles in progess:

- "Consumer Cannibalism and Commodity Fetishism in Augusto Monterroso's Mr. Taylor"
- "The Cooked and the Raw: Cannibalism and Slavery in Terra Papagalli (1997)."
- "An Argentine in Paris: Exile and Diaspora in Alicia Dujovne Ortiz's El árbol de la gitana."
- "The Poetics of Space in Alicia Dujovne Ortiz's El árbol de la gitana and Las perlas rojas."

Miguel López

Article forthcoming:

"Traces of Red: Anthropology, Historiographic Metafiction, and Chicano Identity in Guy García's *Obsidian Sky.*" *Confluencia*, Fall 2008 Vol 24 N°1.

Chapter in forthcoming critical anthology:

"Femicides through Chicana Eyes: Women in the Global Machine in Alicia Gasper de Alba's Desert Blood-Juárez Murders," in Approaches to Killing: An Interdisciplinary Study of the Discursive Construction of Violence in the Northern Border of Mexico. Ed. Héctor Domínguez-Ruvalcaba and Ignacio Corona.

Book in progress:

Women Romancing the Nation: Nature, Nation and the Lettering of Gender in Post-Revolutionary Mexico 1924-1965.

Articles in progress:

- "Recovering Women Migratory Experience in norteño Writers"
- "Las vigilias del sueño: agencia y retórica del cambio en Balún Canán de Rosario Castellanos."

Kathryn McKnight

Chapter accepted:

"Limón diverso: Narraciones de identidad y cimarronaje del Palenque del Limón en Cartagena de Indias (1634)." Desplazamientos y disyunciones: Nuevos itinerarios de los estudios coloniales. Ed. Stephanie Kira.

Book in progress:

Afro-Latino Voices: Documentary Narratives from the Early Modern Iberian World.
 Co-Editors Kathryn McKnight and Leo Garofalo.

Research funding:

- Research Allocations Committee Grant, 2007-2008, \$1,500.00 for translation expenses, anthology project, *Afro-Latino Voices: Documentary Narratives from the Early Modern Iberian World, 1552-1808.* Anthology coedited with Leo Garofalo.
- Susan Geiger Research Award for 2007, from the Feminist Research Institute, \$500.00, for translation expenses, anthology project, Afro-Latino Voices: Narratives from the Early Modern Ibero-Atlantic World, 1552-1808. Anthology coedited with Leo Garofalo.

Margo Milleret

Paper submitted:

"Portuguese Program Evaluation and Spanish Speakers' Needs" Submitted to Proceedings of the Portuguese for Spanish Speakers II Symposium.

Current research project:

Foreign Language Program Evaluation Project, Principle Investigator John M. Norris at University of Hawaii. The Portuguese program at UNM is one of five case studies for this federally funded project under the Department of Education, 2007-2008.

Tey Diana Rebolledo

Edited manuscript in preparation:

"La Página Roja: The Chicana/o Detective Novel."

Translation, annotated critical edition with introduction and foreword:

"The Captivity Narrative of Refugio Gurriola."

Research in progress:

- "May War Rest in Peace: María Mercedes Carranza." Ed.
- "I Am Nobody: Transgenerative Autobiographies and the Chicana Canon."
- "For I Am As Good As She: The Struggle for Representation. In Pursuit of a Literary and Historical Heritage of Hispanas in the West/Southwest, 1550-1950."
- "Las Clarividentes/The Clairvoyants: Chicana Artists and Writers. Ethnicity, Gender and Creativity."

Rena Torres Cacoullos

Articles forthcoming:

- "Phonological and grammatical variation in exemplar models." Studies in Hispanic and Lusophone Linguistics, with Joan L. Bybee, September 2008.
- "On the persistence of grammar in discourse formulas: a variationist study of that."
 Linguistics, with James A. Walker, December 2008.
- "Constructions and pragmatics: variable middle marking in Spanish subir(se) 'go up' and bajar(se) 'go down" with Scott A. Schwenter, Journal of Pragmatics 40,

December 2008.

Chapter forthcoming:

"Las nominalizaciones de infinitivo. Sintaxis histórica del español, tomo II: La frase nominal," Concepción Company Company (directora). México: Fondo de Cultura Económica y Universidad Nacional Autónoma de México. Fall 2008.

Conference proceedings forthcoming:

- "The role of prefabs in grammaticization: How the particular and the general interact in language change," with Joan L. Bybee Proceedings of the 2007 University of Wisconsin-Milwaukee Symposium on Formulaic Language, ed. by Roberta Corrigan, Edith Moraycsik, Hamid Ouali, and Kathleen Wheatley. Amsterdam: John Benjamins. Fall 2008.
- "La evolución de estar + V-ndo hacia expresión obligatoria del aspecto progresivo en español." Actas VII Congreso Internacional de Historia de la Lengua Española, Concepción Company Company y José G. Moreno de Alba (editores). Arco Libros. Fall 2008.

Chapter forthcoming in edited volume:

"Variable yo expression in New Mexico: English influence?" with Catherine E. Travis, in Spanish of the Southwest: A language in transition, Susana Rivera-Mills & Daniel Villa (eds.). Frankfurt: Iberoamericana/Vervuert. 2009.

Articles submitted:

- "Variation and grammaticization: The emergence of an aspectual opposition." Submitted to Studies in Language Variation, P. Pavlou & S. Tsiplakou (eds.), Amsterdam: John Benjamins.
- "The present of the future: discourse variation and the bounds of grammaticization," with James A. Walker, Submitted to Language.

Articles in progress:

- "The evolution of grammar through neutralization-in-discourse."
- "La delimitación del contexto variable según canales de gramaticalización en la distribución complementaria débil."

Catherine Travis

Book accepted but not yet published:

Introducción a la lingüística hispánica (2nd ed.) with José Ignacio Hualde, Antxon Olarrea, Anna María Escobar Cambridge: Cambridge University Press. January 2009.

Chapter in edited volume forthcoming:

• "Variable yo expression in New Mexico: English influence?" with Rena Torres Cacoullos in Spanish of the Southwest: A language in transition, Susana Rivera-Mills & Daniel Villa (eds.). Frankfurt: Iberoamericana/Vervuert. 2009.

Articles in progress:

- "The role of frequency in the retention of nós in Brazilian Portuguese," with Agripino
- "A corpus-based analysis of Spanish locational adverbs," with Timothy Jowan Curnow. Research funding:
- "A corpus of conversational Colombian Spanish" Latin American and Iberian Institute, Faculty Field Research Grant, \$1,293.00 Spring 2008.
- "Using technology for the teaching of linguistics" Teaching Allocations Subcommittee, \$2,262.00, July 2007 - November 2007.

H. ACTIVITIES IN LEARNED AND PROFESSIONAL SOCIETIES

Anthony J. Cárdenas

- Conference organizer of The 15th Annual University of New Mexico Conference on lbero-American Culture and Society Heroes and Anti-Heroes: Celebration the Cid, Albuquerque. February 27-29, 2008.
- Session organizer of "Twice Told Tales, I & II" at the 43rd International Congress on Medieval Studies. The Medieval Institute. Western Michigan University, Kalamazoo. May 8-11, 2008.
- Member of the Executive Committee for the Modern Language Association's Spanish Medieval Language & Literature, 2005–2009.
- Reader for La Corónica.

Enrique Lamadrid

- Manuscript editing on Peter J. García's, Decolonizing Enchantment: Lyricism, Ritual, and Echoes of Nuevo Mexicano Popular Music. For University of New Mexico Press. Manuscript reports for:
- Nabhan, Gary Paul. Arab/American: Landscape, Culture, & Cuisine in Two Great Deserts. For University of Arizona Press.
- Smith, Victoria. Captive Arizona: 1851-1900. For University of Nebraska Press.
- Anaya, Rudolfo. The Collected Plays of Rudolfo Anaya. For University of Oklahoma Press.
- Bent, Pauline Chávez. Atarque: Now All is Silent. Los Ranchos de Alburquerque: LPD Press, 2007.
- Member of the Advisory Board, Smithsonian Center for Folklife and Cultural Heritage.
- Member of the New Mexico Historical Society.

Kimberle López

- National Fulbright application evaluation for Brazil, Argentina, Uruguay, Chile and Venezuela, December 2007.
- Evaluator for National Advanced Placement Spanish Literature Examination. Educational Testing Service, Louisville, Kentucky, June 2008.
- External Mid-probationary reviewer for Raul Rubio, Assistant Professor of Spanish American, U.S. Latino and Brazilian Literature and Film, Wellesley College. Spring 2008.
- Proofread the second edition of Carlos Jáuregui's Canibalia: Canibalismo, calibanismo, antropofagia cultural y consumo en América Latina, Premio Casa de las Américas 2005, published in Madrid: Iberoamericana, 2008.
- Reviewer of two volumes of cultural studies textbook, Elizabeth Coonrod-Martínez's Apertutas I: Southwest and Aperturas II: Centroamérica, Focus Publishing.
- Reviewer of Spanish culture textbook, España y su civilización for McGraw Hill Publishing.
- Reviewer of Spanish American culture textbook, Hispanidades for McGraw Hill Publishing.
- Reviewer of textbook proposal for Spanish, Spanish American, and U.S. Latino culture for Yale University Press.

Miguel López

- Evaluator for National Advanced Placement Spanish Literature Examination. Educational Testing Service, Louisville, Kentucky, June 2008.
- Organizer of a special session for Latin American Studies Association International Congress, Montreal, Canada, September 5-8, 2007.
- Reviewer of two volumes of cultural studies textbook, Elizabeth Coonrod-Martínez's Apertutas I: Southwest and Aperturas II: Centroamérica, Focus Publishing.

Kathryn McKnight

- Member of the Editorial Board for Tulsa Studies in Women's Literature.
- Member of the Editorial Board for the Colonial Latin American Historical Review.
- · Article referee for Chasqui.

Margo Milleret

- Secretary of the Executive Committee of the American Portuguese Studies Association.
- Member of the Editorial Board for Latin American Theatre Review.
- Member of the Editorial Board for Journal of the Mountain Interstate Foreign Language Conference.
- Reviewer for Luso-Brazilian Review.

Eleuterio Santiago-Díaz

- Reviewer of book manuscript Los Comentarios for Centro de Publicaciones Académicas, 2007.
- Reviewer of book manuscript Miguel Soto: Apóstol de la clase obrera for Casa de Estudios José Cardijin, 2007.
- Reviewer of journal articles for Caribbean Studies, 2007.

Tey Diana Rebolledo

• Judge for The Critica Nueva Award, University of New Mexico, 2005 - 2008.

Susan Rivera

• Juror, Premio Emilio Alarcos de Poesía. Ovieda, Spain.

Rena Torres Cacoullos

- Editor of Language Variation and Change.
- Referee of book manuscript proposal for Blackwell, Cambridge University Press.
- Referee of conference proceedings abstracts for Encuentro de Lingüística en el Noroeste.
- Referee of conference proceedings abstracts for Hispanic Linguistics Symposium.
- Referee of national funding organization the National Science Foundation.
- Referee of national funding organization Social Sciences and Humanities Research Council of Canada.

Catherine Travis

- Member of the Linguistic Society of America.
- Member of the International Cognitive Linguistics Association.
- Member of the Australian Linguistics Society.

- Member of the Linguistic Association of the Southwest.
- Reviewer of journal articles for Studies in Language, Intercultural Pragmatics, Compass Proceedings of the 7th Hispanic Linguistics Symposium, 2007.
- Reviewer of journal articles for Forma y Función, Spanish in Context, Proceedings of the Australian Linguistic Society Annual Meeting (2 papers) 2008.
- Reviewer of two dissertation proposals for the National Science Foundation, 2007.

I. OTHER PROFESSIONAL ACTIVITIES (EXHIBITS, OFF CAMPUS TALKS, ETC)

Kathryn McKnight

Judge for *Voces Poéticas*, *Annual Spanish Poetry Contest* for elementary school Students. Sponsored by the UNM Center for Latin American Resources and Outreach, April 2008.

Margo Milleret

- Volunteer and Host Parent, American Field Service High School Intercultural program, 2007 - 2008.
- Orientation Coordinator and member of the New Mexico Area Team Board of Directors for American Field Service, 2004 - present.

J. NON-TEACHING UNIVERSITY, COLLEGE, AND DEPARTMENT SERVICE

Anthony J. Cárdenas

- Spanish Undergraduate Advisor, 2006 2008.
- Chair of Maria Conklin's PhD examination committee completed Spring 2008.
- Chair of Aaron Taylor's master thesis committee "Diego de San Pedro's Tractado de amores de Arnalte y Lucenda: A Critical Study of MS 940 of the Trivalziana Library"
 completed Spring 2008.
- Study Abroad Coordinator for the España Literaria Program. Spain, May 19 June 2, 2008.
- Director of McNair Scholar Daniel Abeyta Editing the Crónica del Cid, 15r-29r, Spring 2008.
- Director of McNair Scholar Myra Villalobos Editing the Crónica del Cid, 30r-49r, Spring 2008.
- Director of Nohemí Hinojosa-López's BA honor's thesis, Spring 2008.
- Director of John Smeltzer's BA honor's teaching, Spring 2008.
- Director of Vincent Richard's independent study course, Summer 2007.
- Director of Valerie Brewster's independent study course, Fall 2007.
- Director of Bernardino Bañuelos's independent study course, Fall 2007.
- Director of Danielle García's independent study course, Fall 2007.
- Director of Justin Sánchez's independent study course, Fall 2007.
- Director of Salvador Alfaro Ayala's independent study course, Spring 2008.
- Director of Luzdelcarmen Carreon's independent study course, Spring 2008.
- Director of Nohemi Hinojosa-Lopez's independent study course, Spring 2008.
- Director of Tina A Joyner's independent study course, Spring 2008.
- Director of Joshua Martinez's independent study course, Spring 2008.
- Director of Michael Nilan's independent study course, Spring 2008.
- Director of John Smeltzer's independent study course, Spring 2008.

- Director of Christa Trujillo's independent study course, Spring 2008.
- Director of Angela Gonzales's independent study course, Summer 2007.
- Director of Rain Story's independent study course, Spring 2008.

María Dolores Gonzales

- Coordinator of the Sabine Ulibarrí Spanish as a Heritage Language Program.
- · Co-chair of Michelle Salazar's dissertation committee.
- Member of Melissa Curtian's dissertation committee, Communication and Journalism.
- Member of Melissa Curtian's PhD exam committee, Communication and Journalism.

Enrique Lamadrid

- · Member of David Briggs' dissertation committee.
- Member of Vanessa de Veritch's dissertation committee.
- Member of Theo Walker's dissertation committee.

Kimberle López

- Co-Director with Finnie Coleman and Miguel López, Afro-Mestizo Presence in Mexico, Study Abroad in the State of Veracruz, Mexico, January 2008.
- Director of Teresa Dovalpage's dissertation committee, "De señora casera a jinetera: Imágenes de la mujer en la narrativa cubana masculina del siglo XX y principios del XIX," - completed Spring 2008.
- Director of Héctor Contreras-López's dissertation committee.
- Member of Olga Rios-Soria's dissertation committee.
- Member of Ricardo Moreira's MA thesis committee completed Summer 2007.
- Director of Jenny Beare's honor's thesis in progress.

Miguel López

- Graduate Advisor, Spanish and Portuguese, 2006 2008.
- Co-Director with Finnie Coleman, Sagrario Sanchez-Cruz and Kimberle López, for Afro-Mestizo Presence in Mexico Study Abroad in Veracruz, Mexico, January 2008.
- · Chair of Olga Rios-Soria's dissertation committee.
- Chair of Erin Amason-Montero's dissertation committee.
- · Chair of Angelica Sanchez-Clark's dissertation committee.
- Chair of Mabel Muñoz's, MA thesis committee, Latin American Studies completed Spring 2008.
- · Member of Alena Johnson's dissertation committee.
- Member of Carmen Holguin-Chaparro's dissertation committee.
- Member of Héctor Contreras-López's dissertation committee.
- Member of Lorena Galván-Valenzuela's dissertation committee.
- Director of Rosario Gonzales' independent study "Chicano Narrative," Fall 2007.
- Director of Oscar Cea's independent study "Central American Literature," Spring 2008.
- Director of Ben Waddell's independent study "Narratives of Immigration," Spring 2008.
- Presented a talk "How to Survive in Graduate School When you are a Minority" to the Graduate and Professional Students of Color Association, Summer 2007.
- Conducted Workshop on How to Study for MA Exams, Fall 2007.

• Conducted Workshop on How to Apply for Graduate School at UNM, Fall 2007.

Kathryn McKnight

- Member of Angelica Sanchez-Clark's PhD exam committee completed December 2007.
- Section head, Latin American Literature, Department of Spanish and Portuguese.

Margo Milleret

- Associate Chair, Spanish and Portuguese, 2007 2008.
- Supervisor and Coordinator of the Portuguese program, 1998 present.
- · Portuguese Undergraduate Advisor.
- Faculty advisor for Portuguese Language Club.
- · Advisor for the Phi Lambda Beta Portuguese Honorary Society.
- Organizer of "African Presence in Cuba and Brazil," Fall 2007.
- Co-author of the department's self-study for Academic Review, 2007-2008.
- Developer of Outcomes Assessments for the Core Curriculum, 2007-2008.
- Chair of Jeremy Lehnen's dissertation committee, Latin American Studies.
- Director of Portuguese honor's thesis for Ryan Bobbe in progress.
- Director of Portuguese honor's thesis for Keelev Lowney, May 2008.
- Director of Portuguese honor's thesis for Kara Miller, May 2008.

Mary B. Quinn

Member of María Conklin's PhD examination committee – completed Spring 2008.

Tey Diana Rebolledo

- Chair of Melba Amador's dissertation committee.
- Chair of Veronica Calvillo's dissertation committee.
- Member of María de Abajo's dissertation committee completed Fall 2007.
- Member of Carmen Holguin-Chaparro's dissertation committee.
- Member of Jeremy Lehnen's dissertation committee, Latin American Studies.
- Member of Jennifer Dickison's dissertation committee, American Studies completed Spring 2008.
- Member of Angelica Sanchez-Clark's dissertation committee.
- Member of Misty Ring's MA committee, Latin American Studies.

Susan Rivera

- Chair of María de Abajo dissertation committee, "Tres escritoras españolas de posguerra: Carmen Martín Gaite, Almudena Grandes, Lucía Etxebarría." - completed November 2007.
- · Chair of Theodore Walker's dissertation committee.
- Chair of David Briggs's dissertation committee.
- Member of Teresa Dovalpage's dissertation committee completed May, 2008.
- Member of Maria Conklin's PhD exam committee completed Spring 2008.
- Member of Aaron Taylor's MA thesis committee completed Spring 2008.
- Director of Alison Grochowski honors thesis, "La imagen de la mujer en los siglos XVIII y XIX" - completed Spring 2008.
- Head of Peninsular Spanish section, Spanish and Portuguese 2007 2008.

Elueterio Santiago-Díaz

Director of Manuel Burgos independent study, Spring 2008.

Rena Torres Cacoullos

- Chair of Earl Brown's dissertation committee, "The conditioning effect and interaction of phonological factors and frequency measures on the reduction of syllable-final /s/ in three dialects of Spanish" completed Spring 2008.
- · Chair of Mary Copple's dissertation committee.
- · Chair of Patricia Morales Cano's dissertation committee.
- Chair of Evelyn Durán-Urrea's dissertation committee.

Catherine Travis

- · Chair of Jennifer Dumont's dissertation committee.
- · Chair of Mami McCraw's dissertation committee, Educational Linguistics.
- · Chair of Daniel Sanford's dissertation committee, Linguistics.
- Chair of Agripino Silveira's dissertation committee, Linguistics.
- Chair of Damián Wilson's dissertation committee.
- Member of Mary Copple's dissertation committee.
- Member of Angus Grieve Smith's dissertation committee, Linguistics completed Spring 2008.
- · Chair of Susan Buescher's MA thesis committee, Linguistics.
- Member of Melvatha Chee's MA thesis committee, Linguistics.
- Member of MA exam committee Jalon Begay, Linguistics.
- Member of MA exam committee Grandon Goertz, Linguistics.
- Member of MA exam committee Steven Menefee, Linguistics.
- Director of Cheryl Gourley's honors thesis, "New Mexican Spanish" completed Spring 2008.

K. DIVERSITY

Throughout the last academic year the Department maintained it's pursuit of diversity, making efforts to attract women and minority groups. The Department issued contracts to fifty seven teaching assistants, thirty four of whom are Hispanic-Americans, two are of African descent, and twelve are Hispanic individuals from such diverse places as Brazil, Bolivia, Spain, Puerto Rico, Cuba, Colombia, Venezuela, Uruguay and Mexico. Our three Portuguese teaching assistants are all from Brazil. Women accounted for 70 percent of the total, of which twenty are Hispanic. A total of six lecturers taught on a part-time basis, all of them are women, and Hispanic. The work study team was composed of four students, three of whom are Hispanic women.

Annual Report Department of Speech and Hearing Sciences July 1, 2007 – June 30, 2008

Submitted by Philip S. Dale, Professor and Chair Department of Speech and Hearing Sciences

I. Significant Developments

A. Accreditation

The department's fourth annual report, covering the period April 1, 2007 – March 31, 2008, was approved by the Council on Academic Accreditation of the American Speech-Language-Hearing Association (ASHA-CAA). The department is currently accredited for the full eight-year cycle of April 1, 2004 – March 31, 2012.

B. <u>UNM Speech-Language-Hearing Clinic</u>

The following chart summarizes the total number of sessions and the populations served (number of individuals) by the clinic for AY 2006-2007 (FS, SS, Summer).

	Age		Ethnicity					
Total	Child	Adult.	White	Hispanic	Black	Native	Asian	Not
Sessions						American		reported
1875	106	77	112	30	3	3	27	8

In addition to individual treatment for a wide range of speech and language disorders, the clinic provided group sessions for adults with aphasia, children with language delay, children with autism spectrum disorders, transgender voice, fluency and articulation clients. (These sessions are included in the figures above.) Preschool children identified in the Albuquerque Public Schools "Child Find" program were also seen for treatment in our clinic. The clinic also provided diagnostic and treatment sessions for clients wishing to modify their English pronunciation. Many of these clients are UNM graduate assistants whose first language is not English.

A fund, established by a gift from Charlotte and Keith Lough, assists clients who cannot afford the established Clinic fees for speech-language pathology services.

C. Acquisition of Equipment and Major Materials

The department received \$10,000 as part of the College of Arts & Sciences Equipment Allocation. The funds were used for a major, somewhat overdue upgrade and modernization of the video facilities in the Clinic. These facilities are an essential part of the supervision process for graduate student clinicians, as well as permitting parents to observe sessions. We upgraded all 8 therapy rooms to point-and-zoom cameras and high-quality microphones, and installed high-quality flatscreen monitors, speakers, and DVD recording equipment in the observation booths. In the future, we hope to network the entire system, which would permit remote observation, supervision, and recording.

D. Comunidad Crecer

For the 19th year, a team of graduate students and supervisors traveled to Mexico City to Comunidad Crecer, a private school/clinic for children and young adults with multiple handicaps. The team this year included 4 speech-language pathology graduate students, 4 occupational therapy graduate students, 3 speech-language pathology supervisors and 2 occupational therapy supervisors. The team was in Mexico for 7 days and evaluated or reevaluated 32 students at the school, provided inservices on a variety of topics for parents and CC staff, and held parent conferences with results and recommendations from the evaluations. During times that the team members were not working with the children, they were taken to museums, the pyramids of the sun and moon, a performance of the Folkloria ballet, the floating gardens, and other cultural sites. The project was superbly coordinated this year by Assistant Professor Dr. Cathy Binger. We anticipate that our new Clinic Director, Dr. Sandra Nettleton, will be coordinating the program next year.

E. Camp of the Rising Sun

A high priority for our clinical training program is providing experience in the widest possible range of service delivery models. As part of this effort, this year a team of SHS graduate students and supervisors participated in Camp of the Rising Sun. This camp is specifically designed for approximately 35 individuals with Autism and is held every summer in July. The project is an interdisciplinary one, involving students and supervisors in Speech-language Pathology, Occupational Therapy, and Education. Additionally, it is an interagency collaborative project between UNM SHS, Center for Development and Disabilities (CDD), and the Southwest Autism Project in Albuquerque. The team this year included 6 speech-language pathology students, 5 occupational therapy students, 2 education students and 4 supervisors. The camp takes place at Camp Oro Ouay, located in the east mountains, with a mission of providing quality service to children and adolescents with autism, along with a quality camp experience. An additional focus is to provide respite for family and guardians. Graduate students in SLP learned interdisciplinary techniques and strategies for the children, and gained a unique experience of providing self-help and daily needs for children with autism. Parents were provided with suggested strategies for communicating with their children while at home. The project was coordinated this year by Dr. Sandra Nettleton, UNM SHS Clinic Director, with the substantial assistance of Elizabeth Meek.

F. End of Contract with Albuquerque Public Schools, and Budgetary Constraints on the Size of the Graduate Program in SHS

At the end of the 2006-2007 year, our contract with the Albuquerque Public Schools ended. For a number of years, the Department of Speech & Hearing Sciences was able to maintain a larger graduate program training speech-language pathologists (SLPs) than otherwise possible, thanks to this contract. APS, as the largest single employer of our graduates, provided this support in order to increase the number of SLPs trained, and to increase the likelihood that individual graduates would chose APS for their initial position.

For a number of reasons, primarily fiscal constraint, APS terminated this contract at the end of the 2006-2007 year. This would necessitate reducing the size of our graduate program by 35-40%, as the limiting, most expensive component of graduate training is the clinical supervision required. There is, however, a very severe shortage of SLPs in New Mexico. The previous Dean of Arts & Sciences was able to provide one-time support of approximately \$61K

as transitional funding. With these funds, and some juggling of clinic schedules, we were able to hold the reduction in size for 2007-2008 to approximately 20%. We also, together with our counterparts at NMSU, pushed for a legislative initiative to address the state-wide shortage of SLPs. This initiative was approved by the Regents of both universities, and by the Higher Education Committees of both the New Mexico House and Senate, but was not funded. The present Dean provided an additional one-year funding of approximately the same amount for 2008-2009, which has allowed us to hold constant at this reduced level, while we continue to seek additional resources.

II. Significant Plans and Recommendations

- We successfully recruited a new Clinic Director, Dr. Sandra Nettleton, who brings broad
 expertise to the position. A high priority for the department, and one to which Dr.
 Nettleton is also contributing in a very substantial way, is greater integration between the
 didactic component of the graduate program and the clinical component.
- Both our assistant professors undergoing review for tenure and promotion completed the process successfully, and are now Associate Professors. Consequently we have a much better balance of junior and senior academic faculty (2:4, respectively).
- In addition to the very solid publication record of the faculty, a high priority has been seeking external funding for research. During the period covered by this report, two grant proposals (\$75K each) have been submitted to the American Speech-Language-Hearing Association by Dr. Binger and Dr. Palmer. Since then a proposal for a large project (\$1.3M) has been submitted to the U.S. Institute of Educational Sciences by Dr. Patterson and Dr. Rodriguez, as well as a small grant proposal by Dr. Neel. Dr. Rodriguez continues her substantial subcontract (\$484K) on an NIH grant to Pennsylvania State University.
- We are continuing to search for a .50 FTE Lecturer in Audiology, to teach two courses
 and supervise practicum experiences. We hope this will improve the coherence and
 consistency of the audiology portion of the curriculum.
- The loss of the APS contract, as explained above, presents what is potentially the largest challenge to the department. We are grateful for the College support, but the long-term future of the department will require additional, continuing state funding.

III. Appointments to Faculty and Staff

Dr. Sandra Nettleton joined our staff as Clinic Director, effective January 2, 2008. There were no additions to the faculty, although a search is in progress, as described above.

IV. Separations of Faculty and Staff

Our Clinic Director, Charlotte Lough, retired effective December 31, 2008 (see previous items concerning our new Clinic Director).

V. Faculty Achievements

A. Publications

Binger, Cathy

Binger, C. (2008). Grammatical morpheme intervention issues for students who use AAC. *Perspectives on Augmentative and Alternative Communication, 17*, 62-68.

Binger, C., Berens, J., Kent-Walsh, J., & Hickman, S. (2008). The impacts of aided AAC interventions on AAC use, speech, and symbolic gestures. *Seminars in Speech and Language*, 29(2), 101-111.

Binger, C., & Light, J. (2008). The morphology and syntax of individuals who use AAC: Research review and implications for effective practice. *Augmentative and Alternative Communication*, 24, 123-138.

Binger, C. (2008). Classroom-based language goals and intervention for children who use AAC: Back to basics. *Perspectives on Augmentative and Alternative Communication*, 17, 20-26.

Kent-Walsh, J., Stark, C., & Binger, C. (2008). Tales from school trenches: AAC service-delivery and professional expertise. *Seminars in Speech and Language*, 29(2), 146-154.

Binger, C. (2007). AAC intervention for children with suspected childhood apraxia of speech. *Perspectives on Augmentative and Alternative Communication*, 16, 10-12.

Dale, Philip

Kovas, Y., Haworth, C. M. A., Dale, P. S., & Plomin, R.. (2007). The genetic and environmental origins of learning abilities and disabilities in the early school years. *Monographs of the Society for Research in Child Development*, 72 (3, Serial No. 288).

Harlaar, N., Dale, P. S., & Plomin, R.. (2007). Reading exposure: A (largely) environmental risk factor with environmentally-mediated effects on reading performance. *Journal of Child Psychiatry and Psychology, 48*, 1192-1999.

Davis, O. S. P., Kovas, Y., Harlaar, N., Busfield, P., MacMillan, A., Frances, J., Petrill, S. A., Dale, P. S., & Plomin, R. (2008). Generalist genes and the Internet generation: etiology of learning abilities by web testing at age 10. *Genes, Brain and Behavior*, 7, 455-462.

Haworth, C. M. A., Dale, P. S. & Plomin, R.. (2008). A twin study into the genetic and environmental influences on academic performance in science in 9-year-old boys and girls. *International Journal of Science Education*, 30, 1003-1025.

Harlaar, N., Hayiou-Thomas, M. E., Dale, P. S., & Plomin, R.. (2008). Why do preschool language abilities correlate with later reading? A twin study. *Journal of Speech, Language, and Hearing Research*, 51, 688-705.

- Goodman, J. C., Dale, P. S., & Li, P. (2008). Does frequency count? Parental input and the acquisition of vocabulary. *Journal of Child Language*, 35, 515-531.
- Haworth, C. M. A., Kovas, Y., Dale, P. S., & Plomin, R.. (in press). Science in Elementary School: Generalist Genes and School Environments. *Intelligence*. (epub: doi:10.1016/j.intell.2008.04.002)
- Haworth, C. M. A., Dale, P. S., & Plomin, R.. (in press). The etiology of science performance: Decreasing heritability and increasing importance of shared environment from 9 to 12 years of age. *Child Development*.

Neel, Amy

- Neel, A.T., Palmer, P.M., & Gass, C. (in press). Can IOPI be used to measure tongue pressure for speech sound? *Journal of Medical Speech-Language Pathology*.
- Neel, A.T. (2008). Vowel space characteristics and vowel identification accuracy. *Journal of Speech, Language, and Hearing Research*, 51, 574-585.

Palmer, Phyllis

Palmer, P.M. (2008). Oculopharyngeal Muscular Dystrophy. In H. Jones & J. Rosenbek (Eds.) *Encyclopedia of Oropharyngeal Dysphagia: Associations with Rare Conditions*. Plural Publishing.

Rodriguez, Barbara

Rodríguez, B., Hines, R. & Montiel, M. (in press). Joint book reading: Latino motherchild dyads of low socioeconomic status and middle socioeconomic status. *Language Speech* and Hearing Services in Schools.

Rodríguez, B., Hammer Scheffner, C., & Lawrence, F. R. (in press). The reliability and validity of the Parent Reading Belief Inventory with Mexican-American families. *Early Education and Development*.

Hammer Scheffner, C., Rodriguez, B.L., Lawrence, F. R., & Miccio, A.W. (2007). Puerto Rican mothers' child rearing and educational beliefs and home literacy practices. *Language*, *Speech, Hearing, Services in the Schools*, 38, 1-9.

Hammer Scheffner, C., & Rodríguez, B. L. (in press). Individual Differences in Bilingual Children's Language Competencies: The Case for Spanish and English. In A. Weiss (Ed.), *Perspectives on individual differences affecting therapeutic change in communication disorders*. Taylor & Francis/Psychology Press.

Miccio, A.W., Hammer Scheffner, C., & Rodríguez, B. L. (in press). Issues in codeswitching: Preschoolers learning two languages. In B. Bullock & A. J. Toribio (Eds.). *The* handbook of code-switching. Cambridge University Press.

B. Conference Presentations

Binger, Cathy

- Binger, C. & Kent-Walsh, J. (2008). Teaching Children who use AAC to use Bound Morphemes. Paper presented at the 13th biennial conference of the International Society for Augmentative and Alternative Communication. Montreal, Canada.
- Kent-Walsh, J., & Binger, C. (2008). Targeting Expressive Language Skills with Children using AAC: Interventions for Peers & Children with Autism. Paper presented at the 13th biennial conference of the International Society for Augmentative and Alternative Communication, Montreal, Canada.
- Berens, J., Binger, C., & Kent-Walsh, J. (2007, November). Impact of aided AAC intervention on other communication modalities. Poster presented at the annual conference of the American Speech-Language-Hearing Association, Boston, MA.
- Binger, C. (2008, February; invited). Bound morpheme intervention for children who use AAC. Invited presentation at the 9th Annual Conference of the ASHA Division on AAC, Long Beach, CA.
- Binger, C., Kent-Walsh, J., Berens, J., Ewing, C., Hickman, S., & Maguire, M. (2007, November). Modeling and recasting: Grammar intervention with children who use AAC. Poster presented at the annual conference of the American Speech-Language-Hearing Association, Boston, MA.
- Stark, C., Kent-Walsh, J., & Binger, C. (2007, November). School-based AAC service delivery survey: Demographics, service delivery, & SLP training. Poster presented at the Annual Convention of the American Speech-Language Hearing Association, Boston, MA.

Dale, Philip

Jørgensen, R.N., Bleses, D., Dale, P. & Fenson, L. (July, 2007). The CLEX website: An introduction to a new cross-linguistic database website and a discussion of dilemmas regarding publishing complete datasets. Child Language Seminar, Reading, UK.

Hayiou-Thomas, M.E., & Dale, P. S. (November, 2007). Genetic and environmental influences on early language and literacy development. American Speech-Language-Hearing Association, Boston, MA.

Dale, P.S. (July, 2008). Some useful insights from the Twins Early Development Study (TEDS) for screening projects. Eleventh International Congress for the Study of Child Language, Edinburgh, Scotland.

Neel, Amy

Neel, A.T. (2007, November). Speech intelligibility and the vowel space: Normal speech. Invited talk presented at the Acoustical Society of America, New Orleans, LA.

Palmer, P.M. and Neel, A.T. (2007, November). Speech and swallowing oculopharyngeal muscular dystrophy. Invited talk presented at the OPMD Family Conference sponsored by the Muscular Dystrophy Association, Albuquerque, NM.

Rodriguez, Barbara

Rodríguez, B., Winslow, A., Hammer, C., & Miccio, A. W. (2008, June). Bilingual children's English and Spanish expressive language skills: A focus on individual differences in syntactic complexity, lexical diversity, and verb morphology. Poster presentation at the National Head Start's 9th Research Conference, Washington, D. C.

Hill, T. D., Lopez, L. M., Miccio, A. W., Hammer Scheffner, C., & Rodríguez, B. L. (2008, June). Understanding language development in ELL preschoolers: Making the connection between language dominance, phonological abilities, and vocabulary development. Poster presentation at the National Head Start's 9th Research Conference, Washington, D. C.

Miccio, A. W., Hammer Scheffner, C., Lopez, L. M., & Rodríguez, B. L. (2008, June). Bilingual Spanish-English Phonological Assessment for Young Children. Poster Symposium presentation at the National Head Start's 9th Research Conference, Washington, D. C.

Rodríguez, B., Hammer, C., & Lawrence, F. (2007, November). Parent Reading Belief Inventory: Reliability and validity in a sample of Mexican-American mothers. Poster presentation at the 2007 American Speech-Language-Hearing Association Annual Convention, Boston, Massachusetts.

C. <u>Outside Professional Service</u>

Binger, Cathy

Consulting Editor: Augmentative and Alternative Communication, 2008-2010 Guest Editor: Journal of Speech, Language, and Hearing Research, August 2008.

Dale, Philip

Editor, Journal of Child Language

Neel, Amy

Reviewer for Journal of the Acoustical Society of America; Journal of Speech, Language, and Hearing

Reviewer for proposed textbook, Anatomy and Physiology for Speech and Hearing, Wolters-Kluwer Publishing.

Palmer, Phyllis

Reviewer for Journal of Speech, Language, and Hearing Research; Dysphagia Website manager for dysphagia.com

Patterson, Janet

Reviewer for Language, Speech and Hearing Services in Schools; Journal of Speech, Language, and Hearing Research

Rodriguez, Barbara

Reviewer, Language Speech and Hearing Services in the Schools; Journal of Early Childhood Literacy, American Journal of Speech-Language Pathology

Member, Hispanic Caucus Representative, Multicultural Issues Board, American Speech Language Hearing Association

American Speech Language Hearing Association, Division 14, Research Conference Planning Committee

Editor, American Speech Language Hearing Association, Division 14, Perspectives on Communication Sciences and Disorders in Culturally and Linguistically Diverse Populations

VI. Outside Sponsored Research

Binger, Cathy

Binger, C. Using Voice Output Devices to Improve the Turn-Taking Skills of Children with Autism Spectrum Disorders (ASD). Research Allocation Committee Small Grant Award, University of New Mexico. May-September, 2008, \$4000

(submitted; under review)

Binger, C. Using Focused Stimulation to Improve the Grammar Skills of Children who use AAC. American Speech-Language-Hearing Foundation. January 2009 - December 2010, \$75,000.

Palmer, Phyllis

(submitted; under review)

Palmer, P. Treatment of swallow deficits in patients with OPMD. American Speech-Language-Hearing Foundation. January 2009- December 2010, \$75,000.

Patterson, Janet

(submitted; not funded)

American Speech Language Hearing Association

Multicultural Grant Activities, Project CUE

Janet Patterson, Ph.D. and Barbara Rodríguez, Ph.D.

Changing Undergraduate Education: Pathways to Academic Success and Diversity \$9,548

Rodriguez, Barbara

Assessing Bilingual Phonological Development in Young Children Lead Investigator: Barbara L. Rodríguez, Ph.D.

Principal Investigator: Adele W. Miccio, Ph.D. NIH/Child Development and Behavior Branch Consortium with The Pennsylvania State University 10/2005 to 6/2010, \$484,044

(submitted; not funded)
American Speech Language Hearing Association
Multicultural Grant Activities, Project CUE
Janet Patterson, Ph.D. and Barbara Rodríguez, Ph.D.
Changing Undergraduate Education: Pathways to Academic Success and Diversity
\$9,548

VII. Students

A. Graduates

From Fall, 2007, through Summer, 2008, 32 master's students received their degrees. Of those reporting their prospective plans (26), the following sites of employment were represented:

New Mexico public schools	31 %
New Mexico health care facilities	31%
New Mexico private practice	31%
Out-of-state employment	7%
Further study (doctoral)	0

Fifty-one students received the Bachelor of Arts degree majoring in Speech & Hearing Sciences.

We also have a substantial number of students at any point in time who are officially "non-degree" students. Most have undergraduate degrees in other fields who are taking foundation courses in SHS in order to apply for graduate programs. There were 27 this past year.

B. Applications to the Graduate Program

There were 67 applications for fall, 2007, entry into the master's program in speech-language pathology. We accepted 27 of those applicants, and 19 enrolled in the program.

C. Enrollment composition

In spring, 2008, 82 undergraduate A&S students majored in Speech & Hearing Sciences, and an additional 22 students in the major were registered in University College. These included 47 Hispanic, 41 White/non-Hispanic, 6 Native American, 3 African-American, 4 Asian, and 5 not reported students.

The master's degree program served 44 enrolled graduate students, including 20 Hispanic, 26 White/non-Hispanic, 2 Asian, 1 African-American, and 4 not reported students.

TABLE 1

COLLEGE OF ARTS AND SCIENCES

DEPARTMENT CHAIRS: 2007 - 2008

American Studies	History				
Gabriel Melendez	Patricia Risso				
Anthropology	Linguistics				
Michael Graves	Sherman Wilcox				
Biology	Mathematics & Statistics				
Sam Loker	Alejandro Aceves				
Chemistry	Philosophy				
Cary Morrow	John Taber	_			
Communication & Journalism	Physics & astronomy				
John Oetzel	Bernd Bassalleck				
Earth & Planetary Sciences	Political Science				
John Geissman	Mark Peceny				
Economics	Psychology				
Philip Ganderton	Ronald Yeo	_			
English	Sociology	_			
David Jones	Philip Gonzales				
Foreign Languages & Literatures	Spanish & Portuguese				
Natasha Kolchevska	Tey Rebolledo				
Geography	Speech & Hearing Sciences				
Paul Matthews	Philip Dale				

TABLE 1 (continued)

COLLEGE OF ARTS AND SCIENCES

PROGRAM DIRECTORS: 2007 - 2008

African American Studies	Institute of Meteoritics
Finnie Coleman	Carl Agee
American Indian Research Institute	International Studies Institute
Beverly Singer	Christine Sauer
BA/MD Program	Latin American Studies
Phillip Ganderton	Kim Gauderman
Center for Advanced Studies	Maxwell Museum
Ivan Deutsch	James Dixon
Consortium of the Americas	Museum of Southwest Biology
for Interdisciplinary Science	Tom Turner
Nitant Kenkre	
Earth Data Analysis Center	Peace Studies
Stan Morain	Carole Nagengast
Feminist Research Institute	Religious Studies
Anita Obermeier	Richard Wood
Institute of Medieval Studies	Women Studies
Timothy Graham	Janet Cramer

TABLE 2

COLLEGE OF ARTS AND SCIENCES

STANDING COMMITTEES I

TENURE AND PROMOTION COMMITTEES

College of Arts and Sciences Senior Promotion Committee 2007-08

Professor Zach Sharp, Earth and Planetary Science (Chair)
Professor Chris Sierra, Political Science
Professor Jane Smith, Psychology
Sharon Warner, English.
Susan Tiano, Sociology
Virginia Scharff, History
Anthony Cardenas, Span/Portguese
Martin Kirk, Chemistry.
Janice Schuetz, Communications and Journalism

College of Arts and Sciences Junior Mid-Probationary & Promotion and Tenure Committee 2006-2007

Associate Professor Caroline Smith, Linguistics (Chair)
Professor Alok Bohara, Economics
Associate Professor Pamela Cheek, Foreign Languages
Associate Professor Miguel Lopez, Spanish/Portuguese
Professor Sally Seidel, Physics/Astronomy
Associate Professor John Roberts, Sociology.
Associate Professor David Tierney, Chemistry
Professor Jane Selverstone, Earth and Planetary Sciences

TABLE 3

COLLEGE OF ARTS AND SCIENCES

PROMOTIONS, TENURE, MID-PROBATIONARY REVIEWS, NEW APPOINTMENTS, RESIGNATIONS AND RETIREMENTS 2007-08 Review Candidates

<u>Name</u>	Department	Action Required
Ulfar Bergthorsson	Biology	Mid-Probationary
Cathy Binger	Speech & Hearing	Mid-Probationary
Mary Domski	Philosophy	Mid-Probationary
Marias Fontenla	Economics	Mid-Probationary
Joe Galewsky	Earth and Planetary	Mid-Probationary
J.M. Geremia	Physics and Astronomy	Mid-Probationary
Alyosha Goldstein	American Studies	Mid-Probationary
Kristine Grimsrud	Economics	Mid-Probationary
Derek Hamilton	Psychology	Mid-Probationary
Matthew Hofer	English	Mid-Probationary
Rhian Jones	Earth and Planetary	Mid-Probationary
Pavel Lushnikov	Math/Stats (Assoc. Prof)	Mid-Probationary
Pamela Lutgen-Sandvik	Communications and Journalism	Mid-Probationary
Terri Moyers	Psychology (.5 FTE)	Mid-Probationary
Carmen Nocentelli	English and FLL joint	Mid-Probationary
Ylva Pihlstrom	Physics and Astronomy	Mid-Probationary
Michael Rocca	Political Science	Mid-Probationary
Gabriel Sanchez	Political Science	Mid-Probationary
Thomas Sizgorich	History	Mid-Probationary
Jason Scott Smith	History	Mid-Probationary
Raji Vallury	Foreign Languages & Literatures	Mid-Probationary
Lorna Brau	Foreign Languages & Literatures	Tenure & Promotion
Charles Cunningham	Biology	Tenure & Promotion
David Hanson	Biology	Tenure & Promotion
Michelle Hall Kells	English	Tenure & Promotion
Dinesh Loomba	Physics and Astronomy	Tenure & Promotion
Nancy Lopez	Sociology	Tenure & Promotion
Geoffrey Miller	Psychology	Tenure & Promotion
Amy Neel	Speech & Hearing	Tenure & Promotion
Steven Poe	Biology	Tenure & Promotion
Barbara Reyes	History	Tenure & Promotion
Andrew Sandoval-Strausz	History	Tenure & Promotion
Catherine Travis	Linguistics & Spanish/Portugese	Tenure & Promotion
Wei Wang	Chemistry	Tenure & Promotion

TABLE 3 (Continued) 2007-08 Review Candidates

Promotion

Communications and Journalism Tenure & Promotion Olaf Werder Tenure & Promotion Psychology David Witherington Math and Statistics Tenure Santiago Simanca Felisa Smith Tenure Biology Promotion History Timothy Graham Promotion Sociology John Roberts Promotion

English

Linguistics

Hector Torres

Phyllis Wilcox

TABLE 3 (Continued)

COLLEGE OF ARTS AND SCIENCES

PROMOTIONS, TENURE, MID-PROBATIONARY REVIEWS, NEW APPOINTMENTS, RESIGNATIONS AND RETIREMENTS

Resignations/Retirements (Effective AY 2007-2008)

Altenbach, J S Biology
Archuleta, Elizabeth English
Bentley, Paul Chemistry
Brandon, Stephen English
Burness, Stuart Economics

Clements, Clancy Spanish and Portuguese

Goldfrank, Benjamin Polical Science
Hill, Kim Anthropology
Hurtado, Ana Anthropology

Klebes, Martin Foreign Languages and Literature

Koltchinskii, Vladimir Mathematics and Statistics

Lindsey, Byron Foreign Languages and Literature McAlhany, Joseph Foreign Languages and Literature

Putkaradze, Vakhtang Mathematics and Statistics

Schueler, George Philosophy
Shea, Jerome English
Watkins, Joseph Anthropology
Williams, Jerry Geography

TABLE 4
COLLEGE OF ARTS AND SCIENCES

A&S TRAVEL DISBURSEMENTS: 2007-2008

Department	General <u>Allocations</u>	Special <u>Allocations</u>
Africana Studies	\$1,200	\$0
American Studies	\$7,600	\$0
Anthropology	\$20,800	\$0
Biology	\$32,200	\$0
Chemistry	\$14,000	\$0
Communication and Journalism	\$16,000	\$0
Earth and Planetary Sciences	\$17,600	\$0
Economics	\$10,400	\$0
English	\$26,400	\$601
Foreign Languages and Literatures	\$9,400	\$2,506
Geography	\$3,600	\$0
History	\$22,800	\$800
Linguistics	\$7,600	\$0
Mathematics and Statistics	\$26,800	\$0
Medieval Studies	\$400	\$1,206
Philosophy Total	\$12,300	\$0
Physics and Astronomy	\$25,200	\$0
Political Science	\$12,800	\$0
Psychology	\$19,600	\$0
Religious Studies	\$2,200	\$0
Sociology	\$15,200	\$0
Spanish and Portuguese	\$12,400	\$3,160
Speech and Hearing Sciences	\$4,400	\$0
Women Studies	\$1,750	\$0_
	\$322,650	\$8,273

TABLE 5

COLLEGE OF ARTS AND SCIENCES

DISBURSEMENTS OF SPECIAL COLLEGE FUNDS: 2007-2008

Department	Special Allocations (a)
Africana Studies American Studies Economics English Feminist Research Foreign Languages and Literatures	\$2,000 \$1,750 \$2,279 \$4,579 \$0 \$2,493
Geography History Mathematics and Statistics Medieval Studies Philosophy Physics and Astronomy Spanish and Portuguese	\$ 755 \$3,594 \$2,525 \$3,307 \$1,056 \$1,000
Women Studies	<u>\$1,000</u> \$27,838

0

⁽a) Includes speakers' honoraria, support for conferences, publications

TABLE 6
COLLEGE OF ARTS AND SCIENCES

SUMMER SESSION ALLOCATIONS DATE: 2007-2008

<u>Department</u>	Final 2007 Figures Allocation	Percentage
Africana Studies	\$8,000	0.92%
American Studies	\$12,328	1.42%
Anthropology	\$38,913	4.47%
Biology	\$90,087	10.35%
Chemistry	\$57,498	6.61%
Communication and Journalism	\$54,378	6.25%
Earth and Planetary Sciences	\$25,500	2.93%
Economics	\$19,488	2.24%
English	\$97,457	11.20%
Foreign Languages and Literatures	\$36,934	4.24%
Geography	\$9,248	1.06%
History	\$32,000	3.68%
International Programs	\$3,500	0.40%
Linguistics	\$6,700	0.77%
Mathematics and Statistics	\$132,152	15.18%
Natural Sciences	\$0	0.00%
Philosophy	\$20,000	2.30%
Physics and Astronomy	\$30,228	3.47%
Political Science	\$24,100	2.77%
Psychology	\$52,806	6.07%
Religious Studies	\$14,800	1.70%
Sociology	\$57,712	6.63%
Spanish and Portuguese	\$37,891	4.35%
Speech and Hearing Sciences	\$4,000	0.46%
Women Studies	\$4,800	0.55%
WOMEN Studies	<u>= 1</u>	
Total:	\$870,520	100.00%

TABLE 7

COLLEGE OF ARTS AND SCIENCES

STANDING COMMITTEES II GRADUATE AND UNDERGRADUATE COMMITTEES -- 2007-08

A&S Graduate Committee

<u>Department</u>	Member
American Studies	Gabriel Melendez
Anthropology	Sylvia Rodriguez Suzanne Oakdale Bruce Huckell Jane Lancaster Osbjorn Pearson
Biology	Eric Loker (Chair) Robert Miller
Chemistry & Chemical Biology	Richard Kemp (Chair) Steve Cabaniss Hua Guo Martin Kirk Patrick Mariano
Communication & Journalism	Karen Foss (Master's) Janet Cramer (PhD)
Earth & Planetary Sciences	Tobias Fischer, Chair Jane Selverstone Yemane Asmerom Peter Fawcett Karl Karlstrom Lou Scuderi Rhian Jones
Economics	Robert Berrens Kristine Grimsrud Janie Chermak
English	Jesse Aleman

TABLE 7 (continued) A&S Graduate Committee 2007-08

Foreign Languages & Literature Walter Putnam (Grad Dir)

Warren Smith Joseph McAlhany Susanne Baackmann

Pamela Cheek

Geography Brad Cullen

History Elizabeth Hutchison

Linguistics Caroline Smith (Linguistics)

Mathematics & Statistics Cristina Pereyra

Philosophy John Bussanich

Physics & Astronomy Sally Seidel

Political Science Timothy Krebs

Kathy Hochstetler Wendy Hansen

Psychology Timothy Goldsmith

Sociology Nancy Lopez (Chair)

Spanish & Portuguese Rena Torres Cacoullos (C)

Miguel Lopez Kimberle Lopez Catherine Travis

Speech & Hearing Sciences Barbara Rodriguez

TABLE 7 (continued) <u>A&S Undergraduate Committee - 2007-08</u>

Department	<u>Member</u>
American Studies	Rebecca Schreiber
Anthropology	Ann Ramenofsky
Biology	William T. Pockman
Chemistry & Chemical Biology	Cary Morrow
Communication & Journalism	Jan Schuetz (Comm) Dennis Herrick (Journ)
Earth & Planetary Sciences	Dave Gutzler Gary Weissmann Gary Smith Matt Nyman Maya Elrick Laura Crossey Paula Watt
Economics	Kate Krause Jennifer Thacher Melissa Binder
English	Carolyn Woodward
Foreign Language/Lit.	Steven Bishop
Geography	Paul Matthews
History	Charlie Steen
Linguistics	Melissa Axelrod (Linguistics) Barbara Shaffer (Sign) Roseann Willink (Navajo

TABLE 7 (continued) A&S Undergraduate Committee – 2007-08

Math/Statistics Michael Nakamaye

Philosophy Mary Domski

Physics & Astronomy Richard Rand Daniel Finley

Political Science Peter Kierst

Ellen Grigsby (Pre-Law)

Gabriel Sanchez

Psychology Gordon Hodge

Religious Studies Daniel Wolne

Sociology Jane Hood (Chair)

Karen Majors

Spanish/Portuguese Kathryn McKnight (Chair)

Maria Delores Gonzales Alejandra Balestra Leila M. Lehnen Miguel A, Estrada

Speech/Hearing Sciences Phyllis Palmer
Amy Neel

Women Studies Joyce Bell

TABLE 8 College of Arts & Sciences Degrees Awarded 1998-99 to 2007-08 Academic Years

ſ	H. Santaharin	3.45			Advanc	ed Degrees			<u> </u>	
İ							Total Ac			egrees
	Bachelors	Degrees	Ma	sters	Doc	toral	Degi	rees	Com	bined
		%	ļ	%		%	1	%		%
		Increase		Increase		Increase		Increase	Ì	Increase
		over	Number		-	over		over	Number	over
	Number of		of	1	Number of		Number of		1	Previous
Year	Awards	Year	Awards	Year	Awards	Year	Awards	Year	Awards	Year
1998-99	1,104	0.00%	211	0.00%	104	0.00%	315	0.00%	1,419	0.00%
1999-00	1,094	-0.91%	207	-1.90%	88	-15.38%	295	-6.35%	1,389	-2.11%
2000-01	972	-11.15%	221	6.76%	94	6.82%	315	6.78%	1,287	-7.34%
2001-02	973	0.10%	175	-20.81%	113	20.21%	288	-8.57%	1,261	-2.02%
2002-03	1,160	19.22%	228	30.29%	80	-29.20%	308	6.94%	1,468	16.42%
2003-04	1,310	12.93%	211	-7.46%	120	50.00%	331	7.47%	1,641	11.78%
2004-05	1,190	-9.16%	231	9.48%	101	-15.83%	332	0.30%	1,522	-7.25%
2005-06	1,243	4.45%	218	-5.63%	96	-4.95%	314	-5.42%	1,557	2.30%
2006-07	1,307	5.15%	223	9.90%	96	-1.50%	319	0.10%	1,626	4.24%
2007-08	1,307	0.00%	231	3.59%	71	-26.04%	302	-5.33%	1,609	-1.05%
10-year										
Period	11,660	2.06%	2,156	2.42%	963	-1.76%	3,119	-0.41%	14,779	1.50%

Source: Deggrant database

Office of Institutional Research Mark Chisholm 2/2008

TABLE 9
College of Arts & Sciences
Degrees Awarded by Department 2007-2008

Department	Bachelors	Masters	Doctoral	Total
African American Studies	2	·		2
American Studies	7	3	4	14
Anthropology Department	73	11	3	87
Biology Department	148	5	8	161
Chemistry Department	15	8	8	31
Communication Journalism	129	9	7	145
Earth and Planetary Sciences Dept	18	5	3	26
Economics	41	11	4	56
English Department	103	23	2	128
Foreign Languages Literatures	20	9	ō	29
Geography Department	8	6	o	14
History Department	80	15	4	99
Linguistics	20	7	2	29
Mathematics & Statistics	45	21	2	68
Philosophy Department	26	2	1	29
Physics & Astronomy	21	23	10	54
Political Science Department	82	5	1	88
Psychology Department	214	13	9	236
Religious Studies Prgm	7	0	0	7
Sociology Department	134	3	1	138
Spanish Portuguese	24	9	1	34
Speech and Hearing Sciences	29	28		57
Womens Studies	3			3
Other Programs (Interdisciplinary)*				
Art	1	i		1
Asian Studies	3			3
Biochemistry	26			26
Economics-Philosophy	1			1
English-Philosophy	8			8
European Studies	6			6
Russian Studies	3			3
Latin American Studies	10	15	1	26
Native American Studies	n/a _			0
Total	1,307	231	71	1,609

Source: Deggrant database Office of Institutional Research Mark Chisholm 11/2008

TABLE 9
College of Arts & Sciences
Degrees Awarded by Department 2006-2007

Department	Bachelors	Masters	Doctoral	Total
African American Studies	1			1
American Studies	12	7	8	27
Anthropology Department	47	18	8	73
Biology Department	165	4	21	190
Chemistry Department	24	5	14	43
Communication Journalism	138	10	5	153
Earth and Planetary Sciences Dept	20	11	3	34
Economics	40	12		52
English Department	106	17	3	126
Foreign Languages Literatures	23	10	1	34
Geography Department	7	10	0	17
History Department	67	9	7	83
Linguistics	25	1	1	27
Mathematics & Statistics	35	20	5	60
Philosophy Department	14	1	1	16
Physics & Astronomy	7	5	7	19
Political Science Department	81	7	3	91
Psychology Department	209	10	3	222
Religious Studies Prgm	11	0	0	11
Sociology Department	162	10		172
Spanish Portuguese	30	15	5	50
Speech and Hearing Sciences	25	20		45
Womens Studies	1			1
Other Programs (Interdisciplinary)*				
Art	3			3
Asian Studies	7			7
Biochemistry	24			24
Economics-Philosophy	2			2 6
English-Philosophy	6			
European Studies	4			4
Latin American Studies	8	20	1	29
Native American Studies	n/a			0
Total	1,304	222	96	1,622

Source: Deggrant database Office of Institutional Research Mark Chisholm 2/2008

TABLE 10 COLLEGE OF ARTS AND SCIENCES

FTE BUDGETED FACULTY: 2007-2008

<u>Department</u>	<u>Faculty</u>	GA/TA
Africana Studies	2.50	0.25
American Studies	7.75	3.50
Anthropology	21,03	8.25
Arts and Sciences	75.47	31.50
Biology	38.57	21.75
Chemistry	18.07	16.00
Communication and Journalism Earth and Planetary	20.40	8.50
Sciences	20.43	7.25
Economics	11.98	7.25
English	35.07	29.50
Foreign Languages and Literatures	12.99	8.00
Geography	3.00	1.50
History	25.70	12.50
Linguistics	11.49	2.75
Mathematics and Statistics	33.47	22.15
Maxwell	1.00	0.00
Medieval Studies Institute	0.50	0.25
Philosophy	11.00	4.95
Physics and Astronomy	28.47	13.25
Political Science	16.13	7.00
Psychology	20.47	13.00
Religious Studies	3.50	1.00
Sociology	17.52	7.00
Spanish and Portuguese	13.71	18.50
Speech and Hearing	5.50	2.00
Women's Studies	<u>0.50</u>	<u>1.00</u>
	456.22	248.60

Data Source: College of Arts and Sciences Instructional Budget, 2007-08

TABLE 11
College of Arts and Sciences
NEW RESEARCH AND TRAINING GRANTS: 2007-2008
(tenure track and research faculty)

<u>Department</u>	<u>Amount</u>	# of <u>Faculty</u>	# of Grants
American Studies	\$0	0	<u>0</u>
Anthropology	\$1,936,000	7	11
Arts & Sciences	\$25,000	1	1
Biology	\$13,812,000	47	92
Center for Advanced Studies	\$1,208,000	5	14
Chemistry	\$2,719,000	10	18
Communication & Journalism	\$0	0	0
Contract Archeology	\$2,456,000	2	30
Earth & Planetary Sciences	\$2,293,000	14	25
Earth Data Analysis Center	\$1,638,000	6	22
Economics	\$562,000	6	14
English	\$19,000	3	3
Foreign Languages & Literatures	\$20,000	1	1
Geography	\$65,000	1	1
History	\$0	0	0
Institute for Public Policy	\$451,000	3	8
Institute for Social Research	\$2,341,000	3	19
Linguistics	\$136,000	2	3
Mathematics	\$1,614,000	9	16
Maxwell Museum	\$208,000	5	7
Medieval Studies	\$4,000	l	1
Meteoritics	\$661,000	8	19
Philosophy	\$100,000	1	1
Physics	\$5,859,000	19	39
Political Science	\$220,000	2	4
Psychology	\$1,425,000	10	12
Religious Studies	\$7,000	1	1
Sociology	\$20,000	2	2
Spanish and Portuguese	\$0	0	0
Speech and Hearing	<u>\$128,000</u>	2	<u>2</u>
Total	\$39,927,000	171	366

APPENDIX 1

COLLEGE OF ARTS AND SCIENCES BY-LAWS OF THE COLLEGE

By-Laws of the College of Arts and Sciences University of New Mexico 2007 Revision

Preamble

The College of Arts and Sciences is the largest College at UNM and incorporates the most diverse array of disciplines. It enrolls more students and includes more majors than any other division of the University. All UNM undergraduates take numerous courses within the College as it is the repository for the core curriculum. Thus the College of Arts and Sciences occupies a primary place in the education of UNM students. The mission of the College is to create new knowledge, to broadly disseminate existing and new knowledge to students, and to train students in the evaluation and application of ideas to issues important to society at the local, state, national, and international levels.

Because of the great breadth of humanities, social science, and natural science disciplines encompassed by the College, it has traditionally featured an unusually high degree of cooperation and understanding among the constituent departments, Deans who have an integrative and synthetic vision, and a long-standing commitment to the principle of shared governance. The following By-Laws provide a detailed guide to the supradepartmental organization and operation of the College, the duties and responsibilities of the Dean, and the mechanisms by which the Dean and A&S faculty act cooperatively to fulfill the missions of the College.

I. The Office of the Dean

1. Authority

The authority of the Dean derives from the Board of Regents, the President of the University, the Provost, and the Faculty of the College, each acting within its lawful authority.

- 2. College By-Laws and the Faculty Handbook
- a. The College By-Laws amplify and complement the UNM Faculty Handbook. None of the By-Laws shall be interpreted as revising or contradicting the provisions of the Handbook.

b. The appointment, term of office, functions, and periodic review of the Dean are described in the *Handbook*, Sections A51 (Article III) and C35. The duties of the Dean in connection with faculty reviews and the appointment and review of departmental chairpersons are specified in the *Handbook*, Sections B4.3.2, B4.9.4-7, B5.6, and C40.

3. Other Duties

In addition to the duties prescribed by the *Faculty Handbook* (see article I.2 above), the Dean shall have the following responsibilities:

- To provide educational leadership and set high standards for the College's instructional and research programs;
- b. To promote the academic quality and welfare of the College's faculty, through the authorization of new faculty positions, the diversification of the faculty, oversight of faculty development and review, and recommendations to the Provost concerning faculty reappointment, promotion and tenure, and special honors;
- c. To represent the College in its relations with the central administration, other colleges and units within the University, the student body, and public, and to advocate for the resources necessary to fulfill the College's mission;
- d. To exercise control over the internal budget of the College, allocating and reallocating faculty and staff lines, graduate assistantships, and other resources;
- e. To review and assess the quality of the College's departmentalized and non-departmentalized units, their effectiveness in clarifying, developing, and achieving their missions, and their participation in the College's mission; and to use these assessments as the bases for budget decisions and decisions affecting the units' instructional programs;
- f. To promote and maintain shared governance within the College concerning policies and resources, by consulting regularly with the departmental executive officers and the Faculty of the College, either directly or through their representative bodies;
- g. To select, assign responsibilities to, and evaluate the Associate Deans;
- h. To determine and oversee collegiate administrative structure and activities, including the associate deanships and the necessary nonacademic staff;
- i. To oversee and promote external fundraising and the acquisition of grants and contracts in support of the College's instructional and research programs; and
- j. To facilitate conflict resolution by addressing conflicts as they arise and working to resolve them expeditiously according to established policies and procedures.

4. Selection

a. Search. When a vacancy occurs in the deanship of the College, the Provost oversees a search for a new dean. After consultation with the Faculty and the Chairs of Departments in the College and other such persons as the Provost shall see fit, the Provost shall appoint a search committee. The search committee shall

be diverse and broadly representative of the faculty in the College. The faculty component of the committee shall constitute a majority of the voting members of the committee and shall be chosen from a list of nominees provided by the Council of Chairs. The committee shall be chaired by a person who holds a faculty appointment in the University. The committee shall include representatives of the student body and the College's non-academic staff; it may also include other members designated by the Provost.

b. Appointment. The committee shall be consulted in connection with the drafting of the job description. The committee shall assess applications for the deanship and recommend candidates to be interviewed for the position. The Provost shall select finalists from the search committee's list, and may add finalists from the pool of qualified applicants whose names do not appear on the list. The committee shall participate in campus interviews and shall ascertain and transmit to the Provost the assessments by faculty, staff and students regarding the short list of candidates being considered. The committee shall make recommendations to the Provost concerning the offer of the appointment.

II. Associate Deans

The College Professional staff at present includes three Associate Deans:

The Associate Dean for Faculty is responsible for matters involving faculty hiring, tenure and promotion, annual reviews and other personnel deliberations, as well as oversight of the College's interdisciplinary programs and museums as appropriate.

The Associate Dean for Curriculum and Instruction is responsible for advising, student complaints and grievances, and advising the Dean concerning all matters involving curriculum and instruction, including summer session and part-time budgets.

The Associate Dean for Research is responsible for approving research proposals, especially compliance issues and cost-share, encouraging the sponsored research of all units in the College, and coordinating with the Office of the Vice President for Research, the Research Cabinet and Category 3 Research Centers, as well as oversight of interdisciplinary research centers in the College as appropriate.

Normally one of the 3 Associate Deans will also carry the title of Senior Associate Dean with responsibilities for serving as Acting Dean in the Dean's absence.

The Senior Associate Dean and the Associate Dean for Faculty must have the rank of Professor; the other Associate Deans may come from the ranks of tenured Associate Professors or Professors. The Associate Deans do not participate in promotion and tenure decisions or votes at the departmental level. The Associate Dean for Faculty reads and makes recommendations to the Dean on all promotion and tenure decisions in the College. At the Dean's discretion, normally in cases with divided votes, the other Associate Deans may be asked to make recommendations to the Dean as well, except that an Associate Dean holding

the rank of Associate Professor shall not participate in reviews of candidates for promotion to full professor.

When a vacancy occurs the Dean circulates an open call for nominations and applications among the tenured faculty of the College. The Dean, other Associate Deans, College Development Officer, and College Administrator constitute the search and hiring committee.

III. The Faculty and the Faculty Assembly

1. The Faculty

In keeping with section A51, article 1, of the *Faculty Handbook*, the faculty of the College of Arts and Sciences includes all professors, associate professors, assistant professors, instructors, and lecturers, including part-time temporary faculty.

2. The Voting Faculty

In keeping with section A51, article 1, of the Faculty Handbook, the voting faculty of the College of Arts and Sciences shall include all full-time, continuing members of the faculty: instructors, lecturers, and assistant, associate, and full professors. All tenure-track and tenured faculty, regardless of FTE, will be voting members of the College faculty. Research professors, faculty on temporary or interim appointments (such as visiting professors) and non-tenure-track faculty on part-time appointments are not voting members of the College faculty. Voting rights at the departmental level are established by the faculty of the department according to Article II, Sec. 2 of the Faculty Constitution.

3. The Faculty Assembly

- a. Membership. The Faculty Assembly comprises all members of the College faculty, as defined in article II.1 above. All faculty of the College may attend and comment in the Faculty Assembly, but only voting members, as defined in article II.2 above, may participate in formal votes. A quorum for the purposes of voting requires the attendance of at least 20% of the voting faculty.
- b. Meetings. In keeping with section A51, article III.3c, of the Faculty Handbook, the Dean of the College of Arts and Sciences is the presiding officer of the Faculty Assembly. The College faculty delegates to the Dean, the authority to determine the number and timing of Assembly meetings. However, a special meeting may be called in writing by at least ten members of the voting faculty. In that case, the Dean will convene a meeting within three weeks of receiving the call. Except in the case of emergency meetings, the agenda shall be circulated at least five days in advance of the meeting.
- c. Duties. The duties of the Faculty Assembly are to establish rules for the conduct of its business; to receive and respond to reports or recommendations of the Dean and College Committees; to identify topics about which the Dean or College

Committees shall report back to the Assembly with information or recommendations; and to consider amendments to the College By-Laws.

IV. Committees

Some committees are established by authority of the *Faculty Handbook* and some by the authority of the College By-Laws.

- 1. Standing Committees
- a. Chairs Council

The Chairs Council comprises the Dean, the Associate Deans, the Chairs of all departments, and the Directors of those programs, museums, and institutes with independent budgets in the College. (At present, these include: Africana Studies, American Indian Research Institute, BA/MD Program, Center for Advances Studies, Center for Science, Technology and Policy, CREATE, Consortium of the Americas for Interdisciplinary Science, Earth Data Analysis Center, Feminist Research Institute, Institute for Medieval Studies, Institute of Meteoritics, International Studies Institute, Latin American Studies, Maxwell Museum, the Museum of Southwestern Biology, Peace Studies, Religious Studies, Sustainability Studies and Women Studies.

The Chairs Council meets at least once a month during the academic year and can meet more frequently if there is sufficient business and during the summer if there are urgent matters. It also has a full-day retreat in August just before the academic year begins. The Dean chairs the meetings. The agenda is set by the Dean, but individual Chairs or groups of Chairs can also submit items for Council discussion or action.

The duties of the Chairs Council are to share information about developments in the College; to serve as a forum in which the Dean and Associate Deans can get advice about key issues; to serve as a major deliberative forum for issues involving College policy including, but not limited to, selection of the Dean, planning, budget, hiring, tenure and promotion practices, and development.

b. Senior Promotion Committee

Function. The Senior Promotion Committee (SPC) reviews the dossiers of faculty advanced by their departments for consideration for promotion from Associate to full Professor, and reports its recommendations regarding each candidate to the Dean. These recommendations are reviewed by the Dean in formulating his/her decision on the case, and are forwarded to higher administrative levels together with the Dean's decision. Following the policy for more complete post-tenure reviews defined in section B4.9.7 of the Faculty Handbook, the Dean will seek a recommendation from the Senior Promotion Committee on cases where serious

deficiencies appear to persist in a faculty member's performance after a reasonable period of time for improvement. Should the Dean conclude that the case warrants informing the Provost, the dossier submitted to the Provost will include the recommendations of the Senior Promotion Committee. Prior to sending his/her recommendations on tenure and promotion or post-tenure review to the Provost, the Dean will inform the Committee Chair about the decisions.

Membership. The SPC consists of nine members of the College faculty having the rank of full Professor. Members are appointed by the Dean each year, following consultation with departmental Chairs. Each chair is responsible for nominating at least one potential member of the SPC each year. The precise nomination processes used are determined at the departmental level, but should include appropriate consultation with departmental faculty. Committee member terms are generally for two years and are staggered, in order to allow continuity from year to year. Members will be chosen by the Dean in order to provide new members as well as continuity from the previous year, and in order to reflect a broad range of departments and disciplines within the College. The Chair of the SPC is appointed by the Dean.

Process. The SPC typically has an organizational meeting late in the Fall semester, when information is available regarding which A&S faculty are being advanced for promotion to full Professor. At this meeting, the Dean and Associate Dean for Faculty discuss the Committee's charge and review the criteria for promotion specified in the Faculty Handbook. Promotion candidates are assigned to committee members so that each candidate is reviewed especially thoroughly by two members.

After the candidate dossiers are complete in early January, each committee member reads all of the dossiers, provides a detailed written summary of the record of each candidate assigned to him/her for thorough review, and leads the discussion of those candidates before the committee in a second meeting (usually in late January). At this second meeting, each candidate's record and qualifications for promotion are discussed thoroughly. Any committee member from the same department as a given candidate recuses him or herself from the work of the committee: they leave the room during discussion of that candidate and make no recommendation regarding promotion. Within a week after this meeting, each committee member fills out the standard A&S promotion evaluation form for each candidate, recommending for or against promotion, and returns these to the committee Chair. The Chair summarizes the Committee's recommendations for each candidate in a report to the Dean, and the individual evaluation forms are forwarded together with the committee Chair's report to the Dean.

c. Junior Promotion and Tenure Committee

Function. The Junior Promotion and Tenure Committee (JPTC) reviews the dossiers of faculty advanced by their departments for consideration for tenure and for promotion from Assistant to Associate Professor and faculty advanced for mid-probationary review, and reports its recommendations regarding each candidate to the Dean. These recommendations are reviewed by the Dean in formulating his/her recommendations, and are forwarded to higher administrative levels together with the Dean's recommendation. Prior to sending his/her recommendations on tenure, promotion, and mid-probationary reviews to the Provost, the Dean will inform the Committee Chair about the decisions.

Membership. The JPTC consists of nine members of the College faculty having tenure and the rank of Associate or full Professor. Members are appointed by the Dean each year, following consultation with departmental Chairs. Each chair is responsible for nominating at least one potential member of the JPTC each year. The precise nomination processes used are determined at the departmental level, but should include appropriate consultation with departmental faculty. Committee member terms are generally for two years and are staggered, in order to allow continuity from year to year. Members will be chosen by the Dean in order to provide new members as well as continuity from the previous year, and in order to reflect a broad range of departments and disciplines within the College. The Chair of the JPTC is appointed by the Dean.

Process. The JPTC typically has an organizational meeting late in the Fall semester, when information is available regarding which A&S faculty are being advanced for promotion and tenure and for mid-probationary review. At this meeting, the Dean and Associate Dean for Faculty discuss the Committee's charge and review the criteria for promotion specified in the Faculty Handbook. Promotion and mid-probationary candidates are assigned to committee members so that each candidate is reviewed especially thoroughly by two members.

After the candidate dossiers are complete in early January, each committee member reads all of the dossiers, provides a detailed written summary of the record of each candidate assigned to him/her for thorough review, and leads the discussion of those candidates before the committee in a second meeting (usually in late January). At this second meeting, each candidate's record and qualifications are discussed thoroughly. Any committee member from the same department as a given candidate recuses him or herself from the work of the committee; they leave the room during discussion of that candidate and make no recommendation. Within a week after this meeting, each committee member fills out the standard A&S promotion evaluation form for each candidate, recommending for or against tenure and promotion, and returns these to the committee Chair. The Chair summarizes the Committee's recommendations for each candidate in a report to the Dean, and the individual evaluation forms are forwarded together with the committee Chair's report to the Dean. A similar process is conducted for mid-probationary review candidates in February and the results are forwarded to the Dean.

d. Sabbatical Leave Committee

The Sabbatical Leave Committee is appointed yearly by the Associate Dean for Faculty, who chairs the Committee. The Committee consists of three tenured faculty, one each from the Humanities, Social Sciences, and Sciences. The Committee meets each semester and reviews and recommends sabbatical leave requests to the Dean. The Committee may ask candidates to clarify or strengthen requests as appropriate before making a recommendation to the Dean.

e. Undergraduate Committee

Function. The Arts and Sciences Undergraduate Committee (ASUC) is made up of representatives of the undergraduate units within the College. The overall role of ASUC is to advise the Dean on all matters pertaining to undergraduate programs and undergraduate units within the college, and to provide a link between the Faculty Senate Curriculum Committee and decision-making in the College regarding undergraduate programs.

ASUC will not duplicate the governance work of the Faculty Senate Curriculum Committee, but will maximize less formal communication and dialogue regarding the improvement of undergraduate education within the College and the development of new undergraduate programs. ASUC's purview will include, but not be limited to, identifying, addressing, and troubleshooting problems in undergraduate education that transcend any single department; advising the College in its efforts to support departmental recruitment and retention of minority undergraduate students; advising the Dean regarding proposals for new undergraduate programs and changes in existing programs; recommending improvements in college student advising processes; and following up on issues which surface from unit reviews involving undergraduate programs.

Membership and Structure. The Chair of each undergraduate unit in the College will appoint a faculty member to the ASUC. Members are chosen under procedures defined by each department, which should include appropriate consultation with departmental faculty.

Operation. The ASUC will generally meet two times per semester. The Dean of Arts and Sciences will be asked to attend one meeting per year. At other times, the ASUC will be presumed to have access to the Dean and Associate Deans as appropriate for ongoing consultation. These Deans will offer staff support for such areas as scheduling meetings, arranging meeting space, coordinating with the Faculty Senate Curriculum Committee, taking minutes, etc. Meetings of the ASUC will be convened by the Associate Dean for Curriculum and Instruction. Ten members will constitute a quorum.

f. Graduate Committee

Function. The Arts and Sciences Graduate Committee (ASGC) is made up of representatives of the graduate units within the College. The overall role of ASGC is to advise the Dean on all matters pertaining to graduate programs and graduate units within the College; to coordinate with the Dean of Graduate Studies on all matters affecting graduate programs within Arts and Sciences; and to provide a link between the Faculty Senate Graduate Committee and decision-making in the College regarding graduate programs.

ASGC will not duplicate the governance work of the Faculty Senate Graduate Committee, but will maximize less formal communication and dialogue regarding the improvement of graduate education within the College and the development of new graduate programs. ASGC's purview will include, but not be limited to, identifying, addressing, and troubleshooting problems in graduate education that transcend any single department; advising the College and the Office of Graduate Studies in their efforts to support departmental recruitment and retention of minority graduate students; advising the Dean regarding proposals for new graduate programs and changes in existing programs within the College; and following up on issues which surface from unit reviews involving graduate programs, and carrying any concerns regarding graduate education within the College to the Faculty Senate Graduate Committee and the Dean of Graduate Studies, as appropriate.

Membership and Structure. The Chairperson of each graduate unit in the College will appoint a faculty member to the ASGC. This will ordinarily be that unit's Director of Graduate Studies (or equivalent, for example Chair of Graduate Committee). The latter are chosen under procedures defined by each department, which should include appropriate consultation with departmental faculty.

Operation. The ASGC will generally meet two times per semester. The Dean of Arts and Sciences and the Dean of Graduate Studies will be asked to attend one meeting per year. At other times, the ASGC will be presumed to have access to both Deans and Associate Deans as appropriate for ongoing consultation. The deans will offer staff support for such areas as scheduling meetings, arranging meeting space, coordinating with the Faculty Senate Curriculum Committee, taking minutes, etc.

Meetings of the ASGC will be convened by the Associate Dean for Curriculum and Instruction. Ten members will constitute a quorum.

2. Ad Hoc Committees

The Dean has the authority to constitute and appoint ad hoc committees as needed. The following are the current (2007-08) ad hoc committees. This list will be amended yearly to reflect any changes in the committees or their structure.

a. A&S Teaching Excellence Award (previously the Gunter Starkey Teaching Awards) Committee

These awards recognize individuals who have made significant contributions to the College's teaching mission. Three faculty and two teaching assistants are selected each year. The Committee is convened each year in the spring by the Associate Dean for Faculty and comprises the previous year's winners of the award – both faculty and graduate students. The Committee reads applications from departments for faculty and graduate student awards and ranks the candidates. The final decision on the awards is made by the Dean.

b. Regents' Professor and Regents' Lecturer Committee

Regents' Professor is a special title bestowed on selected senior faculty members who in the judgment of the Dean on the advice of a faculty selection committee merit recognition of their accomplishments as teachers, scholars, and leaders both in university affairs and in their national/international scholarly communities. There are three such awards and the term is three years. Regents' Lecturer is a special title bestowed on selected junior faculty members (Associate Professors) who in the judgment of the Dean on the advice of a faculty selection committee merit recognition for their scholarly, teaching and service accomplishments. There are eight such awards and the term is three years. As vacancies become available, the Regents' Professor and Regents' Lecturer Committees are convened by the Associate Dean for Faculty. Both committees are composed of previous awardees. The Committees read applications from departments for faculty and graduate student awards and rank the candidates. Applications are also reviewed and ranked by the Associate Deans. The final decision on the selections is made by the Dean.

c. Distinguished Professor Nominations

Following University guidelines for appointment of Distinguished Professors, once a department has agreed to support a distinguished professor nomination, and the Deputy Provost has reviewed the materials and conducted the Provost level evaluation, the Dean will be contacted for a recommendation on the candidates. The Dean will constitute a committee of current Regents' Professors, College Distinguished Professors and the Associate Deans to review and make recommendations to the Dean on candidates for this title. The Dean will report the results of the review and provide his/her recommendation to the Deputy Provost.

d. Dean's Ad Hoc Budget Committee

A new Committee was instituted in 2007 by Dean Claiborne to give the Chairs and Directors direct input to the college's annual budget process. It is comprised of the Dean, the Senior Associate Dean, the College's Financial Officer and at least eight Chairs and Directors. The Committee meets at the direction of the Dean.

V. Procedure for Electing Faculty Senators

Representation. The Faculty Handbook, section A51, article 1.6a, states that "There shall be one senator for each thirty full-time faculty members or major fraction thereof from each school [and] college...elected by the members of that faculty." Currently, each of the 13 A&S Faculty Senators represents 27 A&S faculty. A&S members of the Faculty Senate are determined by proportional representation based on departments or small groups of departments, as follows:

Physics and Astronomy: 1 Senator

History: 1 Senator Anthropology: 1 Senator

Foreign Languages and Spanish & Portuguese: 1 Senator Linguistics, Speech/Hearing, and American Studies: 1 Senator

Economics and Philosophy: 1 Senator

English and Communication & Journalism: 2 Senators Biology and Earth & Planetary Sciences: 2 Senators Mathematics & Statistics and Chemistry: 1 Senator

Sociology, Political Science: 1 Senator Psychology and Geography: 1 Senator

Because it is possible that the number of faculty members within departments may change across time, and that adjustments in Senate representation may be needed in the future to maintain proper proportional representation, the Associate Dean for Faculty will monitor numbers of faculty in each department or departmental group once every two years to determine if any changes are needed in the composition of departmental groups or in allocation of Senators to the above groups.

Election. Chairs of each department or departmental group will be notified by the Associate Dean for Faculty when it is time for their department or group to hold an election for the Senate. Departmental groups should coordinate election of their representative(s), according to a process agreeable to all the departments within the group. Each group is also responsible for electing an alternate representative. Chairs will report the selection of their Senate representative(s) to the Associate Dean for Faculty promptly, who will then notify the University Secretary. These results shall be provided by the last working day of the sixth week of the Spring semester.

Terms for senators are two years. Initially, to establish a rotation, for departmental groups represented by two senators, the term of one senator will be one year and of the other, two years. Thereafter, all terms are for two years.

As current A&S representation is "at large" within the College, implementation of proportional departmental representation will be phased in as the terms of present Senators end, so that by the end of the two-year terms of Senators currently in the first year of their term, the proportional representation outlined in the section on Representation above is achieved.

Caucus. The College Senators may elect to organize themselves as a caucus in the College to provide information and advice to the Dean and Chairs Council on Faculty Senate matters of interest to the College.

VI. Approval and Amendment of By-Laws

1. Approval

A mail or electronic ballot with a copy of the By-Laws document shall be sent to the voting faculty of the College. Upon approval by a majority of those who cast ballots and by the Dean, these shall become the permanent By-Laws of the College.

2. Amendment

The Dean shall review and consider amending the College By-Laws at least once every seven years. Amendments may be proposed at any time by ten voting members of the Faculty Assembly, or by the Dean. Amendments shall be transmitted to the Faculty Assembly at least ten days before the scheduled vote takes place, and discussed at a Faculty Assembly meeting before the vote. Ratification of amendments shall require the approval of a majority of the voting faculty of the College who cast ballots. If approved, amendments shall become effective at the beginning of the next academic semester.

In those areas which the College By-Laws entrust to the discretion of the Dean, the By-Laws may, without a faculty vote, be revised to reflect changes in the College administrative structure. Such areas include the creation or dissolution of Ad Hoc Committees and the redefinition of the titles, qualifications, and duties of the Associate Deans and other administrators. Such changes should, however, be made only after consultation with the Chairs Council.