

2013

# 2013 Annual Report

Office of Research Development  
*Eastern Michigan University*

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# OFFICE OF RESEARCH DEVELOPMENT

2013 Annual Report



# EASTERN MICHIGAN UNIVERSITY



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*Eastern Michigan University is a public, comprehensive university offering programs in the arts, sciences and professions. EMU prepares students with the intellectual skills and practical experiences to succeed in their lives and careers and to be worthy and effective citizens.*

# Who We Are ...

## Office of Research Development

Jeffrey Kentor  
**Associate Provost and Associate Vice President for  
Graduate Studies and Research**

Caryn Charter  
**Director of Research Development**

Alethea Helbig  
**Faculty Associate, Publications and Editing**

Harriet Lindsay  
**Faculty Associate, Undergraduate Research**

Philip Rufe  
**Faculty Associate, Technology Transfer**

Susan Campbell  
**Project Officer**

Donelle Goerlitz  
**Project Officer**

Rich Magyar  
**Systems Administrator**

Marjorie Dargo  
**Senior Secretary**





# Innovative Solutions for a Better Community

We are very pleased to present the 2013 Research Report, which summarizes the many exciting accomplishments of EMU faculty in research, scholarly, and creative activity. We hope this report demonstrates the immediate and real-world impact that sponsored activity at EMU has on our local and regional communities.

Research is central to a university's mission. Not only does research advance and apply new knowledge for the benefit of society, it fosters collaborative relationships with community organizations, other institutions of higher education, as well as business and industry. Moreover, it prepares students for the critical roles they will assume in our information-based economy.

Whether EMU is developing new life-saving technologies for manufacturing and medical industries, implementing pioneering programming to increase the potential of young people in the region, or re-examining print media and how society defines the experience of the book, EMU research is putting innovative solutions into practice for the benefit of society. Eastern Michigan University received grants and contracts totaling \$10.9 million in FY2013. A majority of this funding (54%) came from federal sources and a significant portion of the awarded projects provided direct service to the community.

We believe that as you review this report you will see the important role EMU faculty and students play in improving the lives of those living in southeastern Michigan through the conduct and implementation of research. Please enjoy!

Best Wishes



Jeffrey Kentor  
Associate Provost and  
Associate Vice President for Graduate  
Studies and Research



Caryn Charter  
Director of Research Development



Dr. Cory Emal and his students focus on the design and organic synthesis of molecules that can help maintain a healthy circulatory system.

“We make specific changes to the structure of certain molecules that affect their action against a specific biological target,” says Emal, who launched the project seven years ago. “The target is plasminic inhibitor 1 [PAI-1]. People with high levels of PAI-1 are at high risk for plaque buildup and blood clots. We’re trying to develop molecules that can help reduce the amount of PAI-1 in people who have too much in their circulatory system.”

Many global research groups and pharmaceutical companies have worked on PAI-1 inhibitors. But none are dealing with the specific molecules Emal and his team are investigating.

“PAI-1 is a tough nut to crack and the project is tremendously complex,” Emal says. “We’ve developed a method of demonstrating how our molecules interact with PAI-1, which is something no one else has done. We can use the data from those molecular ‘snapshots’ to create more molecules for testing.”

Emal adds that the project would not have been possible without his undergraduate and graduate student-researchers.

“We’ve had 14 master’s students and 23 undergraduates during the project’s seven years,” he says. “They made every single molecule of the 400 developed. I’m there to develop ideas, teach the students how to design comprehensive research projects and experiments, and help the students achieve their career goals. Many students have gone to jobs in the pharmaceutical or chemical industries. Others have pursued doctoral programs.

“This project shows that Eastern can do cutting-edge research in important areas while remaining focused on teaching. Our tradition of being a student-focused university doesn’t preclude us from doing potentially important science. We keep a foot in both worlds.” ■

# Building a Better Molecule

*Advanced research may lead to new treatments for plaque and blood clots*

Heart attack and stroke accounted for more than 700,000 U.S. deaths in 2011, according to the Centers for Disease and Control Prevention. Only cancer comes close to matching heart attack as the leading cause of death. The main culprits for heart disease and stroke are blocked arteries due to plaque buildup and blood clots. But what if there was a drug that

could prevent these conditions from forming in the first place?

That’s one of the questions EMU Associate Professor of Chemistry Cory Emal and his students are trying to answer. They’re focusing on the design and organic synthesis of molecules that can help maintain a healthy circulatory system. Their research, in collaboration with the University of Michigan, has received several million dollars in grant funds from the National Institutes of Health and the Camille and Henry Dreyfus Foundation.





Dr. Subhas Ghosh and Dr. Vijay Mannari.

# Life-Saving Innovations

## *COT research to benefit medical and manufacturing industries*

**T**wo EMU College of Technology faculty are preparing to bring revolutionary new products to the marketplace that may have a major impact on the medical and manufacturing industries—and save lives.

Professor of Technology Studies Subhas Ghosh has been developing an anti-microbial spray that kills bacteria on privacy curtains in health care settings. The Centers for Disease Control and Prevention estimates nearly 1.7 million hospital-associated infections, from all types of bacteria combined, contribute to 99,000 deaths annually in the U.S. Privacy curtains can harbor and transmit potentially fatal microbes to patients with compromised immune systems.

“Our research group has developed a chemical formula that can be sprayed

on hospital curtains,” Ghosh says. “The formula contains an anti-microbial agent that attracts and kills up to 99.9 percent of bacteria.”

The spray can be applied to a wide range of fabrics, including cotton and polyester. Unlike chemical formulations developed by other researchers, Ghosh’s fabric treatment can be recharged after the curtains are washed.

“Our sprays can withstand up to at least 50 wash cycles, and the microbe-killing properties are just as potent as they were after the initial application,” Ghosh says. “After completing further tests, we’ll begin contacting different suppliers and companies to commercialize the product.”

Professor of Engineering Technology Vijay Mannari has also developed a chemical technology for commercialization. His formula will help create a safe process for making aluminum alloys corrosion resistant. Applications include

the automotive, aerospace, aviation, construction, transportation and consumer products industries.

“The current aluminum alloy corrosion-prevention process involves hexavalent chromium [hex chrome],” Mannari says. “While the process prevents corrosion, hex chrome is a substance that causes cancer. Due to this toxicity, the government is phasing out hex chrome from all manufacturing applications. The challenge is to create a corrosion-prevention treatment that is just as effective but non-toxic.”

Mannari’s research group developed several formulas that replace hex chrome with non-toxic silicon compounds. After conducting many tests with a Detroit-based manufacturer of aluminum alloy wheels, Mannari says his research group has identified an effective compound and application process.

“Our compound’s corrosion-prevention performance is excellent,” he says. “The only downside is having a two-step curing process for the alloy pre-treatment and the final powder coat. We’re testing our compound now to see how it works on different aluminum alloys.”

In 2013, the Michigan Initiative for Innovation and Entrepreneurship (MIIE) awarded grants to EMU to assist in commercializing the anti-bacterial spray and chromate-free treatment. Ghosh’s project received \$31,248, while Mannari’s research received \$44,857.

“Eastern is continually involved in cutting-edge research that has immediate and practical applications,” says Philip Rufe, EMU Technology Transfer coordinator. “For many years, Eastern has been known first for its dedication to classroom instruction. The research projects led by Professors Ghosh and Mannari show that Eastern is also very active in applied research that can have a broad impact on society.” ■



### *Research shows the problem is pervasive among youth*

**T**he seeds of Intimate Partner Violence (IPV) are often sown in childhood, due to early exposure to trauma, community violence or pornography. Unfortunately, because many parents and schools aren't adequately addressing IPV, the problem

Project organizers have agreements with 14 middle and high schools within Wayne County for conducting confidential surveys. EMU student/researchers are surveying 1,250 consenting male and female students between the 6th and 9th grades and will track their responses annually for three years.

"The surveys are designed to disentangle the relationship between IPV

neighborhood environments, and school and teacher support, the surveys also delve into the role technology plays in IPV.

"Social networking abuse and sexting [texting sexually explicit material via cell phone] have developed a new set of problems," Kernsmith says. "Cyber-bullying is verbal and psychological abuse in a different context. With regard to sexting, if a 14-year-old girl sends an explicit photo of herself to a 15-year-old boy—whether through coercion or to gain attention—she becomes a child pornographer. When he sends that photo to his friends, he also becomes a child pornographer. School administrators don't have good policies to deal with this problem."

Participating schools will also receive extensive training regarding prevention programming and policy development.

"Right now, we're involved in basic research with the surveys," Kernsmith says. "Ultimately, what's most important is creating effective interventions to deter IPV before it becomes adulthood behavior." ■

# Exposing Intimate Partner Violence

is growing. And the few school districts that acknowledge IPV don't know how to address it.

"IPV can vary from emotional and verbal abuse to physical acts of violence," says Roger Kernsmith, EMU professor of Sociology, Anthropology and Criminology. "Whether a person is a perpetrator or victim, IPV becomes learned behavior that can carry into adult relationships."

To shine a light on youth IPV, Kernsmith is co-leading a project with the School of Social Work at Wayne State University that will document abusive relationships and help lay the groundwork for intervention and prevention strategies. The project, which launched in 2012, received just over \$1 million in funding from the Centers for Disease Control and Prevention for a three-year period. EMU will receive \$330,000 in funding for the project.

"Teen dating violence tends to be a black hole—nobody wants to talk about it," Kernsmith says. "Some school districts say it just doesn't happen, which is foolish at best. Our goal is to collect data through student surveys to learn what's really going on in youth relationships, and then create a template for effective prevention practices."

perpetration, community context, school environment, and peer and family relationships," Kernsmith says. "We're also recruiting middle and high school students and parents to participate in separate focus groups to provide a greater level of understanding."

In addition to questions about violence perpetration, home and neigh-





# Turning Troubled Lives Around

## ***Social Work students mentor first-time juvenile offenders***

Jesse\* was a troubled 8th grader who had little use for school. Although a local high school recruited him to play football, Jesse didn't see much point in attending class. He fell into the wrong crowd and started hanging out with drug pushers. Eventually, police arrested Jesse and brought him before the Washtenaw County Juvenile Court.

Jesse might have snuffed out his potential for success had it not been for the Washtenaw County Juvenile Court Project,

a unique partnership between the court and Eastern Michigan University's School of Social Work. For the past three years, EMU has paired social work majors with first-time juvenile offenders. Supervised student-mentors help kids like Jesse avoid further encounters with the law and get their lives back on track.

"Most of these offenders are ages 11 to 17 who have committed crimes like minor larceny or low-level drug offenses—most are from broken homes," says project Director and Associate Professor of Social Work Jennifer Kellman Fritz. "Rather than going through the court system, they enter our Adolescent Diversion Program for 12 to 15

weeks. We train about 12 student-mentors each year and assign each student to a juvenile offender. The goal is to keep these kids in school, improve their relationships with their parents or guardians, and spur their interest in college or in acquiring a job skill. It's been very successful. Only one of the more than 30 kids we've worked with have re-offended."

The student-mentors spend about 12 to 14 hours a week with each offender, taking them to school, offering tutoring services, exposing them to collegiate life at Eastern, and teaching life skills. The mentors reward the kids with meals or tickets to EMU sports events.

"We also partner with community organizations like the Corner Health Center in Ypsilanti to ensure these kids have access to physical and mental health care services," Kellman Fritz says. "The Washtenaw County Trial Court and Ypsilanti School System have also been amazingly supportive."

The project receives most of its funding from the Washtenaw County Juvenile Court. During the 2013 fiscal year, the project received \$83,510, bringing total project funding to nearly \$277,000. Kellman Fritz is seeking grants to help sustain the project and incorporate more parental involvement.

"This project is a great example of a community-based partnership that benefits everyone," she says. "Our students are having magical moments with each kid. They're connecting and making a difference."

Jesse's mentor was a student who also plays football at Eastern. The student brought Jesse to campus, introduced him to his teammates, and showed him that academics can be the foundation for a successful life—on and off the gridiron. Today, Jesse is back in school, earning good grades and hoping to play collegiate football.

"It was a perfect match," Kellman Fritz says. "Success stories like Jesse's underscore how critical mentoring programs are for juvenile offenders." ■

*\*The youth's name was changed to protect his anonymity.*





Book prototype from the 2012 Open Book Workshop. Book and photo by John Page Corrigan.

# Is the printed book dead?

***Thought-provoking project explores how we define and experience books***

If you think a book is just pages of text and images placed between two covers, think again.

Two EMU Art professors are challenging accepted notions of what books are and how they're presented. In the process, they're also exploring ways of reshaping the reader experience.

Some critics have proclaimed the printed book dead, based on recent bookstore closings and migration of text to

e-readers. Professor of Art Leslie Atzmon and Associate Professor of Art Ryan Molloy reject that premise. Their research, titled the Open Book Project, addresses the future of the book as a digital, physical or hybrid object. The project is funded in part by a \$35,000 National Endowment for the Arts (NEA) grant. It is the first NEA grant Eastern has received.

"With changing and emerging technologies, we want people to begin questioning how the book is defined," Molloy says. "Even the term 'e-book' is vague. Today, people are writing on Twitter. Does that text constitute a book? The question is open."

For the past three summers, the Open Book Project held thought-provoking, 10-day workshops at EMU's Parsons Center near Traverse City. Lecturers, visiting artists and Eastern students examined the frameworks by which we experience and structure books. They also discussed book production and distribution, the cultural role books play, and book content.

Last summer, workshop participants created books that incorporate their on-site experiences. Their projects ranged from lily pads that spelled out messages in a pond, to scrolling lines of text projected on tree trunks. The latter project, created by Eastern MFA student Sara Brandys, is an example of an "immersive environment" book.

"Sara deconstructed the book into an audible and physical experience," Atzmon says. "She wrote in collaboration with a guest instructor, who uses computer programming as an artistic medium. The program utilizes projection to display text on tree trunks along a path. This type of project asks the question 'What are pages?' In a traditional book, pages divide up information. But pages can also be on tree trunks or lily pads."

Atzmon and Molloy also staged several exhibitions of experimental books from the summer workshops at EMU's University Gallery and Ford Gallery. Works included unique printed books; altered books; sculptural books; and installation, photography and performance-based books. In May, the Open Book Project published a catalog based on the 2010 exhibition.

"The important thing is to generate excitement about books and what they might become," Atzmon says. "Don't write off the book just yet." ■

*To learn more about the Open Book Project and its workshops, exhibitions and catalog, visit [openbookproject.info](http://openbookproject.info).*

# Bringing more innovations to the marketplace

## Grant helps enhance Eastern's technology transfer activities

**E**astern Michigan University's Office of Research Development (ORD) has steadily developed a technology transfer process to help faculty take their ground-breaking innovations to the marketplace. Thanks to a recent \$50,000 grant from the Michigan Economic Development Corporation (MEDC), ORD is dedicating even more resources toward inspiring new research and commercializing products to benefit society.

ORD Director Caryn Charter says Eastern's technology transfer endeavors stem from a MEDC-funded project in the mid-2000s.

“Eastern participated in a project called the Multi-University Technological and Expertise Assets Management for Enterprise Development [U-TEAMED],” she says. “U-TEAMED provided Eastern with the expertise and support needed to develop our technology transfer capability. Since the start, Eastern has received more than 35 invention disclosures, primarily in the area of coatings, materials and textiles.”

The recent \$50,000 grant by MEDC's Michigan Translational Research and Commercialization program has helped streamline ORD's technology transfer activities.

"We needed some help in enhancing our technology transfer process," says

Philip Rufe, EMU Technology Transfer coordinator. "The grant funds allowed us to hire a process improvement consultant, who collected information and formulated a list of suggestions."

The independent consultant visited the Eastern campus, interviewed about 30 faculty researchers and university administrators, and reviewed the existing technology transfer process.

"We followed the consultant's recommendations," Rufe says. "We're actively promoting and encouraging more faculty research, and we're devoting more resources to technology transfer in terms of personnel. This process of feeding Eastern's technology transfer machine will help inspire even more innovations for the marketplace, and we look forward to increasing business engagement."

“Moving research downstream into commercial processes for the betterment of society is a critically important part of the research enterprise,” Charter adds. “Much of the research we do at Eastern has a direct benefit to the community around us. This is

obvious with our many public service programs, but it's also true for our scientific research. Two examples are the anti-microbial textiles [led by Professor of Technology Studies Subhas Ghosh] and chromate-free aluminum pre-treatment [led by Professor of Engineering Technology Vijay Mannari]. Both projects offer new and alternative technologies to potentially solve big challenges faced by society.” ❖

For an overview of the technology transfer process at Eastern, and to access technology transfer policies and a training module, visit **[emich.edu/ord/tech-transfer/tt.html](http://emich.edu/ord/tech-transfer/tt.html)**.





# Developing Future Environmental Stewards

## *SEMIS inspires educators to adopt place-based education*

In Detroit, students from Hope of Detroit Academy mapped areas filled with illegally dumped tires. The students then collected the tires and took them to a recycling center to be made into floor mats. In another part of the city, Detroit Institute of Technology students performed home energy audits and weatherized more than 1,000 homes in just eight weeks. At the Ann Arbor Learning Center, 2nd and 3rd graders learned about the environmental benefits of bats and how human activities are destroying bats' natural habitats. The students worked with local businesses to build and install bat houses across their area.

These are some examples of how K-12 teachers are forging community partnerships and inspiring their students to become active citizen-stewards of their communities and the Great Lakes through the Southeast Michigan Stewardship Coalition (SEMIS). Based at EMU, SEMIS is one of nine statewide hubs supported by a grant from the Great Lakes Fishery Trust (GLFT). Since launching in 2008, SEMIS has built a powerful alliance of 11 public, private and charter schools in Wayne and Washtenaw counties.

"SEMIS is based on place-based learning experiences and eco-justice," says Ethan Lowenstein, EMU professor of Teacher Education and SEMIS director. "Students learn about science outside the classroom by engaging in their local environments. In the pro-

cess, students begin to understand the root causes of some serious social and ecological problems. Students then take action as community advocates and address the problems identified."

SEMIS helps its partner schools develop place-based stewardship education approaches and facilitates community partnerships through on-site curriculum coaching, a series of eight-day seminars, and an intensive four-day summer institute. Lowenstein says SEMIS brings

In addition to GLFT funding, SEMIS is supported by grants from the National Oceanic and Atmosphere Administration, the Spencer Foundation, and the National Endowment for the Arts. This funding is crucial at a time when many schools have slashed budgets for innovative programs like SEMIS.

"The grants have helped us double the number of participating teachers over the past year," Lowenstein says. "We're helping to develop some visionary com-



Hope of Detroit Academy Tire Sweep

cess, students begin to understand the root causes of some serious social and ecological problems. Students then take action as community advocates and address the problems identified."

"It's rare to find an organization that connects such a culturally and racially diverse group," he says. "SEMIS educators find they can learn a lot from each other by reflecting on eco-justice issues and questions, leveraging each other's strengths, and putting their ideas into practice."

munities and show there's a different way of schooling. SEMIS is transforming how teachers see themselves, their world and their teaching. In turn, they develop students as future citizen-stewards of healthy ecological-social systems in their communities." ❖

To learn more about Southeast Michigan Stewardship Coalition activities, visit [semiscoalition.org](http://semiscoalition.org).

# Smooth Transition

*Bright Futures helps students move from elementary to high school and beyond*

For many children, advancing from elementary to middle to high school is no easy task. Nearly one out of four Michigan students fail to graduate from public school with his or her freshman class, according to the Michigan Department of Education. Research also indicates students can show dropout predictors years before leaving school. The warning signs often appear during the transitional school years between the 5th and 9th grades.

In 1997, EMU's Institute for the Study of Children, Families and Communities tackled this problem by launching its Bright Futures 21st Century Community Learning Centers program. Bright Futures offers high quality after-school programs to elementary, middle and high schools in the Romulus, Wayne-Westland and Ypsilanti school districts. The program serves about 750 students each day and 1,200 families every year. The Michigan Department of Education awarded three \$675,000 grants in 2013 to support three Bright Futures cohorts.

"Bright Futures focuses on positive youth development by teaching skills like perseverance, time management and organization," says Lynn Malinoff, Bright Futures project director. "We also focus on a growth mindset—the idea that becoming an expert at something requires a lot of determination, practice and failure. We also share these strategies with the teachers so the concepts can become incorporated in the school culture. The totality helps prepare elementary, middle and high



Penelope Coteria, Tyler Johnson and Jefferson Adam race towards a photo finish for Bright Futures photographer and WIMA student, Sydney Johnson.

school students to advance to the next level of schooling."

Bright Futures programs meet after school for three hours Monday through Thursday, 32 weeks during the school year and six weeks in the summer. Highly trained site coordinators provide instruction and leadership at each program site. Students receive daily homework help, targeted academic assistance and mentoring.

Students also participate in a variety of clubs and activities that embed academic concepts from the school curriculum within the context of learning a skill or craft. At Marshall Upper Elementary School in Westland, students can participate in clubs like "Art-spiration," "Mad Science," and "Origami and Paper Airplane Creation." Students at Ypsilanti New Tech High School can participate in clubs like Video Game Design, Music, Nutritious Cooking and others on topics

like leadership and anti-bullying.

The program is paying dividends. In 2012-13, about 70 percent of the 1,300 Bright Futures students engaged in activities that support STEM (science, technology, engineering and math) education. Classroom teachers reported that about 70 percent of Bright Futures students improved in homework completion and classroom behavior. About 95 percent of parents said the program provides positive benefits for their children.

"It's important to have strategies that support the students, move them through the process of learning, and allow them to practice and learn from their mistakes," Malinoff says. "Bright Futures instills a confidence that allows the students to move forward and prepare for the complex world that awaits them." ■■

*To learn more about the Bright Futures program, visit [EMUBrightFutures.org](http://EMUBrightFutures.org).*



# Technology Transfer Summary for FY 2013



EMU Professor Jamil Baghdachi with cohort Cynthia Templeman from Toyota Motor Engineering work together on various coatings projects.

**Technology Transfer**, also known as Technology Commercialization, is the transfer of University-developed innovations into the marketplace for the benefit of the community, general public, and University. Innovation and its dissemination is the first and foremost goal.

Revenue generation, through licensing royalties and option agreements, perpetuates the research and technology transfer process. The following is a summary of technology transfer activity at Eastern Michigan University during FY 2013.

**Invention Disclosures: 3**

**Patent Applications Filed: 5**  
(provisional and utility combined)

**Issued U. S. Patents: 2**

## **FY 2013 Invention Disclosures**

**EMU0707.03 Chromate-free Organic-inorganic hybrid pretreatment for corrosion resistance of aluminum alloys.**

Vijay Mannari, Coatings Research Institute

**EMU1202.00 Encapsulation of PCM for Thermo-regulating Fabric Application**

Subhas Ghosh, Textile Research and Training Institute

**EMU1203.00 Eco-friendly flame retardant textile fabric using nonhalogenic intumescence chemistry.**

Subhas Ghosh, Textile Research and Training Institute

Vijay Mannari, Coatings Research Institute

Vikas Joshi, student

## **FY 2013 U.S. Patent Applications Filed**

**Corrosion Resistant Coatings and Methods Using Polyepoxysilane Precursors**

Vijay Mannari, Coatings Research Institute

**Eco-Friendly Flame Retardant Finish Using Phosphorous Based Intumescences Chemistry**

Subhas Ghosh, Textile Research and Training Institute

Vijay Mannari, Coatings Research Institute

Vikas Joshi, student

**Microencapsulated Phase-Change Materials, Related Methods, and Related Articles**

Subhas Ghosh, Textile Research and Training Institute

**Plasminogen Activator Inhibitor-1 Inhibitors and Methods of Use Thereof**

Cory Emal, Chemistry

Greg Abernathy, student

## **FY 2012 Issued U.S. Utility Patents**

**Bactericidal Silver Surfactant Delivery Into Coating and Polymer Compositions**

John Texter, Coatings Research Institute



Our environmentally friendly chromate-free pretreatment can be used to provide corrosion resistance for products such as aluminum wheels.

**Bactericidal Silver Surfactant Delivery Into Coating and Polymer Compositions**

John Texter, Coatings Research Institute

**Self-Stratifying Coatings**

Jamil Baghdachi, Coatings Research Institute

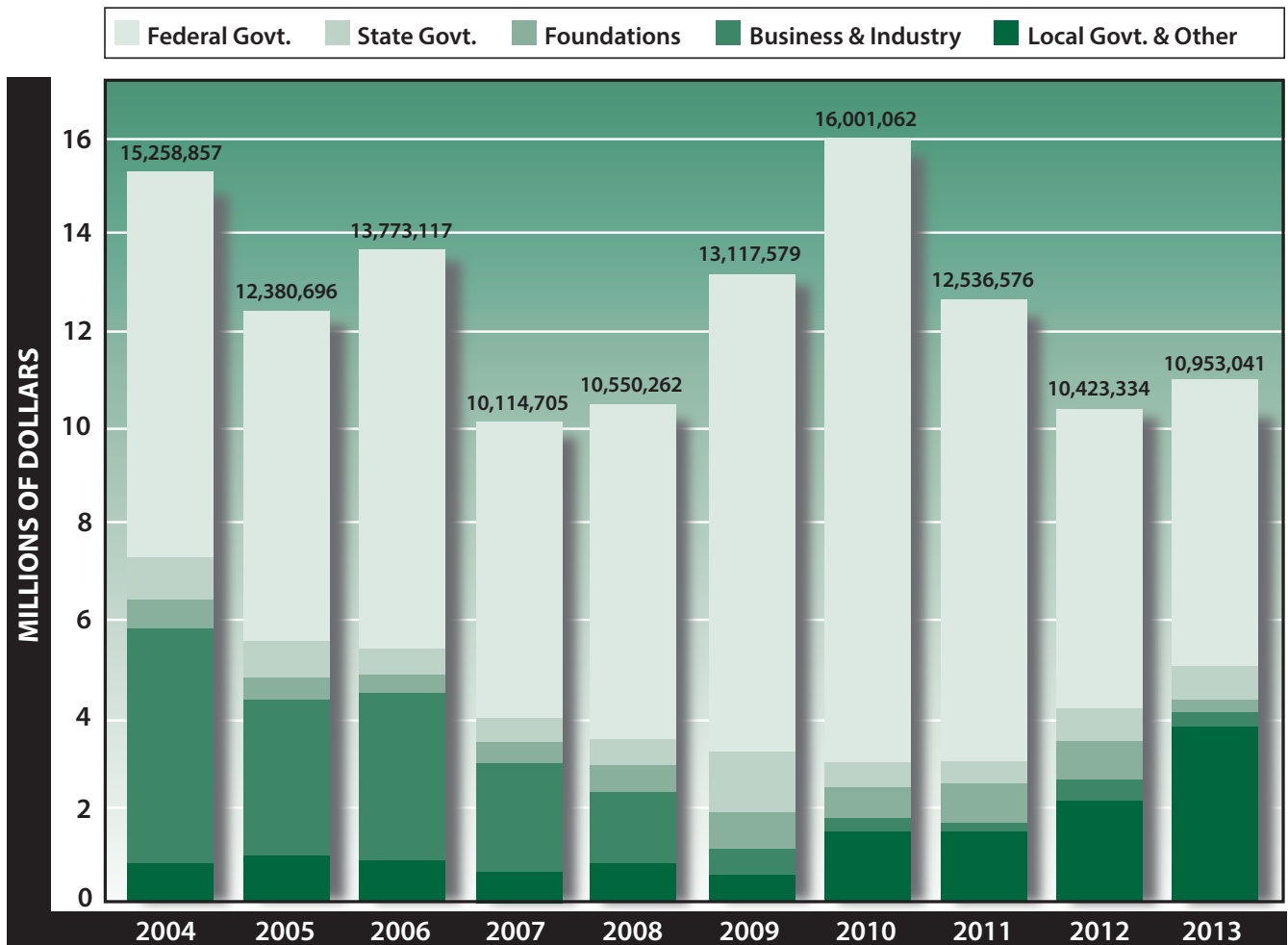
Cynthia Templeman, Toyota Motor Engineering and Manufacturing North America Punthip

Talapatcharoenkit, student

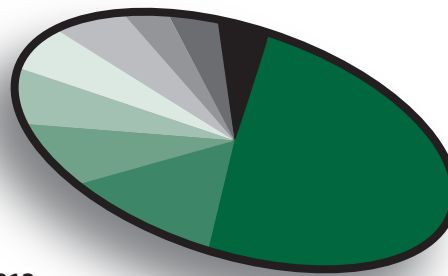


# Award Statistics

## History of Awards by Sponsor Type FY 2004-2013

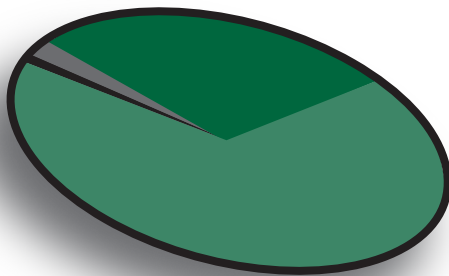


## Federal Sponsorship by Agency FY 2013



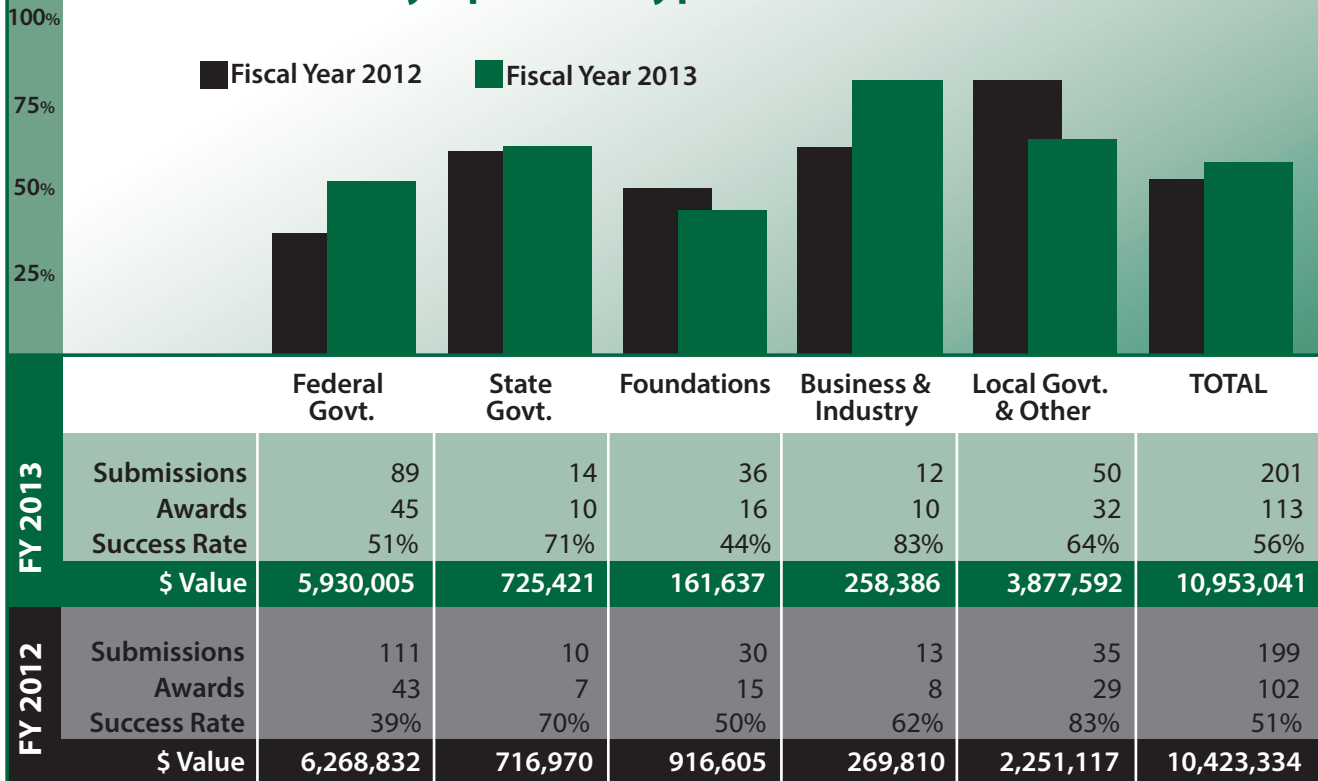
U.S. Department of Education.....	48%
U.S. Department of Defense.....	12%
U.S. Department of Agriculture.....	8%
Small Business Administration.....	8%
U.S. Department of Health & Human Services.....	7%
National Science Foundation.....	6%
U.S. Agency for International Development....	4%
National Aeronautics & Space Administration.....	2%
Centers for Disease Control & Prevention.....	2%
Other*.....	3%

## Awards by Activity Type FY 2013



Research & Development.....	19%
Service.....	77%
Corporate/Community Training.....	1%
Instructional Support & Other.....	3%

## Success Rate by Sponsor Type FY 2012/13





# Proposal & Award Summary

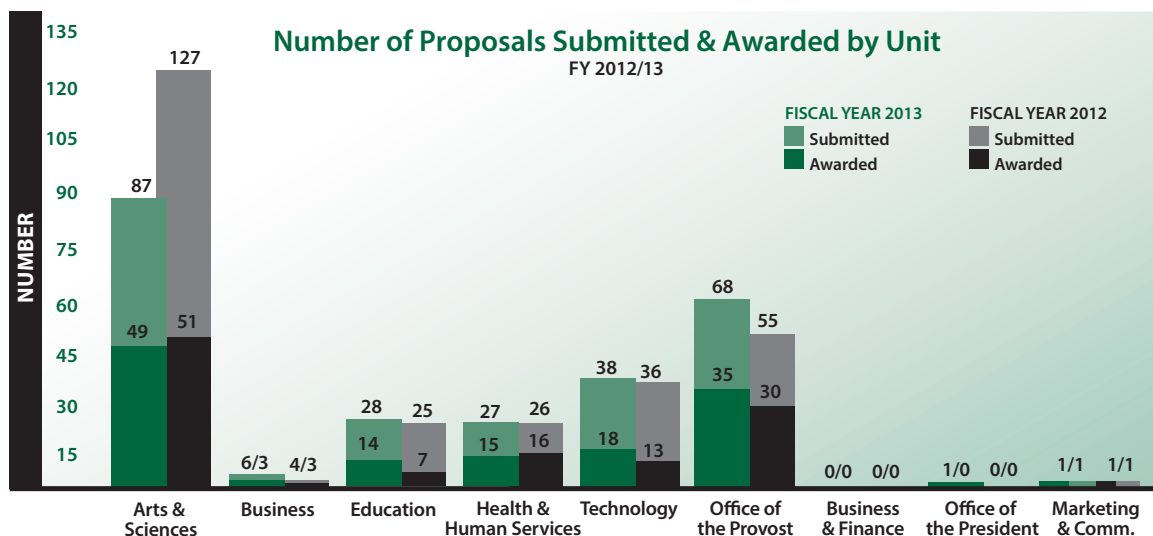
## Proposal & Award Summary by Unit FY 2012/13

FISCAL YEAR 2013					FISCAL YEAR 2012				
		Proposals		Awards			Proposals		Awards
College of Arts & Sciences	#	value	#	value	#	value	#	value	
African-American Studies	1	\$25,000	0	\$0	0	\$0	0	\$0	
Art	0	\$0	1	\$35,000	1	\$35,000	0	\$0	
Biology	7	\$1,562,691	3	\$52,917	10	\$6,542,815	6	\$249,413	
Chemistry	9	\$6,220,285	3	\$68,689	8	\$5,222,559	1	\$65,000	
Communication, Media, & Theatre Arts	5	\$58,856	7	\$87,125	13	\$1,383,044	6	\$87,217	
Computer Science	0	\$0	0	\$0	1	\$408,551	1	\$32,181	
Economics	0	\$0	0	\$0	0	\$44,032	0	\$0	
English Lang. & Literature	9	\$4,301,630	6	\$299,014	11	\$746,659	4	\$250,180	
Geography & Geology	7	\$2,981,408	3	\$104,291	16	\$9,716,759	5	\$417,036	
History & Philosophy	8	\$1,382,487	1	\$15,000	5	\$7,980,709	2	\$822,263	
Institute for Geospatial Research & Education	10	\$8,413,023	3	\$120,356	10	\$8,413,023	3	\$120,356	
Institute for Language Information & Technology	2	\$374,999	3	\$438,866	2	\$232,367	1	\$151,455	
Mathematics	1	\$796,611	0	\$0	2	\$262,781	0	\$0	
Music & Dance	0	\$0	0	\$0	0	\$0	0	\$0	
Office of the Dean, Arts & Sciences	0	\$0	0	\$0	0	\$0	0	\$0	
Physics & Astronomy	6	\$446,205	4	\$179,900	18	\$5,559,007	6	\$155,077	
Political Science	2	\$209,951	0	\$0	0	\$0	1	\$2,434	
Psychology	3	\$3,416,750	1	\$4,012	9	\$6,194,559	4	\$122,340	
Sociology, Anthropology & Criminology	12	\$2,716,442	8	\$731,503	12	\$10,985,957	5	\$869,315	
Women's and Gender Studies Program	0	\$0	0	\$0	0	\$0	0	\$0	
World Languages	8	\$243,822	5	\$48,954	9	\$1,718,217	6	\$353,815	
<b>TOTAL</b>	<b>87</b>	<b>\$26,902,293</b>	<b>49</b>	<b>\$2,114,511</b>	<b>127</b>	<b>\$65,446,039</b>	<b>51</b>	<b>\$3,698,082</b>	
College of Business	#	value	#	value	#	value	#	value	
Accounting	1	\$1,235	1	\$1,235	1	\$18,564	1	\$18,564	
Finance/Computer Information Systems	0	\$0	0	\$0	0	\$0	0	\$0	
Management	1	\$52,400	0	\$0	0	\$0	0	\$0	
Marketing	1	\$32,503	0	\$0	1	\$50,000	0	\$0	
Office of the Dean, Business	3	\$527,448	2	\$475,048	2	\$602,000	2	\$602,000	
<b>TOTAL</b>	<b>6</b>	<b>\$613,586</b>	<b>3</b>	<b>\$476,283</b>	<b>4</b>	<b>\$670,564</b>	<b>3</b>	<b>\$620,564</b>	
College of Education	#	value	#	value	#	value	#	value	
Leadership & Counseling	2	\$2,146,924	0	\$0	2	\$7,068,443	1	\$572,263	
Office of the Dean, Education	5	\$2,716,815	4	\$507,330	4	\$2,218,849	1	\$500,000	
Special Education	3	\$990,261	2	\$7,000	4	\$2,537,237	0	\$0	
Teacher Education (check 21st Century)	18	\$4,401,739	8	\$307,900	15	\$11,377,251	5	\$1,400,668	
<b>TOTAL</b>	<b>28</b>	<b>\$10,255,739</b>	<b>14</b>	<b>\$822,230</b>	<b>25</b>	<b>\$23,201,780</b>	<b>7</b>	<b>\$2,472,931</b>	
College of Health & Human Services	#	value	#	value	#	value	#	value	
School of Health Promotion & Human Performance	2	\$151,785	1	\$27,227	1	\$26,626	1	\$26,626	
School of Health Sciences	3	\$449,761	0	\$0	5	\$5,148,749	2	\$61,132	
School of Nursing	7	\$3,438,193	2	\$72,147	5	\$355,472	4	\$257,618	
Office of the Dean, HHS	7	\$1,399,487	6	\$3,251,189	10	\$10,597,615	5	\$1,215,023	
Gerontology Program	1	\$63,103	1	\$63,103	1	\$63,103	1	\$63,103	
School of Social Work	7	\$1,756,637	5	\$558,659	4	\$3,253,845	3	\$1,312,484	
<b>TOTAL</b>	<b>27</b>	<b>\$7,258,966</b>	<b>15</b>	<b>\$3,972,325</b>	<b>26</b>	<b>\$19,445,410</b>	<b>16</b>	<b>\$2,935,986</b>	
College of Technology	#	value	#	value	#	value	#	value	
School of Engineering Technology	10	\$4,888,814	3	\$502,201	12	\$6,013,597	4	\$94,120	
Coatings Research Institute	6	\$2,415,128	2	\$501,951	4	\$1,507,079	4	\$74,120	
Center for Product Research and Development	2	\$1,730	1	\$250	0	\$0	0	\$0	
Engineering Technologies	2	\$2,471,956	0	\$0	8	\$4,506,518	0	\$20,000	
School of Technology Studies	28	\$4,086,152	15	\$217,503	24	\$9,816,708	9	\$572,768	
Center for Regional & National Security	1	\$20,000	3	\$116,105	2	\$142,689	2	\$119,439	
Textiles Res. & Training Institute	10	\$55,498	9	\$52,998	1	\$599,622	0	\$0	
Technology Studies	17	\$4,010,654	3	\$48,400	21	\$9,074,397	7	\$453,329	
Office of the Dean, Technology	0	\$0	0	\$0	0	\$0	0	\$0	
<b>TOTAL</b>	<b>38</b>	<b>\$8,974,966</b>	<b>18</b>	<b>\$719,704</b>	<b>36</b>	<b>\$15,830,305</b>	<b>13</b>	<b>\$666,888</b>	

## Proposal & Award Summary by Unit FY 2012/13 *continued*

FISCAL YEAR 2013					FISCAL YEAR 2012				
		Proposals		Awards			Proposals		Awards
Office of the Provost	#	value	#	value		value	#	value	
Academic Programming & Student Success	14	\$1,547,117	8	\$223,125	13	\$1,517,499	6	\$326,178	
Office of Academic Service Learning	10	\$1,181,166	6	\$67,125	11	\$1,355,065	3	\$55,744	
Academic Services	0	\$0	0	\$0	0	\$0	0	\$0	
Holman Learning Center	1	\$130,000	1	\$130,000	1	\$160,000	2	\$268,000	
Nonprofit Leadership Alliance	2	\$209,951	0	\$0	1	\$2,434	1	\$2,434	
Undergraduate Programming	1	\$26,000	1	\$26,000	0	\$0	0	\$0	
Academic Success Partnerships	8	\$3,772,270	3	\$377,583	3	\$274,716	3	\$274,716	
Bruce T. Halle Library	3	\$9,787	2	\$5,192	0	\$0	0	\$0	
Charter Schools	0	\$0	0	\$0	0	\$0	0	\$0	
Extended Programs & Educational Outreach	1	\$40,000	1	\$35,000	1	\$35,000	1	\$35,000	
Center for Organizational Risk Reduction	1	\$40,000	1	\$35,000	1	\$35,000	1	\$35,000	
Research, Administration, and Graduate School	33	\$8,408,177	18	\$2,831,257	30	\$14,484,432	16	\$3,163,083	
Graduate School	0	\$0	0	\$0	0	\$0	0	\$0	
Inst. for the Study of Children, Families & Comm.	25	\$5,932,716	11	\$2,185,021	28	\$14,069,539	13	\$2,742,476	
Upward Bound	4	\$394,266	4	\$394,266	1	\$398,293	2	\$404,007	
McNair Scholars Program	1	\$1,999,224	1	\$219,999	0	\$0	0	\$0	
Office of Research Development	3	\$81,971	2	\$31,971	1	\$16,600	1	\$16,600	
Honors College	0	\$0	0	\$0	1	\$213,180	1	\$213,180	
Ombudsman	0	\$0	0	\$0	0	\$0	0	\$0	
Office of International Students	0	\$0	0	\$0	0	\$0	0	\$0	
Student Life	3	\$8,624	0	\$0	0	\$0	0	\$0	
Campus Life	0	\$0	0	\$0	0	\$0	0	\$0	
Diversity and Community Involvement	3	\$8,624	0	\$0	0	\$0	0	\$0	
Student Well-Being	4	\$21,180	3	\$172,680	4	\$356,428	3	\$194,928	
Children's Institute	2	\$11,180	3	\$172,680	3	\$341,428	2	\$179,928	
Counseling & Psychological Services	0	\$0	0	\$0	0	\$0	0	\$0	
University Health Services	2	\$10,000	0	\$0	1	\$15,000	1	\$15,000	
Provost's Office	2	\$3,465,469	0	\$0	3	\$3,688,474	0	\$0	
<b>TOTAL</b>	<b>68</b>	<b>\$17,272,624</b>	<b>35</b>	<b>\$3,644,837</b>	<b>55</b>	<b>\$20,569,729</b>	<b>30</b>	<b>\$4,207,085</b>	
<b>Business &amp; Finance</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	
<b>TOTAL</b>	<b>0</b>	<b>\$0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>\$0</b>		<b>0</b>	
<b>Office of the President</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	
Physical Plant	0	\$0	0	\$0	0	\$0	0	\$0	
Public Safety	1	\$249,972	0	\$0	0	\$0	0	\$0	
Environmental Health & Safety	0	\$0	0	\$0	0	\$0	0	\$0	
<b>TOTAL</b>	<b>1</b>	<b>\$249,972</b>	<b>0</b>	<b>\$0</b>	<b>0</b>	<b>\$0</b>	<b>0</b>	<b>\$0</b>	
<b>University Marketing and Communications</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	<b>#</b>	<b>value</b>	
University Marketing	0	\$0	0	\$0	0	\$0	0	\$0	
WEMU Radio	1	\$172,641	1	\$172,641	1	\$184,279	1	\$184,279	
<b>TOTAL</b>	<b>1</b>	<b>\$172,641</b>	<b>1</b>	<b>\$172,641</b>	<b>1</b>	<b>\$184,279</b>	<b>1</b>	<b>\$184,279</b>	
<b>TOTAL</b>	<b>SUBMITTED</b>		<b>AWARDED</b>		<b>SUBMITTED</b>		<b>AWARDED</b>		
<b>201</b>	<b>\$47,379,620</b>	<b>113</b>	<b>\$10,953,041</b>	<b>199</b>	<b>\$70,899,573</b>	<b>102</b>	<b>\$10,423,334</b>		

This list reflects dual credit for collaborative projects between units. Therefore, subtotals will not match the grand totals above, which are the actual net submissions and awards for FY2013 and FY2012.





# INTERNAL AWARDS

2012-2013

## Ronald W. Collins Distinguished Faculty Awards

### Doris Fields

(Communication, Media and Theatre Arts). Teaching II

### Vijaykumar Mannari

(Engineering Technology). Research II

**Joel Schoenhals** (Music and Dance). Creative Activity

## Sixth Annual Michigan Distinguished Professor of the Year Award

**Margaret Crouch** (History and Philosophy)

## EMU-FT Lecturers' Outstanding Teaching Award Recipient

### Kelly Victor-Burke

(Geography and Geology)

## Sabbatical Leave Awards

**Cathryn Amidei** (Technology Studies). "The Vis Viva Series: New Techniques for Woven Representation of Digital Imagery on the Jacquard Loom"

**Leslie Atzmon** (Art). "The Visual Power of Hebrew Letterforms in Torah Scrolls and Micrographic Texts"

### Jamil Baghdachi

(Engineering Technology). "Functional Polymer Coatings: Principles, Methods, and Applications" Marcia Bombyk (Social Work). "Advancing Academic Service-Learning in Social Work"



**Subhas Ghosh** (Technology Studies) "Development of Sustainable Natural Fiber Based Composites for Technical Textiles"

**Carla Harryman** (English Language and Literature). "Letters Not About Hope"

### Steven Huprich

(Psychology). "Personality Disorders: Assessment, Diagnosis, and Research"

### Alissa Huth-Bocks

(Psychology). "A Developmental Examination of Individual and Contextual Risks Impacting the Mother-Child Relationship from Pregnancy to Three Years Post-Partum"

### Kristin Judd

(Biology). "Examining Links between Microbial Community Composition and Ecosystem

Function in a Stream Network"

### John McCurdy

(History and Philosophy). "Billets and Barracks: Martial Space and the American Revolution"

### Maria Milletti

(Chemistry). "Using Molecular Dynamics Methods to Study the Interaction between Small Molecule Inhibitors"

### Christine Neufeld

(English Language and Literature). "Gathering the Gossips: Acoustical Agency in Late Medieval Literature"

### Amy Sacksteder

(Art). "The Fading Light: Collaborations with an Island"

### Elizabeth Schuster

(Social Work). "The Life Experience of the Very Old and the Role of Transcendence in the

Adaptive Process"

**Ellen Schwartz** (Art). "Cast Bronze Icons: Audience and Significance in the Middle Byzantine Era"

### Jennifer Seibert

(Art). "A Short Documentary Film Project: The American Dream and the Pursuit of Happiness"

### Solange Simões

(Sociology, Anthropology and Criminology and Women's and Gender Studies). "Internationalizing Professional Development through the Integration of Teaching, Research, and Service"

### Richard Stahler-Sholk

(Political Science). "Indigenous Autonomy and Social Movements: Lessons from the Zapatista Experience in Chiapas, Mexico"

### Annette Wannamaker

(English Language and Literature). "Theorizing the Early Reader: Aesthetics, Identity, and Culture in Literature for Beginning Readers"

### Sherry Jerome Wilkinson

(Music and Dance). "The Ballet Project: A Proposal to Earn Certification in Multiple Dance Pedagogical Methods"

### Bill Woodland

(Economics). "Regression to the Mean and the Major League Baseball Season Wins Total Betting Market"

### Linda Woodland

(Accounting and Finance). "The Favorite Long-Shot Bias and Odds Betting in the National Football League: An

Examination of Market Efficiency and Profitability”

**Nesa Wu** (Computer Information Systems). “Basics of ‘Lean’ Operations Management Principles with Applications for Manufacturing, Service, and Healthcare Industries”

### Faculty Research Fellowships

**Leslie Atzmon** (Art). “The Graphic Design Reader Anthology”

**David C. Chou** (Computer Information Systems). “Developing Cloud Computing as a Model for Information Technology Sustainability”

**Elizabeth Currans** (Women’s and Gender Studies). “Engendering Publics: Women’s Demonstrations in the 21<sup>st</sup> Century U.S.”

**Suzanne M. Dugger** (Leadership and Counseling). “Foundations of Career Counseling: Completion of a Textbook Manuscript for Publication by Pearson Education”

**Paul Leighton** (Sociology, Anthropology and Criminology). “Proposal to Write Chapters for Oxford’s *Handbook on White Collar Crime* and the *Routledge Handbook of International Crime and Justice Studies*”

**Raymond Rosenfeld** (Political Science). “Comparative Civic Culture: Ukraine and Latvia”

**Jamie Scaglione** (Chemistry). “Understanding

the Antifungal Mycosubtilin”

**Joel Schoenhals** (Music and Dance). “Beethoven’s 32: Exploring the ‘New Testament’”

**Sylvia Sims Gray** (Social Work). “‘At Risk’ Students and University Stakeholders: On Crossing the Finish Line”

**Tsu-Yin Wu** (Nursing). “Increasing Colorectal Cancer Screening: Developing and Testing a Culturally Tailored Intervention in Asian Americans”

### Provost’s New Faculty Research Awards

**Damir Cavar** (English Language and Literature). “Natural Language Processing for Linguistic Annotation of Text Archives”

**Xiangdong Che** (Technology Studies). “Build a Virtual Testbed to Simulate Cyber-Ecosystem”

**Michelle Hersh** (Biology). “Seed Pathogens in Fragmented Landscapes”

**Heather Hutchins-Wiese** (Health Sciences). “Food Preference Survey to Determine Dietary Patterns and Risk for Osteoporosis in Postmenopausal Women”

**Sandra Jackson** (Music and Dance). “Commissioning and Performance Project for Clarinet and Wind Ensemble”

**Ingo Janser** (Chemistry). “Tunable Functionality of Alpha, Beta-Unsaturated Carbonyl Compounds: Development of Novel Pharmaceuticals”

**Rhonda V. Kraai** (Special Education). “Access to Communities of Faith for People with Disabilities”

**Rusty McIntyre** (Psychology). “The Stereotype Threat of Social Exclusion: How Being Ostracized Increases the Pressure to Perform in Situations Assessing Social Worth”

**Chong Oh** (Computer Information Systems). “Movie Tweets: Predicting Movie Box Office Performance with Social Media”

**Tierney Ann Orfgen** (Technology Studies). “Perceived Accountability in the Workplace: Extension and Explanation of the Role of Perceived Accountability in Workplace Outcomes”

**Yaman Roumani** (Computer Information Systems). “Forecasting Seasonality of Software Vulnerabilities Using an ARIMA Model”

**Theresa Saunders** (Leadership and Counseling). “The Cost of Change: SIG Funding in the EAA”

**James Saunoris** (Leadership and Counseling). “The Economic Impacts of Intergovernmental Transfers”

**J. Michael Scoville** (History and Philosophy). “Flourishing: Its Meaning and Ethical Significance for Environmental Ethics”

**Sarah E. Shea** (Social Work). “Evaluation of the Effects of Specialized Reflective Practice Training on Infant Mental Health Practice and Supervision”

### Undergraduate Research Stimulus Program Awards

**Cory Emal** (Chemistry). Mentoring Sarah Burke. “Development of a New Class of Inhibitors of Plasminogen Activator Inhibitor-1”

**Deborah Heyl-Clegg** (Chemistry). Mentoring Hector Figueroa. “Running Interference on Protein Aggregation: The Effects of Non-Specific Peptide Inhibitors”

**Karen Saules** (Psychology). Mentoring Lauren Fowler. “An Examination of the Relationship of Problematic Food Types to the Development of Substance Use Disorder in Post-Bariatric Surgery Patients”

**William Sverdlik** (Computer Science). Mentoring Andrew Frailing. “Cooperative Distributed Problem Solving”

**Anne Casper** (Biology). Mentoring Catherine Kaminski. “Determining DNA Break Points in the Human Fragile Site FRAXB”

**Joel Schoenhals** (Music and Dance). Mentoring Jeffrey Nicholas. “Suite for Piano”

**Gretchen Otto** (Art). Mentoring Darin Smith. “Samburu Innovations”

**David Pawlowski** (Physics and Astronomy). Mentoring Ashley Taylor-Voss. “Global Model Simulations during Solar Flares and Dust Storms at Mars”



# EXTERNAL AWARDS

2012-2013

## OFFICE OF THE PROVOST

### Academic Programming and Student Success

**Jessica Alexander,**  
**Academic Service-Learning  
and Communication,  
Media and Theatre Arts**  
*Digital Inclusion in the  
Community—Southside  
Ypsilanti Wireless Project*  
**Knight Foundation**  
**\$15,757**

*The B. Side Workforce  
Investment Act*  
**Washtenaw County  
Children's Services Dept.**  
**\$35,868**

*Go Vote! MCC Mini-Grant*  
**Michigan Campus Compact**  
**\$500**

**Jessica Alexander,**  
**Academic Service-Learning  
and Communication,  
Media and Theatre Arts,**  
**and Elise Buggs, Academic  
Success Partnerships**  
*Project Shift*  
**Michigan Campus Compact**  
**\$15,000**

**Adam Meyer, Holman  
Success Center**  
*Getting on the Right Track—  
Trackers Program (Mich. 4-S  
Program)*  
**Mich. Dept. of Labor and  
Economic Growth**  
**\$130,000**

**Christina Shell,**  
**Undergraduate  
Programming, Records and  
Registration**  
*Student Transcript and  
Academic Record Repository  
(STARR) Data-Exchange Process*

**Mich. Dept. of  
Management and Budget**  
**\$26,000**

### Academic Success Partnerships

**Elise Buggs, and Jessica  
Alexander, Academic  
Service-Learning and  
Communication, Media  
and Theatre Arts**  
*Project Shift*  
**Michigan Campus Compact**  
**\$15,000**

**Elise Buggs and Lynette  
Findley**  
*Independent Living Skills  
Coach for Training Eligible  
Foster Care Youth (Mentorship  
Access and Guidance While in  
College [MAGIC])*  
**Michigan Dept. of Human  
Services**  
**\$224,583**

*Michigan Department of  
Career Development KCP State  
GEAR-UP Program*  
**Michigan Department  
of Labor and Economic  
Growth-Career**  
**\$138,000**

### Bruce T. Halle Library

**Lisa Klopfer**  
*Bridging Cultures Bookshelf  
"Muslim Journeys"*  
**National Endowment for  
the Humanities**  
**\$1,092**

*Southeastern Michigan as a  
Region of Study: An Annotated  
Resource Guide*  
**American Library  
Association**  
**\$4,100**

### Extended Programs and Educational Outreach

**Barbara Hopkins, Center  
for Organization Risk  
Reduction**  
*CET 2012-2013: Trenching and  
Excavating Qualified Person  
Training*  
**Mich. Dept. of Labor and  
Economic Growth**  
**\$35,000**

### Research, Administration, Graduate School

**Lynn Malinoff and Russell  
Olwell, Institute for the  
Study of Children, Families  
and Communities**  
*21<sup>st</sup> Century Community  
Learning Centers, Bright  
Futures at Middle and High  
Schools*  
**Michigan Dept. of  
Education**  
**\$2,024,725**

**Russell Olwell, Institute  
for the Study of Children,  
Families and Communities  
and History and  
Philosophy**  
*Connecting Hamilton  
Crossing: Developing Family  
Self-Sufficiency-Education  
Programs for Subsidized-  
Housing Residents*  
**Washtenaw County**  
**\$15,000**

**Russell Olwell, Institute  
for the Study of Children,  
Families and Communities,  
and Roger Kernsmith,  
Sociology, Anthropology  
and Criminology**  
*Strengthening Supports for  
Healthy Relationships: A  
Gender-Sensitive, Mixed-  
Methods Analysis of Protective  
Factors for Intimate-Partner  
Violence*

**Wayne State University**  
**\$105,396**

**Russell Olwell, Institute  
for the Study of Children,  
Families and communities,  
and Ethan Lowenstein,  
Teacher Education**  
*Matrix Theatre Company  
Project*  
**Matrix Theatre Company**  
**\$16,500**

**Russell Olwell, Institute  
for the Study of Children,  
Families and Communities,  
and Ethan Lowenstein  
and Rebecca Martusewicz,  
Teacher Education**  
*SEMIS Small-Contract Fund:  
Professional-Development  
Training and Consultation  
regarding Curriculum  
Development/Mapping and  
Evaluation*  
**Honey Creek Community  
School**  
**\$4,800**

*SEMIS Small Contract Fund:  
Professional Development  
Training and Consultation  
regarding Curriculum  
Development/Mapping and  
Evaluation*  
**Birmingham Seaholm High  
School**  
**\$5,000**

*SEMIS Small-Contract Fund:  
Professional-Development  
Training and Consultation  
regarding Curriculum  
Development/Mapping and  
Evaluation*  
**Boggs Educational Center,  
Detroit**  
**\$2,000**

*SEMIS Small Contract Fund:  
Professional Development  
Training and Consultation  
Regarding Curriculum  
Development/Mapping  
and Evaluation, John Paul II  
Catholic School*

**John Paul II Catholic School**  
**\$3,000**

*SEMIS Small Contract Fund: Professional Development Training and Consultation Regarding Curriculum Development/Mapping and Evaluation, Honey Creek #3*  
**Honey Creek Community School**  
**\$8,600**

**Mark Jackson, Upward Bound, and Russell Olwell, Institute for the Study of Children, Families and Communities**  
*Upward Bound—MDE Summer Food Program, Summer, 2012*  
**Michigan Dept. of Education**  
**\$6,902**

*Upward Bound—MDE Summer Food Program, Summer, 2013*  
**Michigan Dept. of Education**  
**\$6,902**

*Creating a Mentoring Partnership: Mentor2Youth and Upward Bound Work Together to Improve Outcomes for Ypsilanti-Area School-Aged Youth*  
**Ann Arbor Area Community Foundation**  
**\$3,000**

*Upward Bound*  
**U.S. Dept. of Education**  
**\$377,462**

**Heather Neff, McNair Scholars Program and English Language and Literature**  
*Eastern Michigan University Ronald McNair Program*  
**U.S. Dept. of Education**  
**\$219,999**

**Philip Rufe and Caryn Charter, Office of Research Development, and Subhas Ghosh, School of Technology Studies**  
*Preventing Bacterial Transmission from Privacy Curtains*  
**University of Michigan**  
**\$11,719**

**Philip Rufe and Caryn Charter, and Vij Kumar Mannari, School of Engineering Technology**  
*Commercialization of Organic-Inorganic Hybrid Chromate-Free Pretreatment for Aluminum Alloys*  
**University of Michigan**  
**\$20,252**

## **Student Well-Being**

**Christine Aris, Children's Institute**  
*2012-2013 Great Start Readiness Program*  
**Washtenaw Intermediate School District**  
**\$171,880**

*PNC Grow Up Great: For Me, For You, For Later*  
**Washtenaw Child Care Network**  
**\$800**

## **COLLEGE OF ARTS AND SCIENCES**

### **Art**

**Leslie Atzmon and Ryan Molloy**  
*Open Book*  
**National Endowment for the Arts**  
**\$35,000**

### **Biology**

**Margaret Hanes**  
*Digitization TCN: Collaborative Research: Tritrophic Databasing*

*Initiative*  
**University of Michigan**  
**\$5,433**

**Allen Kurta**  
*Preconstruction Mist-Netting Survey of Bats at the Pheasant Run Wind Project, Huron County, Michigan*  
**Atwell, LLC**  
**\$37,884**

*Evaluation of Habitat for the Endangered Indiana Bat along Pipeline 1200B*  
**Consumers Energy Company**  
**\$9,600**

### **Chemistry**

**Cory Emal**  
*Novel Targets in Thrombosis and Atherosclerosis*  
**University of Michigan**  
**\$46,259**

**Lawrence Kolopajlo and Steven Pernecky**  
*CSI STEM Summer Camp*  
**American Indian Higher Education Consortium**  
**\$3,930**

**Maria Milletti**  
*2012 Jean Dreyfus Boissevain Lectureship for Undergraduate Institutions*  
**Dreyfus Foundation, Camille Henry**  
**\$18,500**

### **Communication, Media, and Theatre Arts**

**Jessica Alexander, Academic Service-Learning**  
*Digital Inclusion in the Community—Southside Ypsilanti Wireless Project*

**Knight Foundation**  
**\$15,757**

*The B. Side Workforce Investment Act*

**Washtenaw County Children's Services Dept.**  
**\$35,868**

*Go Vote! MCC Mini-Grant*  
**Michigan Campus Compact**  
**\$500**

**Jessica Alexander, Academic Service-Learning, and Elise Buggs, Academic Success Partnerships**  
*Project Shift*  
**Michigan Campus Compact**  
**\$15,000**

**Wendy Kivi**  
*EMU Takes Electrical Safety Instruction to Local Safety-Education Programs*  
**DTE Energy Foundation**  
**\$20,000**

### **English Language and Literature**

**Cathy Fleischer**  
*Ideas for a Book Series for NCTE*  
**National Council of Teachers of English**  
**\$12,000**

*Exploring Writing Outside Your Comfort Zone: Writing in Unfamiliar Genres with You and Your Students*  
**National Writing Project**  
**\$12,000**

**Heather Neff, McNair Scholars Program**  
*Eastern Michigan University Ronald McNair Program*  
**U.S. Dept. of Education**  
**\$219,999**

**Martin Shichtman**  
*Bringing College-Level Jewish Education Directly to the Southeastern Michigan Jewish Community: A Collaboration between Eastern Michigan*



# EXTERNAL AWARDS

2012-2013

*University Jewish Studies and  
Temple Israel, West Bloomfield,  
Michigan*

**Covenant Foundation**  
**\$15,015**

**William Tucker**  
*SEED Elementary  
Evaluation #1*  
**National Writing Project**  
**\$20,000**

*SEED #3: Professional  
Development in a High-Need  
School*

**National Writing Project**  
**\$20,000**

## Geography and Geology

**Nancy Bryk and Theodore  
Ligibel**

*For Love of This Place:  
Interpreting the Campbell-  
DeYoung Farmstead*

**Michigan Humanities  
Council**  
**\$14,909**

**Theodore Ligibel**  
*Graduate Internship for the  
Mich. Dept. of Transportation*  
**Mich. Dept. of  
Transportation**  
**\$14,382**

**Steven LoDuca**  
*Collaborative Research:  
Macrophytes Across the  
Proterozoic-Phanerozoic  
Boundary: A Baseline Study of  
Macroalgae During a Critical  
Interval in Earth-System  
History*  
**National Science  
Foundation**  
**\$75,000**

## History and Philosophy

**Russell Olwell, Institute  
for the Study of Children,  
Families and Communities**  
*Connecting Hamilton  
Crossing: Developing Family  
Self-Sufficiency-Education  
Programs for Subsidized-  
Housing Residents*  
**Washtenaw County**  
**\$15,000**

## Institute for Geospatial Research and Education

**Yichun Xie**  
*RAPIDS Work Plan 2010-4,  
RAPIDS 3.0 Software Coding,  
Testing, and Implementation*  
**Great Lakes Commission**  
**\$39,840**

*IGRE Industry Rates Small  
Contract Fund: GIS Mapping  
Project for Archdiocese of  
Detroit*  
**Archdiocese of Detroit**  
**\$500**

*IGRE Industry Rates Small  
Contract Fund: Ogemaw  
County Software Update after  
Server Error*  
**Ogemaw County**  
**\$900**

*RAPIDS Work Plan 2010-4,  
RAPIDS 3.0 Software Coding,  
CAROL 2 Application,  
Maintenance*  
**Great Lakes Commission**  
**\$8,000**

## Institute for Language Information and Technology

**Veronica Grondona**  
*Endangered Languages*

*Project Technical Lead  
Succession Agreement*  
**Google, Inc.**  
**\$200,000**

**Damir Cavar**  
*Multi-Tree: Completing  
the Library of Language  
Relationships*  
**National Science  
Foundation**  
**\$153,884**

*Collaborative Research:  
Automatically Annotated  
Repository of Video and  
Audio Resources Community  
(AARDVARC)*  
**National Science  
Foundation**  
**\$84,982**

## Physics and Astronomy

**Mary (Beth) Kubitskey**  
*The Impact of MSP  
Professional Development  
on the Quality of Instruction  
in Middle School Math and  
Science Classrooms*  
**American Institutes for  
Research**  
**\$36,496**

**David Pawlowski**  
*Utilizing Probability  
Distribution Functions  
and Ensembles to  
Forecast Ionospheric and  
Thermospheric Space Weather*  
**University of Michigan**  
**\$32,308**

*Understanding the Time-  
Dependent Response of the  
Martian Upper Atmosphere to  
Solar Flares and Dust Storms*  
**National Aeronautics and**

**Space Administration**  
**\$111,096**

## Psychology

**Steven Huprich**  
*Evaluating the Clinical Utility  
of Three Models of Personality-  
Disorder Diagnosis*  
**International  
Psychoanalytic Association**  
**\$4,012**

## Sociology, Anthropology and Criminology

**Kristine Ajrouch**  
*The Muslim Immigrant  
Experience: Trends and  
Outcomes*  
**University of Arizona**  
**\$30,000**

**Roger Kernsmith, and  
Russell Olwell, History and  
Philosophy and Institute  
for the Study of Children,  
Families and Communities**  
*Strengthening Supports  
for Healthy Relationships:  
A Gender-Sensitive, Mixed-  
Methods Analysis of Protective  
Factors for Intimate-Partner  
Violence*  
**Wayne State University**  
**\$105,396**

**Mansoor Moaddel**  
*The Birth Place of the Arab  
Spring: Value Orientations and  
Political Actions in Tunisia*  
**MITRE Corporation**  
**\$353,067**

*Religion, Secularism, and  
National Identity in the Islamic  
World*  
**Universitat Gottingen**

**(Georg-August) and  
University of Michigan**  
**\$34,743**

*Cross-National Analysis of  
Islamic Fundamentalism*  
**Office of Naval Research**  
**\$208,297**

## **World Languages**

**Hitomi Oketani**  
*Japanese School of Detroit*  
**Japanese School of Detroit**  
**\$22,778**

*Michigan Japanese Bilingual  
Education Foundation 2013  
Student Teacher Agreement*  
**Michigan Japanese  
Bilingual Education  
Foundation**  
**\$12,900**

*Charter School  
Implementation Consultation*  
**Japanese American School  
of Southeast Michigan**  
**\$9,776**

**Motoko Tabuse**  
*Japanese Dinner Show*  
**Japan Business Society of  
Detroit Foundation**  
**\$1,500**

**Sayuri Kubota**  
*24<sup>th</sup> Annual Conference of  
the Central Association of  
Teachers of Japanese*  
**Japan Business Society of  
Detroit Foundation**  
**\$2,000**

## **COLLEGE OF BUSINESS**

**Office of the Dean**  
**Richard King**  
Small Business and

Technology Development  
Center, Region 9 Host  
**Grand Valley State  
University**  
**\$475,048**

## **Accounting and Finance**

**D. Robert Okopny**  
*Internal Auditing Education  
Partnership*  
**Internal Auditing Academic  
Advancement**

## **COLLEGE OF EDUCATION**

### **Office of the Dean**

**Jann Joseph, and Jon  
Margerum-Leys, Autism  
Collaborative Center**  
*Developing New and  
Expanding Existing Autism  
Services*  
**Mich. Dept. of Community  
Health**  
**\$500,000**

*Eastern Michigan University  
Autism Collaborative Center—  
S.P.L.A.S.H./Playground  
Funding*  
**Ann Arbor Autism  
Foundation**  
**\$7,330**

## **Special Education**

**John Palladino**  
*Journal of Ethnographic &  
Qualitative Research*  
**Journal of Ethnographic  
and Qualitative Research**  
**\$7,000**

**Teacher Education**  
**Marguerite Daisey and**

**Joseph Bishop**  
*Eastern Michigan Practicum  
for Teacher-Educators from  
Pakistan*  
**Education Development  
Center, Inc.**  
**\$258,000**

**Ethan Lowenstein and  
Rebecca Martusewicz, and  
Russell Olwell, Institute  
for the Study of Children,  
Families and Communities**  
*SEMIS Small Contract Fund:  
Professional Development  
Training and Consultation  
Regarding Curriculum  
Development/Mapping and  
Evaluation*  
**Birmingham Seaholm High  
School**  
**\$5,000**

*SEMIS Small-Contract Fund:  
Professional-Development  
Training and Consultation  
Regarding Curriculum  
Development/Mapping and  
Evaluation*  
**Boggs Educational Center,  
Detroit**  
**\$2,000**

*Semis Small-Contract Fund:  
Professional-Development  
Training and Consultation  
Regarding Curriculum  
Development/Mapping and  
Evaluation*  
**Honey Creek Community  
School**  
**\$13,400**

*SEMIS Small Contract Fund:  
Professional Development  
Training and Consultation  
Regarding Curriculum  
Development/Mapping and  
Evaluation*

**John Paul II Catholic School**  
**\$3,000**

**Ethan Lowenstein, and  
Russell Olwell, Institute  
for the Study of Children,  
Families and Communities**  
*Matrix Theatre Company  
Project*  
**Matrix Theatre Company**  
**\$16,500**

**Nelson Maylone**  
*Woodrow Wilson Mentoring  
Support*  
**Woodrow Wilson  
Foundation**  
**\$10,000**

## **COLLEGE OF HEALTH AND HUMAN SERVICES**

### **Office of the Dean**

**Crystal Mills and Sarah  
Shea, School of Social work**  
*Flinn Project: Building and  
Expanding Reflective Practice  
in Infant Mental-Health  
Programs: A Community  
Mental-Health Professional-  
Development Model*  
**Michigan Association for  
Infant Mental Health**  
**\$8,735**

*Evaluation of Partnership for  
Success II Grant Activities*  
**Southeast Michigan  
Community Alliance**  
**\$8,000**

*Strategic Prevention  
Framework: Partnerships for  
Success PFS II Evaluation*  
**Clark and Associates,  
Detroit**  
**\$8,000**

# EXTERNAL AWARDS

2012-2013

**Crystal Mills and Mark Ragg, School of Social Work**  
*Consumer Micro-Enterprise Development Consumer Satisfaction Data Collection, Analysis, and Reporting*  
**Detroit/Wayne County Community Mental Health Agency**  
**\$351,614**

*University Collaboration to Support System-Wide Implementation of Best-Promising and Evidence-Based Practices in Community Mental Health*  
**Detroit/Wayne County Community Mental Health Agency**  
**\$2,760,000**

*Integrated Health-Care Grant*  
**Detroit/Wayne County Community Mental Health Agency**  
**\$114,840**

## Gerontology Program

**Shelly Weaverdyck and Elizabeth Schuster**  
*EMU Alzheimer's Education and Research Program*  
**Michigan Dept. of Community Health**  
**\$63,103**

## School of Health Promotion and Human Performance

**Kathleen Conley**  
*UM:NIH—Stroke Health and Risk Education*  
**University of Michigan**  
**\$27,277**

## School of Nursing

**Virginia Lan**  
*EMU Nurse Faculty Loan Program*  
**Health Resources and**

**Services Administration**  
**\$50,147**

**Tsu-Yin Wu**  
*Empowering Immigrant Asian Americans: Community Participatory Approach*  
**W.K. Kellogg Foundation**  
**\$22,000**

## School of Social Work

**Jennifer Kellman Fritz**  
*Washtenaw County Juvenile Court*  
**Washtenaw County Government**  
**\$83,510**

**Mark Ragg, and Crystal Mills, Office of the Dean of Health and Human Services**  
*University Collaboration to Support System-Wide Implementation of Best-Promising and Evidence-Based Practices in Community Mental Health*  
**Detroit/Wayne County Community Mental Health Agency**  
**\$2,760,000**

*Integrated Health-Care Grant*  
**Detroit/Wayne County Community Mental Health Agency**  
**\$114,840**

*Consumer Micro-Enterprise Development Consumer Satisfaction Data Collection, Analysis, and Reporting*  
**Detroit/Wayne County Comm. Mental Health Agency**  
**\$351,614**

**Sarah Shea, and Crystal Mills, Office of the Dean of Health and Human Services**  
*Flinn Project: Building and Expanding Reflective Practice in Infant Mental-Health*

*Programs: A Community Mental-Health Professional-Development Model*  
**Michigan Association for Infant Mental Health**

## COLLEGE OF TECHNOLOGY

## School of Engineering Technology

**Vijaykumar Mannari, Coatings Research Institute**  
*Soy-Based Functional Building Blocks for Sustainable Advanced Coatings*  
**U.S. Dept. of Agriculture**  
**\$481,699**

**Vijkumar Mannari, Coatings Research Institute, and Philip Rufe and Caryn Charter, Office of Research Development**  
*Commercialization of Organic-Inorganic Hybrid Chromate-Free Pretreatment for Aluminum Alloys*  
**University of Michigan**  
**\$20,252**

**Philip Rufe, Center for Product Research and Development**  
*Student Design Product "Shaver" with Xavier Clemons*  
**Xavier Clemons**  
**\$250**

## School of Technology Studies

**Julie Becker, Textiles Research and Training Institute**  
*Textiles Research and Training Institute (TRTI) Small Contract: Edited Camisoles*  
**Our Own Products, LLC**  
**\$313**

*Textiles Research and Training Institute (TRTI) Small Contract:*

*Summer/Fall Consultations on Line Planning, Merchandising, and Development*  
**DEFYE**  
**\$300**

*Textiles Research and Training Institute (TRTI) Small Contract: Merchandising Strategies and Line Development*  
**Lady Aitch**  
**\$177**

*Textiles Research and Training Institute (TRTI) Small Contract: Prototype Design and Development*  
**Lady Aitch**  
**\$1,042**

*Textiles Research and Training Institute (TRTI) Small Contract: Training on Gerber AccuMark Software*  
**FFC Services**  
**\$882**

*Gerber CAD Pattern Design System Version 8—Training—TRTI Small Contracts*  
**Champion Manufacturing**  
**\$2,811**

**John Dugger III**  
*Project Lead the Way—Bosch*  
**Bosch**  
**\$18,600**

*Project Lead the Way*  
**Wisconsin Energy Foundation**  
**\$10,000**

*Project Lead the Way—Welch*  
**James A. Welch Foundation**  
**\$19,800**

**Subhas Ghosh, Textiles Research and Training Institute**  
*Military Tent Fire Retardant and Thermo-Regulating Properties*  
**University of Michigan**  
**\$30,377**



*Jacquart Fabric Products  
Contract.*

**Jacquart Fabric Products**  
**\$5,377**

**Subhas Ghosh, Textiles  
Research and Training  
Institute, and Philip Rufe  
and Caryn Charter, Office  
of Research Development**  
*Preventing Bacterial  
Transmission from Privacy  
Curtains*  
**University of Michigan  
(MEDC)**  
**\$11,719**

**Gerald "Skip" Lawver,  
Center for Regional and  
National Security**  
*DoD Information Assurance  
Scholarship Program for 2012-  
2013 Academic Year*  
**Department of Defense**  
**\$96,105**

**Bradley Wilkerson, Center  
for Regional and National  
Security**  
*Information Assurance  
High School Cyber-Security  
Competition*  
**National Security Agency**  
**\$20,000**

## **UNIVERSITY MARKETING AND COMMUNICATIONS**

### **WEMU Radio**

**Mary Motherwell**  
*WEMU Community  
Service Grant*  
**Corporation for Public  
Broadcasting**  
**\$172,641**





**Office of Research Development**

Phone: 734.487.3090

Fax: 734.481.0650

[emich.edu/ord](http://emich.edu/ord)