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**ST. CLOUD
STATE TEACHERS
COLLEGE**

Graduate Bulletin

1955 - 1956

ST. CLOUD, MINNESOTA

ST. CLOUD
STATE TEACHERS COLLEGE

Graduate Bulletin

Volume XI

January 1955

Number 2

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Calendar for Graduate Students

1955-1956

Summer Sessions

1955

Registration, First Session	Monday, June 13, 1955
Class Work Begins	Tuesday, June 14, 1955
Session Ends	Friday, July 15, 1955
Registration, Second Session	Saturday, July 16, 1955
Class Work Begins	Monday, July 18, 1955
Session Ends	Friday, August 19, 1955

Fall Quarter

Registration	Tuesday, September 13, 1955
Class Work Begins	1:10 P.M. Tuesday, September 13, 1955
Thanksgiving Vacation Begins	Noon, Wednesday, November 23, 1955
Class Work Resumed	Monday, November 28, 1955
Quarter Ends	Saturday, December 3, 1955

Winter Quarter

Registration	Monday, December 5, 1955
Class Work Begins	Tuesday, December 6, 1955
Christmas Vacation Begins	Noon, Saturday, December 17, 1955
Class Work Resumed	Tuesday, January 3, 1956
Quarter Ends	Saturday, March 3, 1956

Spring Quarter

Registration	Monday, March 5, 1956
Class Work Begins	Tuesday, March 6, 1956
Easter Vacation Begins	3:00 P.M., Wednesday, March 28, 1956
Class Work Resumed	Wednesday, April 4, 1956
Quarter Ends	Saturday, June 2, 1956

Summer Sessions

1956

Registration, First Session	Monday, June 11, 1956
Class Work Begins	Tuesday, June 12, 1956
Session Ends	Friday, July 13, 1956
Registration, Second Session	Saturday, July 14, 1956
Class Work Begins	Monday, July 16, 1956
Session Ends	Friday, August 17, 1956

Administrative Organization for Graduate Study

State Teachers College Board

Mr. Howard Williams, President	Mankato
Mr. Dean Schweickhard, ex officio, Secretary	St. Paul
Mrs. Myrtle Bjorkland	Hopkins
Miss Helen M. Conway	St. Paul
Mr. T. Dexter Duggan	Bemidji
Mr. J. John Halverson	Albert Lea
Mr. Wilbur W. Holes	St. Cloud
Mr. S. J. Kryzsko	Winona
Mr. Oscar B. Rusness	Moorhead

Administrative Staff

George F. Budd	President
Herbert A. Clugston	Dean of Academic Administration
Mary Lilleskov	Registrar
Marvin E. Holmgren	Coordinator of Graduate Studies
Robert Zumwinkle	Director of Student Personnel Services

Graduate Council

Rowland C. Anderson	Division of Mathematics and Science
Rachel Graves Bodoh ..	Division of Education, Philosophy and Psychology
George F. Budd, Ex-officio	President
Herbert A. Clugston	Dean of Academic Administration
James G. Harris	Division of Social Studies
Marvin E. Holmgren	Coordinator of Graduate Studies

Instructional Divisions

Arts and Music	Mr. Larson, Chairman
Business	Mr. Daggett, Chairman
Education, Philosophy and Psychology	Mr. Slobetz, Chairman
Health and Physical Education	Mr. Brainard, Chairman
Languages and Literature	Mr. Barnhart, Chairman
Mathematics and Science	Mr. Bemis, Chairman
Social Studies	Mr. Lohrman, Chairman

Graduate Faculty

Anderson, Rowland, C., Ed.D., Columbia University
Archer, Fred C., Ph.D., School of Education, New York University
Balcer, Charles, Ph.D., State University of Iowa
Banta, Josephine, Ph.D., University of Michigan
Barker, S. Hugh, Ph.D., University of Wisconsin
Barnhart, T. A., Ph.D., Ohio State University
Bemis, C. O., M.A., Columbia University
Bodoh, Rachel G., Ed.D. Colorado State College of Education
Brainard, A. F., Ed.D., New York University
Cates, Edwin H., Ph.D., State University of Iowa
Clugston, Herbert A., Ph.D., University of Colorado
Cotton, William J., Ed.D., Teachers College, Columbia University
Daggett, Clair E., Ph.D., State University of Iowa
Dillingham, Orval, M.F.A., University of Minnesota
Edelfelt, Roy, Ed.D., Teachers College, Columbia University
Folkerts, Carl J., Ph.D., State University of Iowa
Gilbert, Floyd O., Ed.D., University of North Dakota
Harris, James G., Ph.D., University of Missouri
Holmgren, Marvin E., Ph.D., University of Minnesota
Larson, Raymond H., Ph.D., University of Minnesota
Lohmann, Victor L., Ed.D., University of Missouri
Lohrman, H. P., Ph.D., Ohio State University
Marvel, Lorene, M. Mus., MacPhail's School of Music
Mentzer, Loren W., Ph.D., University of Nebraska
Mitchell, Richard S., Ed.D., Teachers College, Columbia University
Morse, Marjorie J., Ph.D., University of Wisconsin
Nelson, Arthur F., Ph.D., State University of Iowa
Partch, Max L., Ph.D., University of Wisconsin
Perry, Floyd, Ed.D., Colorado State College of Education
Riggs, Ronald G., Ed.D., University of North Dakota
Skewes, George J., Ph.D., University of Wisconsin
Slobetz, Frank B., Ed.D., University of Missouri
Smith, Lewis C., Ph.D., State University of Iowa
Stoney, William S., Ph.D., State University of Iowa
VanNostrand, M. E., Ph.D., Boston University
Waugh, Harvey R., M.A., State University of Iowa
Warmhoudt, Arthur, Ph.D., State University of Iowa
Woronoff, Israel, Ph.D., University of Michigan
Yates, J. W., Ed.D., University of Missouri
Zumwinkle, Robert G., Ph.D., University of Minnesota

General Information

History

St. Cloud State Teachers College was established in September, 1869, as the Third State Normal School. In 1894 the name was changed to the St. Cloud State Normal School. Until 1898 the St. Cloud State Normal School was essentially a secondary school, with a few students of college grade after 1894. From 1898 to 1912, the St. Cloud State Normal School was a four-year high school plus two years of college. During World War I, the high school classes were gradually eliminated, and until 1925 the school operated primarily as a two-year college. The name of the institution was changed in 1921 to St. Cloud State Teachers College.

The year 1926-27 marks the beginning of a new era in the history of the college, for then the four-year course leading to a baccalaureate degree was organized. The first two degrees were conferred in 1928.

Since the close of World War II the college has undergone a period of tremendous expansion, both in enrollment and in curricular offering. A liberal arts program was introduced in 1946, and in 1948 certain pre-professional programs were added. In spite of these additions, the college has continued to be primarily a teacher-preparing institution. Through revision of the teacher-education curricula and the addition of the psycho-educational clinic, extension classes and graduate study, the college has sought constantly to improve its services to teachers during both their initial preparation and their in-service professional growth.

Location

The campus is situated in the southeastern residential section of St. Cloud, Minnesota. The main campus has a beautiful location overlooking the Mississippi River. The city of St. Cloud, with a population of some 28,000 is located about 70 miles northwest of the Twin Cities.

Accreditation

St. Cloud State Teachers College is a member of the North Central Association of Colleges and Secondary Schools, the American Association of Colleges for Teacher Education, and the American Council on Education.

Veterans' Benefits

Veterans' benefits are available to graduate students who are veterans of either World War II or the Korean War.

Those who seek benefits under the provisions of P.L. 346 must apply for graduate work within 30 days of the receipt of the bachelor's degree. Veterans who teach during the regular year can qualify for veterans' benefits by enrolling during summer sessions.

Veterans of the Korean War may use the educational benefits provided by either P.L. 550, for the regular veteran, or P.L. 894, for the veteran who qualifies for disability benefits.

Application for veterans' benefits should be made at either the nearest veterans' office or with the Dean of Men at this college.

Housing for married veterans is available at a low rental rate. Application forms can be obtained by writing to the Dean of Men.

Part-Time Employment

There are many opportunities for students who desire part-time employment. A limited number of these are available on campus. The offices of the Dean of Men and the Dean of Women will assist graduate students who need part-time employment.

Graduate students who carry the full academic load should not plan to devote much time to part-time employment. In cases where it is necessary to devote considerable time to part-time employment, the student's academic load will be reduced accordingly.

Living Accomodations

The college operates four modern residence halls for women and one, for men. Application for rooms, with an accompanying deposit of \$5.00, should be addressed to the Dean of Women or the Dean of Men. Additional information about the college-operated residence halls can be obtained by consulting the general college catalog or by directing correspondence to the appropriate Dean.

Many college-approved homes located near the campus provide accommodations for living quarters or rooms equipped for light housekeeping.

The college provides forty-eight housing units for married veterans. The date of application and number of dependents will also be considered in making assignments.

Requests for application forms for housing units should be directed to the office of the Dean of Men.

Health Service

Graduate students enjoy the same Health Service privileges as the undergraduate students. Preventive and remedial health services are provided. These services include physical examinations, communicable disease control measures, some laboratory services, consultation concerning individual health problems, some hospital and medical care, and health education.

Placement Service

The college operates a Placement Service which assists superintendents and school boards in obtaining accurate information concerning the character, personality, preparation and experience of students and graduates of the St. Cloud State Teachers College. Information that is collected is kept on file permanently.

Placement services are available to graduate students after they have completed twenty quarter hours of graduate work in residence at this college. This restriction does not apply to those students who have qualified for placement service as undergraduates of the college.

Whenever possible, the Placement Service informs eligible students about openings. It submits in confidence to employing officials and to other institutional placement bureaus any data which it possesses concerning candidates, and it assists graduate students in obtaining positions.

Co-curricular Activities

In general, graduate students are invited to participate in undergraduate activities (including orchestra, band and vocal music groups) which do not involve intercollegiate competition.

The college has an Intramural Athletic Department that offers all students opportunities to participate in recreational activities of an athletic nature.

The artists course brings to the campus a variety of entertainment furnished by nationally recognized artists representing music, dance, drama and lecture. There is usually one such evening program each month throughout the year. The activity ticket admits graduate students to these programs.

Opportunities for participation in student activities cover a large area of interests. Graduate students are urged to maintain a well-balanced co-curricular program to supplement their academic endeavors.

Graduate Study at St. Cloud State Teachers College

History

In recent years the college has had an increasing number of requests for opportunities to continue professional study beyond the baccalaureate degree. In 1953 the Minnesota State Legislature authorized the state's teachers colleges to offer the fifth year of work in teacher education leading to an appropriate graduate degree. As a result, a program of graduate study leading to the degree of Master of Science in Education was inaugurated at St. Cloud State Teachers College during the summer of 1953.

General Purposes

The program of graduate studies is adapted to the increased maturity, the richer background, the stronger professional motivation, and the greater range of intellectual interests which characterize post-baccalaureate students who are accepted as candidates for the advanced degree at this college. The program is planned cooperatively by learner and teacher and is rooted in the important aspects of study which find focus in the recognition and definition of a problem, gathering of data, and interpretation and application of the learnings secured.

Emphasis is placed on directed reading, techniques of primary investigation, independent and constructive thinking. High standards of performance in the ability to organize and evaluate evidence and defend conclusions are required.

The purposes of graduate study at this college are:

- a. To develop to the optimum degree the professional ability of teachers who show promise of becoming superior professional workers. The program is designed to meet the needs of those who wish to continue preparation in the field of teaching by extending and augmenting their professional and cultural understandings and skills.
- b. To provide for the concentrated study of the more strictly professional phases of preparation for teaching for students whose undergraduate study did not provide for those phases.
- c. To develop appreciations, attitudes, and understandings characteristic of educated persons.
- d. To provide some preparation and experience in educational research to the end that sensitivity to change and an attitude of intelligent inquiry may be fostered.

General Fields of Concentration

The graduate program provides advanced preparation in the following general service fields:

1. Elementary school teaching
2. Elementary school administration
3. Secondary school teaching

The Teaching Fields

Since one of the primary purposes of the graduate program at this college is to broaden the student's preparation for work in education, a limit is placed on the maximum credit that can be taken in the student's chosen field. Because of this limit and also because it is intended that the program of each student will be patterned to fit his needs, the use of the term "major" has been conscientiously avoided. Instead, the term "Teaching Field" is used as the label for the area in which the student chooses to specialize within the limits of the 9-21 quarter hour regulation.

The following teaching fields have been approved for offering the maximum of 21 quarter hours:

- a. Business Education
- b. Elementary
- c. English
- d. History
- e. Industrial Arts
- f. Science
- g. Social Science

The following teaching fields have been approved for offering the minimum of 9 quarter hours:

- a. Fine Arts
- b. Mathematics Education
- c. Music
- d. Physical Education
- e. Speech

Independent Study

The ability to locate, interpret, evaluate and apply the results of research is desirable for all students. The candidate for the Master's

degree must present evidence of his ability to attack specific educational problems and to draw valid and relevant conclusions from the data that have been assembled. These objectives will be achieved by one of the following:

1. A minimum of two research papers prepared in connection with graduate courses.
2. A thesis for which a maximum of three quarter hours of graduate credit will be granted.

In either case, the evidence of independent study must be filed with the Graduate Council not less than two weeks before completion of the work for the Master's degree. Only the original copies of the research papers or thesis will be accepted by the Graduate Council.

One of the research papers must be prepared in connection with a course taken in the Teaching Field and the other, in connection with one of the Professional Educational courses. Each of these papers must have been approved by the course instructor for submission to the Graduate Council. During the quarter that a course is taken the student must inform the instructor that he intends to prepare a research paper in connection with that course.

No credit other than that granted for the course is allowed for research papers.

Plans for the thesis, as well as its final draft, must be approved by the Graduate Council.

Fees

FALL, WINTER AND SPRING QUARTERS

Tuition fees for residents per quarter . . .	
6 credits or less	\$23.00
More than 6 credits	46.00
Tuition fees for non-residents per quarter	
6 credits or less	55.00
More than 6 credits	110.00
Student Activity fee	
6 credits or less	None
More than 6 credits	10.00
Deposit fee (paid only in initial quarter)	3.00

SUMMER SESSIONS

Tuition fees for residents and non-residents per session	
4 credits or less	\$35.00
More than 4 credits	45.00

Student activity fee	
4 credits or less	None
More than 4 credits	5.00
Deposit fee (paid only in initial session)	3.00

A charge of three dollars will be levied against each student who pays class fees later than the first day of classes for each quarter as designated in the college calendar.

The Summer Session

This college offers opportunities for graduate work to teachers in service who are interested in continuing their education. Although the number of regular-year students who attend the summer sessions is increasing, most of the summer session students are teachers in service. Credits earned during summer sessions may be applied toward the fulfillment of requirements for the Master's degree in the same manner, and subject to the same regulations, as credits earned during the academic year.

The normal student load is eight quarter hours per summer session.

The Summer Session Bulletin contains the course schedules, the cost of attendance, information about special features and other information of interest to those who wish to spend a profitable summer in a pleasant atmosphere. Copies of the bulletin may be obtained by writing to the Registrar of the college.

Evening and Saturday Classes

St. Cloud State Teachers College offers a number of graduate courses on campus during evenings and Saturday forenoons during the regular school year. These courses may be used to satisfy Master's degree requirements. For additional information about these courses, write to the Coordinator of Graduate Studies.

Library Facilities

The new library building, the David L. Kiehle Library, is a masterpiece of planning to provide the best possible combination of beauty, comfort and utility. In addition to reserve and reference reading rooms, it includes a curriculum laboratory, conference rooms, library science classrooms, a recreational reading room, independent study rooms and a large listening room. The Audio-Visual Center, which is located in the library building, includes two classrooms with complete audio-visual facilities, central offices, a photographic dark room, and three individual listening booths.

The floor plans of the David L. Kiehle Library emphasize easy access to the book shelves instead of the traditional separation of book stacks from reading rooms. Library holdings consist of approximately 80,000 volumes. Almost 500 periodicals are currently received. In all aspects the keynote is professional service.

Admission to Graduate Study

Students seeking admission to graduate study must complete the application form and submit it to the Coordinator of Graduate Studies. Complete official transcripts of undergraduate work will be required upon entrance. Graduate credits earned at other institutions will be accepted only when supported by complete official transcripts that indicate that the credits were earned at the graduate level. All transcripts must be sent directly from the college where the credits were earned.

An applicant will be granted unconditional admission to graduate study:

1. If he holds a baccalaureate degree from a college or university accredited by the American Association of Colleges for Teacher Education, or the appropriate regional accrediting agency, or from a college recognized by the state university of the state in which the college or university is located, and
2. If his application is approved by the Coordinator of Graduate Studies in accordance with the regulations of the Graduate Council.

An applicant will be granted conditional admission to graduate study under certain conditions. Among these conditions are the following:

1. The student holds a baccalaureate degree from an unaccredited college.
2. The student has not submitted all of the required admissions information and the supporting transcripts.
3. The student has twelve quarter hours or less to complete for graduation with the bachelor's degree in education.

Upon completion of fifteen quarter hours of satisfactory graduate work or when the deficiency has been removed, the student will be admitted unconditionally.

Admission to graduate study does not guarantee candidacy for the master's degree. A student may take graduate courses without intending to qualify for the master's degree. In any case where the student is taking courses for graduate credit, the regulations governing graduate study in this college apply.

Requirements for the Degree

In order to be awarded the degree of Master of Science in Education the candidate must have met the following requirements:

1. He must have earned a minimum of 45 quarter hours of creditable graduate work of which at least one half must

have been earned in courses taught by faculty members having earned doctorates.

- a. He must have earned at least 9 quarter hours but not more than 21 quarter hours in his Teaching Field.
 - b. He must have earned a minimum of 9 quarter hours in Professional Education. (See Required Professional Core.)
 - c. He must have earned a minimum of 9 quarter hours in General Studies which includes Introduction to Research (Communication 500) 2 credits. Courses taken in General Studies must be taken in areas other than that of the Teaching Field and Professional Education.
2. He must have satisfactorily completed the requirements for independent study.
 3. He must have made application for graduation at the beginning of the quarter or session during which he expects to complete the work for the Master's degree.
 4. He must have participated satisfactorily in the final evaluation conference.

Required Professional Core

All candidates must take three of the following courses:

1. Advanced Educational Psychology (Psychology 563) 3 credits
2. Curriculum Improvement (Education 566) 3 credits
3. Human Relations (Education 567) 3 credits
4. Problems in American Education (Philosophy 559) 3 credits

Credits Transferable

St. Cloud State Teachers College will allow the transfer of 9 quarter hours of graduate work satisfactorily completed at other accredited colleges or universities and / or extension credit earned at this college.

Graduate courses in which a grade of "C" or lower was earned will not be accepted in transfer.

Graduate credit will not be allowed for credits earned through correspondence study.

Transfer credit at the graduate level will be allowed only on the basis of work taken at institutions qualified to give graduate work at the time the credit is earned.

Appointment of Adviser

After the application for admission has been acted upon by the Coordinator of Graduate Studies, the applicant will be referred to the appropriate Division or Department Chairman for the appointment of an adviser. Insofar as possible the student's choice of adviser will be considered.

The adviser will help the student formulate a plan of study leading toward the accomplishment of the student's objectives in pursuing graduate study.

Registration

Graduate students are expected to register during the regular registration period at the beginning of each quarter or summer session (see calendar).

Registration will not be permitted after (1) the second week of the quarter or (2) the first week of the summer session.

Arrangements for registration are made through the office of the Coordinator of Graduate Studies.

Course Load

The normal student load per quarter is fifteen quarter hours for the regular year and eight quarter hours for each summer session. Teachers who enroll in on-campus graduate courses while carrying a full-time teaching load are permitted to enroll for no more than six quarter hours; the maximum load for those who enroll in off-campus graduate courses is four quarter hours.

Course Numbering System

Courses numbered 500-599 inclusive are courses that may be included in graduate programs. Some of these courses carry a double number. Advanced undergraduate students as well as graduate students may enroll in such courses. Courses that carry only a 500 number are for graduate students only.

Only 500 level courses will be accepted for graduate credit.

Marks

The following marks are used in reporting the caliber of graduate work: A (excellent), B (good), C (acceptable) and D (unsatisfactory).

Students who withdraw officially from a class previous to the mid-term period will be reported "withdrawn" (W). After the mid-term period

students who withdraw and are doing satisfactory work will be reported "withdrawn satisfactory" (WS); students whose work is failing at the time of official withdrawal from class will be reported "withdrawn unsatisfactory" (WU), provided the withdrawal occurs prior to the expiration of two-thirds of the class meetings. After that time a mark of "D" will be recorded.

Courses not completed during the regularly scheduled period will be recorded as "Incomplete." Such "Incomplete" must be removed by students within a year in order to receive credit for the course.

The caliber of research papers that are to be submitted to the Graduate Council will be reflected in the course mark. However, in some cases, because of the nature of the problem, it will not be possible to complete the paper before marks are submitted for the course. In such cases, tentative marks will be given to indicate that the paper is in progress.

Tentative marks will be indicated by adding a "T" to the regular mark. For example, if the student has earned a "B" in a course in which a paper is in progress, a tentative mark of "T-B" will be submitted.

When the paper has been completed and accepted, the tentative mark will be changed to a permanent mark. Tentative marks must be changed to a permanent mark within one year. If the paper is not submitted within that period of time, the instructor will submit a permanent mark based on what the student accomplished in the course. After a course has been completed, the student forfeits his right to prepare a research paper for that course, unless he is able to obtain the permission of the instructor.

Standard of Scholarship

Candidates for the degree must maintain a "B" average. Courses in which a mark below "C" was earned will not be accepted for graduate credit.

The Graduate Council may refuse further registration on the basis of unsatisfactory scholarship.

Auditors

Auditors may enroll for courses by securing the permission of the instructor of the course and the Coordinator of Graduate Studies. Auditors pay the regular fees.

Auditors are not permitted to take the course examinations nor will they be given credit for the courses audited.

The Master's Degree

Name of Degree

The satisfactory completion of a graduate study program at St. Cloud State Teachers College culminates in the conferring of the degree of Master of Science in Education. This is the only graduate degree that is awarded by the college at the present time.

Admission to Candidacy for the Master's Degree

A student who wishes to secure the degree of Master of Science in Education must file an application for admission to candidacy with the Coordinator of Graduate Studies. Application forms, to be filled out in duplicate, can be obtained at the Graduate Studies Office. This application should ordinarily be made after 16 quarter hours of graduate work have been satisfactorily completed. All deficiencies must be removed before admission to candidacy for the degree will be granted. In addition, prior to admission to candidacy for the degree, a student must have met the undergraduate requirements of the college on the level (elementary or secondary education) at which he expects to do his graduate work.

The qualifying conference for candidacy will be conducted by the Graduate Council and the applicant's adviser. If the applicant intends to satisfy the independent study requirement by preparing a thesis, the plans for the thesis must be submitted, for Graduate Council action, at the time of the qualifying conference.

Admission to candidacy will be contingent on evidence of personal and professional fitness and preparation for the Master's degree as well as on demonstrated ability to do satisfactory and creditable work at the graduate level. The following factors will be considered by the Graduate Council in determining each student's qualification for candidacy for the degree:

1. The student's undergraduate record.
2. The record of the student's work in graduate courses given by this college.
3. The student's work in graduate courses given by other institutions as recorded in official transcripts.
4. A general college aptitude test at the graduate level.
5. A standardized English test.
6. A teacher attitude inventory.
7. A personality inventory.
8. A speech test.
9. An evaluation conference.
10. The recommendation of the adviser.

The Graduate Council may deny admission to candidacy, or may refuse further registration, on the basis of unsatisfactory scholarship or

other evidences of unfitness for teaching. In cases where the Graduate Council is in doubt concerning the student's qualifications, it may make recommendations for the correction or removal of weaknesses. In such cases, acceptance for candidacy will be delayed until satisfactory evidence of the student's qualifications has been submitted to the Council.

Time Limit

All credits used in meeting requirements for the degree of Master of Science in Education must be earned within seven years of the awarding of the degree.

Teaching Experience

Some experience in teaching before the awarding of the degree is regarded as being highly desirable.

Application for Graduation

Candidates for the Master's degree must file an application for graduation with the Coordinator of Graduate Studies at the beginning of the quarter or session during which he plans to complete work for the degree. This application must be approved by the adviser.

Final Evaluation Conference

Each candidate for the Master's degree is required to participate in an evaluation conference during the final quarter or session of his graduate program. The graduate faculty is represented at this conference by no less than five members, including the student's adviser (s). The faculty representatives other than the adviser (s) are appointed by the Graduate Council. Graduate faculty members are appointed from each of the three fields in the student's graduate program. The Graduate Council is also represented at this conference. Other interested faculty members are encouraged to attend.

The final evaluation conference has the following purposes:

- a. provide an additional basis for determining the candidate's qualifications for the Master's degree;
- b. help the student synthesize his graduate study experience;
- c. continue the process of educating the student in his professional rights and obligations;
- d. aid the student in making plans for his future professional growth and service; and
- e. discover problem points in the graduate program that need continued study and improvement.

Conferring of Degrees

Degrees are conferred at the commencement exercises at the close of each quarter. Each candidate is required to be present unless excused by the Dean of Academic Administration. Permission to graduate in absentia is granted only in exceptional cases.

Summary of Requirements for the Master's Degree

Procedure	Under Direction of	Date
File application for admission to graduate study, together with the necessary official transcripts of college work	Coordinator of Graduate Studies	Prior to enrollment; at earliest convenience
Appointment of Adviser	Division Chairman	Prior to enrollment
Registration	Adviser	See Calendar
Take qualifying test battery	Director, Psycho-Educational Clinic	During first quarter
Take speech test	Member, Speech Department	During first quarter
File application for candidacy for Master's degree	Adviser, Division Chairman, Coordinator of Graduate Studies	After completion of 16 quarter hours of graduate work at this college
Qualifying conference for candidacy	Graduate Council and Adviser	During second quarter
Acceptance of candidacy for the Master's degree	Graduate Council	During second quarter of graduate work
Application for graduation submitted to Coordinator of Graduate Studies	Adviser	At beginning of last quarter or session
Final Evaluation Conference	Graduate Faculty Committee	During final quarter or session
Submit either (1) thesis or (2) two research papers to Graduate Council	Instructor and Adviser	Not later than two weeks before graduation

DESCRIPTIONS OF COURSES

Division of Arts and Music

FINE ARTS

Courses for Advanced Undergraduate and Graduate Students

- 531 **History of Art.** Survey of the arts from the caveman to the present day.
Four credits. Dillingham
- 532 **Modern Art.** Study of contemporary architecture, painting and sculpture and the movements leading to them.
Four credits. Dillingham
- 538 **Great Masters of Painting.** Several artists of different periods and countries. Growth of each from early drawings to their mature style.
Four credits. Dillingham
- 539 **Art in the U.S.** Study of painting, sculpture, architecture and design in general from Colonial times to the present. Special emphasis will be given local, Minnesota and Mid-West Art and their particular problems. Prerequisite: permission of instructor.
Four credits. Dillingham

Courses for Graduate Students Only

- 544 **Advanced Studio Work.** Special problems in any of the following: oil painting, water color painting, sculpture, design or commercial art. Prerequisite: Art 232 and Art 234 or equivalent.
Four credits. Dillingham
- 564 **Design Laboratory.** Creative experimentation in many materials and critical analysis of result. Prerequisite: Art 232 and Art 234 or equivalent.
Four credits. Dillingham
- 599 **Thesis in Art**
One to three credits. Staff

INDUSTIAL ARTS

Courses for Advanced Undergraduate and Graduate Students

- 517 **Organization and Administration of Industrial Education.** A course designed to impart understandings of the organization and administration of the all-day, part-time and evening industrial programs.
Three credits. Larson
- 531 **Evaluation in Industrial Subjects.** Analysis of factors to be evaluated; instruments of measurement to be studied; and techniques of their use.
Two credits. Larson
- 551 **Selection and Organization of Subject Matter.** Technique of trade and job analysis, selection of teaching content, and the organization of content into instruction sheets and course material.
Three credits. Larson

Courses for Graduate Students Only

- 500 Special Problems.** Specific problems in industrial education. Also a service course for students who wish to study industrial problems as they relate to other fields. Permission of Instructor.
Two to six credits. Larson
- 505 Handicrafts Seminar.** A course approached both as a shop subject and a recreational activity. Activities based upon student demonstration and reports and permitting experimentation with new media.
Two credits. Larson
- 510 Seminar in Industrial Education.** Group exploration of topics bearing on Industrial Education. (Example—Evolution of psychologies of learning as they relate to Industrial Education).
Two credits. Larson
- 530 Improvement of Instruction in Shop Subjects.** Investigation of specific shop problems; improvement of individual skills and knowledges; opportunity for experimentation; and the setting up of new shop areas.
Two to six credits. Larson
- 568 Current Literature and Research.** Analysis of the literature of the industrial field with special attention to individual readings and reports; the implications of such literature on current problems in Industrial Education.
Four credits. Larson
- 573 Leaders and Movements in Industrial Education.** Contributors to the development of industrial education with special attention to the economic, social and philosophical factors motivating this development.
Four credits. Larson
- 599 Thesis in Industrial Education.** Independent study employing scientific methods and procedures in the solution of problems relating to industrial education.
Three credits. Staff

MUSIC

Course for Advanced Undergraduate and Graduate Students

- 554 Stringed Instrument Seminar.** Special projects in study of stringed instruments, including study of special techniques of bowing, position work and artistic skills. Survey of solo materials.
Two credits. Waugh

Courses for Graduate Students Only

- 520 Analytical Technique.** Harmonic, melodic and structural analysis of music in various periods with emphasis on aspects specifically needed by the students.
Four credits, Waugh, Stoney
- 531 Choral Arranging.** Principles and devices in choral arranging for choruses of all types and degrees of development.
Three credits. Stoney, Waugh
- 542 Choral Literature.** A study of choral literature from Palestrina to the present day with special attention to the greater works in Oratorio, Operatic, Choral, Symphonic, and Mass form.
Two credits. Waugh

550 Music for the Classroom Teacher. Advanced methods in the teaching of Public School music through the first six grades which includes Unit study in connection with music, aids to the elementary teacher in her music integration, special projects in music in the classroom. The purpose of this course is to provide the advanced student or the experienced teacher with a survey of current materials, and to offer a comparison of teaching methods.

Four credits.

Marvel

553 Music Education Seminar. Research and discussion of the latest developments in the field of Music Education. Individual problems analyzed and discussed.

Two credits.

Marvel, Waugh

599 Thesis in Music

One to three credits.

Staff

Division of Business

Courses for Advanced Undergraduate and Graduate Students

- 513 **Office Management.** A course dealing with the problems involved in planning and directing the functions of business or professional offices, the executive duties and responsibilities of the office manager and the private secretary, and the supervision of employees.
Four credits. Archer
- 523 **Salesmanship.** A study of the salesman, merchandise, customers, and the sale. Practical illustrations and demonstrations.
Two credits. Daggett
- 546 **Consumer Education.** A general education course open to all graduate students, dealing with some of the more perplexing problems of personal banking, wise consumption, buying on credit, borrowing money, making investments, buying insurance, home ownership, household records, taxes and wills.
Four credits. Archer
- 568 **Personal Income Tax Accounting.** A course providing training in the preparation of personal income tax returns, both State and Federal. Not open to accounting majors.
Three credits. Daggett

Courses for Graduate Students Only

- 580 **Foundations of Business Education I: Backgrounds of Business Education.** An integrated study of basic principles, philosophy, and curriculum development in business education.
Three credits. Archer
- 581 **Foundations of Business Education II: An Evaluation of Current Literature in Business Education.** Provides a comprehensive knowledge of professional and business literature and furnishes guidance in evaluation and application of contemporary writings.
Three credits. Archer
- 587 **Improvement of Instruction in Business Subjects.** A study of methods and materials for raising the level of business-teacher preparation and to meet the need for effective in-service education. Prerequisite: Business teaching experience.
Four credits. Archer
- 599 **Thesis in Business Education.**
One to three credits. Staff

Division of Education, Philosophy, Psychology

EDUCATION

Courses for Advanced Undergraduate and Graduate Students

- 500 Reading and Conference. Individual readings and conferences with staff members. Subject matter to be determined by the student's needs. Hours to be arranged.
Credits arranged. Staff
- 515 The Teaching of Reading in the Primary Grades. Methods and materials for first three grades. Reading readiness, ways of determining readiness for reading and planning a program of readiness activities for children not yet ready for reading. The teaching plan of the various reading programs on the market to be studied carefully through the use of teacher's manuals. Four credits. Bodoh, Perry
- 516 The Teaching of Reading in the Intermediate Grades. Special emphasis on work-type reading, adjusting the reading program to individual differences, word attack skills including the dictionary, and grouping in the intermediate grades. An independent reading program for information and pleasure. Four credits. Bodoh
- 517 Developmental Reading in the Junior and Senior High School. The nature of the high school reading program; the development of reading techniques and skills; development of vocabulary, reading interests, and reading ability in the content fields; appraisal of reading abilities; and diagnosis and remediation. Four credits. Bodoh, Lohmann
- 519 Administration and Supervision of the Reading Program. Emphasis on implementation and improvement of the reading program from pre-reading through corrective procedures in high school. Four credits. Bodoh
- 521 The Analysis and Correction of Reading Disabilities. Causes of reading difficulties, procedures used to diagnose and to correct them. The relationship of the following factors to reading disabilities will be considered: vision, hearing, speech, intelligence, preference, health, readiness, home environment and school environment. Prerequisite: Psychology 262 and Education 250 or equivalent. Four credits. Lohmann
- 523 Practice in the Analysis of Reading Disabilities. Clinical experiences in the administration and interpretation of various techniques available in diagnosing reading disabilities. Opportunity to determine the causes of disabilities found in cases sent to the Psycho-Educational Clinic and to prescribe needed remediation. Prerequisite: Education 421-521. Four credits. Lohmann
- 525 Practice in the Correction of Reading Disabilities. Clinical experiences in the correction of reading disabilities of cases diagnosed by the Psycho-Educational Clinic. Prerequisite: Education 421-521. Four credits. Lohmann

- 550 School Law.** Study of statutes and judicial decisions affecting public education in Minnesota and other states. Discussion of legal authority, powers, and liabilities of school personnel with respect to school finance, curriculum, property, contracts, pensions, tenure, etc.
Three credits. Gilbert, Holmgren
- 568 Audio-Visual Materials and Methods of Instruction.** Techniques of utilizing community resources, field trips, display materials, projected still pictures, motion pictures, television, sound recordings, radio, etc., in educational programs. Opportunity to learn equipment operation.
Four credits. Mitchell
- 572 School Organization and Administration.** Types of organization for elementary and secondary schools, classification and promotion of pupils; the administration of service departments; public relations; effective office plans; the elementary and secondary school principalship; teacher-pupil relationships; co-curricular activities.
Four credits. Gilbert, Holmgren
- 574 Educational Administration.** The administration of education in the United States; problems relating to the participation of the Federal government in education; organization and duties of state departments of education; major activities of boards and superintendents in local school units.
Four credits. Gilbert, Holmgren, Slobetz
- 576 Supervision and Improvement of Instruction.** A general course in supervision for students in either elementary or secondary fields; opportunities for concentrated work in various fields of emphasis.
Four credits. Edelfelt, Perry
- 578 Supervision of Student Teaching in Elementary and Secondary Schools.** A study of the principles and techniques of supervision of student teachers. Attention is given to the nature and purpose of student teaching in the professional curriculum and procedures for guiding the student in planning and evaluating learning activities. Prerequisite: two years successful teaching experience.
Four credits. Cotton, Edelfelt
- 595 Workshop in Elementary Education.** Specific teaching problems of experienced teachers; intensive study under direction of workshop staff who give personal guidance, suggest methods, references, and resources. Prerequisite: Teaching experience and permission of workshop staff.
Four to eight credits. Staff

Courses for Graduate Students Only

- 566 Curriculum Improvement.** Procedures and programs of curriculum improvement with emphasis on curriculum change as social process; factors involved in leadership in curriculum development; problems of production and utilization of curriculum documents; emphasis on role of action research in curriculum improvement. Prerequisite: Education 366 or equivalent.
Three credits. Cotton, Edelfelt
- 567 Human Relations.** Study of techniques and the practice of group interaction in problematic human relations situations. Case analysis; group discussion; sociodrama and role-playing; action research-community and school projects.
Three credits. Edelfelt
- 570 Workshop in Audio-Visual Materials and Methods of Instruction.** Opportunity for experienced teachers and administrators to study questions and problems about instructional materials and methods that are of mutual

interest. Activities to be based on needs of workshop members.

Four credits.

Mitchell

- 580 Statistical Methods in Education.** Basic statistics for workers in Education. Advanced study of measures of central tendency, measures of dispersion, and correlation theory; introductory study of sampling problems and tests of significance.

Three credits.

Holmgren

- 599 Thesis in Education.**

One to three credits.

Staff

PHILOSOPHY

Course for Graduate Students Only

- 559 Problems in American Education.** Emphasis on the most general of the issues arising in our American educational situation. Organizing principle of education in a democracy; the school and the state; education and social reconstruction; public schools and religious education; academic freedom; teaching controversial issues.

Three credits.

Clugston, Gilbert

PSYCHOLOGY

Courses for Advanced Undergraduate and Graduate Students

- 564 Principles and Procedures in Guidance I.** Philosophy of guidance, individual appraisal, counseling services, informational services, placement organization, group guidance activities, staff service and contributions, and program organization and administration. Prerequisite: Education 345.

Three credits.

Yates, Zumwinkle

- 565 Principles and Procedures in Guidance II.** Methods of achieving guidance program objectives; laboratory experiences and case studies. Prerequisite: Psychology 464.

Three credits.

Yates, Zumwinkle

- 571 Mental Hygiene.** A study of the characteristics of wholesome personality; reading, discussion, and observations to train the prospective teacher in methods and aims of mental hygiene; emphasis on both personal development and techniques of effective adjustments in the teaching situation. Prerequisites: Psychology 121 and Psychology 262.

Three credits.

Clugston, Van Nostrand

- 575 Abnormal Psychology.** A survey of the types of functional and organic deviations of psychic activity for the purpose of understanding the normal behavior of human personality with greater clarity and precision.

Four credits.

Van Nostrand

- 581 Psychology of Elementary School Subjects.** The laws of learning as applied to the elementary school subjects with special attention to the most recent investigations and reports. Conformity of school practices and procedures with accepted or established principles. Discovery of the source and nature of pupils' difficulties in the learning of the elementary school subjects.

Four credits.

Slobetz

- 584a Senior Seminar, History of Psychology.** The great systems, experiments, and personalities in the development of modern psychology.

Two credits.

Clugston, Van Nostrand

584b Senior Seminar, Schools of Psychology. Current systems or schools of psychology with a comparative study and critical analysis of each, together with study of the contributions of outstanding persons in each of the schools.

Two credits.

Clugston, Van Nostrand

584c Senior Seminar, Psychology of Personality. A study of common human traits together with the individual factors which by their vital relationship within the individual develop the human personality; consideration of personality organization and development, interpersonal relationships, and the individual's frame and field of reference.

Two credits.

Clugston, Van Nostrand

586 Psychometric Technique Binet. The measurement of intelligence by means of the Stanford revision of the Binet-Simon technique; demonstrations, lectures, practice in administration of the tests; observation of the individual by the instructor. Admission by consent of the instructor.

Three credits.

Yates

Courses for Graduate Students Only

563 Advanced Educational Psychology. Principles of psychology of learning and experimental findings. Application to problems encountered in teaching and learning. Examination of theories of learning. Prerequisite: 15 credits of Education and 12 credits of Psychology.

Three credits.

Slobetz, Woronoff

599 Thesis in Educational Psychology.

One to three credits.

Staff

TEACHING

Course for Advanced Undergraduate and Graduate Students

579 Practicum in Supervision and Coordination. Supervised experience in the role of supervisor or consultant to elementary or secondary teachers in the special areas; open to students with majors or minors in the special areas. Parallel or prerequisite: Education 476-576.

Credits arranged.

Staff

Division of Health and Physical Education

PHYSICAL EDUCATION

Courses for Advanced Undergraduate and Graduate Students

- 511 Organization and Development of Physical Education in the Elementary School.** Principles, problems and procedures in the development of the elementary school program in physical education. Open to four year elementary graduates.
Four credits. Brainard
- 550 Curriculum in Physical Education.** Principles and methods of curriculum construction in physical education. Planning of units of work, keeping in mind the psychological, sociological, and physiological factors involved. Open only to majors and minors except by consent of instructor.
Four credits. Brainard

Courses for Graduate Students Only

- 530 Seminar in School Health Education.** Critical study of the problems confronting teachers engaged in teaching or supervising health education in the public schools.
Four credits. Brainard
- 552 Tests and Measurements in Physical Education.** Critical study of tests and measurements available in physical education; methods of constructing and evaluating new tests and measurements. Open to majors and minors.
Three credits. Brainard
- 560 Problems in Physical Education.** Consideration of special problems in physical education including facilities, equipment, space, time, cost, etc. Such consideration includes the social, physiological implications involved. Open to majors and minors in physical education.
Four credits. Brainard
- 599 Thesis in Physical Education.**
One to three credits. Staff

Division of Languages and Literature

COMMUNICATION

Course for Graduate Students Only

- 500 Introduction to Research.** Evaluating research procedures and interpreting findings. Defining and delimiting a problem, efficient gathering and proper documentation of data; organization and presentation of findings in acceptable form.
Two credits. Staff

LITERATURE

Courses for Advanced Undergraduate and Graduate Students

- 530 Chaucer.** The Canterbury Tales and other narratives in Middle English.
Four credits. Barnhart
- 534, 535, 536. World Literature.** Classics from the Classical period to the present, with special reference to the unconscious defenses which they embody.
Each three credits. Barnhart, L. Smith
- 540 Milton and Dryden.** Prose, poetry and drama of the Age of Controversy.
Four credits. L. Smith
- 547 History of Drama.** Studies in representative world drama from 900.
Four credits. Barnhart

Courses for Graduate Students Only

- 501 Literary Theory and Criticism.** Problems involving an understanding of the artist's work, his public, and his ability to create. The problem of how theoretical knowledge can be used to improve the teacher's instructional methods.
Four credits. Barnhart
- 531 Structural Linguistics.** Advanced studies of sounds, sentence structure, inflections, and vocabulary. Prerequisite: English 431 or 432.
Four credits. Barnhart
- 538 American Studies.** An investigation of American authors and their works.
Two to four credits. L. Smith
- 543 Shakespeare Studies.** Critical examination of the text and source, theories, and history of representative comedies, tragedies, and histories.
Four credits. Barnhart
- 548 Contemporary Studies.** An analysis of significant aspects of contemporary literary thought, designed to provide the student with the opportunity to explore thoroughly the works of selected writers.
Four credits. L. Smith
- 555 Individual Studies.** An intensive examination of selected writings, writers, and literary trends.
Two to six credits. Staff
- 599 Thesis.**
One to three credits. Staff

SPEECH

Courses for Advanced Undergraduate and Graduate Students

- 520 Persuasion.** A course giving added emphasis to the uses of effective extemporaneous speech together with a study of the psychological elements in the audience-speaker situation. A study of motivation, attention, suggestion, and the ways and means of winning audience response.
Three credits. Balcer
- 571 Educational Radio and Television Workshop.** Laboratory course of three quarters designed to provide actual experience in as many fields of radio and television production (non-technical) as possible. Practice in the application of broadcasting and telecasting performance techniques — writing, acting, announcing, and directing. Prerequisite: Speech 371. Three consecutive quarters required for four credits.
Four credits. Balcer
- 584 Intercollegiate Discussion and Debate.** Co-curricular study of current national debate and discussion topics. Participation in inter-squad and inter-collegiate discussion and debate tournaments. Practice in extemporaneous speaking and original oratory. Three consecutive quarters necessary for three credits. Evening class.
Three credits.

Courses for Graduate Students Only

- 521 Seminar in Public Address.** Research problems in public address.
Three credits. Balcer
- 550 Seminar in Speech Education.** Lecture, discussion and demonstration of problems in speech education.
Three credits. Balcer
- 599 Thesis.** Approved research in selective phases of speech education including the writing of an original play.
Three credits. Staff

Division of Mathematics and Science

MATHEMATICS

Courses for Advanced Undergraduate and Graduate Students

- 540 History of Mathematics.** Historical survey of mathematical development and contributions from beginning to present time. Prerequisite: Mathematics 332.
Four credits. Anderson, Bemis
- 559 Recent Trends in Arithmetic.** A course for teachers who have not had a recent course in arithmetic method, emphasizing newer teaching technique, current teaching materials, remedial procedures, and findings of recent research. Observations in the college laboratory school.
Four credits. Anderson, Bemis

Courses for Graduate Students Only

- 542 Functional Mathematics for Secondary Teachers.** Professionalized subject matter intended to broaden and deepen the teacher's knowledge of mathematics.
Four credits. Anderson, Bemis
- 544 Special Projects in Mathematics (Elementary or Secondary).** A seminar or conference course on special projects in Mathematics. Hours and credits to be arranged.
Maximum four credits. Staff
- 599 Thesis in Mathematics Education.**
One to three credits. Staff

SCIENCES

Courses for Advanced Undergraduate and Graduate Students

- 501 Major Developments in the Physical Sciences.** A general education course employing selected science experiences as a basis for explanations of the major developments in the area of physical science and their significance. Not open to students with majors or minors in physical science.
2 hrs. Discussion, 4 hrs. Lab.
Four credits. Nelson and Staff
- 502 Modern Biological Concepts.** A general education course in which modern concepts in physiology, genetics and ecology are developed through selected laboratory experiences, reading and discussion. Not open to students with majors or minors in the biological sciences. 2 hrs. Lecture and Discussion, 2 hrs. Lab.
Three credits. Barker, Mentzer, Partch
- 503 Field Study and Regional Interpretation.** A general education field course in regional interpretation involving study of glaciation and soils, vegetation and animal life, and the roles of factors in determining the potentialities of the region. Not open to students with majors or minors in the biological sciences. 1 hr. Discussion, 6 hrs. Field and Lab.
Four credits. Mentzer, Partch

- 549 **Problems of Resource Management.** Survey of conservation problems; interrelationship of resources; management of resources; agencies directly and indirectly involved; conservation literature. Prerequisite: Two years of science. 2 hrs. Disc., 4 hrs. Field and Lab.
Four credits. Mentzer

Courses for Graduate Students Only

- 510 **Science Colloquium.** Individual study and reporting of selected specific science topics.
One credit per quarter. Staff
- 599 **Science Thesis.** Individual investigation of a problem in science or science teaching.
Three credits. Staff

BIOLOGY

Courses for Advanced Undergraduate and Graduate Students

- 541 **Ecology.** The interactions of living things with their environment; field studies of deciduous forest, coniferous forest, grassland, sand plain, rock, lake, bog, and stream communities; succession; biological bases for land use planning and management; vegetation regions of the United States. Prerequisites: Biology 242 and 246. 2 hrs. Disc., 4 hrs. Field.
Four credits. Partch, Mentzer
- 542 **Embryology.** Prenatal development of the human body; laboratory emphasis on the chick and the pig. Prerequisite: Biology 242. 2 hrs. Disc., 4 hrs. Lab.
Four credits. Barker
- 545 **General Physiology.** Physiology of the cell, life processes in plants and animals, and the intergration and coordination of life processes in organisms, including man. Prerequisites: Biology 242 and 246. 2 hrs. Disc., 4 hrs. Lab.
Four credits. Barker

Course for Graduate Students Only

- 547 **Ecology Problems.** Individual study of the biological aspects of a locality aiming at a better understanding of the biological resources and problems of the community and their greater utilization in teaching. Prerequisite: Biology 441 or 541. Time to be arranged with the instructor.
Two to four credits. Partch, Mentzer

CHEMISTRY

Courses for Advanced Undergraduate and Graduate Students

- 511 **Advanced Inorganic Chemistry.** Theoretical approach to, and aspects of, inorganic chemistry. Prerequisite: Two years of Chemistry. 4 hrs. Discussion.
Four credits. Nelson
- 521 **Organic Chemistry.** Aliphatic, aromatic, and heterocyclic compounds of carbon. 3 hrs. Discussion and 4 hrs. Lab.
Five credits. Nelson

- 522 Quantitative Analysis.** Volumetric and gravimetric methods of greater complexity and finer techniques than those presented in Chem. 421; includes some instrumental analysis. Prerequisite: Chemistry 325. 2 hrs. Discussion, 4 hrs. Lab.
Four credits. Nelson
- 523 Qualitative Organic Analysis.** Identification of several single and mixed organic compounds by physical and organic qualitative methods. Prerequisite: Chemistry 322. 2 hrs. Disc., 4 hrs. Lab.
Four credits. Nelson
- 525, 526, 527 Physical Chemistry.** Application of fundamental laws and theoretical principles to gases, liquids, solids, solutions, and colloids; mass law; phase rule; electrochemical problems. Prerequisite: Chemistry 325 and Calculus. 2 hrs. Disc., 4 hrs. Lab.
Each four credits. Nelson

PROFESSIONAL EDUCATION COURSES

Courses for Advanced Undergraduate and Graduate Students

- 508 Physical Science Techniques.** Construction, repair, and calibration of laboratory instruments and demonstration devices; preparation and standardization of solutions; checking balances; simple glass blowing techniques; apparatus assembly and checking. Prerequisite: Two years of physical science. 4 hrs. Lab.
Two credits. Nelson
- 509 Biological Science Techniques.** Collection, preparation, and display of biological materials, including the making of slides and plastic mounts and some work in taxidermy; other working techniques useful to biology teachers. Prerequisite: Biology 242 and 246. 4 hrs. Lab.
Two credits. Barker
- 551 Teaching Science in Elementary Schools.** Contributions which can be made through the science area toward meeting personal and social needs during childhood; the integration of science experiences into the program of elementary education; methods, materials, books, and other teaching helps. Prerequisite: Science 324 or consent of instructor.
Three credits. Skewes
- 555 Workshop in Conservation and Conservation Education.** A wide range of experiences designed to help teachers plan and implement their teaching of conservation: curriculum planning, group work, conferences, demonstrations, lectures, field trips, and evaluation of audio-visual aids. The workshop is conducted by the Departments of Science and Social Studies.
Four credits. Mentzer and Staff

Courses for Graduate Students Only

- 504 Seminar in Elementary Science Problems.** Individual and group study of problems connected with teaching elementary science and the development of a functional science program at the elementary level; analysis and use of researches in elementary science education.
Four credits. Skewes
- 552 Workshop for Science Teachers.** Work on curricular or teaching problems in the science area by individuals or groups of teachers desiring to improve their science programs. Experiences will be varied according to the needs and problems of the registrants who will have opportunities to

utilize the services of various staff members.
Four credits.

Skewes and Staff

- 553 Problems in Teaching Junior and Senior High School Science.** Analysis of high school science courses in the light of social and personal needs and changing conditions; use of research findings in improving science instruction; survey and use of resources in science teaching; adjustment to differences in interests, aptitudes, and vocational goals; evaluation. Prerequisite: A major or minor in science.
Four credits.

Skewes

Division of Social Studies

ECONOMICS

Courses for Advanced Undergraduate and Graduate Students

- 500 **Special Problems in Economics.** A seminar or conference course for advanced students wishing to work out a special problem in economics.
Credits arranged. Folkerts
- 571 **Money and Banking.** A study of the monetary and banking system of the United States; the nature of bank credit, the operation of the individual bank and its relation to the banking system, the Federal Reserve System, central bank policy and the relationship between bank credit, money and price levels.
Four credits. Folkerts
- 573 **Labor Economics.** A study of labor as a factor of production, the growth of collective bargaining, labor legislation with their attendant effects upon society.
Four credits. Folkerts

Course for Graduate Students Only

- 599 **Thesis in Economics.**
One to three credits. Staff

GEOGRAPHY

Course for Advanced Undergraduate and Graduate Students

- 586 **Political Geography.** The geographical strength and weakness of the Great Powers which influence political changes in the world today.
Four credits. Morse

HISTORY

Courses for Advanced Undergraduate and Graduate Students

- 500 **Special Problems in History.** A seminar or conference course for advanced students wishing to work out a special problem in any area in history.
Credits arranged. Staff
- 517 **French Revolution and Napoleon.** A study of the course of a revolution and of the origin of many modern ideas and institutions.
Three credits. Harris
- 534 **Central and Eastern Europe.** A study of the breakup of the three empires: German, Austro-Hungarian, and Russian—with the consequent political, economic and social disruptions leading to World War II and the present power struggle for domination of this area.
Three credits. Morse

- 535 **History of the Far East.** A study of the westernization of China and Japan during the nineteenth century which led to their becoming participants in world affairs.
Three credits. Cates
- 536 **The Middle East.** A study of the national, religious, and geographic forces which have made this area a center of unrest and power struggle today.
Two credits. Morse
- 537 **Two World Wars, 1912-1953.** A general survey of the major events and trends comprising global history from 1912 to the present.
Four credits. Cates
- 542 **Recent American History, 1912 to Date.** A presentation of the emergence of the United States as a world power with emphasis on the interplay of domestic and foreign policies. Open to those who have not had History 141.
Four credits. Cates
- 545 **Foreign Relations of the United States, 1775-1865.** A study of American foreign policy involving fundamental principles, problems of neutral rights, the Monroe Doctrine and the influence of sectional politics on foreign affairs.
Three credits. Cates
- 546 **Foreign Relations of the United States, 1865-1912.** A study of how America emerged from a continental to a world power after the Spanish-American War.
Three credits. Cates
- 547 **Foreign Relations of the United States, 1912 to the Present.** An analysis of how the participation of the United States in two World Wars has brought it to a position of world leadership.
Three credits. Cates
- 548 **Social Forces in American History.** A study of the historical development of American thought-exact, speculative, and popular-and its interrelationship with the social environment.
Three credits. Harris
- 550 **The Liberal Movement.** An examination of the rise of liberal political thought and practice, its capitulation before conservative, fascist, and communist forces, with consideration of the prospect for liberalism in the contemporary world.
Three credits. Morse

Courses for Graduate Students Only

- 551 **Readings in American History.** A guided study of American History through individual investigation of special periods and topics.
Two credits. Harris
- 552 **Historiography.** A study of significant historians and historical theory; problems in the presentation of historical interpretation.
Two credits. Harris
- 599 **Thesis in History**
One to three credits. Staff

POLITICAL SCIENCE

Courses for Advanced Undergraduate and Graduate Students

- 500 **Special Problems in Political Science.** A seminar or conference course

for advanced students wishing to work out a special problem in political science.

Credits arranged.

Riggs

- 582 International Organization.** A study of the history and development of the community of nations, the organization and authority of the League of Nations, the United Nations and its auxiliary components.
Three credits.

Riggs

- 585 Social Legislation.** A study of federal, state, and local laws and regulations covering protective and control measures in social problems of health, safety, social insurance, child labor, advertising, pure food and drugs, old age benefits, and others.
Three credits.

Riggs

- 586 Political Parties.** An analysis of the American party system, its structure, practices, and policies as found in the caucus, convention, campaign, and election procedures.
Two credits.

Riggs

- 587 Legislative Process.** A course set up on the basis of problems connected with a democratic legislature. Typical example: the influence of committees; political party influence; pressure groups.
Two credits.

Riggs

- 589 American Political Thought.** An analysis of the philosophy which underlies our American system of democratic government. A study of political theories which have contributed to the formation of our system of government.
Two credits.

Riggs

Courses for Graduate Students Only

- 501 The Western Political Heritage.** A study of the development of political thought, with emphasis upon the background of modern democratic principles.
Three credits.

Riggs

- 599 Thesis in Political Science.**
One to three credits.

Staff

SOCIOLOGY

Courses for Advanced Undergraduate and Graduate Students

- 500 Special Problems in Sociology.** A seminar or conference course for advanced students wishing to work out a special problem in sociology.
Credits arranged.

Lohrman

- 561 Development of Western Social Thought.** Significant contributions of social thinkers and philosophers from ancient times to the present.
Four credits.

Lohrman

- 564 School and Community.** The study of community structure, institutions and life. The relationship between community and personality growth. School and community relationships; the community school; youth and community surveys; the coordinating council.
Three credits.

Lohrman

- 565 Social Psychology.** The study of the influence of human relations and culture upon the development of personality. Comparative study of the

biological, ethnological and culture approaches to individual, sex, and racial differences. The development of attitudes and prejudices. The study of propaganda, rumor and other psycho-social phenomena.
Four credits. Lohrman

567 **Cultural Anthropology.** The study of culture: its meaning, analysis, changes. Cultural differentiation. The significance of culture in human relations. Insights and concepts necessary for understanding and promoting inter-culture relations. Primitive and modern advanced cultures.
Four credits. Lohrman

568 **Ethnic Relations.** The study of problems arising from ethnic differentiation, such as cultural background, religion, and race.
Three credits. Lohrman

569 **Marriage and Family.** A study of courtship, marriage, husband-wife relationships, parent-child relationships, problems of the family, the factors associated with happiness and success, and family disorganization.
Four credits. Lohrman

Course for Graduate Students Only

599 **Thesis in Sociology.**
One to three credits. Staff

PROFESSIONAL COURSE

Course for Graduate Students Only

Social Studies 501 Social Studies Seminar. The world in the Twentieth Century in geography, history, economics, political science, sociology and anthropology. Prescribed for those pursuing a field of concentration in the Division of Social Studies.
Three credits. Lohrman and Staff

the 1990s, the number of people in the UK who are aged 65 and over has increased by 1.5 million (1990-1999) and is projected to increase by a further 1.5 million by 2010 (Office for National Statistics 2000). The number of people aged 65 and over is projected to increase by 2.5 million by 2020 (Office for National Statistics 2000).

There is a growing awareness of the need to develop strategies to meet the needs of the ageing population. The Department of Health (1999) has identified the need to develop a 'new paradigm' for the care of the elderly. This paradigm is based on the principle of 'active ageing', which is the process of maintaining and enhancing the functional ability of older people to live independently and to participate in society. The Department of Health (1999) has identified a number of key areas for action in order to achieve this paradigm, including: (1) promoting the health and well-being of older people; (2) ensuring that older people have access to the services and resources they need; and (3) ensuring that older people are able to participate in society.

One of the key areas for action is the need to develop strategies to promote the health and well-being of older people. This includes the need to develop strategies to prevent the onset of chronic disease and to manage chronic disease when it does occur. The Department of Health (1999) has identified a number of key areas for action in order to achieve this, including: (1) promoting the health and well-being of older people; (2) ensuring that older people have access to the services and resources they need; and (3) ensuring that older people are able to participate in society.

Another key area for action is the need to ensure that older people have access to the services and resources they need. This includes the need to develop strategies to ensure that older people have access to housing, transport, and social services. The Department of Health (1999) has identified a number of key areas for action in order to achieve this, including: (1) promoting the health and well-being of older people; (2) ensuring that older people have access to the services and resources they need; and (3) ensuring that older people are able to participate in society.

A third key area for action is the need to ensure that older people are able to participate in society. This includes the need to develop strategies to ensure that older people are able to participate in community activities, education, and employment. The Department of Health (1999) has identified a number of key areas for action in order to achieve this, including: (1) promoting the health and well-being of older people; (2) ensuring that older people have access to the services and resources they need; and (3) ensuring that older people are able to participate in society.

In order to achieve the 'new paradigm' for the care of the elderly, it is essential that we develop strategies to promote the health and well-being of older people, ensure that older people have access to the services and resources they need, and ensure that older people are able to participate in society. This requires a multi-disciplinary approach, involving the participation of a wide range of stakeholders, including the government, the private sector, and the community.

The Department of Health (1999) has identified a number of key areas for action in order to achieve this paradigm, including: (1) promoting the health and well-being of older people; (2) ensuring that older people have access to the services and resources they need; and (3) ensuring that older people are able to participate in society.