

Oakland University

Graduate Catalog

2005-2007

YOUR GATEWAY TO A WORLD OF OPPORTUNITIES

www.oakland.edu/grad

OAKLAND UNIVERSITY

2005-2007
GRADUATE CATALOG



September 2005

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The **Graduate Program Catalog** is the listing of academic programs, degree requirements, policies, and related information.
The **Graduate Course Description Catalog** includes course listings and descriptions. Together, they comprise the
Oakland University Graduate Catalog.

All data in this catalog reflects information as it was available at the publication date. Oakland University reserves the right
to revise all announcements contained in this publication at its discretion and to make reasonable changes in requirements
to improve or upgrade academic and non-academic programs.

It is the responsibility of each student to be aware of and understand University regulations as published.

Oakland University is a legally autonomous state institution of higher learning. Legislation creating Oakland University as an independent institution, separate from Michigan State University, was established under Act No. 35, Public Acts of 1970. The university is governed by an eight-member board of trustees appointed by the governor with the advice and consent of the Michigan Senate.

As an equal opportunity and affirmative action institution, Oakland University is committed to compliance with federal and state laws prohibiting discrimination, including Title VI of the Civil Rights Act of 1964, Title IX of the Education Amendments of 1972, Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act. It is the policy of Oakland University that there shall be no unlawful discrimination against any person on the basis of race, sex, sexual orientation, color, religion, creed, national origin or ancestry, age, height, weight, marital status, handicap, familial status, veteran status or other prohibited factors in employment, admissions, educational programs or activities. Inquiries or complaints should be addressed to:

Director, Office of University Diversity and Compliance, 203 Wilson Hall, Oakland University, Rochester, Michigan 48309-4401.

Oakland University is accredited by the North Central Association of Colleges and Schools Commission on Institutions of Higher Education (30 N. LaSalle St., Suite 2400, Chicago, Illinois 60602-2504, 800-621-7440).

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* Mildred Merz, Kresge Library

**ex officio*

Oakland University
Rochester, MI 48309-4401
(248) 370-2100
<http://www.oakland.edu>

Academic units

Dean of the College of Arts and Sciences, (248) 370-2140
Dean of the School of Business Administration, (248) 370-3286
Dean of the School of Engineering and Computer Science, (248) 370-2217
Dean of the School of Education and Human Services, (248) 370-3050
Dean of the School of Health Sciences, (248) 370-3562
Dean of the School of Nursing, (248) 370-4081

Admissions information

Graduate Admissions, (248) 370-3167
Undergraduate Admissions, (248) 370-3360

Service Offices

Academic Calendar 2005-2006

Fall 2005

Registration	Monday, Tuesday	August 29-30
New Student Convocation	Wednesday	August 31
Classes begin	5:00 p.m., Wednesday	August 31
Labor Day holiday	Monday	September 5
Thanksgiving recess begins	10:00 p.m., Wednesday	November 23
Classes resume	7:30 a.m., Monday	November 28
Classes end	5:00 p.m., Wednesday	December 7
Study period	Thursday	December 8
Exams begin	7:30 a.m., Friday	December 9
Exams end	10:00 p.m., Thursday	December 15
Fall Commencement	Saturday	December 17

Winter 2006

Registration	Tuesday	January 3
Classes begin	7:30 a.m., Wednesday	January 4
Martin Luther King, Jr. Day	Monday (Classes suspended)	January 16
Winter recess begins	10:00 p.m., Saturday	February 25
Classes resume	7:30 a.m., Monday	March 6
Classes end	10:00 p.m., Tuesday	April 18
Study period	Wednesday	April 19
Exams begin	7:30 a.m., Thursday	April 20
Exams end	10:00 p.m., Wednesday	April 26

Spring 2006

Registration	Thursday	April 27
Classes begin	7:30 a.m., Monday	May 1
Spring Commencement	Saturday	May 6
Memorial Day holiday	Monday	May 29
Classes end	10:00 p.m., Saturday	June 17
Final exams	Monday-Wednesday	June 19-21

Summer 2006

Registration	Thursday	June 22
Classes begin	7:30 a.m., Monday	June 26
Independence Day holiday	Monday -Tuesday	July 3-4
Classes resume	7:30 a.m., Wednesday	July 5
Classes end	10:00 p.m., Saturday	August 12
Final exams	Monday-Wednesday	August 14-16

Academic Calendar 2006-2007**Fall 2006**

New Student Convocation	Monday	August 29
Classes begin	7:30 a.m., Wednesday	August 30
Labor Day holiday	Monday	September 4
Thanksgiving Recess begins	10:00 p.m., Wednesday	November 22
Classes resume	7:30 a.m., Monday	November 27
Classes end	10:00 p.m., Tuesday	December 5
Study period	Wednesday	December 6
Exams begin	7:30 a.m., Thursday	December 7
Exams end	10:00 p.m., Wednesday	December 13
Fall Commencement	Saturday	December 16

Winter 2007

Classes begin	7:30 a.m., Thursday	January 4
Martin Luther King, Jr. Day	Monday (Classes suspended)	January 15
Winter Recess begins	10:00 p.m., Saturday	February 24
Classes resume	7:30 a.m., Monday	March 5
Classes end	10:00 p.m., Wednesday	April 18
Study period	Thursday	April 19
Exams begin	7:30 a.m., Friday	April 20
Exams end	10:00 p.m., Thursday	April 26
Spring Commencement	Saturday	May 5

Spring 2007

Classes begin	7:30 a.m., Monday	May 7
Memorial Day holiday	Monday	May 28
Classes resume	7:30 a.m., Tuesday	May 29
Classes end	10:00 p.m., Saturday	June 23
Final exams	Monday - Wednesday	June 25-27

Summer 2007

Classes begin	7:30 a.m., Monday	July 2
Independence Day holiday	Wednesday	July 4
Classes resume	7:30 a.m., Thursday	July 5
Classes end	10:00 p.m., Saturday	August 18
Final exams	Monday - Wednesday	August 20-22

Admission Schedule

Admission Schedule

This is a general guide for submission of application material. Some programs have earlier closing dates for admission. Applicants should check the specific admission deadlines and requirements for the program they wish to enter at www.oakland.edu/grad. If no dates are given, the following schedule will apply.

Term for which admission is requested:

	Regular Applicants	Special Graduate Applicants	International Applicants
Fall 2005	August 1, 2005	August 15, 2005	May 1
Winter 2006	December 1, 2005	December 10, 2005	September 1
Spring 2006	April 1, 2006	April 10, 2006	
Summer 2006	June 1, 2006	June 10, 2006	
Fall 2006	August 1, 2006	August 10, 2006	
Winter 2007	December 1, 2006	December 10, 2006	
Spring 2007	April 1, 2007	April 10, 2007	
Summer 2007	June 1, 2007	June 10, 2007	

Prospective students whose applications for program admission are incomplete on the designated date may be considered for special graduate admission if the program area permits admission in such status. Applications postmarked after the date designated for receipt of special graduate admission requests may be processed in time for late registration if the applicants so desire. However, they should be aware that a \$35 late registration fee will be assessed.

Applicants for special graduate status must submit an application for admission, application fee and transcript that posts evidence of a bachelor's/master's degree. Admitted applicants to graduate programs who do not enroll for the term in which they were admitted must contact Graduate Admissions, 160 North Foundation Hall (248) 370-3167. If done within five terms of the date of original admission term, no readmission fee is charged; thereafter, a new application, documentation and application fee are required. Inactive application files are destroyed after five terms.

■ INTRODUCTION

Oakland University is a doctoral research-intensive public university of more than 16,000 students that offers a diverse set of academic programs, from baccalaureate to doctoral levels. In all its activities, Oakland University strives to exemplify educational leadership. Anchored by a strong liberal arts program, the university is organized into the College of Arts and Sciences, Schools of Business Administration, Education and Human Services, Engineering and Computer Science, Health Sciences and Nursing, The Honors College, and Graduate Study and Lifelong Learning. All academic programs of the university are accredited by the North Central Association of Colleges and Schools.

The university's full-time faculty, which now numbers more than 400, has a distinguished record of research and scholarship. Faculty members have won some of the most prestigious awards made by government agencies and private foundations. External funding support for academic, student, and university projects now totals more than \$10 million. Studies in biological and physical sciences and nondestructive testing attract national and international attention to Oakland University, and its highly recognized Eye Research Institute is the only major eye research center in the United States not associated with a medical school. The Institute for Biochemistry and Biotechnology of the College of Arts and Sciences is gaining a national reputation in diverse fields within biomedical sciences. The university takes pride in the many scholarly books and articles written by its faculty and in their contributions to pedagogy and the creative arts. Wherever possible, students are involved in research projects; the results of research and scholarship are integrated into related courses of instruction.

Resources available to support scholarly activities of students and faculty include both library and computing facilities. The central university library is the Kresge Library, which has additional specialized collections and services in performing arts and education. Computing resources include a distributed environment on a variety of operating system platforms, connected across campus by a high-speed fiber optic network.

Complementing its academic programs, Oakland University collaborates actively with business and industry to foster economic development in southeastern Michigan and provide internships and research opportunities for students and faculty. The university provides major public service offerings with emphasis on the professional performing arts. Meadow Brook Hall, former home of the university's benefactors, now serves as a conference and cultural center. Meadow Brook Art Gallery houses the university's permanent collection of African art and presents a variety of special exhibits annually. Meadow Brook Theatre, a professional theatre, is located in Wilson Hall. Meadow Brook Music Festival brings a summer program of world-class entertainment to campus.

Oakland University was created in 1957 when the late Alfred G. and Matilda R. Wilson donated their 1,500-acre estate and \$2 million to Michigan State University to begin a new college in Oakland County. Named Michigan State University - Oakland, the new campus enrolled its first students in 1959. In 1963, its name was changed to Oakland University and in 1970 the Michigan Legislature recognized the maturity and stature of the university by granting it autonomy. The governor appointed Oakland University's first board of trustees in 1970.

From its beginning, the university has emphasized academic quality, concentrating on providing a dynamic, student-focused learning environment with integration of liberal and professional studies by a faculty of dedicated scholar-teachers. Located in suburban Oakland County, Michigan, Oakland University is easily accessible to millions of Detroit metropolitan area residents. The natural beauty of the campus, much of it still wooded and undeveloped, is enhanced by comprehensive recreational facilities and modern buildings that house the university's many academic and public service programs as well as some 1,600 residential students. Adjacent to the campus is the Oakland Technology Park, a research park where private-sector companies work hand-in-hand with higher education. Student research and internship opportunities are also enhanced by the proximity of many Fortune 500 companies.

■ Role and Mission

The following role and mission statement for the university was adopted by the Oakland University Board of Trustees on July 21, 1982. It emphasizes four essential ingredients for the direction of the university: excellent and relevant instruction; high quality basic and applied research and scholarship; responsive and effective public and community service; and a comprehensive schedule of student development activities.

As a state-supported institution of higher education, Oakland University has a three-fold mission. It offers instructional programs of high quality that lead to degrees at the baccalaureate, master's and doctoral levels, as well as programs in continuing education; it advances knowledge and promotes the arts through research, scholarship, and creative activity; and it renders significant public service. In all its activities, the university strives to exemplify educational leadership.

Instruction

Oakland University provides rigorous educational programs. A strong core of liberal arts is the basis on which undergraduates develop the skills, knowledge and attitudes essential for successful living and active, concerned citizenship. A variety of majors and specialized curricula prepare students for post-baccalaureate education, professional schools, or careers directly after graduation. Each program provides a variety of courses and curricular experiences to ensure an enriched life along with superior career preparation or enhancement.

The university offers master's programs that meet demonstrable needs of Michigan residents and that maintain excellence. Doctoral programs are offered which are innovative and serve needs that are not adequately met elsewhere in the state.

Offerings in continuing education provide Michigan residents with high quality coursework for professional development and personal enrichment.

Oakland University is selective in its admission standards and seeks both traditional and nontraditional students, ensuring equal opportunity to all who can profit from its offerings. While serving principally Michigan residents, it welcomes qualified applicants from other states and countries. A special effort is made to locate and admit disadvantaged students with strong potential for academic success and to provide the support conducive to the realization of that potential. The faculty and staff cooperate with nearby community colleges to ensure that their students who seek to transfer to Oakland

Introduction

University are well prepared for work at a senior college. In recruiting and admitting students, enrollments are not permitted to exceed numbers consistent with preserving the high quality of instruction.

The university strives to remain current and relevant through an adequate program of continuing faculty development and the exploration of innovative schedules, methods, and curricular design in keeping with the various needs of its diverse students, many of whom commute, work or are older than the traditional college-age student.

Oakland University offers, and will continue to offer, only those programs for which adequate resources and well-prepared faculty are available and for which a demonstrable need is expressed through the attraction of qualified students.

Research and scholarship

Oakland University assumes an obligation to advance knowledge through the research and scholarship of its faculty and students. The university's research and scholarship mission takes expression in a variety of forms ranging from basic studies on the nature of things to applied research directed at particular problems to contributions to literature and the arts. Within its means, the university provides internal financial support for research and scholarship. Simultaneously, it pursues with vigor external sources of support. Research institutes, financed primarily by outside grants, make an important contribution to this mission.

In addition to their intrinsic value, research and scholarship reinforce the instructional mission of the university. Wherever possible, students are involved in research projects, and the results of research and scholarship are integrated into related courses of instruction.

In carrying out its research and scholarship mission the university seeks especially to be responsive to the needs of Michigan, particularly of the populous southeastern sector. Application of research and scholarship to problems and concerns of the state's business and industry and to its scientific, educational, governmental and health and human-service agencies serves also to reinforce the public service role of the university.

Public service

Oakland University serves its constituents through a philosophy and program of public service that are consistent with its instructional and research missions. It cooperates with businesses, governmental units, community groups, and other organizations on research, technical development and problem-solving enterprises in an attempt to apply the expertise of the university to the issues of society in general or the region in particular so as to further enhance the quality of life in the service areas of the university. It attempts to maintain the degree of flexibility necessary to respond with innovative instruction, research and other service to rapidly changing needs. It makes its facilities available for a multitude of activities of agencies and community groups whose purposes are compatible with the mission of the university. It provides access to its programs and campus, insofar as is consistent with the role and scope of the institution, for the recreational and physical enrichment of area citizens. Cultural enrichment is provided for the community through the Meadow Brook enterprises, on- and off-campus presentations by faculty and students, and other campus events. The university aims to provide a model of socially responsible decision-making and ethical institutional behavior, recognizing that institutional strength derives

from an effective interaction with the institution's diverse external environs.

Student development

In direct support of its academic mission, Oakland University provides basic services and experiences which integrate cognitive learning with the personal growth of the individual student in the emotional, social, physical, cultural, ethical and interpersonal domains. In so doing, the university seeks to facilitate the development of those personal skills which will contribute to informed decision making and productive citizenship. This objective is accomplished through a variety of student enterprises, including campus organizations, athletics and other sponsored activities and events.

Key to its achievement is the provision of a governance system in which students play a meaningful role in the institutional decision-making processes.

The university takes particular cognizance of its considerable enrollment of older and nontraditional students and provides advising, counseling and other services of special value to such students in effecting career changes and developing additional personal competencies. Through the maintenance of complementary academic and extracurricular environments, Oakland University assists students in the realization that life is a continuum of growth, change and adaptation and provides them with the skills essential to the achievement of their fullest potential.

■ GENERAL INFORMATION

Graduate Programs

Graduate programs, with philosophical foundations in the university's role and mission, are directly linked to the research, scholarship and public service activities of the university. New knowledge is produced, and directed toward the solution of technological, social, economic and political problems and issues. Students, educated in intellectual inquiry and critical analysis, are full partners in graduate programs structured to maximize personal growth and achievement as specific career-related goals are obtained. Dynamic relationships with regional companies provide real advantages in pursuing career options through work-study, internships, project involvement and community action.

Graduate Degree Programs

Doctor of Philosophy

applied mathematical sciences
biomedical sciences (health and environmental chemistry, medical physics)
education (counseling, early childhood education, educational leadership)
mechanical engineering
reading education
systems engineering

Doctor of Physical Therapy

Doctor of Science in Physical Therapy

Education Specialist

school administration

Master of Accounting

Master of Arts

biology, counseling, English, history, linguistics, mathematics

Master of Arts in Liberal Studies

Master of Arts in Teaching:

reading and language arts, elementary education, secondary education

Master of Business Administration

Master of Education

early childhood education, educational leadership, educational studies, special education

Master of Music

Master of Public Administration

Master of Science

applied statistics, biology, chemistry, computer science and engineering, electrical and computer engineering, embedded systems, engineering management, exercise science, industrial applied mathematics, information systems engineering, information technology management, mechanical engineering, physical therapy, physics, software engineering, systems engineering

Master of Science in Nursing

adult gerontological nurse practitioner, family nurse practitioner, nurse anesthesia, nursing acute care, nursing education, RN to MSN

Master of Training and Development

Graduate Certificate Programs

Advanced Microcomputer Applications
Clinical Exercise Science
Complementary Medicine and Wellness
Corporate and Worksite Wellness
Exercise Science
Microcomputer Applications
Neurological Rehabilitation
Nursing Education
Orthopedic Manual Physical Therapy
Orthopedics
Pediatric Rehabilitation
Statistical Methods
Teaching and Learning for Rehabilitation Professionals
Teaching English as Second Language

Post-Master's Graduate Certificate Programs

Accounting
Adult Gerontological Nurse Practitioner
Advanced Reading, Language Arts and Literature
Business Economics
Educational Administration
Entrepreneurship
Family Nurse Practitioner
Finance
General Management
Higher Education
Human Resources Management
International Business
Local Government Management
Management Information Systems
Marketing
Nonprofit Organization & Management
Nurse Anesthesia
Production/Operations Management
Reading, Language Arts and Literature

Development and Review of Graduate Programs

New programs are developed along established guidelines and within the framework of the university's role and mission statement. The approval process is monitored by Graduate Study and Lifelong Learning. It includes evaluation by and endorsement from several designated internal and external bodies. Once in place, graduate programs are reviewed on a regularly scheduled basis by faculty program review committees and Graduate Study and Lifelong Learning. At the time of publication of this catalog, several programs are in various stages of review. Program or course changes resulting from these reviews will be announced. Students should maintain contact with their advisers and Graduate Study and Lifelong Learning to be fully aware of the current status of programs to which they have been admitted.

Accreditation

Oakland University is accredited as a doctoral degree-granting institution by the Higher Learning Commission of the North Central Association of Colleges and Schools, 30 N. LaSalle St., Suite 2400, Chicago, Illinois 60602-2504; telephone 800-621-7440. In addition, specific programs and curricula are accredited individually by specialized or professional accrediting agencies. The principal accreditation agencies are as follows:

Business Administration

Accreditation Council of the American Assembly of Collegiate Schools of Business

Education

Teacher Education Programs: National Council for Accreditation of Teacher Education

Graduate Counseling: Council for Accreditation of Counseling and Related Educational Programs

Engineering*

Division of Engineering (undergraduate): Accreditation Board for Engineering and Technology – Engineering

Arts and Sciences

Chemistry: American Chemical Society*

Music: National Association of Schools of Music

Political Science (Master of Public Administration): National Association of Schools of Public Affairs and Administration

Nursing

National League for Nursing and Commission on Collegiate Nursing Education

Nurse Anesthesia: American Association of Nurse Anesthetists (Council on Accreditation of Nurse Anesthesia Educational Programs)

Health Sciences

Physical Therapy: American Physical Therapy Association

*Accreditation limited to only one degree per level per institution

■ Student Affairs and Services

The Division of Student Affairs provides an array of out-of-class support services, leisure activities and educational programs that complement and enhance students' educational experiences. The Office of the Vice President for Student Affairs is located in 144 Oakland Center (248-370-4200). Brief descriptions of services for students follow.

Academic Skills Center

The Academic Skills Center offers a variety of services and programs to help students become independent learners so they may achieve their best academically. The center offers individual and group tutoring, supplemental instruction, writing assistance, learning strategy seminars, self-paced instructional materials, assistance in applying for specific scholarships, and more. The ASC also handles undergraduate readmission to Oakland University. All ASC services and programs are free.

Campus Recreation

The Department of Campus Recreation provides facilities, programs and services to meet the recreational, fitness, wellness and personal development needs of the Oakland University community. The goal of campus recreation programs is to enhance the quality of student and campus life through knowledge, opportunities, interests and behaviors that promote healthy lifestyles and to encourage making a regular recreational activity an element of daily life.

Campus Recreation programs include intramural sports, club sports, fitness assessment and programs in group fitness sessions and clinics, wellness programs, aquatic and learn-to-swim programs, and informal sports that are self-directed and self-paced. Recreation Center facilities include the recreation gym with three basketball/volleyball courts, a one-tenth mile four-lane running track, three racquetball/walleyball courts, four multi-purpose rooms, a 7,500 square foot fitness center with over 70 pieces of cardiovascular and strength equipment, wellness center, 50 meter pool, spa and bubble pool in the aquatic center, two class/meeting rooms, locker rooms and snack bar. Campus Recreation also oversees the Upper Pioneer Fields.

Students enrolled in classes that meet on the main campus are assessed an activity fee that permits entry to the center. Further information about eligibility for family members, facility hours or program offerings may be obtained at the facility's Welcome Center or by telephone (248) 370-4732 or by visiting the web site at www.oakland.edu/unit/campus_rec.

Career Services

The Career Services Department, 275 West Vandenberg Hall, (248) 370-3250, assists in identifying professional-level career-related full-time, part-time and seasonal employment opportunities for both students and alumni. Its Professional Employment unit provides assistance to graduating students and alumni in locating career positions. Its Career Experience unit helps students in arranging internships, cooperative education work experiences and part-time or full-time seasonal employment in positions that complement their classroom work. All students are encouraged to explore these programs.

Career Services provides direct access to job opportunities through on-campus interviews, job referral activities and job vacancy postings daily on the Internet. A computerized system, eRecruiting@OU, is used to register students and alumni for referral and on-campus recruiting and to produce a professional-looking resume. Individual placement advising and career information are available to both students and alumni, including open advising during designated hours.

The department offers a variety of job fairs and career information/networking programs throughout the year. Special seminars assist students in developing job search skills. In addition, information is publicized about internship/fellowship opportunities generated outside the university. The department also maintains a home page on the Internet that contains career resources and links to other job/career information. The Web address for Career Services is <http://www.oakland.edu/careerservices>.

The department library contains both printed and videotaped employer information, plus job search information and career publications and periodicals. It also includes the application materials for Graduate Record Examinations (GRE), Law School Admission Test (LSAT), Medical College Admission Test (MCAT), and Graduate Management Admission Test (GMAT), among others.

Center for Multicultural Initiatives

Center for Multicultural Initiatives (CMI) develops and implements strategies and programs in an effort to increase the recruitment, retention and graduation of underrepresented racial and ethnic groups and to enhance their academic and social success. The CMI assists individual students and organizations in solving university related problems. It administers the Oakland University Trustees Academic Success Fund and oversees several scholarship, loan and peer mentor programs. It works to develop a campus climate that is sensitive and responsive to the issues of racial and ethnic diversity at Oakland University. The CMI is located in 134 North Foundation Hall (248-370-4404).

Counseling Center

The Counseling Center located in the Graham Health Center provides counseling, testing and consultations to university students.

The personal counseling services provide treatment for relationship difficulties, depression and anxiety, stress disorders, underachievement and child, family or marital problems. Evaluations regarding learning problems or disabilities are available through the psychological testing services. For students experiencing drug or alcohol problems, counseling, assessment and referral services are available. Specialized counseling is also available for family members of substance abusers. Career testing and counseling help students to identify potential career majors or educational directions through the clarification of their abilities, interests and personal needs.

Strict rules of confidentiality are observed. No notation is made in any university record regarding a student's voluntary use of clinic services. The first six counseling sessions for students are free. After that, services are available at a nominal cost. Students may contact the center directly at 248-370-3465.

Dean of Students

The Dean of Students serves as an advocate for the development of programs and services to meet the developmental needs of students. As such, the dean of students monitors the university environment, assists with student life policy development and serves as an advocate for students facing academic, financial and personal problems while enrolled at Oakland University. The Dean of Students office is located in the Student Affairs Office at 144 Oakland Center (248-370-3352).

Disability Support Services

Advocacy and support services are provided through the Office of Disability Support Services located in 106 North Foundation Hall. Services include, but are not limited to, priority registration, alternative testing arrangements, assistive technology, alternative media formats, assistance in identifying volunteer note-takers and readers, electronic door-openers and sign-language interpreting services. Students are encouraged to schedule an appointment 6 weeks prior to the semester and bring documentation of their disability. To register or for information, contact the DSS Office at 248-370-3266 (voice) or 248-370-3268 (TDD). In cases involving alleged illegal discrimination or harassment, the student should contact the Office of University Diversity and Compliance, 203 Wilson Hall, 248-370-3496.

Health Services

Oakland University students may receive nurse practitioner medical services at the Graham Health Center (248-370-2341). Services include management of most acute and chronic medical problems, laboratory and pharmaceutical services, and ability to handle minor trauma and to give initial treatment to more serious emergencies. Men's and women's health, including gynecological examination is available as well as a variety of low cost contraception. Allergy injections are given while a nurse practitioner is on the premises (the patient must have a doctor's written instructions and vaccine that may be stored at the health center). Information is available on weight control, nutrition, smoking cessation, exercise and many other topics. The center will bill some insurance companies including Maksin Student Insurance and PPOM. Student health insurance is available at reasonable rates. In addition, faculty and staff may be seen for employee physicals, some acute problems, and some work-related injuries. For additional information, please visit our website at www2.oakland.edu/ghc.

ID Card Office

The SpiritCard, Oakland's official university identification card, is available to all students, faculty and staff. There is no charge for the initial card, but there is a replacement fee for lost, stolen or damaged cards. To avoid a replacement fee, keep your card for the duration of your Oakland University career. ID cards may be obtained at the ID Card office, 112 Oakland Center, (248) 370-2291. A driver's license, state-issued picture ID or passport is required at the time of carding. The office is open Monday, Tuesday, Thursday, Friday, 9:00 a.m. through 8:00 p.m., and Wednesday until 7:00 p.m. during the Fall and Winter semesters. Special extended hours for the first week of Fall and Winter semesters are Monday through Thursday, 8:00 a.m. through 6:30 p.m. ID cards are required to access residence hall meal plans, the Recreation Center, gain entrance into some university events, check out library materials from Kresge Library, print in open labs and gain access to the 24 hour computer lab. Your SpiritCard

General Information

can also be used as an on-campus debit card by activating your SpiritCa\$h account. SpiritCa\$h is accepted at various locations throughout campus, including the University Bookstore, Pioneer Food Court, Pic-A0Deli, Katke Cousins Gold Course, PrintWise stations, copy machines at Kresge Library and the Oakland Center, and select vending machines in the Oakland Center. Beginning Summer 2005, students can activate a brand new feature by upgrading to a SpiritCard PLUS option. By opening a checking account with Credit Union One (conveniently located in the Oakland Center), the SpiritCard PLUS offers students, faculty and staff ATM access and the purchasing power of MasterCard Debit. For more information on the Oakland University SpiritCard, visit www.ouspiritcard.com.

International Students and Scholars

Services are provided by the Office of International Students and Scholars located in 157 North Foundation Hall. Orientation, advising, assistance with preparing documents for the U.S. Immigration and Naturalization Service, sponsoring agencies and home country governments are among the available services. International students are required to meet with a staff member prior to registration. Any international student or exchange visitor requiring assistance may contact the office at 248-370-3358.

Lowry Center for Early Childhood Education

The School of Education and Human Services operates the Matthew Lowry Center for Early Childhood Education for young children of students, faculty, staff and the community. The center houses three programs (PreKindergarten, preschool and toddler) and is located in the new SEHS building on the first floor. All programs are accredited by the National Association for the Education of Young Children and are licensed by the Michigan Department of Social Services. The PreKindergarten program is an early childhood program that offers full (9-4) and half day (9-12 or 1-4) programs for children who are 4 years old by December 1 through 5 years.

The Preschool program is an early childhood program that offers full (9-4) and half day (9-12 or 1-4) programs for children who are 3 and 4 years old.

The toddler program is for children 18 months to 3 years old and offers full (9-4) and half day programs (9-12 or 1-4). The curriculum is designed to stimulate and support the developmental growth of young children.

Aside from regular program hours, extended hours are available from 7:30-9 and 4 -5:30 at an additional cost.

The Center operates weekdays from 7:30 a.m. to 5:30 p.m. Space in all programs is limited. Parents are encouraged inquire about the waiting list if interested in registration. Lowry also offers a summer day camp program for children 18 months to 6 years old. Please call the reception desk for more detailed information (248-370-4100).

Oakland Center

The Oakland Center serves students, faculty, staff, alumni and guests of Oakland University by offering an environment that supports a variety of social, recreational, cultural and entertainment programs. Open seven days a week and located in the heart of the campus, the Oakland Center features a food court including brand name eating establishments, such as Chick-Fil-A and Subway. The University Bookstore and Credit Union One are housed in the Oakland Center, as well as vending machines, Bumpers Game Room, public telephones, computer labs, e-mail kiosks, Café O'Bear's coffee shop, a

TV lounge and meeting/multipurpose rooms. Also located in the Oakland Center are the offices of Student Activities and Leadership Development, Student Affairs, Dean of Students, Chartwell's food service, the ID Card Office, student organizations, University Student Congress, Student Program Board, *The Oakland Post* student newspaper and WXOU-FM, the student-operated radio station.

Oakland University E-mail

Oakland provides each student with free e-mail service and an address. Instead of sending information through the U.S. Postal Service, Oakland University will e-mail information and direct links to secured Web sites to students via their official OU email address, including grades availability, tuition and fees bills, financial aid, schedule of classes and graduation information. This information is important to maintaining a student's relationship with the university. The university will hold students accountable for the information sent via e-mail. Therefore, students are encouraged to check their Oakland e-mail account regularly, at least twice each week.

Oakland's University Technology Services Web site offers tips and information about activating, accessing and forwarding OU e-mail at www.oakland.edu/uts/ or selecting the Info Tech button from OU's home page, then clicking E-mail Services.

Oakland University will not sell or give away student e-mail information and will not use e-mail to advertise for third parties.

Family Educational Rights and Privacy Act

The federal Family Educational Rights and Privacy Act of 1974 pertains to confidential student educational records. This legislation allows students the right to view upon request their own confidential educational records and defines the use of these records by others. The dean of students is the university compliance officer for the Family Educational Rights and Privacy Act. Students who do not want directory information to appear on the Oakland University web site can restrict release of such data by doing the following:

- Login to Sail
- Click on Login to Secure Area
- Complete the User Login
- Select Personal Information
- Select Directory Profile
- De-select the Display in Directory option for items you wish to not appear in the web directory.

Students who do not want directory information released in any other form must notify the Office of the Registrar in writing. Forms for this purpose are available in 101A O'Dowd Hall. Upon receipt of the completed form or a letter, directory information will be withheld until the student requests in writing that it be released. Requests for privacy may also be faxed to the Registrar at 248-370-3461.

The university considers student theses and dissertations to be public statements of research findings. Therefore, students who submit such work in fulfillment of degree requirements shall be deemed to have consented to disclosure of the work.

A full statement of students' rights is available in the Office of the Dean of Students (144 Oakland Center, 248-370-3352).

Any questions, grievances, complaints or other related problems may be addressed to the Dean of Students, 144 Oakland Center, Oakland University, Rochester, Michigan 48309-4401 (248-370-3352) and/or filed with the U.S. Department of Education.

Campus Sex Crimes Prevention Act

Oakland University shall comply with the applicable requirements of the new "Campus Sex Crimes Prevention Act," beginning in 2002, which states that every sex offender registered under "Megan's Law" provide information of his/her enrollment or employment by a college or university. Names of registered sex offenders enrolled or working at Oakland University is provided by the Oakland University Police Department (OUPD) with campus jurisdiction from the State government. To obtain this information, please contact the OUPD, 3 Police & Support Services Building, 248-370-3331 or the police website: <http://mirage.ots.oakland.edu/oupd/oupd.htm>.

Questions or further information regarding the Campus Sex Crimes Prevention Act may be obtained by contacting the Vice President for Student Affairs, 248-370-4200 or the Director of Police, 248-370-3000. In accordance of the "Family Educational Rights and Privacy Act," nothing may be construed to prohibit Oakland University from disclosing information provided to the university concerning registered sex offenders. Finally, it is required that the Secretary of Education take appropriate steps to notify Oakland University that disclosure of this information is permitted.

■ Centralized and Specialized Research Facilities

Office of Grants, Contracts and Sponsored Research

The Office of Grants, Contracts and Sponsored Research supports research and scholarship at Oakland University. In particular, the office acts as the coordinating office between Oakland University and the federal and state agencies, foundations and public and private corporations that provide funds for research, education, training and service programs. In addition to providing information and assistance on sponsored programs, the office is responsible for insuring that ethical and legal guidelines are adhered to in the completion of all research projects. Research involving human subjects must be reviewed and approved by the university's Institutional Review Board. The board insures that research protocols are designed to protect the rights of individuals who participate as subjects in research projects. The university is responsible for the humane care and use of laboratory animals in research and does so through the Institutional Animal Care and Use Committee. This committee monitors research projects involving laboratory animals to ensure that the provisions of all applicable laws and regulations are followed. A Biosafety Committee, which also operates out of the Office of Grants, Contracts and Sponsored Research, is responsible for evaluating all research and teaching that involves recombinant DNA molecules, infectious materials, and/or cultured cell lines. The Radiation Safety Committee reviews, approves and monitors all use of radiation in research and teaching on the Oakland campus.

The Office of Grants, Contracts and Sponsored Research also oversees the internal awards of research funds to faculty and students. The Research Committee of the University Senate reviews research applications and recommends funding for individual faculty projects and research-related activities, and student research project support. Students and faculty may contact the Office of Grants, Contracts and

Sponsored Research for guidelines and application cover sheets. This information is also available on the world wide web; follow the University Research Committee link from <http://www.oakland.edu/research>.

Eye Research Institute

The Eye Research Institute, with laboratories and offices on the third and fourth floors of Dodge Hall, conducts studies on the eye in health and disease. Faculty research is funded by the National Institutes of Health. The research involves a multidisciplinary approach to the study of the lens and cataract, and the biochemistry, physiology and pharmacology of the retina. The institute has tissue culture laboratories and transmission and scanning electron microscopes, maintained, in part, by a Vision Research Infrastructure Development grant from the National Eye Institute.

Several members of the Department of Ophthalmology at William Beaumont Hospital, which is affiliated with the institute, are members of the institute's clinical faculty. This affiliation provides enhanced educational experience for ophthalmology residents and fellows. The institute also offers qualified undergraduate and graduate students opportunities for research experience.

The programs of the Eye Research Institute are regularly reviewed by a scientific advisory board, whose members are nationally recognized leaders in eye research. Further information may be obtained by contacting the Office of the Director. For more information, visit www2.oakland.edu/eri.

■ University Approval for Research Activities Involving Human Subjects, Animals, Biosafety, and Radiation Safety

Protection of human subjects

All research projects involving the participation of human subjects or use of materials of human origin must be submitted for review by the Institutional Review Board for the Protection of Human Subjects (IRB) before the research can be conducted. This requirement includes all research, from low-risk investigations such as surveying people on the street about their favorite television shows to high-risk studies like clinical trials of experimental medical treatments. Applications are submitted online (see "Online Application for Conducting Research" section). All students conducting research must have an Oakland University faculty sponsor. The student and faculty sponsor are jointly responsible for contacting the IRB and for keeping abreast of the approval process as it pertains to the study. For more information about human subjects review and to access the Oakland University Guidelines for Research Involving Human Subjects, click on Human Subjects link on the Research web page or contact Dr. Judette Haddad at (248) 370-4898 or haddad@oakland.edu. To access the Human Subjects Tutorial, click on Compliance Tutorial link on the Research web page.

Protection of animal subjects

Research using vertebrate animals must have the approval of the Institutional Animal Care and Use Committee (IACUC) and be conducted according to university guidelines. For more information click on Animal Care Use link on the Research web page or contact Cliff Snitgen at (248) 370-4441 or snitgen@oakland.edu.

Biosafety

All research, teaching and testing at Oakland University involving recombinant DNA, infectious agents, materials of human origin, and/or cultured cell lines must be approved by the Institutional Biosafety Committee (IBC). Approval is obtained through submission of biosafety research applications. Applications are submitted online through the Research Application Manager. For more information and copies of applications, click on the Biosafety link on the Research web page or contact Dominic Luongo, Biosafety Officer at (248) 370-4314 or luongo@oakland.edu.

Radiation safety

Radioactive material (including machinery producing ionizing radiation) can only be used by authorized Oakland University permit holders or under the supervision of a permit holder. User permits are issued by the Radiation Safety Committee (RSC) only to the fulltime OU faculty members or principal investigators. all others must work under the supervision of a full-time faculty member. To access the Radiation Safety Tutorial, click on the Compliance Tutorial on the Research web page. For more information click on the Radiation Safety link off the Research web page or contact Dominic Luongo, Radiation Safety Officer at (248) 370-4314 or luongo@oakland.edu.

Online application for conducting research

To access the compliance committee applications referred to above, researchers should visit the Research Application Manager (RAM) at <http://www2.oakland.edu/research/appmanager/>. Researchers who are accessing the site for the first time, should access the Step-by-Step Instructions at <http://www2.oakland.edu/research/appmanager/stepbystep.cfm> to create an account. Depending on the elements involved and the scope of the project, students will gain access to the relevant applications required to conduct the study.

■ Center for Information and Instructional Technology

The Center for Information Technology is the umbrella identity for the three branches of information technology support at Oakland University. University Technology Services is responsible for the university information technology infrastructure. UTS also provides technical support for a desktop or laptop computers through to network connectivity, including email, storage, and enterprise systems. E-Learning and Instruction Support (e-LIS) offers support to faculty, staff, and students in the creation of online learning material and the development of custom web solutions for academic needs. Classroom Support and Instructional Technical Services (CSITS) provides management of technology in the campus classrooms, support to faculty, staff and students on the use of instructional and

presentation technology systems, multimedia production and consulting. OU TV management, video production and archiving, and AV equipment distribution.

■ Office of Institutional Research and Assessment

The Office of Institutional Research and Assessment (OIRA) provides student-related information such as enrollment, credit hours, degrees, curriculum, etc., to internal and external data-users and decision makers. Internal requests for information are utilized for academic planning, student program development and budgetary purposes. Externally, the Office of Institutional Research and Assessment is charged with the responsibility for compliance with state and federal statistical reporting requirements for public universities, such as the annual state budget request and the Integrated Postsecondary Educational Data System (IPEDS) submission, among others. OIRA is also responsible for coordination and support of activities related to the assessment of student academic achievement, as specified in the Oakland University Assessment Plan submitted to the North Central Association.

OIRA routinely conducts social science research projects related to the university's overall educational mission, such as student retention tracking and the annual survey of new freshmen, which provides data on career goals at time of admission and other descriptive items.

All student information provided by the Office of Institutional Research and Assessment is in the aggregate and is public and available to administrators, faculty, students and the university community at large at <https://www2.oakland.edu/secure/oira/>.

■ Continuing Education

Continuing education serves individuals at various stages of their careers, from students applying for graduate study to professionals intent on career advancement. Continuing education at Oakland University is delivered through the various academic units. Information regarding specific programs may be obtained by contacting the Schools of Business Administration, Education and Human Services, Engineering and Computer Science, Health Sciences or Nursing.

■ SEHS Educational Resources Lab

The Educational Resources Lab (350 Education Building, 248-370-3060) provides support for the academic, research and development activities of the School of Education and Human Services. Patrons are provided with a functional setting for the examination, study, research, development, production, and evaluation of instructional materials and technologies. Workshops, seminars and consultation services in instructional technology and research strategies are available.

General Information

POLICIES AND PROCEDURES

Admissions

Requirements for admission to a degree program

The graduate admissions policy of Oakland University is selective. Degree program applicants must have official transcripts and letters of recommendations sent directly by their originators to Graduate Admissions. Detailed instructions are included in the "Application for Admission to Graduate Study" and on the website (www.oakland.edu/grad). Additional admission information and requirements may be found in the sections of this catalog describing the programs offered by the various schools and departments. Admission will be granted by Graduate Admissions for a definite term on recommendation by the department or school concerned and is based on the applicant's undergraduate record, letters of recommendation and other evidence that may be required. All transcripts, recommendations and other documents received by the university become the property of the university and will not be released. Copies will be made only for university use.

An applicant must hold a baccalaureate from a regionally accredited undergraduate institution. Scores from the Graduate Record Examination, including advanced (subject) tests when available, are required from those students who graduated from schools not accredited by one of the regional accrediting agencies. In addition, all international applicants, other visa holders, permanent residents and exchange students who are non-native English speakers must provide proof of English proficiency to be admitted to the university. Proof consists of TOEFL or MELAB test scores, a baccalaureate degree from a regionally accredited U.S. college or university, one year of study at and a diploma from a U.S. high school or 24 transferable credits, excluding ESL coursework, from a U.S. community college or baccalaureate institution.

Application for admission by international students

International applicants should submit both a university application and an international student supplemental application at least 6 months before the date they hope to enter the university. Applications will be reviewed for fall and winter admission only. All application materials must be submitted by May 1 for fall admission and by September 1 for winter admission. Application materials include: a university application, the application fee, recommendations, official transcripts, transcript evaluation for students with foreign educational credentials, official test scores, an international student supplemental application and a notarized bank statement in U.S. dollars for the required amount. Fees paid to Oakland University must be made in U.S. funds drawn from U.S. banks.

The minimum institutional requirement for foreign academic credentials is a general foreign transcript evaluation. The general report provides the university with required degree equivalency information as well as verification of the authenticity of original

documentation. Graduate Study and Lifelong Learning may recommend specific transfer credit evaluation companies for consistency of documentation, but will accept any transcript evaluation prepared by a NACES (National Association of Credential Evaluation Services) member.

Individual programs requiring more detailed information may require a course-by-course (or detailed) report in place of the general report.

If the application is approved, students will receive a letter of admission to the university. International students are required to submit scores from the Graduate Record Examination General Test (GRE) prior to admission. The Test of English as a Foreign Language (TOEFL) is also required. The Graduate Management Admission Test (GMAT) is required for admission to the MBA program in lieu of the GRE.

International applicants who are presently in the United States on a student status may be required to provide statements from the International Student Advisers at their current institutions. International students who do not enroll during their indicated semester of admission must submit an application to update at least eight weeks prior to the start of the term (fall or winter) in which they wish to enroll.

English language proficiency policy

International applicants, other visa holders, permanent residents, and exchange students whose native language* is not English must provide proof of English proficiency.

Admission

One of the following constitutes proof:

1. TOEFL: 550 minimum on paper-based TOEFL; 213 minimum on computer-based TOEFL
2. MELAB: 77 minimum
3. 24 transferable credits, excluding ESL coursework from a U.S. community college or baccalaureate institution
4. a baccalaureate degree from a regionally accredited U.S. college or university
5. 1 year of study at and a diploma from a U.S. high school

Some programs at Oakland University may require a higher level of proficiency than listed above. Applicants should examine the program description for their field of study for information about additional English proficiency requirements and furnish proof as part of the admission process (admissions: <http://www.oakland.edu>; click on 'Prospective Students').

Admission with ESL coursework

One of the following constitutes proof:

1. TOEFL: 520-549 on paper-based TOEFL; 192-212 on computer-based TOEFL
2. MELAB: 73-76

Students must register for ESL courses as part of their coursework starting in their first semester of registration. ESL placement is done by the Center for American English (CAE) using the Institutional TOEFL and other assessment tools. Upon completion of the individualized ESL instruction sequence, students' English proficiency will be evaluated using the Institutional TOEFL to determine whether additional ESL coursework is necessary to

achieve English proficiency. The individualized ESL instruction sequence designed by the CAE is not negotiable.

Satisfactory completion of the individualized ESL instruction sequence is expected within one year, but ESL coursework is required until minimum proficiency is demonstrated.

Admission to Intensive English Program

Prospective students who do not have adequate English proficiency for admission or admission with ESL coursework to the university can be admitted to the Intensive English Program. ESL placement is done by the Center for American English (CAE) using the Institutional TOEFL and other assessment tools.

Upon completion of the individualized ESL instruction sequence, students' English proficiency will be evaluated using the Institutional TOEFL to determine whether additional ESL coursework is necessary to achieve English proficiency. The individualized ESL instruction sequence designed by the CAE is not negotiable.

Upon completion of the Intensive English Program, students may (re)apply for admission to Oakland University; applicants are evaluated using the admission criteria described above.

*A native language is a language that is acquired naturally during childhood and is usually spoken at home, as opposed to a language that is learned later in life, for example, as part of a person's formal education. Students whose native language is not English are encouraged to visit the Center for American English to discuss any language difficulties they may have while attending Oakland University.

Conditional admission

Applicants currently completing undergraduate requirements or degree holders whose preparation is judged deficient by the admitting graduate program may be eligible for conditional admission with approval from Graduate Admissions. Deficiencies of conditionally admitted students must be rectified in a time and manner specified in the conditional admit letter provided by Graduate Admissions. Students who do not meet the conditional requirements stipulated for full admission status are ineligible for further enrollment and denied full admission to the graduate program. While in a conditional status students, will not be eligible to receive their degrees, to transfer credit from other institutions, or to hold teaching or research assistantships.

Special graduate status

Special graduate status may be granted by Graduate Admissions to students who wish to pursue a degree, but have not officially been admitted to a degree program. Students must submit a copy of a transcript providing evidence of a bachelor degree awarded and any specific materials required by the department. Students will be allowed to take no more than a total of 12 credits while in this status.

Credit earned at Oakland University under special graduate status — but none that has been earned at another institution — will be officially recorded. This credit may be applied toward degree requirements if a student later is admitted to a degree program and if the credit is appropriate to the degree objective. However, admission as a special graduate student in no way assures subsequent admission to a degree program. Students in this status must apply for admission to a program through Graduate Admissions and provide official transcripts, recommendations and any additional credentials specified by the program faculty.

A recommendation on admission is then made by the academic department or school to Graduate Admissions, which makes the final decision. Requirements and regulations prevailing for the semester of formal admission to a graduate program will govern the student's program.

Inactive status and readmission

Oakland University classifies inactive students into three categories that require reapplication or readmission.

The categories are as follows:

1. Admitted applicants who do not enroll for the term in which they were admitted must apply to update their admission to graduate study. If done within five terms of the original admission term, no additional fee is charged; thereafter, a new application, documentation, transcripts and application fee are required. Inactive files are destroyed after five terms.
2. Students who have been admitted to a graduate program and have completed course work but subsequently have not enrolled at Oakland University for a period of two years must apply for readmission and pay the readmission fee. Readmission is not automatic. The readmission request is reviewed by the appropriate admissions committee and Graduate Admissions. Each request is evaluated in terms of the six-year time limit for completing degree requirements, performance in course work and progress toward the degree. Students will not be readmitted to programs that have been suspended or discontinued. The catalog current at the time a student is readmitted will govern program requirements, policies and procedures.
3. Students who have not registered for an Oakland University graduate course for seven years are considered inactive and their graduate files are destroyed. Students who wish to take classes subsequently must follow the regular admission procedure. The student's Oakland University transcripts remain available in the Academic Records Office.

Program transfers or endorsement additions

This process is to be used only by students who have been admitted to one master's degree program and wish to transfer to another master's degree program or who wish to add into an endorsement program. Please note that additional application materials may be required. Program admission requirements are detailed in this catalog. Regulations governing graduate programs require that all credit applied toward a degree must be earned within six calendar years of the awarding of the degree.

Graduate non-matriculating admissions

Applicants who wish to enroll in graduate courses, but do NOT wish to be admitted to a graduate program may request non-matriculating status. Applicants admitted to a non-matriculating status are subject to the following stipulations:

Guest status

Graduate students from other accredited colleges or universities must submit a graduate application with verification of academic standing from the applicant's home institution BEFORE the applicant will be considered for enrollment.

Professional development

Applicants who have a bachelor's degree from an accredited college or university must submit a graduate application with a copy of a transcript providing evidence of a terminal degree (bachelor's, master's or doctoral).

1. Admission is granted to a particular school or college, but NOT to a specific graduate program.
2. There is no limitation on the number of graduate credits that may be earned in this status.
3. Departmental permission must be obtained, prior to enrolling for graduate courses, to assure proper academic preparation.
4. There is no assurance that credits earned in this status will be approved and applied toward a graduate program.
5. Not more than 12 credits would be eligible for review, approval and application toward a graduate program at a later date. These credits must comply with requirements published in the Time Limit section of the Graduate Catalog.
6. Non-matriculating graduate students who later decide to seek admission to a graduate program must adhere to all admission requirements specified by the program.

Michigan Intercollegiate Graduate Studies (MIGS)

The MIGS program is a cooperative inter-institutional arrangement which permits graduate students to take advantage of educational offerings available at other participating institutions but not available at their own. It is open to any student in good standing in a graduate program at a member institution. Courses must be numerically graded courses (not graded P/F, S/U or CR/NC) approved in advance by the student's graduate adviser and the MIGS liaison officer at both the home institution and the host institution. Admission by the host university is contingent on the availability of space and resources. The member institutions are Andrews University, Central Michigan University, Eastern Michigan University, Grand Valley State University, Michigan State University, Michigan Technological University, Northern Michigan University, Oakland University, Siena Heights College, University of Detroit-Mercy, University of Michigan, Wayne State University and Western Michigan University. Additional information is available from Graduate Study and Lifelong Learning.

Post-baccalaureate status

Post-baccalaureate status may be granted applicants who have a bachelor's degree from an accredited college or university and who wish to enroll in undergraduate courses, either to develop an additional major or to prepare for admission to a degree program. Please contact the Undergraduate Admissions for a post-baccalaureate application.

■ Academic Procedures

Transcripts

Academic records are maintained in the Academic Records Office, 102 O'Dowd Hall. Transcripts of academic records may be obtained by completing a transcript request form at the Academic Records Office or by writing to: Transcript Request, Office of the Registrar, Oakland University, Rochester, Michigan 48309-4401. Requests should include the name under which the student attended, the student's Oakland University student number, the date the student last attended and date of degree (if applicable), and the address to which the transcript is to be sent.

A check or money order for \$5 per transcript must accompany the request. Transcripts will not be issued for students who have delinquent indebtedness to the university or who are delinquent in repaying a National Direct Student Loan (NDSL), Perkins Loan or Nursing Student Loan (NSL).

Grades

The Office of the Registrar has discontinued mailing grades to students starting with the winter 2003 semester. Grades can be accessed in two ways:

1. By calling the SAIL system at (248) 370-4646 and following the voice prompts to listen to grades.
2. From a computer with Internet access:

Go to the Oakland University home page at www.oakland.edu. Click on the SAIL (Student and Administrative Information Link) in the lower right corner of OU's home page. Click on "Login to Secure Area". Enter your nine-digit student ID number as the User ID and six-digit personal identification number as the PIN then click on "Login". Click on "Student Services & Financial Aid". Click on "Student Records". Click on "Final Grades" and then "Select a Term". Grades then can be printed from the Web.

In the event that a paper copy of grades is needed for employee tuition reimbursement, forward a request to registra@oakland.edu with your name and address.

Starting fall 2003, Oakland University also will begin sending official university business information to students through their free OU e-mail account, providing a more efficient and cost-effective notification of items like bills, schedule of classes, news, campus events and more.

In some cases, students will receive the information directly in their e-mail. In others, they will receive an e-mail notification that data is available to access through a secure Web site.

All OU students will be held accountable for the information the university sends through e-mail. Through the Oakland system, students can forward their Oakland e-mail to a preferred e-mail account. However, if the preferred e-mail address changes, the student will be responsible for updating the forwarding address.

Students can learn more about Oakland e-mail and find answers to their questions on OU's E-mail Account Document Library Web page by clicking on the Information Technology button from anywhere on Oakland's home page, then selecting e-mail services.

Petition of exception

Students may request waivers, substitutions or modifications of specific academic requirements by filing a Petition of Exception form with Graduate Study and Lifelong Learning, 520 O'Dowd Hall. The advisers and/or graduate committees will make recommendations to Graduate Study and Lifelong Learning, who will review the petition and notify students of any action taken. Petition of Exception forms are available at www.oakland.edu/grad.

Restriction of student records and holds

Students may not register for classes if their records have been restricted and holds placed on their records for failure to pay fees, to submit complete application forms or to satisfy admission or retention conditions.

Transfer credit

Students who are in good academic standing (not probationary or conditional) in a master's degree program and wish to transfer courses from other accredited U.S. colleges or universities must have such credit approved by their academic advisers and Graduate Study and Lifelong Learning. The credit must be earned at the graduate level (500 level and above) with a grade of at least 3.0 (or B) and not be graded pass/fail, satisfactory/unsatisfactory or credit/non-credit; it must be applicable to the student's program and may not have been previously used to satisfy degree requirements at this or another institution. In accordance with policies set by the Michigan Council of Graduate Deans, no more than one credit will be awarded, per week of instruction. Applications should be filed after the first semester is completed at Oakland and, in any event not later than the first week of the semester in which the student expects to graduate. It will be necessary to have official transcripts of the work on file in the Graduate Study and Lifelong Learning. Transfer Credit Applications are available at www.oakland.edu/grad.

A maximum of 9 semester hours of transfer credit is acceptable toward a graduate degree. Approved transfer credit will appear on the student's official transcript in the Office of the Registrar. Transfer credit earned more than six years before the OU degree is awarded will not be applied toward degree requirements.

Course descriptions

Graduate Course descriptions are available at www.oakland.edu/grad. These descriptions are updated daily and represent the most accurate source of graduate course information in effect for any given term.

Courses taken as an undergraduate

Up to 12 credits (400 level and above) taken as an Oakland University undergraduate may be applied to a graduate program if the courses have not been used to fulfill the bachelor's degree requirements. The courses must be applicable to the student's graduate program, approved by the student's adviser and graduate committee, and Graduate Study and Lifelong Learning. The difference between undergraduate tuition and graduate tuition will be assessed at the time credits are transferred to the graduate academic record. Transfer request forms are available at www.oakland.edu/grad.

Courses applied to an earlier graduate degree

Except in some cases of the doctor of philosophy degree, where up to 32 credits from a previous master's degree may be applied, credit earned in one master's degree program cannot be used again in a second master's degree or graduate certificate program.

However, the student's adviser may review courses completed in the previous master's degree to determine OU course equivalency. Those courses found equivalent to OU courses which satisfy degree requirements in the second master's program may be eligible for course waiver. In this case, the student, in consultation with his/her adviser, must file a Petition of Exception form, identify the course equivalent and select a substitute course as a replacement for the required course. Final approval of the Petition of Exception will be with Graduate Study and Lifelong Learning.

Course competency credit

Competency examinations are offered by some departments and with the approval of Graduate Study and Lifelong Learning can be used to update Oakland University credit which is beyond the six-year time limit. Students should consult their advisers for specific information and must register and pay fees during the normal registration period. University legislation stipulates that the examination must be taken not more than six weeks after the close of registration.

Changes in enrollments (add/drop)

Graduate students wishing to add or drop a course may secure the appropriate form from the Registration Office or from the academic office of the area in which they are enrolled. A student adding a course beginning the first day of classes will need the signature of the instructor of the new course. The add/drop form is then presented to the Registration Office for processing. If a refund is involved it will be mailed to the student. The first two weeks of a semester (one week in spring or summer sessions) are a no-grade period for dropping courses. See the Schedule of Classes for dropping and withdrawal options.

Withdrawal

A graduate student wishing to withdraw from the university may do so by filing an official withdrawal notice with the Registration Office. This may be done in person, by SAIL (Student Access Information Line), fax, or certified mail. Information about each option is provided in greater detail in each term's Schedule of Classes. The withdrawal is recorded by the Registration Office and the amount of refund, excluding the non-refundable enrollment fee, is determined based on the date of receipt. If a refund is due, it will be mailed to the student.

Academic probation

Students who are not making satisfactory progress in their programs, as determined by their advisers and program chairperson, may be placed in probationary status with conditions imposed for retention in the program.

Academic conduct of graduate students

All members of the academic community at Oakland University are expected to practice and uphold standards of academic integrity and honesty. Academic integrity means representing oneself and one's work honestly. Misrepresentation is cheating since it means students are claiming credit for ideas or work not actually theirs and are thereby seeking a grade that is not actually earned. Following are some examples of academic dishonesty:

1. Cheating on examinations. This includes using materials such as books and/or notes when not authorized by the instructor, copying from someone else's paper, helping some-one else copy work, substituting another's work as one's own, theft of exam copies, or other forms of misconduct on exams.
2. Plagiarizing the work of others. Plagiarism is using someone else's work or ideas without giving that person credit; by doing this students are, in effect, claiming credit for someone else's thinking. Whether students have read or heard the information used, they must document the source of information. When dealing with written sources, a clear distinction should be made between quotations (which reproduce information from the source word-for-word within quotation marks) and paraphrases (which digest the source of information and produce it in the student's own words). Both direct quotations and paraphrases must be documented. Even if students rephrase, condense or select from another person's work, the ideas are still the other person's, and failure to give credit constitutes misrepresentation of the student's actual work and plagiarism of another's ideas. Buying a paper and handing it in as one's own work is plagiarism.
3. Cheating on lab reports by falsifying data or submitting data not based on the student's own work.
4. Falsifying records or providing misinformation regarding one's credentials.
5. Unauthorized collaboration on computer assignments and unauthorized access to and use of computer programs, including modifying computer files created by others and representing that work as one's own.

Unless they specifically indicate otherwise, instructors expect individual, unaided work on homework assignments, exams, lab reports and computer exercises, and documentation of sources when used. If instructors assign a special project other than or in addition to exams, such as a research paper, or original essay or a book review, they intend that work to be completed for that course only. Students must not submit work completed for a course taken in the past or for a concurrent course unless they have explicit permission to do so.

Instructors are expected to maintain the following standards in the context of academic conduct:

1. To inform and instruct students about the procedures and standards of research and documentation required to complete work in a particular course or in the context of a particular discipline.
2. To take practical steps to prevent and detect cheating.
3. To report suspected academic misconduct to the Dean of Students, 144 Oakland Center, for consideration by the Academic Conduct Committee of the University Senate.
4. To present evidence of plagiarism, cheating on exams or lab reports, falsification of records, or other forms of academic conduct before the Academic Conduct Committee.

Students are expected to maintain the following standards in the context of academic conduct:

1. To be aware of and practice the standards of honest scholarship.
2. To follow faculty instructions regarding exams and assignments to avoid inadvertent misrepresentation of work.
3. To be certain that special rules regarding documentation of term papers, examination procedures, use of computer-based information and programs, etc., are clearly understood.
4. To avoid the appearance of cheating.

If students believe that practices by the instructor are conducive to cheating, they may convey this message to the instructor, to the chairperson of the department, or to any member of the student/faculty Academic Conduct Committee (either directly or through the Office of the Dean of Students).

If academic misconduct is determined by the Academic Conduct Committee, the committee assesses penalties ranging from academic disciplinary reprimand, to academic probation, to suspension or expulsion (dismissal) from the university. All conduct records are maintained in the Office of the Dean of Students.

■ Procedures for Appeals

Denial of admission

An applicant seeking an appeal must do so within 15 working days of the date of the denial letter and make such request in writing to the program department (chair, coordinator or admissions committee). The appeal must be based on new information not included in the original application or on extenuating circumstances not known to the department or to the Executive Director of Graduate Study and Lifelong Learning at the time of the initial decision. Within 15 working days of receipt of the written appeal, the department will submit a recommendation to the Executive Director of Graduate Study and Lifelong Learning either to admit the applicant or to sustain the original denial. The Executive Director of Graduate Study and Lifelong Learning shall review the recommendation and notify the student in writing of the final decision within 10 working days of the departmental recommendation. The decision of the Executive Director of Graduate Study and Lifelong Learning is final.

Dismissal for academic performance

A student must formally request reconsideration from the program department (chair, coordinator or admissions committee) within three months of notice of dismissal, with such request being submitted in writing and including the basis for the appeal, e.g., new supporting information and/or reference to violations of university procedures. Within 15 working days of receipt of the written appeal, the department must submit to the Executive Director of Graduate Study and Lifelong Learning a recommendation either to reinstate the student to the program (with or without conditions imposed) or to uphold the original dismissal. The Executive Director of Graduate Study and Lifelong Learning shall review the recommendation and notify the student in writing of the decision within 10 working days.

If the original dismissal is sustained, the student may submit a written request for an appointment with the Executive Director of Graduate Study and Lifelong Learning to discuss the decision. After the meeting with the Executive Director of Graduate Study and Lifelong Learning the student may submit a written request to the Interim Vice Provost for Graduate Education & Academic Administration to refer the matter to the chair of the Student Conduct Committee of the Graduate Council for a second review. Such referral shall be forwarded by Graduate Study and Lifelong Learning within five working days. The committee will conduct its review within the procedures established by the Graduate Council. A recommendation either to sustain the denial or to reinstate the student (with or without conditions imposed) shall be forwarded to the Interim Vice Provost for Graduate Education & Academic Administration. The Vice Provost may accept or reject the committee recommendation and a letter notifying the student of the Vice Provost's decision shall be forwarded to the student within five working days of receipt of the committee recommendation. The decision of Vice Provost shall be final.

Dismissal from the university

Dismissal by Graduate Study and Lifelong Learning is based on a recommendation from the program faculty. It is an action taken only after thorough evaluation of the student's progress toward a degree by both the program faculty and the Executive Director of Graduate Study and Lifelong Learning.

Credit system

The unit of credit is the semester hour. No graduate student may register for more than 12 credits in fall or winter semester, or 8 credits in spring or summer, without the written authorization of his/her adviser.

Course numbering system

Courses numbered 100-299 are introductory or intermediate undergraduate courses and cannot be used toward graduate degrees. Courses numbered 300-499 are advanced courses primarily for undergraduates. Graduate students, with the approval of a departmental adviser, may use up to 12 credits of 400-499 courses taken at Oakland University toward a graduate degree. In approved interdisciplinary programs graduate students, with the approval of a departmental adviser, may use up to 12 credits of 300-499 courses taken at Oakland University toward a graduate degree. Courses numbered 500 and above are primarily for graduate students. Qualified undergraduates may enroll in courses numbered 500-599, provided they have obtained prior written permission to do so from the department chair and the course instructor. Courses numbered 600 and above are restricted to graduate students. Courses 700 and above are primarily for doctoral students, but qualified masters students may enroll provided they have obtained permission from the department or school offering the class.

Grading

To qualify for a graduate degree, a student must have an overall average of at least 3.00 in all courses taken at Oakland University as a graduate student. No grade below 2.0 may be applied toward a graduate degree. Many programs have more stringent grade

requirements for credit and retention. Specific information may be found under the appropriate program area of this catalog. The graduate grading system, implemented fall 1984, is described below.

1. The basic graduate grading system at Oakland University is a 32-point system of numerical grades of 0.0 and 1.0 through 4.0 by tenths and non-numerical grades of W, I, P, U, S, R, and Z.
2. The first two weeks of a semester (one week in the spring and summer sessions) are a "no-grade" period for dropping and adding full semester courses. (For "first-half" or "second-half" courses, this period is the first week of the appropriate "half-term.") Courses dropped during these periods are not indicated on the student's transcript.
3. The meanings of non-numeric grades are as follows:
 - a. The W (Withdraw) grade is assigned by the registrar if a student withdraws officially from a course or all courses between the end of the no-grade period and the last day for withdrawal specified in the Schedule of Classes each term.
 - b. The I (Incomplete) grade is temporary and may be given only after the cut-off date for use of the "W" grade. It is used in the case of severe hardship beyond the control of a student that prevents him or her from completing course requirements. Course work to remove an "I" grade must be completed during the first eight weeks of the next semester (fall or winter) for which the student registers unless a student-initiated extension is approved by the instructor and the Graduate Study and Lifelong Learning. If course requirements are not completed within one year and no semester has been registered for, the "I" grade shall become permanent. A student who wishes to receive an Incomplete grade in a course must present a Student Request for Incomplete (I) Grade form to the instructor by the day of the scheduled final examination. This form, which indicates the instructor's willingness or unwillingness to grant the "I" and the schedule he or she sets for completing the term's work, is available in department offices.
 - c. The P (Progress) grade is a temporary grade that may be given only in a course that cannot be completed in one semester or session. Prior approval must be obtained from the appropriate committee on instruction and the Graduate Study and Lifelong Learning for each course in which "P" grades are to be assigned. The "P" grade is given only for satisfactory work. "P" grades must be removed within two calendar years of the date of assignment; otherwise the "P" converts to a permanent "I" which remains on the transcript. This rule does not apply to doctoral dissertation work.
 - d. The grade of "S" is given in certain selected courses and is meant to imply 3.0 or better. Courses in which S/U grading is used must be approved by the appropriate committee on instruction and the Executive Director of Graduate Study and Lifelong Learning, who will notify the registrar.
 - e. The grade of "U" is given to graduate students only when a course is graded S/U and implies a non-passing grade of less than 3.00.
 - f. The grade of "R" is a temporary grade assigned by the registrar in the absence of a grade from the instructor or in the case of the award of an inappropriate grade.

- g. The final grade of “Z” is assigned upon registration for a course as an auditor. The student’s declaration of intention to audit is required at the time of registration, and it is understood that no credit for the course is intended that term. An audit registration for a course is permitted only during the late registration period each term. Permission of the instructor to audit and admission to the university are both required before such a registration will be permitted. Regular tuition and fees apply to all courses.
4. All grades and marks assigned will appear on a student’s transcript. However, only numerical grades are used in computing the student’s grade point average.

Appeal of grade

Students desiring to appeal a grade should first contact the instructor who issued the grade. If satisfaction is not received the student may further appeal, in turn, to the program coordinator, the department chair and, finally, to the school dean, whose decision is final.

Repeating courses

With the permission of the program faculty and the Graduate Study and Lifelong Learning, graduate students may repeat a course up to two times. The last numerical grade earned in the course will be used in computing the grade point average. The student must file a Petition of Exception to document permission of program faculty and Graduate Study and Lifelong Learning prior to registration. Filing of this form is the responsibility of the student and will ensure proper adjustments to degree credits are made.

Time limit

Credit earned more than six years before a master’s degree is to be granted may not be used to fulfill the degree requirements. This means, for example, that a course taken in Fall 1997 may be used toward a degree only until the end of the Fall 2003 semester. Time limits for doctoral programs will be found within the program descriptions. Doctoral students with credits earned more than seven years before the degree is granted, must request an extension from the academic dean and Graduate Study and Lifelong Learning.

■ Doctoral/Master’s Information

Doctoral residency requirement

All doctoral programs have residency requirements. Students are advised to consult the appropriate section of this catalog that pertains to their particular degree program. All doctoral students are required to register for at least one credit of coursework every fall and winter semester after their admission to a program. In cases where the student has completed all of the formal coursework for the degree, the student may register for doctoral or dissertation research. The student must be registered for the semester in which they defend their dissertation.

Continuous enrollment policy for doctoral students

The continuous enrollment policy for doctoral students requires continuous registration of graduate students for at least one credit hour each semester in the academic year to maintain an active graduate student status. This includes semesters in which the comprehensive, preliminary or qualifying examination is taken, defense, and each subsequent terms (fall and winter) until the degree requirements are met and the dissertation is submitted to Graduate Study and Lifelong Learning.

Continuous enrollment is met by registration in a graduate-level course relevant to the student’s academic program. Doctoral students who have completed required credit hours toward their degree may register for GCE 800. This course will be assessed at the “graduate continuous enrollment” rate (equivalent to one credit at the current graduate tuition rate with NO fee assessment) and will not count toward the degree.

Should circumstances arise that may cause an interruption in graduate study, the student must apply for a **Leave of Absence**. A student on official “leave of absence” is NOT required to pay tuition, fees or GCE fees; but the student is NOT entitled to any services from the university during the leave, including demands upon faculty or advisor time, or receipt of fellowship, assistantship, or financial aid.

Some agency and graduate assistantship eligibility may have course-load requirements that exceed the minimum registration requirements of the Continuous Enrollment Policy (e.g. Veterans Administration, United States Citizenship and Immigration Services (USCIS) for international students, and federal financial aid programs). Therefore, **it is the student’s responsibility to register for the appropriate number of credits that are required for funding eligibility and/or compliance as outlined by specific agency regulations under which they are governed.**

Doctoral students who do not maintain continuous enrollment and have NOT been granted an official leave of absence, are subject to termination of admission to the program, based on recommendation of the department and approval by the Academic Dean.

Leave of absence

Doctoral students, who are considering a **Leave of Absence**, should seek immediate guidance from their advisor or doctoral committee chairperson. Whenever possible, the request should be made in advance of the anticipated leave or as soon as possible after commencement of an emergency leave. Requests for **Leave of Absence** will not be granted retroactively. Students who are absent beyond the end of an approved Leave of Absence will be required to apply for readmission to the program.

A student granted a leave of absence will have his or her time-to-completion of degree extended by the amount of time granted in the leave of absence. A student on official “Leave of Absence” is exempted from the requirements set forth in the “Continuous Enrollment Policy.” While in this status, students are NOT entitled to any services from the university, including demands upon faculty or advisor time, or receipt of fellowship, assistantship, or financial aid during their authorized leave. Leave of Absence Request forms are available through Graduate Study and Lifelong Learning www.oakland.edu/grad.

Master's thesis and doctoral dissertation

Students are responsible for obtaining the publication "Guide to the Preparation of Theses and Dissertations" from www.oakland.edu/grad. In addition, students must make an appointment prior to and after defense or presentation to assure that the manuscript conforms to university format standards. Three copies of the approved manuscript must be delivered to Graduate Study and Lifelong Learning, 520 O'Dowd Hall, by the date stated in the Schedule of Classes and at www.oakland.edu/grad for the term in which the student expects to graduate. Doctoral students must submit an additional copy to meet the UMI publication requirement.

The university considers student theses and dissertations to be public statements of research findings. Therefore, students who submit such work in fulfillment of degree requirements shall be deemed to have consented to disclosure of the work.

Graduation information

Information in this section is intended to guide you in completing your degree requirements. It is not a substitute for departmental advising. Students must meet with their departmental adviser to confirm that they have met all the following requirements and to determine what additional departmental requirements may exist.

Graduation Checklist for Master's Students

To fulfill their graduation requirements, master's students must:

1. File a program of study with Graduate Study and Lifelong Learning (520 O'Dowd Hall)
2. Submit an online Application for Graduation for the term in which they expect to graduate, by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad. If graduation requirements are not completed by the stated deadlines, students must resubmit an online Application for Graduation for the term in which they expect to complete their degree requirements.
3. Review their academic record for any unmet requirements:
 - Incomplete (I) or progress (P) grades must be removed.
 - Transfer credits must be approved and processed by the beginning of the semester of intended graduation.
 - Transfer credits must have been completed within the 6-year time limit, to count toward degree requirements
 - An overall 3.0 GPA must be achieved.
 - A Petition of Exception must be filed, if the degree will NOT be completed with the University's 6-year time limit (a 2-year extension for a maximum of an 8-year total).
4. Complete a successful defense or presentation, if completing a thesis, by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad.
5. Attain format approval from Graduate Study and Lifelong Learning, if completing a thesis, by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad.
6. Submit for binding 3 copies of their format approved thesis to Graduate Study and Lifelong Learning by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad.

Master's student participation in Graduation ceremony before completion of degree requirements

Within one term of completing their degree requirements, master's students may participate in commencement. A "Request to Participate in Commencement Ceremony" form must be approved by their academic adviser and department chair and submitted to Graduate Study and Lifelong Learning for final approval.

Graduation Checklist For Doctoral Students

To fulfill their graduation requirements, doctoral students must:

1. File a program of study with Graduate Study and Lifelong Learning (520 O'Dowd Hall)
2. Submit an online Application for Graduation for the term in which they expect to graduate, by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad. If graduation requirements are not completed by the stated deadlines, students must change their graduation date by contacting Graduate Study and Lifelong Learning (520 O'Dowd Hall).
3. Review their academic record for any unmet requirements:
 - Incomplete (I) or progress (P) grades must be removed.
 - Transfer credits must be approved and processed by the beginning of the semester of intended graduation.
 - Transfer credits must have been completed within the 6-year time limit, to count toward degree requirements
 - An overall 3.0 GPA must be achieved.
 - A Petition of Exception must be filed, if the degree will NOT be completed with the University's 6-year time limit (a 2-year extension for a maximum of an 8-year total).
4. Register for the term in which their dissertation will be defended.
7. Complete a successful dissertation defense by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad.
8. Attain format approval from Graduate Study and Lifelong Learning by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad.
9. Submit for binding 3 copies of their format approved dissertation to Graduate Study and Lifelong Learning by the deadline stated in the *Schedule of Classes* or at www.oakland.edu/grad.
10. Submit an additional copy of their format approved dissertation to meet the UMI publication requirement.

Doctoral student participation in Commencement

Doctoral students are not eligible to participate in commencement, without completing all degree requirements, including the dissertation defense and submission of an approved dissertation to Graduate Study and Lifelong Learning. The dissertation must be signed by all committee members and comply with the dissertation requirements as outlined in the *Guide to the Preparation of Theses and Dissertations*.

Commencement

Commencement ceremonies are held twice each year. A May ceremony recognizes Winter Semester (April) and Spring Session (June) degree candidates. A December ceremony is held for Summer Session (August) and Fall Semester (December) degree candidates. For additional information on upcoming commencement ceremonies, please refer to the Schedule of Classes or www.oakland.edu.

Tuition and Fees

The Oakland University Board of Trustees reserves the right to change any and all tuition and fees when circumstances make such a change necessary. Tuition and fees quoted in this catalog are from the Fall 2005 semester. The Schedule of Classes at www.oakland.edu or each semester or session carries a listing of current charges.

All fees are assessed at registration and are payable in U.S. dollars. Checks and credit card payments returned by the bank will place students in a non-payment status.

Tuition

Tuition for each semester is assessed on the basis of the credit value of the course. One credit is the equivalent of one semester hour. On-campus graduate tuition for Michigan residents is \$335.25 per credit while nonresidents are assessed \$584.00 per credit. Some courses have additional special fees, which are published in the class schedule for the term. All fees are subject to change by the Board of Trustees.

General service fee

All students who register are assessed a \$147 general service fee each term, of which \$57 is nonrefundable. In addition to funding the cost of registration and student records maintenance, this fee is also used to support such student services as the Oakland Center, Graham Health Center, athletics, and maintenance of the parking lots, roads and walkways on campus.

Course fee

In addition to tuition, a course fee of \$13.50 per credit hour (\$54.00 per 4 credit hour course) is charged for some specialized courses. See the current Schedule of Classes for a complete listing of applicable courses.

Student activities fees

Students who register for on-campus credits are charged an activities fee of \$21.00 each term. The fee for each of the fall and winter terms is \$21.00, and the fee is \$10.50 for each of the spring and summer terms. Additional information on student activities can be obtained from the Dean of Students Office.

Recreation Center fee

All students registered for classes are charged a Recreation Center Fee. The fee for each of the fall and winter terms is \$75.00, and the fee for each of the spring and summer terms is \$47.50. Students registered exclusively in classes that meet off site from the main campus will have the fee waived unless they voluntarily pay the fee in order to have access to the Recreation Center. Additional information on Recreation Center services and fees can be obtained from the Department of Campus Recreation www.oakland.edu.

Late registration fee

Students registering during the late registration period must pay an additional nonrefundable late registration fee of \$35. Students who take courses exclusively within a program scheduled to register after the beginning of classes will not be required to pay this fee if they register during the special registration session scheduled for such groups. Tuition checks and credit card payments returned by the bank will be considered as nonpayment.

Course competency by examination fee

Students who have been approved to update Oakland University credit, which is beyond the six-year time limit, must register for course competency examination credit. The course competency by examination fee will be assessed \$34 per credit.

Late penalty payment

A 1.5% late payment penalty will be assessed monthly on delinquent outstanding student account balances.

Application fee

The application fee for graduate programs is \$50. Payment of this fee must accompany the application for admission for all graduate programs. This is a non-refundable processing fee.

Residential service fees

Residence halls and apartments are financially self-supporting. Housing fees, including room and board, reflect the actual cost of operation and are established by the Oakland University Board of Trustees. The 2005-2006 rate for double room and board is \$6,080, which includes a \$16.00 hall government fee, and is for fall and winter combined. Single room fees, if available, are an additional \$1090. Residence halls offers four meal options:

Block 285 Plus 50 Plan

Students selecting this plan can enjoy:

- 285 meals each semester in Vandenberg Dining Center;
- three meal transfers per week in Pioneer Food Court;
- 50 declining balance points (meal dollars) per semester to purchase food at any Chartwell's food facility on campus or in the Recreation Center on the basis provided for in the agreement.

Block 210 Plus 100 Plan

Students selecting this plan can enjoy:

- 210 meals each semester in Vandenberg Dining Center;
- three meal transfers per week in Pioneer Food Court;
- 100 declining balance points (meal dollars) per semester to purchase food at any Chartwell's food facility on campus or in the Recreation Center on the basis provided for in the agreement.

Block 150 Plus 250 Plan

Students selecting this plan can enjoy:

- 150 meals each semester in Vandenberg Dining Center;
- 250 declining balance points (meal dollars) per semester to purchase food at any Chartwell's food facility on campus or in the Recreation Center on the basis provided for in the agreement.

University Student Apartments are available for single students who are at least 20 years old. Students can select from 2-bedroom, 3-bedroom (handicapped accessible), or 4-bedroom apartment styles. The 2005-2006 academic year rate for a 4-bedroom apartment is \$4,910. Students living in the apartments are not required to have a meal program. Voluntary meal plans are available for purchase.

George T. Matthews Family apartments are available for married students and single parent families. All of the apartments are 2-bedroom, townhouse style. The monthly rental rate is \$685.

A \$100 non-refundable down payment is due with all housing contracts. This down payment will be credited against the first housing payment. Students who sign a housing contract are committing to a binding agreement for the contract period. The housing fees may be paid in full at registration or paid in installments as specified in the Schedule of Classes.

If students withdraw from Oakland University, room and board fees are refunded on a prorated basis less penalty fees as described in the terms and conditions of the contract. Formal notice of withdrawal must be given to the Housing Office.

Refund of tuition and fees

Students who withdraw from Oakland University or drop courses that reduce their total credit load may be eligible to receive a refund of tuition and fees. Failure to drop or withdraw formally will result in forfeiture of any refund. Official drops and complete withdrawals from all courses must be submitted either in person or by certified mail to the Registration Office (100 O'Dowd Hall), or by fax (248-370-3461). Students may also drop courses or withdraw from Oakland University up to the last day of official withdrawal as published in the Schedule of Classes by using www.oakland.edu. See Adjusting courses (add and drop). The date that notification is received in the Registration Office determines the applicable refund. A specific schedule of refunds, with qualifying dates, is published each semester and session in the Schedule of Classes. Information regarding the method of calculating refunds for financial aid recipients can be found in the current Focus on Financial Aid pamphlet, which is provided to financial aid recipients and available to others upon request. Refund checks will be mailed approximately two weeks after a withdrawal has been filed with the Registration Office (with the exception of September and January when refunds are held until after the date of record for release).

Educational expenses

Students agree that their unpaid educational expenses, including without limitation tuition and fees, will be charged to their student account, must be paid in accordance with applicable University payment schedules, are subject to late payment fees and are non-dischargeable educational loans and/or benefits pursuant to 11 U.S.C. § 523(a)(8).

Requirements of the Taxpayer's Relief Act of 1997

The Taxpayer's Relief Act of 1997 was passed by the Congress and signed into federal law by the president in 1997 to offer American taxpayers some tax relief if they made payments during the tax year to a qualified university. Part of this law is a requirement that the university receiving such payments report annually to the taxpayer and the Department of the Treasury the taxpayer's identification number (TIN), also known as the social security

number (SSN), the taxpayer's name and amounts paid to the university during the previous tax year. This information is to be reported regardless of the taxpayer's intention to actually take a credit or deduction under this law. Only students not taking for-credit courses or foreign visitors without taxpayer identification numbers are exempt from this requirement. The university must therefore receive your TIN, or SSN before it can conduct billing and receipting transactions with you. You can find more information about this law on the web at <http://www.nacubo.org/tra97/> or by going to the Internal Revenue Service site <http://www.irs.gov/> and refer to the "Tax Regs" section. This public law is in the Internal Revenue Code, Section 6050S.

Residency classification for admission and tuition purposes

For university purposes, "domicile" is defined as the place where an individual intends his/her true, fixed and permanent home and principal establishment to be, and to which the individual intends to return whenever away. Upon admission to the university, a student is classified either as a Michigan resident or a nonresident based upon information relating to the student's domicile. A determination of Michigan domicile is required for in-state rates to apply, except as stated below.

An individual whose activities and circumstances, as documented to and found by the university, demonstrate that the individual has established a Michigan domicile will be classified as a resident. An individual whose presence in the state is based on activities or circumstances that are indeterminate or temporary, such as (but not limited to) educational pursuits, will be presumed not to be domiciled in Michigan and will be classified as a nonresident. To overcome a presumption of nonresident status, a student must file an Application for Reclassification of Residence Status and document with clear and convincing evidence that a Michigan domicile has been established. The burden of proof is on the applicant.

Evidence of domicile

Certain circumstances, although not controlling, support a claim of domicile. Other circumstances create a presumption against domicile.

Circumstances supporting a claim of domicile include:

- Dependence upon a parent domiciled in Michigan as demonstrated by permanent employment and establishment of a household in the state;
- Employment of the student or the student's spouse in Michigan in a full-time, permanent position, and that employment is the primary purpose for the student's presence in Michigan;
- Residence with Michigan relatives who provide more than half of the student's support including educational costs. This necessarily means that no non-Michigan resident claims the student as a dependent for income tax purposes.

The fact that certain indications of domicile may apply to a student does not mean that the student automatically will be classified as a resident or that the student is relieved of the responsibility for filing an Application. See Residency application process below.

Circumstances that do not in themselves support a claim of domicile include:

- employment that is temporary or short-term military assignment;
- employment in a position normally held by a student;
- ownership or lease of property;
- presence of relatives in the state, except as described above;
- possession of a Michigan driver's license or voter's registration;
- payment of Michigan income or property taxes;
- the applicant's statement of intent to be domiciled in Michigan.

In cases where the university determines that an applicant has not demonstrated establishment of Michigan domicile, unless substantial and new information arises that clearly demonstrates the establishment of domicile, the university will require the applicant to document one year of continuous physical presence in the state as one of the criteria for determining eligibility for resident classification in any subsequent application. The year of continuous presence is never the only criterion used for determining resident eligibility, and, in itself, will not qualify a student for resident status.

In documenting the year of continuous physical presence in Michigan, the applicant will be expected to show actual physical presence by means of enrollment, employment, in-person financial transaction, health care appointments, etc. Having a lease or permanent address in the state does not, in itself, qualify as physical presence. A short-term absence (summer vacation of 21 days or less, spring break and break between fall and winter term), of itself, will not jeopardize compliance with the one year requirement. In determining the effect of a short-term absence, the nature of the absence will be assessed to determine whether it is contrary to an intent to be domiciled in Michigan.

Presumption of domicile

Certain circumstances create a presumption of domicile. However, the presence of such a circumstance does not mean that the student will be classified automatically as a Michigan resident or that the student is relieved of the responsibility to file an application. These circumstances include:

Dependent students

A student is presumed to be a dependent of his or her parents if the student is 24 years of age or younger and has been primarily involved in education pursuits or has not been entirely financially self-supporting through employment.

(a) Residents:

The following apply only if the student has not taken steps to establish a domicile outside of Michigan or any other action inconsistent with maintaining a Michigan domicile.

- A dependent student whose parents are domiciled in Michigan is presumed to be eligible for resident classification.
- A dependent student whose parents are divorced is presumed to be eligible for resident classification purposes if one parent is domiciled in Michigan.
- A student who is living in Michigan and who is permanently domiciled in Michigan does not lose resident status if the parents leave Michigan, provided: (i) that the student has completed at least the junior year of high school prior to the parents' departure, and (ii) that the student remains in Michigan, enrolled as a full-time student in high school or an institution of higher education.

(b) Non-residents: A dependent student whose parents are domiciled outside the state of Michigan is presumed to be a nonresident.

Absences from the state

Individuals domiciled in Michigan immediately preceding certain types of absences from the state may retain their eligibility for resident classification under the following conditions:

- An individual domiciled in Michigan for five years just prior to leaving the state for less than one year may return to the university as a resident for admission and tuition purposes.
- An individual domiciled in Michigan at the time of entry into active military duty, missionary work, Peace Corps or similar philanthropic work does not lose eligibility for resident classification as long as he or she is on continuous active duty and continuously claims Michigan as the state of legal residence for income tax purposes. Dependent children of such an individual also are eligible for resident classification provided: (i) that they are coming to the university directly from high school or they have been continuously enrolled in college since graduating from high school, and (ii) that they have not claimed residency elsewhere for tuition purposes.
- An individual who is domiciled in Michigan immediately preceding an absence from the state for full-time enrollment in school or for a medical residency program, internship or fellowship does not lose eligibility for resident classification provided that the individual has maintained significant ties to the state during his or her absence (e.g., parents still in the state, payment of state taxes, active business accounts), and that the individual has not claimed residency for tuition purposes in another state.

Residence status of aliens

Notwithstanding the above, except for those aliens holding a permanent resident visa, the only aliens eligible for consideration for classification as a resident are those who are on a visa other than a student visa, and who are engaged in permanent employment in the United States, and whose employer has filed or is in the process of filing for permanent resident status on behalf of the alien. An alien will be eligible for consideration if the alien's parents or spouse meet(s) the alien requirements above and dependent status also exists.

Application of in-state tuition rates in special circumstances:

Regardless of domicile, in-state tuition rates apply to the following persons:

- Graduate students who hold an assistantship or fellowship awarded through Oakland University;
- Students employed in Michigan in full-time, permanent positions.

Appeal process

Any student desiring to challenge his or her initial residency classification may appeal the determination to the Residency Reclassification Appeals Office, 101A O'Dowd Hall, (248) 370-3455. The Associate Registrar makes the initial determination of residency. The Registrar is the second level of appeal, and the Residency Reclassification Appeals Committee is the third level of appeal and is composed of two individuals: Vice Provost for Enrollment Management and a representative from the Provost's Office. The committee convenes only as necessary. The determination of the Residency Reclassification Appeals Committee is final.

Residency application process

It is the student's responsibility to apply for admission under the proper residency classification. If a student indicates Michigan resident status on the admissions application and the admissions office questions that status, the student will be classified as a nonresident and notified of the need to file an Application for Reclassification of Residence Status with the Residency Appeals Office. The fact that a student's claim to residency for university purposes is questioned does not necessarily mean that he or she will be ineligible for resident status; it simply means that the student's circumstances must be documented and reviewed. Failure on the part of admissions staff to question a student's claim to resident eligibility does not relieve the student of the responsibility to apply and register under the proper residency classification. Furthermore, the university may audit enrolled or prospective students at any time with regard to eligibility for resident classification and may reclassify students who are registered under an improper residency classification.

The presence of any of the following factors will result in an initial classification as a nonresident:

- Out-of-state employment within the last three years;
- Living out of state at the time of application to the university;
- Attendance or graduation from an out-of-state high school (applies if the individual is 24 years of age or younger);
- Attendance or graduation from an out-of-state high school and involvement in educational pursuits for the majority of time since graduation from high school.

Residency reclassification documentation

The following are required:

- a completed application,
- a written signed statement explaining why Michigan is one's true home,
- a letter from the employer of the family member providing the major support for the student, stating the family member's position title, when the Michigan employment began, and, for aliens, the status of any application for permanent residency; and
- documentation of the Michigan home (lease or home purchase document) must be included.

Applicants also are responsible for providing any other documentation necessary to support their claim to resident eligibility. Additional documentation may be required by the university.

Misrepresentation and falsification of information

Applicants or students who provide false or misleading information or who intentionally omit relevant information in any document relevant to residency eligibility may be subject to legal or disciplinary measures including revocation of admission or expulsion. Students improperly classified as residents based on this type of information will have their residency classification changed and may be retroactively charged nonresident tuition for the period of time they were improperly classified.

■ Financial Aid, Assistantships and Scholarships

Financial aid

Oakland University is one of the most affordable universities in the state. Oakland is committed to making a college education possible for all students. The purpose of the financial aid, scholarship and student employment programs at Oakland University is to help students and their families pay for education expenses. Many programs available to graduate student operate under the assumption that the primary responsibility for financing a college education rests with students and their families. However, a variety of scholarships, grants, loans ad student employment opportunities are available through Oakland University, federal state, local and private sources.

Complete information concerning financial aid, scholarships and student employment is available on the Oakland University website at www.oakland.edu/oakland/financialaid. The website also offers access to financial aid forms.

Admitted students are provided with an Oakland University email address. Financial aid is communicated to students through their OU email address.

Office hours

The Financial Aid Office, which includes student employment, is located in 120 North Foundation Hall. The office is open from 8am to 5pm Monday through Friday. Extended office hours may be announced.

Applying for financial aid

You must be admitted to Oakland University in an eligible degree or certificate program of study to be considered for financial aid. A Free Application for Federal Student Aid (FAFSA) is required. It is recommended that you complete the FAFSA over the Internet at www.fafsa.ed.gov. To maximize your financial aid award package, we recommend you complete your application as soon as possible after January 1 for the upcoming academic year. Be sure to include Oakland University's federal school code of 002307 on your FAFSA. You must complete a FAFSA each year in which you are interested in receiving financial aid.

The Financial Aid Office begins to send financial aid award notifications through your Oakland University email address in March for the upcoming academic year. Financial aid awards and adjustments continue as needed throughout the year as subsequent funding and information become available. Financial Aid notifications provide information concerning the amount and type of

financial aid you are eligible to receive. Financial Aid is initially offered for the regular academic year of fall and winter semesters. If you are interested in receiving financial aid for the spring and summer semesters, you will need to complete a Spring and Summer Financial Aid Application available on the financial aid website.

The Financial Aid Office might need additional information or documentation from you to support your financial aid awards and package. It is important to respond to any request promptly. Delays in providing information and documentation to the Financial Aid Office may affect your financial aid package and/or the transfer of funds to your student account.

Unusual circumstances

Extenuating family circumstances such as long term loss of employment or income, death, separation or divorce or medical/dental expenses not covered by insurance can affect a student's financial aid package. If you would like a review of your financial aid because you have extenuating circumstances, and Unusual Circumstances/Dependency Status Appeal Form is available on the financial aid website.

Sources of financial aid

To assist eligible graduate students in financing their education the university participates in the following programs:

Federal College Work Study

The Federal College Work-Study Program provides jobs for graduate students with financial need and who are enrolled at least half time. Jobs are available on and off campus. Students need to work to earn the award. A Federal College Work Study award does not guarantee a job.

William D. Ford Federal Direct Loan Program

The William D. Ford Federal Direct Loan Program is designed to provide loans to graduate students enrolled at least half time. Eligibility for the subsidized Direct Loan is based on financial need. Students are awarded the maximum eligible subsidized Direct Loan before receiving an unsubsidized Direct Loan award. The annual loan amounts for a graduate student is \$18,500 for each year of study. No more than \$8,500 of the annual amount may be in a subsidized Direct Loan. As a graduate student, the aggregate loan amount is \$138,000 (\$65,000 can be a subsidized Direct Loan.) This limit includes loans received as an undergraduate student.

Repayment of Federal Direct Loans begins six months after a student graduates, withdraws or drops below half time enrollment. A subsidized Direct Loan does not accrue interest before repayment begins or during authorized periods of deferment. An unsubsidized Direct Loan accrues interest from the time the loan is disbursed until it is paid in full. Interest that accrues while in school or during other period of nonpayment is capitalized on the balance of the loan. The interest rate is variable and reevaluated every year but it will not exceed 8.25%. For July 1, 2004 to June 30, 2005 the interest rate for loans while in school was 2.77%. The interest rate for loans in repayment was 3.42%.

Part-time employment

On-campus jobs of varying kinds and durations are provided for students registered at least half-time who wish to work during the school year. Students seeking employment should register in the

financial aid office. Most students who have part-time jobs work 10 to 20 hours each week.

Graduate assistantships and scholarships

A limited number of graduate assistants are appointed in schools and departments offering graduate degree programs. Stipends depend on assignments, hours of work required and qualifications of the assistant. Scholarships in the amount of tuition and fees are available on a competitive basis. Both assistantship and scholarship nominations are made by the individual departments offering graduate programs. To be eligible, students may not be in a conditional admission or probationary status. Graduate assistants must be registered full-time each fall and winter semester in which they hold assistantships. The assistantship and the program of study constitute a full-time commitment; therefore, no additional employment may be undertaken without the permission of the Executive Director of Graduate Study and Lifelong Learning.

Assistants are paid one-fourth of the semester stipend at the end of each month. The first payment in the fall semester is on September 30, the first in the winter semester is on January 31. International students should be aware that they will need approximately \$1,200 to cover their expenses until the end of the first month.

Extremely well-qualified students are invited to apply to the Department of Chemistry for consideration for the Bennett Scholarship in Chemistry. Awards will be granted to full-time students whose undergraduate records not only give evidence of exceptional past academic achievement, but promise future high accomplishment as well. All decisions will be based on a student's complete record, including grades, courses taken, test scores, letters of recommendation and a personal interview.

Graduate assistantship time limit policy

Master's degree students may be supported by Graduate Study and Lifelong Learning funds for a maximum of two years; for doctoral students the limit is four years.

Steven R. and Leah P. Vartanian Endowment Scholarship

Graduate students who may be physically challenged and confined to a wheelchair may apply to the Steven R. and Leah P. Vartanian Endowment Scholarship fund for financial assistance. Applicants for admission to Oakland University who wish to be considered for this scholarship should file a scholarship application with the Graduate Study and Lifelong Learning prior to April 1.

King/Chavez/Parks Future Faculty Fellowship Initiative

Additional scholarships and fellowships are available to qualified students through the Martin Luther King, Jr./Cesar Chavez/Rosa Parks Future Faculty program, which is a joint venture between the State of Michigan and Oakland University. The primary purpose of the program is to increase the pool of minority candidates pursuing academic careers in post-secondary educational institutions. Interested students may obtain additional information from the Graduate Study and Lifelong Learning.

■UNIVERSITY LIBRARY

Interim dean:

Julie H. Voelck

Office of the dean:

Brenda K. Pierce, Assistant to the Dean/Business Manager

Professors emeriti:

Indra M. David, Ph.D., Wayne State University
Suzanne O. Frankie, D.P.A., George Washington University
George L. Gardiner, M.A., University of Chicago
Robert G. Gaylor, M.L.S., University of Oklahoma
Janet A. Krompart, M.L.S., University of California, Berkley

Associate professors:

Kristine S. Condic, M.S.L., Western Michigan University
Frank Lepkowski, A.M.L.S., University of Michigan
Mildred H. Merz, M.L.S., George Peabody University

Assistant professors:

William Cramer, M.S.L.S., Case Western Reserve University
Linda L. Hildebrand, M.A., University of Denver
Elizabeth Kraemer, M.L.S., Wayne State University
Shawn Lombardo, M.L.S., Wayne State University
Richard L. Pettengill, M.S., Columbia University
Ann M. Pogany, A.M.L.S., University of Michigan
Daniel F. Ring, M.L.S., University of Wisconsin, Madison
Robert Slater, M.L.S., University of Illinois, Urbana-Champaign
Anne Switzer, M.L.S., Wayne State University

Managers:

Eric Condic, Library Systems
Louann Stewart, Access Services
Patricia Clark, Interlibrary Loans

Library facilities

Located in the center of campus, the Kresge Library houses collections of books, journals, reference works, government documents, musical scores and recordings, as well as computer workstations to access an array of digital resources. The Library features seating for individual study, rooms for group work, meeting rooms, audiovisual rooms, rooms with adaptive equipment for students with disabilities, and a student lounge. There are also two networked instruction rooms with 25 workstations in each, and two public computer labs.

Library collections

The Kresge Library's collections include over 719,000 books, approximately 1,520 print and 1,940 electronic journal subscriptions, over 230,000 federal and state documents, and more than 1.1 million microforms.

The Library's Homepage and online catalog serve as gateways to dozens of specialized and general research databases, and hundreds

of full-text electronic journals and e-books, covering a wide range of disciplines and research areas.

In addition to electronic reference resources, the Matilda R. Wilson Reference Collection includes atlases, bibliographies, dictionaries, encyclopedias, indexes, yearbooks, and other print reference materials.

Special collections include the Hicks Collection of Early Books By and About Women, the Springer Collection of Lincolniana, the James Collection of Books on Folklore and Witchcraft, and the Bingham Collection of Historical Children's Literature.

The University Archives is a repository of materials relating to the history of Oakland University, and includes copies of all dissertations written at OU, as well as a substantial number of faculty authored monographs.

Library services

Web site: www.kl.oakland.edu
Phone: (248) 370-4426
Send an e-mail message to a librarian: ref@oakland.edu

Reference assistance and research consultations

Librarians provide reference and research assistance in-person at the Reference Desk, by telephone, or by e-mail. Librarians also offer individualized and customized research consultation sessions by appointment. These in-depth, one-to-one sessions are designed to help students identify and use print and digital resources pertinent to their research topics.

Library instruction

As information literacy specialists, librarians provide extensive instruction for students on using print and digital resources, constructing effective research strategies, and evaluating the information identified. These instruction sessions are a core component of every Rhetoric 160 course. Librarians also provide customized, course-related sessions in the disciplines, as well as workshops on special topics.

Circulation and course reserve services

At the Circulation Desk, undergraduate students may borrow books for a period of 3 weeks, with unlimited renewals, unless another borrower has requested the materials. Students may also borrow Course Reserve materials that have been placed on reserve by their professors. An increasing number of reserve items are available in electronic format on the Web.

Interlibrary loan service

Students may request books and articles not owned by the Kresge Library through the Library's interlibrary loan service. Requests can be made in-person, or through the forms available on the Web.

■ COLLEGE OF ARTS AND SCIENCES

217 Varner Hall • (248) 370-2140 • Fax (248) 370-4280 •
<http://www2.oakland.edu/cas>

Acting dean:

Ronald A. Sudol

Associate deans:

Kathleen H. Moore
 C. Michelle Piskulich

Assistant deans:

Janice S. Elvekrog
 Thomas F. Kirchner

Advisory Board

The Advisory Board for the College of Arts and Sciences is composed of outstanding corporate and professional leaders from the Detroit metropolitan area. Board members provide a vital link with our community, consult with us on goals and objectives for the college, and provide advice, direction, and support for the College of Arts and Sciences' educational, research and outreach activities.

Annette Balian

Monica Emerson, Executive Director, Corporate Diversity Office,
 DaimlerChrysler Corporation

Marianne Fey, Executive Vice President, McCann-Erickson Detroit

Robert Gebbie, Partner, Leadership Strategies International

Salvatore Gianino

William Goldenberg, Senior Vice President, Morgan Stanley Dean
 Witter

Nihal Goonewardene, Presidents and CEO, International Science
 and Technology Institute

Gail Haines

William Horton, Attorney at Counselor at Law, Cox, Hodgman &
 Cearmarcho, P.C.

Dr. Jean Holland, M.D., Dermatology

Thomas E. Kimble, (retired) General Motors

Arthur (Bud) Liebler, Liebler!MacDonald Communication
 Strategies

Lynne Portnoy

Richard E. Rassel, Chairman and CEO, Butzel Long

Lois Shaeovsky

Robert I. Schostak, President, Schostak Brothers & Company

Susan J. Takai

Kimberly Whipple

■ College of Arts and Sciences Graduate Programs

The College of Arts and Sciences offers the following programs leading to advanced degrees. College faculty affiliated with each degree program are listed in each departmental area of this catalog as are the specific requirements for each of the degree programs listed below.

Doctor of Philosophy in Biomedical Sciences

with specializations in:

Health and Environmental Chemistry
 (Department of Chemistry)
 Medical Physics (Department of Physics)

Doctor of Philosophy in Applied Mathematical Sciences

with specializations in:

Applied Continuous
 Applied Discrete
 Applied Statistics

Master of Arts in Biology

Master of Science in Biology

Master of Science in Chemistry

Master of Arts in English

Master of Arts in History

Master of Arts in Liberal Studies

Master of Arts in Linguistics with specializations in:

Linguistic Theory
 Teaching English to Speakers of Other Languages
 Teaching Language Arts

Master of Arts in Mathematics

Master of Science in Industrial Applied Mathematics

Master of Science in Applied Statistics

Master of Music with concentrations in:

Composition
 Conducting
 Music Education
 Pedagogy (piano, voice, instrumental)
 Performance (piano, voice instrumental)

Master of Science in Physics

Master of Public Administration (M.P.A.) with concentrations in:

Health Care Administration
 Nonprofit Organization and Management
 Local Government Management
 Criminal Justice Leadership

Graduate Certificate in Statistical Methods

Graduate Certificate in Teaching English as a Second Language

Graduate ESL (Teaching English as a Second Language) Endorsement Program

Post-Master's Certificate in Local Government Management

Post-Master's Certificate in Nonprofit Organization and Management

■ Doctor of Philosophy in Biomedical Sciences

Biomedical Sciences Doctoral Program Committee: Michael D. Sevilla, Professor of Chemistry, Chair; Kathleen H. Moore, Professor of Chemistry; Norman Tepley, Professor of Physics

The College of Arts and Sciences offers a doctoral program in the biomedical sciences with specializations in health and environmental chemistry and in medical physics.

Specialization in health and environmental chemistry

The health and environmental chemistry specialization of the biomedical sciences doctoral program requires a strong academic background in the natural sciences. Graduates will have completed a unified program of formal coursework, as well as independent research. Graduates will possess the theoretical background and practical skills necessary for successful contribution to the solution of environmental and health-related chemical problems. Scientists who graduate with this specialization will be capable of applying state-of-the-art methods to the detection, quantification and management of a wide variety of naturally occurring and synthetic chemical substances and the related chemical processes. No other doctoral program in Michigan focuses on these particular areas of chemistry, yet the contribution of highly trained doctoral-level scientists is essential to the resolution of major problems facing the nation in these areas.

Specialization in medical physics

Medical physicists are providing primary contributions to advances in diagnostic and therapeutic medicine. Laser surgery, ultrasonics, nuclear medicine, radio-therapy and nuclear magnetic resonance imaging are examples of medical modalities developed and implemented by medical physicists. The medical physics specialization of the biomedical sciences doctoral program is designed for students who plan careers in medical research in industrial, hospital and academic settings. The curriculum is designed to prepare the student to engage in research in areas of physics applied to medicine. Ph.D. candidates may elect to do their research either with one of a number of Oakland University faculty currently involved in biomedical research or with one of the scientists in area hospitals which collaborate closely with the university. Among these are Henry Ford Hospital, Detroit, and William Beaumont Hospital, Royal Oak.

Biomedical sciences doctoral program committee

The program committee, appointed by the Dean of the College of Arts and Sciences, consists of one faculty member from each of the specialization areas as well as the coordinator of graduate programs in the College of Arts and Sciences, who serves as chair of the program committee. The program committee advises the Dean of the College of Arts and Sciences on admission of students, selection of student committees, proposals for changes in degree requirements and approval of doctoral dissertations.

Specialization committees

Two specialization committees, appointed by the Dean of the College of Arts and Sciences on recommendations from the chairs of the chemistry and physics departments, are responsible for preliminary screening of applications for admission, preliminary approval of dissertation committees, approval of course selections by each student, certification of fulfillment of proficiency requirements by each student, administration and grading of preliminary examinations for each student, and proposal of any modifications in degree requirements for students in that specialization. Each specialization committee appoints specific faculty members to advise each incoming student selecting that specialization until the student's dissertation committee is established.

Dissertation committee

A dissertation committee consisting of at least three members, one of whom will serve as dissertation adviser, will be chosen by the specialization committee and the student in question and approved by the Dean of the College of Arts and Sciences. The student's dissertation adviser will be chairperson of the committee. The committee is charged with the guidance of the student in course selection, review of dissertation proposals before initiation of a project and approval of the completed dissertation.

Admissions

Students will be considered for admission if they hold baccalaureates in biology, chemistry, mathematics, physics, engineering or other disciplines related to a program specialization. Admission is highly selective; the prospective student should submit a graduate application, official transcripts from all colleges and universities previously attended, letters of recommendation from three faculty members capable of evaluating scholarly achievements and potential for independent research, and results of the Graduate Record Examination (GRE) including the subject test appropriate to the desired specialization.

Degree requirements

The basic requirements for the Ph.D. in biomedical sciences are completion of a unified program of formal coursework and independent research approved by the candidate's dissertation committee and the appropriate specialization committee. All requirements for the degree must be completed within seven years from the time of admission to the program.

Proficiency of entering students

Each student entering the program must demonstrate proficiency in specific areas of coursework. Upon entering the program the student must consult with the appropriate specialization adviser who will plan a program of coursework to eliminate any deficiencies in the student's preparation. Proficiency is defined as satisfactory knowledge of coursework equivalent to the following Oakland University courses:

- a. students in the health and environmental chemistry specialization must establish proficiency in analytical chemistry (CHM 426) and biochemistry (CHM 454); and in at least two of the following: inorganic chemistry (CHM 463), physical chemistry (CHM 343), cell biology (BIO 309), or physiology (BIO 321).

b. students in the medical physics specialization must establish proficiency in modern physics (PHY 371), physical chemistry (CHM 343) and in at least three of the following: computer programming, differential equations (APM 257), electronics (PHY 341, 347), electricity and magnetism (PHY 381), physiology (BIO 207 or BIO 321) and statistics (STA 226).

In every case the appropriate specialization committee will approve course programs and will certify the student's proficiency in these subject areas.

Preliminary examination

Within two years after admission into the program the student must pass a comprehensive written and oral examination. The comprehensive written examination may consist of a single examination or a series of examinations. The examination is intended to determine the extent of the student's knowledge and fitness for the doctoral degree and will be designed and evaluated by the specialization committee. If the student does not pass the examination, the specialization committee may allow the student to retake the examination within one year. Failure to pass the examination within two attempts shall constitute failure in the Ph.D. program.

Research and dissertation

An integral and major component of the program is the successful completion of original research utilizing state-of-the-art experimental or theoretical methods to study a problem of current interest. Each student shall, in consultation with his/her adviser, prepare a dissertation proposal outlining the problem to be studied, a survey of the appropriate literature, a description of the appropriate techniques, and an outline of the experiments to be performed. The student shall, at the request of the dissertation committee, orally defend the proposal or elaborate on the methods for data collection and analysis. Approval of the proposal by the committee is required prior to commencing research. The project shall be deemed ready for preparation of dissertation at such time as the student's committee agrees that the student has completed the project and that the student is an expert in the use of the specific methods required by the project. At that time, the student shall prepare a doctoral dissertation for submission to the committee and shall defend the dissertation in a public oral examination conducted by the committee and attended by the specialization committee. Acceptance of the dissertation by Graduate Study and Lifelong Learning requires favorable recommendations by the dissertation and specialization committees. All theses/dissertations must conform to university standards (see "Master's thesis and doctoral dissertation" in the Policies and Procedures section of this catalog).

Residence

All students are required to fulfill a residency requirement for this program. Although students may complete some of the program on a part-time basis, continuous full-time enrollment is highly preferred. The minimal residency requirement shall be full-time residency (12 credits per semester) for at least three consecutive full semesters (spring-summer terms are considered a full semester), with at least two of these devoted primarily to the student's research project.

Credit requirement

A minimum of 90 credits beyond the baccalaureate is required, including at least 30 credits of dissertation research. Transfer credits must meet graduate-level requirements and receive approval by the appropriate specialization committee and Graduate Study and Lifelong Learning. All courses taken by each student must be approved by a specialization committee. Each specialization has a set of required areas of graduate-level proficiency and may also require a minimum number of hours of elective courses. Specific requirements for each specialization are shown under the departmental sections.

■ DEPARTMENT OF BIOLOGICAL SCIENCES

375 Dodge Hall • (248) 370-3550 • Fax (248) 370-4225 •
<http://www2.oakland.edu/biology>

Chair:

Arik Dvir

Professors emeriti:

Francis M. Butterworth, Ph.D., Northwestern University
William C. Forbes, Ph.D., University of Connecticut; Ed.D., Columbia University
Esther M. Goudsmit, Ph.D., University of Michigan
Egbert W. Henry, Ph.D., The City University of New York
Asish C. Nag, Ph.D., University of Alberta (Canada)
Nalin J. Unakar, Ph.D., Brown University

Professors:

G. Rasul Chaudhry, Ph.D., University of Manitoba (Canada)
George J. Gamboa, Ph.D., University of Kansas
Sheldon R. Gordon, Ph.D., University of Vermont
R. Douglas Hunter, Ph.D., Syracuse University
Charles B. Lindemann, Ph.D., State University of New York at Albany
Virinder K. Moudgil, Ph.D., Banaras Hindu University (India)
John R. Reddan, Ph.D., University of Vermont

Associate professors:

Keith A. Berven, Ph.D., University of Maryland
John D. Cowlishaw, Ph.D., Pennsylvania State University
Arik Dvir, Ph.D., Hebrew University of Jerusalem (Israel)
Thaddeus A. Grudzien, Jr., Ph.D., Virginia Polytechnic Institute and State University
Fay M. Hansen, Ph.D., Medical College of Wisconsin
Anne L. Hitt, Ph.D., Vanderbilt University
Barkur S. Shastry, Ph.D., University of Mysore (India)
Satish K. Walia, Ph.D., Mahrishi Dayanand University (India)
Douglas L. Wendell, Ph.D., University of California, Davis
Jill H. Zeilstra-Ryalls, Ph.D., Purdue University

Assistant professors:

Shailesh K. Lal, Ph.D., University of Nebraska
Gabrielle A. Stryker, Ph.D., Johns Hopkins University

Adjunct professors:

Jeffrey L. Garvin, Ph.D., Duke University
Tom Madhavan, M.D., University of Madras (India)
V. Elliot Smith, Ph.D., Scripps Institution of Oceanography

Adjunct associate professors:

Sumit Dinda, Ph.D., Oakland University
Nalini Motwani, Ph.D., Wayne State University
Miguelangelo J. Perez-Cruet, M.D., Tufts University

Adjunct assistant professors:

Daniel M. Gedner, D.V.M., University of Saskatoon (Canada)
Andrew F.X. Goldberg, Ph.D., Brandeis University

Degree programs

Master of Science in Biology
Master of Arts in Biology

■ Master of Science in Biology

Coordinator:

Keith A. Berven

Description

The program leading to a Master of Science provides advanced training to students seeking employment in biological disciplines. The Master of Science in biology also prepares students for entrance into Ph.D. programs.

The Master of Science program consists of two tracks: the cellular/molecular biology track for those students interested in organ systems or lower levels of biological organization, and the ecology, evolution and behavior track for students interested in whole organisms or higher levels of biological organization. The graduate program affords students the opportunity to interact closely with the biology faculty as they complete their thesis work.

Admission requirements

Admission to the program requires, but is not limited to:

- A bachelor's degree in biology or related subject (e.g., biochemistry, molecular biology, botany or zoology) from a regionally accredited institution or if the degree is in another discipline the candidate must have completed 20 credits in biology, 8 credits in mathematics, 8 credits in physics and 15 credits in chemistry. Students with deficiencies in these areas may be conditionally admitted with the stipulation that the deficiencies will be corrected.
- An undergraduate grade point average of 3.00 or better (on a 4.00 scale). Exceptions to the GPA requirement may be made if evidence of the capacity for graduate study is provided.
- Biographical sketch stating career goals.
- Transcripts of all college-level work.
- A minimum of two letters of reference.
- Students with an undergraduate degree in biology (or related subject) from a regionally accredited institution must provide scores on the general Graduate Record Examination (GRE). All other students must also provide scores on the biology GRE subject test.
- International students must submit official TOEFL scores, scores for both the general and subject GRE, a transcript evaluation, and meet all requirements for admission for international students.

Degree requirements

The candidate for the cellular/molecular biology track must complete 36 credits, including four 4-credit topic courses: BIO 511, 513, 515, 517 (or their equivalents as approved by the student's thesis committee and the chair of the Graduate Committee). At least 8 credits must be credits earned in graduate research (BIO 690).

The candidate for the ecology, evolution and behavior track must complete 36 credits, including four 3-credit topics courses: BIO 581, 582, 583, 584 (or their equivalents as approved by the student's thesis committee and the chair of the Graduate Committee). At least 8 credits must be earned in graduate research (BIO 690).

Graduate students in both tracks are required to enroll in BIO 691 and present a departmental seminar on their thesis after it has been approved by their thesis committee, and prior to the deadlines (last day for thesis/dissertation public defense or thesis presentation) provided by Graduate Study and Lifelong Learning.

During the first semester of studies, the candidate must choose a thesis adviser with whom he or she will plan and conduct the thesis research. The adviser and candidate will then select a thesis committee. A thesis proposal and a thesis are required for both tracks. The thesis proposal must be approved by the thesis committee before the end of the student's second semester. When completed, the thesis must also be approved by the thesis committee before it can be submitted to Graduate Study and Lifelong Learning for approval. All theses must conform to university standards (see "Master's thesis and doctoral dissertation" in the Policies and Procedures section of this catalog). Students of both tracks must attend department seminars during every semester of their graduate studies.

Cellular/Molecular Biology Track (36 credit hours)

BIO 511*	Advanced Topics in Cellular Biochemistry and Metabolism	4
BIO 513*	Advanced Topics in Cell Physiology	4
BIO 515*	Advanced Topics in Mechanisms of Development	4
BIO 517*	Advanced Molecular Genetics	4
BIO 690	Graduate Research	8
BIO 691	Thesis Seminar	1
Electives		11

Ecology, Evolution, Behavior Track (36 credit hours)

BIO 581*	Topics in Physiological Ecology	3
BIO 582*	Topics in Evolutionary Biology	3
BIO 583*	Topics in Community and Population Biology	3
BIO 584*	Topics in Behavioral Biology	3
BIO 690	Graduate Research	8
BIO 691	Thesis Seminar	1
Electives		15

*or their equivalents as approved by the chair of the Graduate Committee

■ Master of Arts in Biology

Coordinator:

Keith A. Berven

Description

The M.A. in biology is a non-thesis master's program that has a larger course component, but a lesser research component, than the M.S. The M.A. is designed for those students who wish to teach at the secondary or community college level and students who hold full-time jobs.

Admission requirements

The admissions requirements for the M.A. are identical to those of the M.S.

Degree requirements

The candidate for the M.A. degree must complete 36 credits including 28 credits of biology graduate level lecture courses with a minimum of three courses from the cell/molecular track: BIO 511, 513, 515, 517 (or their equivalents as approved by the chair of the Graduate Committee), and a minimum of three courses from the ecology, evolution, behavior track: BIO 581, 582, 583, 584 (or their equivalents as approved by the chair of the Graduate Committee). In addition, M.A. students must complete 8 credits of BIO 690 or 4 credits of BIO 690 combined with a relevant, four-credit course in another discipline (such as education, health sciences, chemistry, physics, mathematics or an additional course in biology). The maximum number of credits that can be transferred from another institution is nine.

M.A. students will earn their 4-8 credit hours of BIO 690 by working with one or more faculty members on a research project. The student will be required to write a report on their BIO 690 research. The departmental graduate committee will determine if students have met the degree requirements for the awarding of the M.A. in biology.

Course requirements (36 credit hours)

At least three courses from the following:

BIO 511*	Advanced Topics in Cellular Biochemistry and Metabolism	4
BIO 513*	Advanced Topics in Cell Physiology	4
BIO 515*	Advanced Topics in Mechanisms of Development	4
BIO 517*	Advanced Molecular Genetics	4

At least three courses from the following:

BIO 581*	Topics in Physiological Ecology	3
BIO 582*	Topics in Evolutionary Biology	3
BIO 583*	Topics in Community and Population Biology	3
BIO 584*	Topics in Behavioral Biology	3
Electives	(graduate-level biology courses):	0 – 7

BIO 690	Graduate Research <i>or</i>	8
BIO 690	Graduate Research (4) and a cognate course (4)	(8)

*or their equivalents as approved by the chair of the Graduate Committee.

Research areas and facilities

The department, housed in both Dodge Hall and the Science and Engineering Building, is engaged in a variety of research programs including angiogenesis, sperm motility, aquatic biology, hormone action, microbiology, parasitology, molecular biology, insect behavior, vertebrate ecology, physiology of the eye, cell physiology, gene regulation, genomics and bioinformatics.

■ DEPARTMENT OF CHEMISTRY

260 Science and Engineering Building • (248) 370-2320

Fax (248) 370-2321

<http://www2.oakland.edu/chemistry/>
chemgradinfo@ouchem.chem.oakland.edu

Chair:

Mark W. Severson

Distinguished professor emeritus:

Paul Tomboulian, Ph.D., University of Illinois

Professors emeriti:

Gotfried Brieger, Ph.D., University of Wisconsin
Kenneth M. Harmon, Ph.D., University of Washington
Steven R. Miller, Ph.D., Massachusetts Institute of Technology
Robert L. Stern, Ph.D., Johns Hopkins University

Distinguished professor:

Michael D. Sevilla, Ph.D., University of Washington

Professors:

Maria Bryant (Szczesniak), Ph.D., University of Wroclaw (Poland)
Arthur W. Bull, Ph.D., Wayne State University
Denis M. Callewaert, Ph.D., Wayne State University
Dagmar R. Cronn, Ph.D., University of Washington
Kathleen H. Moore, Ph.D., Wayne State University
Joel W. Russell, Ph.D., University of California, Berkeley
Mark W. Severson, Ph.D., University of Minnesota
R. Craig Taylor, Ph.D., Princeton University

Associate professors:

Roman Dembinski, Ph.D., Polish Academy of Science (Poland)
Julien Gendell, Ph.D., Cornell University
John V. Seeley, Ph.D., Massachusetts Institute of Technology
Xiangqun Zeng, Ph.D., State University of New York, Buffalo

Assistant professors:

Amanda Bryant-Friedrich, Ph.D., Ruprecht-Karls University (Germany)
Ferman Chavez, Ph.D., University of California, Santa Cruz
John M. Finke, Ph.D., University of California, San Diego
Linda Schweitzer, Ph.D., University of California, Los Angeles

Special instructor:

Ghassan M. Saed, Ph.D., University of Essex (United Kingdom)

Adjunct professors:

David Becker, Ph.D., University of Washington
Grzegorz Chalasinski, Ph.D., University of Warsaw (Poland)
Anna C. Ettinger, Ph.D., University of Illinois
John M. Finke, Ph.D., University of California, San Diego
Gholam-Abbas Nazri, Ph.D., Case Western Reserve University
Fazlul Sarkar, Ph.D., Banaras Hindu University (India)

Adjunct assistant professors:

Janet Bennett, Ph.D., Oakland University
Gerald Compton, M.S., Oakland University
Naomi Eliezer, Ph.D., Hebrew University of Jerusalem

Degree programs

Doctor of Philosophy in Biomedical Sciences: Health and Environmental Chemistry

Master of Science in Chemistry

■ Doctor of Philosophy in Biomedical Sciences: Health and Environmental Chemistry

Graduate Coordinator:

Kathleen H. Moore

The College of Arts and Sciences offers a doctoral degree in biomedical sciences with a specialization in health and environmental chemistry which is centered in the Department of Chemistry. The program requires a strong academic background in the physical sciences. Graduates will have completed a unified program of formal coursework, as well as independent dissertation research, and will possess the theoretical background and practical skills necessary for successful contribution to the solution of environmental and health-related chemical problems. Scientists who graduate with this specialization will be capable of applying state-of-the-art methods to the determination, quantification and management of a wide variety of naturally occurring and synthetic chemical substances and the related chemical processes. No other doctoral program in Michigan focuses on these particular areas of chemistry, yet the contributions of highly trained doctoral-level scientists are essential to the resolution of major problems facing the nation in these areas.

Required areas of graduate level proficiency

Areas of graduate level proficiency required for the health and environmental chemistry specialization and the courses which fulfill them are as follows: analytical chemistry (CHM 521 or 522), biochemistry (CHM 550, 553, or 554), toxicology (ENV 484 and CHM 581), and environmental science (ENV 485 or 486). In addition to the five proficiency courses, students will take 12 credits of advanced coursework which is related to their dissertation area and 2 credits of doctoral seminar (CHM 685). Attendance at departmental seminars is required.

Admission requirements

For information on admission criteria, procedures and general degree requirements, see the Biomedical Sciences Doctoral Program section in this catalog. A detailed description of policies and procedures is also available from the program coordinator.

■ Master of Science in Chemistry

The Master of Science in Chemistry can be viewed as either a terminal or non-terminal degree. By itself it serves as preparation for employment in chemical and related industries, a wide range of government agencies, and two-year college teaching. It also prepares the student for further study toward advanced degrees in chemistry, pharmacology, toxicology, oceanography, medicine, environmental science, and related fields. The program may be adapted to both full-time and part-time students.

The Master of Science in Chemistry is offered in both thesis and non-thesis plans. The thesis plan, which includes a significant laboratory or theoretical research component, is particularly valuable for persons planning to pursue a future Ph.D. degree, or for those preparing for or engaged in industrial laboratory employment. The non-thesis option is designed for those students who either cannot schedule or do not need the thesis research component, and offers opportunity for extended study of advanced chemistry for persons currently employed in industry or teaching professions, or for those who wish a more rigorous technical background ancillary to professional employment in business, law or medicine.

With appropriate course selection, the Master of Science candidate can focus his/her graduate work in a traditional area of chemistry (analytical, biochemistry, inorganic, organic or physical) or in an interdisciplinary area such as environmental chemistry, chemical education, polymer chemistry or toxicology.

Admission requirements

The applicant for admission to regular status in the Master of Science program must have received a bachelor's degree from a regionally accredited institution. Students should have completed at least 36 credits in chemistry (including general, organic, physical and analytical chemistry), 8 credits in calculus, and 8 credits in physics. Students with deficiencies in these areas will need to correct them. Applicants with degrees over five years old may also need to complete additional coursework. A grade point average of at least 3.00 (on a 4.00 scale) in these courses is usually required, but applicants will be considered on their individual merits upon recommendation of persons familiar with each applicant's academic background. The Graduate Record Examination (GRE) may be required, specifically if the applicant does not hold a degree from a regionally accredited institution.

Applicants who do not meet the above requirements may be admitted with probationary status into special graduate status or into post-baccalaureate status.

Degree requirements (thesis plan)

The candidate for the thesis plan Master of Science in Chemistry must complete 32 credits in courses carrying graduate credit, of which 24 credits must be in chemistry. Courses with 400-level numbers may be included providing they do not duplicate courses in

the student's undergraduate degree. At least one lecture course must be taken in each of four different areas chosen from biochemistry, inorganic chemistry, organic chemistry, physical chemistry, polymer or industrial chemistry, analytical chemistry and environmental science. At least 8 of the 32 credits must be in CHM 690. The candidate must have demonstrated accomplishment in research and must complete a thesis approved by a departmental thesis committee before receiving the degree. All theses must conform to university standards (see "Master's thesis and doctoral dissertation" in the Policies and Procedures section of this catalog). No minimum time can be specified for the degree program. Students working on a continuing research project should be registered concurrently for at least 1 credit of CHM 690. Courses taken without an adviser's approval may be excluded from those to be applied to the degree.

Degree requirements (non-thesis plan)

The candidate for the non-thesis plan Masters of Science in Chemistry must complete 32 credits in courses carrying graduate credit, of which 24 credits must be in chemistry. Courses with 400-level numbers may be included providing they do not duplicate courses in the student's undergraduate degree. At least one lecture course must be taken in each of four different areas chosen from biochemistry (or approved biology courses), inorganic chemistry, organic chemistry, physical chemistry, polymer or industrial chemistry, analytical chemistry and environmental science. Each student will be assigned a two-person committee responsible for planning a suitable set of courses which will meet the departmental requirements and the student's particular needs. This might include either concentration in a specialized area related to employment or a broad background in preparation for teaching. Courses taken without the committee's approval may be excluded from those to be applied to the degree. For students interested in a research experience, up to 6 credits of CHM 690 may be included in the program by arrangement with an individual faculty researcher. No minimum time can be specified for the degree program.

Research fields

Current research interests of the faculty include: chemistry of free radical species generated from biological intermediates; fate of toxic organic compounds in the environment; electroanalytical and surface chemistry at solid/liquid interface; computational modeling of intermolecular interactions and surface phenomena; metabolism and biological activity of modified fatty acids and xenobiotic carboxylic acids; physiologic and pathologic mechanisms that modulate immune responses; synthesis and characterization of novel organic, organometallic and inorganic compounds with potential biochemical significance; synthetic modeling of metalloenzyme active sites; chemical education software; trace environmental analyses and environmental modeling; and novel analytical instrumentation. For current, detailed information on individual research efforts, please consult the faculty section of the Department of Chemistry web site www2.oakland.edu/chemistry.

■ DEPARTMENT OF ENGLISH

517 Wilson Hall • (248) 370-2250 • Fax (248) 370-4429 •
<http://www2.oakland.edu/english>

Chair:

Kevin T. Grimm

Distinguished professor emerita:

Gertrude M. White, Ph.D., University of Chicago

Professors emeriti:

Joseph W. DeMent, Ph.D., Indiana University
Thomas Fitzsimmons, M.A., Columbia University
Nigel Hampton, Ph.D., University of Connecticut
James F. Hoyle, Ph.D., Princeton University
David W. Mascitelli, Ph.D., Duke University
Donald E. Morse, Ph.D., University of Connecticut
Brian F. Murphy, Ph.D., University of London (United Kingdom)
Joan G. Rosen, M.A., Wayne State University
William Schwab, Ph.D., University of Wisconsin

Distinguished professors:

Jane D. Eberwein, Ph.D., Brown University
Robert T. Eberwein, Ph.D., Wayne State University

Professors:

Brian A. Connery, Ph.D., University of Arizona
Edward Haworth Hooppner, Ph.D., University of Iowa
Jude V. Nixon, Ph.D., Temple University

Associate professors:

Robert F. Anderson, Ph.D., University of Rochester
Gladys T. Cardiff, Ph.D., Western Michigan University
Natalie Bell Cole, Ph.D., State University of New York at Buffalo
Annette Gilson, Ph.D., Washington University, St. Louis
Kevin T. Grimm, Ph.D., University of Virginia
Susan E. Hawkins, Ph.D., University of Oregon
Niels Herold, Ph.D., University of California, Berkeley
Nancy L. Joseph, Ph.D., Florida State University
Kathleen A. Pfeiffer, Ph.D., Brandeis University

Assistant professor:

Jeffrey Insko, Ph.D., University of Massachusetts, Amherst

Special instructors:

Linda L. McCloskey, M.A., Oakland University
Jimmy T. McClure, M.A., Oakland University
Rachel V. Smydra, M.A., Eastern Michigan University

Degree program

Master of Arts in English

■ Master of Arts in English

The program leading to the degree of Master of Arts in English provides training for students interested in increasing their proficiency in the study of English and American literature and language.

The basic curriculum emphasized major critical approaches rather than specialization within historical periods. Opportunity is offered for scholarly, pedagogical and creative application of such approaches to literature and language. The program serves the needs of those whose eventual goal is the Ph.D. degree; those who teach in secondary schools and who are preparing to teach in junior and community colleges; and those seeking an opportunity to enhance their analytical skills as they study literature from multiple perspectives.

Admission terms and deadlines

The application deadlines for the Master of Arts in English are April 1 for students entering in the fall semester and November 20 for students entering in the winter semester. There are no admits for spring or summer semesters. The program does not accept students into the Special Graduate status.

Admission requirements

Admission to the department's advanced degree program is selective. Chief qualifications are a Bachelor of Arts degree from a regionally accredited institution and academic ability as indicated by the applicant's past record. Applicants must also explain in a statement their reasons for wishing to pursue the advanced study of literature and language. An English major, as such, is not regarded as indispensable background, but a substantial number of undergraduate English courses will normally be expected to appear in the applicant's record. Generally, successful candidates will have earned a 3.50 average in English courses.

In addition to the applicant's statement of purpose, applications should include the following materials:

1. Three letters of recommendation from professors familiar with the candidate's academic potential. These letters should speak to the candidate's record and potential in literary studies.
2. A writing sample, a critical or interpretive essay, of no more than 8 double-spaced typed pages, which demonstrates the candidate's qualification for graduate study in literature.

All entering graduate students must meet minimal university graduate admission standards. All will be enrolled conditionally until they are admitted by the department to degree candidacy. Consideration for candidacy comes after the student has successfully completed 16 credits of graduate work at Oakland University including the literary studies core. Normally, all courses offered toward candidacy must be completed with grades of 3.0 or better. Two grades below 3.0 will automatically render a student subject to evaluation and possible dismissal, as will one grade below 2.5. No transfer credits will be evaluated until a student is admitted to degree candidacy.

When students of specially-recommended ability, but with insufficient background — in extent or balance of previous studies — are admitted, they will be advised to improve their preparation and will usually be asked to take an appropriate number of departmental undergraduate courses before commencing graduate work. Accordingly, their degree programs may require a proportionately longer period to complete.

Enrollment for all courses is subject to the written approval of the chairperson or a graduate adviser.

Degree requirements

Nine courses (36 credits) are required, beginning with the three courses comprising the literary studies core: ENG 533, a course in the methods of literary history (ENG 543, 544, 545 or 546) and a course in literary kinds (ENG 563, 564, 565 or 566). The remaining six courses, chosen in consultation with an adviser, must include two 600-level seminars, or a 600-level seminar and ENG 690, the Master's Project. Completion of the literary studies core must occur before a student is considered for candidacy and is a prerequisite for all 600-level English courses. Within the 36 credits required for the degree, a student may be permitted to take one graduate course in a cognate liberal arts field, or ENG 510 in lieu of a cognate, but only with specific approval of the adviser. Students planning on obtaining a Ph.D. should become proficient in at least one foreign language.

Course requirements (36 credits)

Core Courses:

ENG 533	Critical Theory and Practice	4
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Methods of literary studies chosen from:		4
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ENG 543	Early British	
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ENG 544	Later British	
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ENG 545	American	
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ENG 546	Special Topics	
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Literary kinds chosen from:		4
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ENG 563	Fiction	
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ENG 564	Drama	
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ENG 565	Poetry	
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ENG 566	Modes of Special Forms	
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Six additional courses to include:		24
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Two 600-level seminars <i>or</i>	
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One 600-level seminar and ENG 690 Master's Project	
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Classification of course offerings

The graduate program of the Department of English offers four kinds of courses.

1. Undergraduate courses (300 and 400 levels)

The student may take up to two undergraduate courses from regular departmental 300-level course offerings or, in rare cases, from 400-level courses exclusive of 498 and 499. This option exists primarily to prepare students for seminars in areas of language and literature for which they are not adequately trained. No undergraduate writing courses may be applied to the graduate

program. Students must have prior written permission of a graduate adviser to register in an undergraduate course.

2. Core courses (500 level)

500-level courses are designed to familiarize the student with the principal approaches to literature and language and with methods and tools appropriate to those approaches. These courses (ENG 533, 543, 544, 545, 546, 563, 564, 565, 566) are central to the graduate program because they prepare the student for the more specialized work of the seminars. (ENG 500, 510 and 534 are not core courses.)

3. Seminars and the master's project (600 level)

The graduate seminar allows the student to do independent work in an area in which the instructor has special sophistication, and at the same time to gain criticism and support from other students working in the same area. The instructor will prescribe the subject matter of each course during any given semester. Completion of the literary studies core is a prerequisite for enrollment in a 600-level course. Seminars are limited to 12 students. ENG 690, The Master's Project (optional), involves completion of a project of a scholarly or pedagogical nature, proposed initially by the candidate. Any written work to be submitted in partial or total fulfillment of a project should not exceed 7,500 words. Projects normally arise out of graduate course work. The course is open only to students who can propose an independent project and who have made arrangements with a member of the department interested in supervising it. Students seeking approval to proceed should submit an application for ENG 690 (available in the department office) and a prospectus of the project prior to the beginning of the semester in which they will complete the project. For students undertaking the Master's Project during the winter or spring semester, this application is due four weeks prior to the start of the semester; for fall semester, it is due six weeks prior.

4. Summer workshops

Concentrated four-week workshops on literature, language, writing and other topics of interest to high school teachers and post-baccalaureate students are offered in the summer session. They are designed as refresher courses or as introductions to topics of particular contemporary concern. Workshops grant one to four hours of graduate credit. Students may not offer more than 4 credits of workshops toward fulfillment of requirements for advanced degrees except by permission of the graduate committee of the department. Candidates for degrees must consult with their advisers before electing summer workshops.

When there is significant change in content, graduate courses may be repeated with permission of the chair of the Graduate Program Committee.

Cognate courses

Students in the M.A. program may, with written approval of the chairperson of the Graduate Program Committee, offer one graduate course from another department for credit toward their degrees. Such courses should be advanced work in a field relevant to the students' special interests and needs.

■ DEPARTMENT OF HISTORY

378 O'Dowd Hall • (248) 370-3510 • Fax (248) 370-3528
<http://www.oakland.edu/history/>

Chair:

Carl R. Osthaus

Professors emeriti:

Charles W. Akers, Ph.D., Boston University
V. John Barnard, Ph.D., University of Chicago
Leonardas V. Gerulaitis, Ph.D., University of Michigan
James D. Graham, Ph.D., Northwestern University
Robert C. Howes, Ph.D., Cornell University
Roy A. Kotynek, Ph.D., Northwestern University
W. Patrick Strauss, Ph.D., Columbia University
S. Bernard Thomas, Ph.D., Columbia University
Anne H. Tripp, Ph.D., University of Michigan
Richard P. Tucker, Ph.D., Harvard University

Professors:

Linda K. Benson, Ph.D., University of Leeds (England)
Ronald C. Finucane, Ph.D., Stanford University
Mary C. Karasch, Ph.D., University of Wisconsin, Madison
Carl R. Osthaus, Ph.D., University of Chicago

Associate professors:

Sara E. Chapman, Ph.D., Georgetown University
Daniel J. Clark, Ph.D., Duke University
DeWitt S. Dykes, Jr., M.A., University of Michigan
Todd A. Estes, Ph.D., University of Kentucky
Karen A. J. Miller, Ph.D., Columbia University
Seán F. Moran, Ph.D., American University

Assistant professors:

Getnet Bekele, Ph.D., Michigan State University
Derek K. Hastings, Ph.D., University of Chicago
Weldon C. Matthews, Ph.D., University of Chicago
Matthew A. Sutton, Ph.D., University of California, Santa Barbara

■ Master of Arts in History

This program may serve either as a terminal degree or as a bridge to more advanced study and is designed to accommodate both full- and part-time students. In addition to a complete daytime schedule, late afternoon and evening courses are also available.

Application terms and deadlines

Students may be admitted at four different times: fall semester, winter semester, spring or summer session.

Admission requirements

Admission to the Master of Arts program in history is selective. The department will consider applicants who hold the degree of bachelor's degree in history from a regionally accredited institution, although the department reserves the right to waive the requirement of a history degree for students with outstanding undergraduate records. In addition, the applicant's credentials, including transcripts and letters of recommendation, must give evidence of academic distinction. Of the letters of recommendation, at least one should be from the applicant's current or former professor. The application materials must also include a detailed statement of purpose or justification for entering the graduate program, and an academic writing sample (preferably a history research paper). A grade-point average of 3.50 (on a 4.00 scale) in undergraduate history courses and a GPA of 3.20 in all undergraduate work will ordinarily be considered the minimum standards for admission.

Students of superior promise but with deficient preparation in history may be admitted on condition of completing additional undergraduate history courses or earning grades of 3.5 or above in each of the first two graduate history courses. The department reserves the right to waive any of its requirements in exceptional circumstances with the concurrence of Graduate Study and Lifelong Learning.

Degree requirements

Candidates for the degree of Master of Arts in history must complete 38 graduate-level credits in history (in special cases the Department of History graduate committee may permit a candidate to substitute up to 12 graduate credits in related fields for history credits). At the time of admission, each candidate will choose a major field from the following three areas: United States; Europe (including Great Britain and Russia); Africa, Asia, and Latin America. The candidate must take at least 20 credits in the major field. All candidates must complete at least one colloquium (HST 610), two research seminars (HST 680), or two research tutorials (HST 681), or one of each, and the field examination or thesis (HST 600). Students may not enroll for graduate courses corresponding in title and/or coverage with undergraduate history courses for which they have previously gained credit at Oakland University. Upon the successful completion of three or four graduate courses (12-16 credits), candidates will (a) elect to complete their degree by thesis or by field examination; and (b) select a departmental Mentor and Co-mentor, notifying the graduate adviser of their choices.

Candidates who elect to offer a thesis in partial fulfillment of the degree requirements will fulfill all the requirements listed above; they will take research seminars or tutorials in the major field as thesis-writing courses, and their comprehensive oral examination will concentrate on the thesis and historical problems related to it. A detailed thesis prospectus is to be provided to the Mentor and graduate adviser, preferably upon completion of 24 credits in the candidate's program. All theses/dissertations must conform to university standards (see "Master's thesis and doctoral dissertation" in the Policies and Procedures section of this catalog).

Candidates who do not elect to offer a thesis will fulfill all the requirements listed above; they must take at least one seminar or research tutorial in the major field, and their examination will be devoted to the history of the major field, as described below under Field or Thesis examination (HST 600).

There is no general foreign language requirement for the M.A. in history, but to study certain fields the candidate may need a reading knowledge of a foreign language. Candidates must consult their advisers for the language requirements of specific courses and programs.

Field or Thesis Examination (HST 600)

The examination is taken in the last semester of the student's program; each student must secure permission of the faculty adviser before registering. Candidates who submit a thesis will be examined orally for up to one hour on the thesis and historical problems related to it. The thesis oral examination may not be retaken. Candidates who do not submit a thesis will be examined on the major field; the examination will be adapted to the student's individual program, and the examining committee may assign special readings to be completed for the examination. Candidates taking the examination will be allowed one week to write take-home essays responding to the committee's questions; if the essays are acceptable, the candidate will be tested in a one-hour oral examination. Satisfactory performance on both written and oral selections is required for graduation. A student who fails may retake the field examination in any succeeding semester.

■ DEPARTMENT OF LINGUISTICS

320 O'Dowd Hall • (248) 370-2175 • Fax (248) 370-3144 •
<http://www.pro.lin.oakland.edu>

Chair:

Peter J. Binkert

Professors emeriti:

Daniel H. Fullmer (Linguistics and English), Ph.D., University of Michigan

Don R. Iodice (French and Linguistics), M.A.T., Yale University

William Schwab (Linguistics and English), Ph.D., University of Wisconsin

Professor:

Peter J. Binkert (Linguistics and Classics), Ph.D., University of Michigan

Associate professors:

Madelyn J. Kissock, (Linguistics), Ph.D., Harvard University

Samuel Rosenthal (Linguistics), Ph.D., University of Massachusetts, Amherst

Michael B. Smith (Linguistics), Ph.D., University of California, San Diego

Assistant professors:

Baris Kabak (Linguistics), Ph.D. University of Delaware

Rose M. Lethsholo (Linguistics), Ph.D., University of Michigan

Associated faculty professor:

Alice S. Horning (Rhetoric, Communications and Journalism, Linguistics), Ph.D., Michigan State University

Visiting assistant professor:

Evanthia Diakoumakou, M.A., Wayne State University

Special instructor:

Rebecca Gaydos, M.A.T., Oakland University

Degree programs

Master of Arts in Linguistics

Graduate certificate programs

TESL Endorsement

Graduate Certificate in Teaching English as a Second Language

ESL Endorsement Program

■ Master of Arts in Linguistics

Description

The Master of Arts degree in linguistics provides post-baccalaureate instruction in current linguistic theory and in applied linguistics to teaching language arts or to teaching English to non-native speakers. The degree is intended to accommodate students who have done previous work in linguistics, as well as those who have had little exposure to the subject.

Admission terms and deadlines

Students may be admitted during any semester of the University calendar. Applicants to the program must have all their credentials in to Graduate Admissions, 160 North Foundation Hall, no later than six weeks before the beginning of their initial semester of registration. After that time, and until the beginning of classes, they may apply for admissions as special graduate students. However, not more than 12 credits earned as a special graduate can be applied toward the degree; therefore, the application must be completed as soon as possible.

Admission requirements

Admission is selective. The department will consider applicants who hold a baccalaureate degree from a regionally accredited institution and whose credentials, including transcripts and two letters of recommendation, give evidence of academic distinction. Applicants must explain, in a statement of purpose, their reasons for wishing to pursue graduate work in linguistics. Although an undergraduate major in linguistics is not a requirement for admission, applicants must demonstrate a knowledge of the basic principles of linguistics, as would be encountered in an introductory linguistics course.

A grade point average of 3.00 (on a 4.00 scale) in undergraduate work is ordinarily the minimum standard for admission.

At its discretion, the department may admit students of superior promise but deficient preparation provided that such students correct their deficiencies before commencing graduate work.

Upon completion of LIN 503 and LIN 504, students will be evaluated for admission to candidacy and will choose an area of specialization in consultation with the graduate adviser.

Degree requirements

The Master of Arts degree in linguistics will be awarded to the student who earns 36 credits in nine courses as specified below. A minimum of 2.5 in each course and an overall minimum GPA of 3.00 are required for the M.A. degree.

Upon admission to candidacy, the student will choose an area of specialization from among the following three: linguistic theory, teaching English as a Second Language or language arts. Non-native speakers of English who wish to specialize in teaching English as a Second Language must satisfactorily complete an oral and written examination in English. Other specializations may be developed in consultation with the graduate adviser. At least 16 credits (four courses) of work must be in the area of specialization.

All students must complete LIN 503 (Introduction to Phonology) and LIN 504 (Introduction to Syntax). All students must also complete LIN 680 (Seminar in Linguistics) or LIN 690 (The Master's Thesis). The requirements for LIN 690 will be a thesis of

considerable detail in which students must present the results of their independent research. LIN 690 may be elected only with departmental approval. All theses/dissertations must conform to university standards (see “Master’s thesis and doctoral dissertation” in the Policies and Procedures section of this catalog).

When graduate courses are cross listed with undergraduate courses, graduate students will be required to complete additional work at the graduate level, usually an essay or a project decided in conjunction with the professor.

General Requirements

1. Nine courses (36 credits)
2. No more than 8 credits in courses from other departments
3. No more than 8 credits in 400-level LIN or ALS courses.
4. Either (a) two years of foreign language study, or (b) one year of foreign language study and LIN 609; in either case, demonstrated first year proficiency in at least one foreign language is required. First year proficiency can be demonstrated by satisfactory completion of a foreign language course at the 115-level.

Core Program (12 credits)

LIN 503	Introduction to Phonology	4
LIN 504	Introduction to Syntax	4
LIN 680 or LIN 690	Seminar in Linguistics The Master’s Thesis	4

Specializations

Linguistic theory (24 credits)

LIN 603 or LIN 613	Phonological Theory Advanced Phonology	4
LIN 604 or LIN 614	Syntactic Theory Advanced Syntax	4
LIN 502 or LIN 507	Historical Linguistics Introduction to Semantics	4
One (1) of:		
LIN 505 LIN 507 LIN 557	Phonetic Theory Introduction to Semantics Cognitive Linguistics	4
Two (2) electives		8

Teaching English as a second language (24 credits)

LIN 505	Phonetic Theory	4
ALS 518	The Teaching of English as a Second Language	4
ALS 519	Practicum (See Practicum eligibility)	4
Two (2) of:		
ALS 535 ALS 517	Psycholinguistics Models of Second Language Acquisition	4

ALS 574	Cross-Cultural Communication	4
One (1) elective		4
Language arts (24 credits)		
ALS 520 or ALS 538	Linguistics and Reading Theory and Practice in Language Testing	4
ALS 534	Language Development in Children	4
ALS 535 or ALS 518	Psycholinguistics The Teaching of English as a Second Language	4
LIN 604 or LIN 614	Syntactic Theory Advanced Syntax	4
Two (2) electives		8

■ TESL Certificate

Students may earn a certificate in Teaching English as a Second Language (TESL) by completing the following courses: LIN 503 Introduction of Phonology or LIN 504 Introduction to Syntax; ALS 518 The Teaching of English as a Second Language; and ALS 519 Practicum. In any case, students must complete 12 credits of coursework at OU and must satisfy the eligibility requirements described in “Practicum Eligibility” to obtain the certificate. Students interested in this certificate should contact the adviser in the Department of Linguistics.

■ Graduate Certificate in Teaching English as a Second Language (TESL)

The program consists of 20 credits in Applied Language Studies (ALS) and Linguistics (LIN) as set forth below. It is designed for completion in one or two years by individuals who are already teaching and seeking further professional development or by those seeking additional preparation in order to enter the field of English as a Second Language (ESL).

Admission requirements

All applicants with baccalaureate degrees from a regionally accredited institution will be considered. Ordinarily, a minimum undergraduate grade point average of 3.00 is required for admission to the program (as is the case for admission to the Master of Arts degree program in linguistics). Applicants who are non-native speakers of English must satisfactorily complete an oral and written examination of English in order to be admitted to the Certificate Program.

Requirements for the certificate

Students must complete an approved program of at least 20 credits with an overall average of 3.00 in all courses, including ALS 518, LIN 503 or LIN 504, and ALS 517 or ALS 538. LIN 519 is also required for students with little or no ESL teaching experience. Students will choose at least 8 additional credits from among the following: ALS 517, 519, 538, 535, 574, 576; LIN 503, 504, 505, 507. Other ALS or LIN courses may be substituted with the approval of the certificate adviser. Courses included in the certificate should be selected to enhance competency in his/her specific field of interest and/or application. A minimum grade of 2.5 in each course and an overall minimum GPA of 3.00 is required for the Certificate Program.

Practicum Eligibility

Eligibility for the Practicum (ALS 519) requires completion of ALS 518 with a grade of 3.0 or higher. Non-native speakers of English must in addition, complete satisfactorily an oral and written examination of English.

Relationship to the Master of Arts in Linguistics

All courses taken to fulfill the requirements for the graduate certificate will count toward the Master of Arts (M.A.) degree program in linguistics with a TESL specialization. It is anticipated that a graduate of the certificate program who has all the prerequisites for the M.A. in linguistics can apply for admission to the program and complete the additional credits in about two calendar years as a part-time student or in one calendar year as a full-time student. The department will consider applications from students who complete the certificate program with less than 3.00 grade point average on an individual basis.

■ ESL Endorsement

The Oakland University ESL Endorsement Program is a joint effort between the College of Arts and Sciences' Department of Linguistics and the School of Education and Human Services. The program has received approval from the State of Michigan Board of Education to offer an ESL Endorsement to teacher certification. The program consists of 20 credits taken in five successive semesters.

Description

The purpose of the ESL Endorsement Program is to prepare K-12 teachers to teach ESL classes and to better service LEP (Limited English Proficiency) students presently in K-12 classes. The program is designed for participants who have already obtained a State of

Michigan teaching certificate and are interested in this additional endorsement. The courses in the ESL Endorsement Program will help teachers understand the linguistic and cultural problems that students have when English is not their native language. With ESL background and training, educators will be able to deal with those problems effectively and help students who speak other languages become more integrated into classroom activities.

Admission requirements

Admission is selective. The department will consider applicants who hold a baccalaureate degree from an accredited institution and whose credentials, including transcripts and two letters of recommendation, give evidence of academic distinction. Applicants must explain, in a statement of purpose, their reasons for wishing to pursue the ESL Endorsement. A grade point average of 3.00 (on a 4.00 scale) in undergraduate work is ordinarily the minimum standard for admission.

Relationship to the Master of Arts in Linguistics

All courses listed under the requirements for the ESL Endorsement can be applied toward the Master of Arts degree in Linguistics with a TESL specialization. It is anticipated that a graduate of the endorsement program who has all the prerequisites for the Master of Arts in Linguistics can apply for admission to that program and complete the additional 16 credits needed for that degree in approximately four semesters as a part-time student or two semesters as a full-time student. The courses that make up the 16 credits of additional work for the M.A. degree are LIN 505, LIN 503, LIN 504, and either LIN 680 or LIN 690. For students completing the endorsement program who have less than a 3.0 grade point average in courses taken in that program, and who wish to apply for admission to the M.A. program, the Department of Linguistics will consider their applications on an individual basis.

Degree requirements

The following is a list of the required courses for the program. All courses except the practicum will meet in the evening at a local area high school.

LIN 510	Language Structure, Variation and Change	4
ALS 530	Language Acquisition	2
ALS 570	Language, Culture and Society	2
ALS 630	Language Pedagogy	4
ALS 631	Curriculum and Material Design	2
ALS 632	Assessment and Compliance	2
ALS 640	ESL Practicum	4

■ DEPARTMENT OF MATHEMATICS AND STATISTICS

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Chair:

Louis J. Nachman

Professors emeriti:

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Louis R. Bragg, Ph.D., University of Wisconsin
John W. Dettman, Ph.D., Carnegie Institute of Technology
George F. Feeman, Ph.D., Lehigh University
William C. Hoffman, Ph.D., University of California, Los Angeles
G. Philip Johnson, Ph.D., University of Minnesota
Donald G. Malm, Ph.D., Brown University
James H. McKay, Ph.D., University of Washington

Professors:

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Baruch Cahlon, Ph.D., Tel Aviv University (Israel)
Charles Ching-an Cheng, Ph.D., Rutgers University
J. Curtis Chipman, Ph.D., Dartmouth College
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Darrell P. Schmidt, Ph.D., Montana State University
Irwin E. Schochetman, Ph.D., University of Maryland
Meir Shillor, Ph.D., Hebrew University of Jerusalem (Israel)
Sze-kai Tsui, Ph.D., University of Pennsylvania
J. Barry Turett, Ph.D., University of Illinois
Stuart S. Wang, Ph.D., Cornell University
Stephen J. Wright, Ph.D., Indiana University

Associate professors:

Eddie Cheng, Ph.D., University of Waterloo (Canada)
David J. Downing, Ph.D., University of Iowa
Bo-nan Jiang, Ph.D., University of Texas, Austin
Robert H. Kushler, Ph.D., University of Michigan
Theophilus O. Ogunyemi, Ph.D., Kansas State University
Hyung-ju (Alan) Park, Ph.D., University of California, Berkeley
Ananda Sen, Ph.D., University of Wisconsin
Peter Shi, Ph.D., University of Delaware
Anna M. Spagnuolo, Ph.D. Purdue University
Wen Zhang, Ph.D., Southern Methodist University

Assistant professors:

Babette Benken, Ph.D., University of Michigan
Serge Kruk, Ph.D., University of Waterloo (Canada)
Laszola Liptak, Ph.D., Yale University
Xianggui Qu, Ph.D., University of Michigan
Tanush (Tony) Shaska, Ph.D., University of Florida

Visiting professor:

Gary McDonald, Ph.D., Purdue University

Adjunct professors:

Joseph R. Assenzo, Ph.D., Oklahoma University
Seth Bonder, Ph.D., Ohio State University
Edward F. Moylan, M.A., University of Detroit

Degree programs

Ph.D. in Applied Mathematical Sciences
Master of Arts in Mathematics
Master of Science in Industrial Applied Mathematics
Master of Science in Applied Statistics

Certificate programs

Graduate Certificate in Statistical Methods

■ Ph.D. in Applied Mathematical Sciences

Graduate coordinator:

Meir Shillor

Description

The Ph.D. Program is designed with three specialization areas in applied mathematical sciences: applied continuous mathematics, applied discrete mathematics and applied statistics.

Application requirements

Applicants for admission must present transcripts of all previous undergraduate and graduate level academic work, three letters of recommendation from individuals who are capable of evaluating scholarly achievements and potential for independent research, and results of the Graduate Record Examination (GRE). The Test of English as a Foreign Language (TOEFL) must be submitted by applicants who are graduates of programs taught in a language other than English. In addition, all applicants should submit a brief personal statement (not more than 500 words) describing their goals in pursuing the Ph.D.

Admission requirements

The students admitted to the program must have a bachelor's degree from a regionally accredited institution with at least a 3.00 grade point average, with a major in one of the mathematical sciences, engineering, computer science, the physical sciences, the biological sciences or the health sciences. Specific course prerequisites for regular admission into the program (with relevant Oakland University course numbers) include courses in Multivariable Calculus (MTH 254), Linear Algebra (MTH 256), and Advanced Calculus (MTH 351). In addition, there are specialization prerequisites of: Differential Equations (APM 257) for Applied Continuous; Abstract Algebra (MTH 475) and Data Structures (CSE 231) for Applied Discrete; and 12 credits in Statistics (e.g., STA 226, STA 322, STA 323) for Applied Statistics. In addition, Complex

Variables (MTH 352) is recommended for Applied Continuous students. Students who lack the necessary background may need to complete a few prerequisite undergraduate courses prior to regular admission into the program.

Degree requirements

A minimum of 90 credits beyond the bachelor's degree is required for the Ph.D. degree in Applied Mathematical Sciences, consisting of 60 credits (15 courses) of coursework, 3 credits of APM 695 or STA 695 (Problem Solving Seminar) and 27 credits of APM 790 or STA 790 (Dissertation Research). Students who have earned a master's degree may petition to have prior coursework applied toward the 60 credits. The Committee on Graduate Programs will evaluate the student's prior master's degree work and allow Ph.D. credits for courses judged to be relevant to the proposed Ph.D. course of study. A maximum of 36 credits may be applied; all candidates must complete at least 24 credits of additional coursework exclusively at Oakland University. In the Ph.D. program, credit will not be awarded for courses in which a grade less than 3.0 is earned; however, all numerical grades earned are used in computing a student's GPA and an overall 3.00 GPA must be maintained.

The course requirements and options for each specialization are as follows:

Applied Continuous Specialization

Specialization requirements:

Nine courses are required in the Applied Continuous specialization consisting of:

APM 533	Numerical Methods	4
APM 557	Advanced Partial Differential Equations	4
APM 566	Computational Geometry	4
APM 634	Numerical Methods for Partial Differential Equations	4
APM 658	Mathematical Modeling in Industry: Continuous Models	4
MOR 554	Mathematical Programming	4
MTH 551	Real Analysis	4
MTH 651	Functional Analysis	4
And one course selected from:		
APM 605	Applied Continuous Mathematics: Selected Topics	4
MOR 558	Mathematical Modeling in Industry: Operations Research Models	4
MTH 555	Complex Analysis	4
In addition, the requirements include completion of at least three credits (included in dissertation research credit requirements) in the one-credit seminar:		
APM 695	Problem Solving Seminar	1

Distribution requirements:

Two courses are required in the Applied Statistics area consisting of:

STA 613	Mathematical Statistics I	4
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and one other course selected from the Applied Statistics specialization list.

Two courses are required in the Applied Discrete area consisting of:

APM 563	Applied Mathematics: Discrete Methods I	4
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and one other course selected from the Applied Discrete specialization list.

Applied Discrete Specialization

Specialization requirements:

Eight courses are required in the Applied Discrete specialization consisting of:

APM 563	Applied Mathematics: Discrete Methods I	4
APM 567	Algorithms and Complexity	4
APM 568	Mathematical Modeling in Industry: Discrete Models	4
APM 569	Graph Theory and Applications	4
APM 577	Computer Algebra	4
APM 664	Combinatorial Optimization	4
APM 673	Coding Theory	4
MTH 571	Algebra I	4

In addition, the requirements include completion of at least three credits (included in dissertation research credit requirements) in the one-credit seminar:

APM 695	Problem Solving Seminar	1
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Distribution requirements:

Two courses are required in the Applied Statistics area consisting of:

STA 613	Mathematical Statistics I	4
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and one other course selected from the Applied Statistics specialization list.

Two courses are required in the Applied Continuous area consisting of:

MTH 551	Real Analysis	4
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and one other course selected from the Applied Continuous specialization list.

In addition, there are three free elective courses for a total of fifteen courses to satisfy the 60-credit course requirement, exclusive of dissertation research credit.

Applied Statistics Specialization

Specialization requirements:

Nine courses are required in the Applied Statistics specialization consisting of:

STA 613	Mathematical Statistics I	4
STA 614	Mathematical Statistics II	4
STA 527	Linear Statistical Models	4
Six courses selected from the list below; these six courses must include one of the following sets of courses (STA 515, STA 615), (STA 528, STA 628), (STA 530, STA 630) or (STA 521, STA 621).		
STA 504	Discrete Data Analysis	4
STA 506	Statistical Computing	4
STA 515	Stochastic Processes I	4
STA 521	Multivariate Statistical Methods I	4
STA 522	Statistical Process Control	4
STA 526	Nonparametric Methods	4
STA 528	Reliability and Life Data Analysis I	4
STA 529	Statistical Methods in Sample Surveys	4
STA 530	Time Series I	4
STA 603	Advanced Design of Experiments	4
STA 615	Stochastic Processes II	4
STA 621	Multivariate Statistical Methods II	4
STA 628	Reliability and Life Data Analysis II	4
STA 630	Time Series II	4
In addition, the requirements include completion of at least three credits (included in dissertation research credit requirements) in the one-credit seminar:		
APM 695	Problem Solving Seminar	1

Distribution requirements:

Two courses are required in the Applied Continuous area consisting of:

MTH 551	Real Analysis	4
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and one other course selected from the Applied Continuous specialization list.

Two courses are required in the Applied Discrete area consisting of:

APM 563	Applied Mathematics: Discrete Methods I
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and one other course selected from the Applied Discrete specialization list.

In addition, there are two free elective courses for a total of fifteen courses to satisfy the 60-credit course requirement, exclusive of dissertation research credit.

General examination and dissertation

The General Examination is intended to assess the student's overall knowledge of mathematical sciences at the graduate level and the student's ability to pursue the doctoral degree in his or her selected specialization. The General Examination is administered by the Committee on Graduate Programs and consists of two parts. Both parts of the General Examination must be passed within 13 months of the initial attempt at Part I, and a student may attempt each part of the General Examination no more than twice. Part I consists of three written section exams and is offered once near the beginning of the fall term (normally in September) and once near the beginning of the winter term (normally in January). Each section exam covers material in one of the areas of continuous mathematics, discrete mathematics and statistics. Part II of the General Examination may only be attempted after passage of Part I. Part II consists of a single written exam and is offered within a month after the results of Part I are announced. The material covered in this single exam involves only the area of the student's prospective specialization. Detailed guidelines about the material to be covered on both parts of the General Examination are available from the Graduate Coordinator. Exception to the above must be approved by the Committee on Graduate Programs.

A student must have completed at least 12 credits of graduate coursework at Oakland with a GPA of 3.00 or better before taking the General Examination. No student with a GPA below 3.00 will be permitted to take the General Examination. Students in the Ph.D. program will not be allowed to accumulate more than 32 credits toward the Ph.D. degree without taking the General Examination. A student must have passed the General Examination to be eligible to register for Doctoral Dissertation Research.

Dissertation committee

Each student who has passed the General Examination will have a dissertation committee prior to registration for doctoral research credit.

The dissertation committee will be appointed by the Committee on Graduate Programs, with the approval of Graduate Study and Lifelong Learning. The dissertation committee will consist of five faculty members, at least three of whom will be in the specialization area of the student. Prior to the formation of the committee, the student will nominate one faculty member from the student's area of specialization with the concurrence of the faculty member. At least one member of the committee will be selected by the Committee on Graduate Programs from faculty in the department but outside the student's area of specialization. The chair of the dissertation committee will be the intended supervisor of the doctoral dissertation for the student and is normally the faculty member nominated by the student. The membership of the committee may be changed by action of the Committee on Graduate Programs, with the approval of Graduate Study and Lifelong Learning.

For the first five Ph.D. candidates who take a final oral examination, one of the five members of each dissertation committee shall be faculty members from other research universities with long standing Ph.D. programs in the mathematical sciences. The outside member of the dissertation committee will normally be in the broad area of specialization of the student.

Final oral examination and dissertation defense

The chair of the dissertation committee is responsible for keeping the committee members informed about the progress of the dissertation research and making preliminary drafts of the dissertation available to all members of the dissertation committee in a manner which permits timely suggestions for improvements. When the chair of the committee determines that the dissertation is ready for oral presentation, the chair will request that a colloquium talk be scheduled where the student presents the dissertation. Immediately following the colloquium, the committee will continue an oral examination of the candidate. Others are welcome to attend this portion of the final examination, with the consent of the candidate and the committee. When this oral examination is concluded, the committee will meet privately and decide whether the candidate, with possible modifications in the dissertation, will be recommended by the committee to receive the Ph.D. Every member of the committee must be present at the oral examination and be willing to sign the dissertation (after suitable and specified modifications, if any) for the student to pass this final oral examination.

Time limits

If more than five years have elapsed since passing the General Examination, the student may be required to retake the General Examination before the dissertation committee considers the dissertation for possible acceptance. The decision to require the student to retake the General Examination is made by the Committee on Graduate Programs in consultation with the present members of the dissertation committee.

Residency requirements

A minimum residency requirement is full-time residency (a minimum of 8 credits per semester) for at least three consecutive full semesters (fall-winter-fall, fall-winter-spring/summer, winter-spring/summer-fall, etc.) with at least two of these devoted to dissertation research. The demands of this research activity imply that the student may not be employed in work which is not directly related to dissertation research, for more than twenty hours a week while satisfying this residency requirement. Petitions for exceptions to this policy may be submitted to the Committee on Graduate Programs.

■ Master of Arts in Mathematics

Graduate coordinator:

Meir Shillor

Description

The program leading to the degree of Master of Arts in mathematics provides students with a sound theoretical knowledge of modern mathematical sciences and ample opportunity to learn something of the applications of the mathematical sciences, the construction of mathematical models and the art of problem solving. The program is designed to serve those who wish to enter a Ph.D. program in mathematical sciences or to teach in secondary schools or community colleges.

Admission requirements

Admission is selective. The requirements for regular admission into the program include a baccalaureate from a regionally accredited institution with a 3.00 GPA. Exceptions to this requirement may be made if evidence of the capacity for graduate study is provided. Normally the mathematical preparation requires at least 30 semester credits in undergraduate mathematics including calculus, multivariable calculus, linear algebra and differential equations. Students who have not had an undergraduate course in abstract algebra or advanced calculus may be required to complete one or both of these courses as a prerequisite to regular admission.

Degree requirements

Candidates for the Master of Arts in mathematics will need 36 credits of graduate work. Students must earn at least a 2.5 in each course and an overall GPA of 3.00 or better. In general, they will take at least seven 4-credit courses in mathematical sciences, arranged by the department's Committee on Graduate Programs, and up to two approved electives outside of mathematical sciences. Among the courses arranged by the Department of Mathematics and Statistics there must be included 4 credits in directed reading and research (MTH 590, APM 590 or MTS 590) either in mathematics or in an interdisciplinary area involving mathematics. Candidates must prepare a written report based on this reading and research. Each candidate must take a 4-credit course in analysis (MTS 517 or MTH 551) and a 4-credit course in abstract algebra (MTH 571).

In addition to these requirements, each candidate must pass a combined written and oral examination, which is devised by a candidate's committee appointed by the Committee on Graduate Programs. Details on the format of this exam can be obtained from the department's graduate coordinator.

■ Master of Science in Industrial Applied Mathematics

Graduate coordinator:

Meir Shillor

Description

The primary goal of this program is to provide the appropriate mathematical knowledge and experience for persons seeking positions in industry. The program focuses on those mathematical theories and techniques which are applicable in the industrial setting. Emphasis is on the construction of mathematical models of industrial problems and on the mathematical tools that can be applied to such models. Courses required for the program are offered in the late afternoon or evening to accommodate the part-time student.

Assistantships for students wishing to enroll full time are available on a competitive basis.

Admission

Admission is selective. All applicants who have received a baccalaureate from a regionally accredited institution with a cumulative GPA of 3.00 or more will be considered. The successful candidate's background should include courses in multivariable calculus, linear algebra and differential equations, and a knowledge of at least one high-level scientific programming language such as Pascal, Fortran, C or PL/I. Students admitted without some aspects of the required background will be expected to remedy the deficiency before enrolling in many of the courses of the program.

Degree requirements

To fulfill the requirements for a Master of Science degree in industrial applied mathematics a student must have successfully completed, with at least a 2.5 in each course and an overall GPA of 3.00 or better, a 36-credit program consisting of:

1. Six 4-credit courses that satisfy the following conditions:
 - a) At least one course from APM 533 and APM 534.
 - b) One course from MOR 558 and APM 658.
 - c) At most one course in statistics from courses numbered STA 504 or higher.
 - d) The remaining courses, in this six-course requirement, from MOR 554, APM 557, APM 566 and APM 634.
2. A 4-credit project course APM 595. The student should contact the graduate coordinator for information about the procedures to be followed.
3. Elective courses to complete the 36-credit requirement. These are courses in a related area that must be approved by the graduate coordinator. Generally, these courses will be engineering, statistics, computer science, applied mathematics or operations research. A student who has not completed a course in advanced calculus may be required to complete such a course as one of these elective courses.

selection for completion of the program is developed in consultation with a faculty adviser. Selection of courses will reflect the goal of broad training and any special needs of the student. All courses for the program are offered in the late afternoon or evening to accommodate the part-time student who is engaged in professional development. Teaching and research assistantships are available to well qualified full-time students; internships with industry are also available.

Admission requirements

Admission is selective. All applicants who have received a baccalaureate from a regionally accredited institution with a cumulative GPA of 3.00 or more will be considered. Previous mathematical training should include the satisfactory completion of courses in single and multivariate calculus and linear algebra, as well as at least one course in elementary statistics. Applicants should also have some scientific computing training.

Degree requirements

To fulfill the degree requirements the student must:

1. Have completed, with at least a 2.5 in each course and an overall average of 3.00 in all courses, a program of at least 36 credits.
2. Have completed at least 24 credits in courses labeled STA as approved by an adviser. STA 513 and STA 514 are required unless the student has completed the equivalent course before admission. Students with the necessary mathematics background are encouraged to complete the STA 513-514 sequence in their first year in order to satisfy prerequisites for more advanced courses. The set of elective courses not labeled STA must also be approved by the student's adviser.
3. Have not included more than six credits of STA 590.
4. Have demonstrated competence in applying statistical methods and theory in the solution of a practical problem or problems. This requirement is administered by the Committee on Graduate Programs.

■ Master of Science in Applied Statistics

Graduate coordinator:

Meir Shillor

Description

By offering this program the department seeks to increase the number of people with broad training in statistical methodology which is suitable for application in industrial, business and governmental settings. The program's primary goal is to provide the basis for the skilled and competent application of modern statistical methods. Areas of methodology in the program, in addition to a basic theoretical foundation, include design of experiments, regression analysis, discrete data, statistical computing, statistical process control, non-parametric, multivariate, reliability, sample survey and time series methodology. All applied courses make use of and stress the importance of modern statistical computing software. Because of the wide diversity of backgrounds of entering students, course

■ Graduate Certificate in Statistical Methods

Graduate coordinator:

Meir Shillor

Description

The program consists of 20 credits of statistical methods as set forth below. It is designed for completion in either one year or two years by students who are employed full time. The aim of the program is to provide knowledge in modern statistical methods for industrial managers. Graduates of the program will be capable of standard statistical treatment of industrial problems arising in research, development and production. They also will be able to recognize difficult problems and communicate well with fully-trained statistical experts.

Admission requirement

All applicants will be considered who have received a baccalaureate from a regionally accredited institution. Previous training should include one introductory statistics course and some exposure to calculus.

Requirements for the certificate

To fulfill the certificate requirements, the student must have completed an approved program of at least 20 credits with at least a 2.0 in each course and an overall average of 3.00 in all courses. The courses normally included are STA 501, 502, 503 and 8 additional credits chosen from STA courses numbered 504 or higher. The course selections for a particular student will be chosen to complement previous statistics study and to enhance the competency of the individual in his/her chosen field of application.

Relationship to Master of Science in Applied Statistics

Three courses (STA 501, 502, 503) each count as two credits toward the M.S. degree. Other STA courses numbered 504 or higher count fully toward the degree. It is anticipated that a graduate of the certificate program who has all of the prerequisites for the Master of Science in applied statistics can apply for admission to that program and complete the additional credits needed for that degree in two calendar years as a part-time student or in one calendar year as a full-time student.

■ DEPARTMENT OF MUSIC, THEATRE AND DANCE

211 Varner Hall • (248) 370-2030 • Fax (248) 370-2041
<http://www2.oakland.edu/mtd>

Chair:

Jacqueline H. Wiggins

Professors emeriti:

David Daniels, Ph.D., University of Iowa
John Dovaras, M. M., Northwestern University and D.Litt.
(Honorary), Alma College
Robert Facko, Ed.D., Columbia University
Carol Halsted, Ed.D., Wayne State University
Adeline G. Hirschfeld-Medalia, Ph.D., Wayne State University
Stanley Hollingsworth, Dipl., Curtis Institute of Music and Fellow of
the American Academy of Rome (Italy)

Professors:

Laurie Eisenhower, M.F.A., Arizona State University
Flavio Varani, M.M., Manhattan School of Music
John Paul White, Dipl., Curtis Institute of Music
Jacqueline H. Wiggins, Ed.D., University of Illinois, Urbana-Champaign

Associate professors:

Lettie B. Alston, D.M.A., University of Michigan
Greg Cunningham, Ed.D., University of Illinois
Michael E. Gillespie, Ph.D., Stanford University
David M. Kidger, Ph.D., Harvard University
Kerro Knox, III, M.F.A., Yale School of Drama
Kenneth R. Kroesche, D.M.A., University of Michigan
Michael A. Mitchell, D.M.A., University of Missouri, Kansas City
Gregory A. Patterson, M.F.A., University of Michigan
Karen F. Sheridan, M.F.A., Goodman School of Drama, DePaul University

Assistant professors:

Pavlo Bosyy, M.F.A., School of Theater, Ohio University
Fred A. Love, Jr., M.M., University of Arizona
Mariah E. Malec, M.F.A., Arizona State University
Diane H. Petrella, D.M.A., University of North Texas
Joseph L. Shively, Ed.D., University of Illinois, Urbana-Champaign

Special instructors:

Danny L. Jordan, M.F.A., Wayne State University
Mark A. Stone, M.M., University of Michigan
Thomas M. Suda, M.F.A., Wayne State University

Visiting instructor:

Deborah V. Blair, M.A., Eastern Illinois University

Adjunct assistant professors:

Janice Albright, B.Mus.Ed., Indiana University
Edith Diggory, D.M.A., Indiana University

Special lecturers:

Patricia Gibbons, Louis, Kaarre, Leslie Littell, Roberta Lucas, S.
Alex Ruthmann, Debra Siegel, Phyllis White

Lecturers:

Julie Beeding, Kristen Berger, Barbara Bland, Jacqueline Boucarad, Donna Buckley, William Cable, Brea Cali, Terry Carpenter, Rick Carver, Mary Chmelko-Jaffe, Rebecca Crimmins, Candace deLattre, Nadine DeLeury, Ronald DeRoo, Edith Diggory, Kitty Dubin, Patty Foster, Mindy McCabe Grissom, Mila Govich, John Hall, Rebecca Happel, Jason Harris, Suzanne Hawkins, Terry Herald, Jennifer Kincer-Catallo, Lynnae Lehfeldt, Roberta Lucas, Thomas Mahard, John Manfredi, Daniel Maslanka, David Reed, Alayne Rever, Brett Romnger, Elizabeth Rowin, Christine Naughton Shawl, Victoria Shively, August Thomas, Tom Trenney, Melanie Van Allen, Brent Wrobel, Carol Yamasaki

Applied music instructors:

Janice Albright (voice), Kerstin Allvin (harp), Barbara Bland (voice), Douglas Cornelsen (clarinet), Frederic DeHaven (organ), Candice deLattre (voice), Nadine Delevry (cello), Edith Diggory (voice), Richard Fanning (jazz trumpet), John Hall (guitar), Rebecca Hammond (oboe), Rebecca Happel (piano), Maxim Janowsky (double bass), Danny Jordan (jazz piano), Mark Kieme (jazz saxophone), William King (clarinet), Richard Kowalewski (bass guitar, jazz bass), Daniel Maslanka (percussion), Ervin Monroe (flute), Lori Newman (flute), Diane Petrella (piano), Nick Petrella (percussion), Alayne Rever (saxophone), Elizabeth Rowin (violin, viola), Mary Siciliano (piano), Gordon Simmons (trumpet), Flavio Varani (piano), Corbin Wagner (French horn), Nadine Washington (voice), John Paul White (voice)

Accompanists:

Shari Fiore, Vladimir Kalmsky, Lois Kaarre, Eun Young Yoo, Tatiana Zut, Stanley Zydek

■ Ph.D. in Education: Major in Educational Leadership

Coordinator:

Jacqueline H. Wiggins

Cognate in music education

The Department of Music, Theatre and Dance has designed a Music Education Cognate for the educational leadership major of the Ph.D. in Education program. This cognate prepares candidates for leadership in music education as teacher educators, music education

administrators, and music education curricular leaders. Individuals interested should contact the Graduate coordinator in the Department of Music.

■ Master of Music

Graduate coordinator:

Jacqueline H. Wiggins

Description

The Master of Music program is designed to enhance students' understanding of and proficiency in music and to provide opportunities for student growth as performers, conductors, composers, arrangers, studio instructors and school music teachers.

The Master of Music consists of 36 credits: a core program of 12 credits, with the remaining 24 credits consisting of a concentration (16-22 credits) and electives.

A student can earn a Master of Music with any of the following concentrations: composition, conducting (choral or instrumental), music education, pedagogy (instrumental, piano, or voice), or performance (instrumental, piano, or voice).

Admission requirements

1. Bachelor's degree in music from a regionally accredited institution that must include a minimum of two years of music theory, one year music history, and performance ability in some instrument or voice; or equivalent background to above requirements.
2. Official transcripts from all institutions attended and two official letters of recommendation.
3. Candidate's goals which are compatible with the goals of the Master of Music program at Oakland University (via departmental questionnaire).
4. Audition or other personal evaluation by designated music faculty
 - a) Performance, pedagogy, and conducting concentrations: audition
 - b) Music education: interview and writing sample
 - c) Composition: review of portfolio, interview

Remedial work may be required before full admission.

Degree requirements

The Master of Music degree is awarded upon satisfactory completion of 36 credits in approved program of study, successful performance on an oral examination and successful completion of a culminating project or recital.

If the faculty deems areas of the candidate's undergraduate preparation deficient, undergraduate courses may be prescribed. Such work will not count as part of the 36 credits of the master's program.

As work progresses, the following may be grounds for dismissal from the program:

1. One grade below 2.5.
2. Two grades below 3.0.

Program of study

The 36-credit degree program consists of two major components: a core requirement of 12 credits, plus 24 credits of a major concentration, and electives.

Core courses (12 credits)

MUS 500	Introduction to Graduate Study in Music	2
MUS 521, 522 or 523	Music History Seminars (choose 2)	4
MUT 535 or 536	Music Theory (choose 1)	2
Core electives	Other courses in music history, literature, theory, or other independent study in history and literature	4

MUS 521, 522, and 523 may be repeated for credit when the repeated seminar is on a different topic from the first taken.

Classes required for the student's major concentration may not be used to fulfill the music history core requirement.

Each class taken toward this requirement requires students to write a research paper and present that research to the class.

Major concentrations (24 credits)

Concentrations are offered in the following areas:

Composition - a program for experienced composers, designed to help individuals expand their knowledge base for and experience in the compositional process.

The composition concentration requirements are:

MUT 540	Composition (4 semesters)	8
MUT 550	Composition Seminar	2
MUS 599	Elective studies in related areas (orchestration, arranging, conducting)	6
MUA 601	Master's Recital	2
Electives		6

Conducting - designed to meet the needs of music teachers and other music professionals who are interested in developing high-level skills and understanding in instrumental and/or choral conducting.

The conducting concentration requirements are:

MUS 580	Advanced Choral Interpretation and Conducting Techniques	2
MUS 581	Advanced Instrumental Interpretation and Conducting Techniques	2
MUS Electives in related studies	(orchestration, literature, analysis, voice, diction, score study)	4
Literature course	(MUS 556, 576 or other as appropriate)	2
MUS 620	Conducting Apprenticeship (3 semesters)	6
MUA 601	Master's Recital	2
Electives		6

Music Education - designed to meet the needs of the music teachers, to help them expand and extend their professional skills and understandings with a long-range goal of enabling educators to study and improve their own practice.

The music education concentration requirements are:

MUS 531	Historical and Philosophical Foundations of Music Education	4
MUS 532	Psychological Foundations of Music Education	4
MUS 580, 581, 641, 642, 643 or 644	Music Education Methods or Conducting	2
MUS 689	Research Methods in Music Education	2
MUS 690	Master's Project	4
Electives	(music, education, or music education)	8

Pedagogy - (piano, voice, instrumental) a program for experienced pianists, singers, or orchestral instrumentalists, designed to enable them to explore approaches to teaching their major instrument or voice, to expand their knowledge of repertoire and technique, and to further their personal performance skills and musical understanding.

The pedagogy concentration requirements are:

	Instrumental	Piano	Voice
Applied Study, MUA 500 level (4 semesters)	8	8	8
MUS 533 Learning Theory for Studio Teachers	2	2	2
Pedagogy	4	6	4
Music Literature in major area	4	4	4
Ensembles, MUE 500 level (2 semesters)	2	0	0
MUS 690 Master's Project (includes teaching practicum)	2	2	2
Electives	2	2	4

Performance - a program for highly experienced pianists, singers, or orchestral instrumentalists, designed to enable them to expand their knowledge of repertoire and technique, and to further their personal performance skills and musical understanding.

The performance concentration requirements are:

	Instrumental	Piano	Voice
Applied Study, MUA 500 level (4 semesters)	8	8	8
Pedagogy	4	4	4
Music Literature in major area	4	4	4
Ensembles, MUE 500 level (2 semesters)	2	2	2

MUA 601 Recital	2	2	2
Electives: (additional performance study recommended)	4	4	4

Culminating projects

The culminating project differs depending upon which concentration is chosen.

1. For candidates for a Master of Music with concentrations in composition, conducting or performance, the culminating project is a recital.
2. For candidates for a Master of Music with a concentration in pedagogy, the culminating project consists of written work plus the teaching practicum.
3. For candidates for a Master of Music with a concentration in music education, the culminating project consists of a thesis or equivalent project.

Students are urged to plan ahead for the culminating projects. Obtain information about the expectations for culminating projects from your adviser early in the degree program.

Oral examination

After completion of the culminating project, thesis or recital, the student will be asked to make a 10- to 15-minute presentation to his or her project committee. In the case of a recital, this might include discussion of interpretation, editions chosen, historical aspects, and so on. In the case of a thesis or project, this might take the form of a research presentation, including discussion of intentions, methodology, interpretation of data and findings.

A satisfactory presentation of material reflective of a satisfactory thesis, project or recital constitutes passing the Oral Examination for the degree of Master of Music. Any student who does not pass this examination may be offered the examination again one semester later, upon the approval of the student's adviser.

■ DEPARTMENT OF PHYSICS

190 Science and Engineering Building • (248) 370-3416
Fax (248) 370-3408 • <http://www.oakland.edu/physics>

Interim chair:

Andrei N. Slavin

Professors emeriti:

Abraham R. Liboff, Ph.D., New York University
John M. McKinley, Ph.D., University of Illinois
Ralph C. Mobley, Ph.D., University of Wisconsin
Paul A. Tipler, Ph.D., University of Illinois
William D. Wallace, Ph.D., Wayne State University
Robert M. Williamson, Ph.D., University of Wisconsin

Distinguished professor:

Michael J. Chopp, Ph.D., New York University

Professors:

David Garfinkle, Ph.D., University of Chicago
Andrei N. Slavin, Ph.D., Leningrad Technical University (Russia)
Gopalan Srinivasan, Ph.D., Indian Institute of Technology (India)
Norman Tepley, Ph.D., Massachusetts Institute of Technology
Uma Devi Venkateswaran, Ph.D., University of Missouri
Yang Xia, Ph.D., Massey University (New Zealand)

Associate professors:

Ken Elder, Ph.D., University of Toronto (Canada)
Alberto G. Rojo, Ph.D., Instituto Balseiro Bariloche (Argentina)
Bradley J. Roth, Ph.D., Vanderbilt University

Assistant professor:

George B. Martins, Ph.D., Campinas State University (Brazil)

Adjunct professors of physics:

Carl E. Bleil, Ph.D., University of Oklahoma
Joseph V. Mantese, Ph.D., Cornell University

Adjunct professors of medical physics:

Peter M. Corry, Ph.D., University of Texas
Howard J. Dworkin, M.D., Albany Medical College
Adrian Kantrowitz, M.D., Long Island College of Medicine
Jae Ho Kim, Ph.D., Kyungpook University (University of Iowa)
Harold D. Portnoy, M.D., Wayne State University
Paul D. Stein, M.D., University of Cincinnati
John Wai-Chiu Wong, Ph.D., University of Toronto (Canada)

Adjunct associate professors of medical physics:

Stephen L. Brown, Ph.D., University of Toronto (Canada)
James R. Ewing, Ph.D., Oakland University
Robert Knight, Ph.D., Oakland University
S. David Nathanson, M.D., University of Witwatersrand (South Africa)
Joseph S. Rosenshein, Ph.D., Massachusetts Institute of Technology

Adjunct assistant professors of medical physics:

Elwood P. Armour, Ph.D., University of Texas
Susan Bowyer, Ph.D., Oakland University
Kenneth Jenrow, Ph.D., Oakland University
Quan Jiang, Ph.D., Oakland University
Zheng-Gang Zhang, Ph.D., Oakland University

Adjunct instructor of medical physics:

Ray A. Carlson, M.S., Wayne State University

Degree programs

Doctor of Philosophy in Biomedical Sciences: Medical Physics
Masters of Science in Physics

■ Doctor of Philosophy in Biomedical Sciences: Medical Physics

Coordinator:

Norman Tepley

Description

The College of Arts and Sciences offers a biomedical sciences doctoral program with a specialization in medical physics which is centered in the Department of Physics.

Medical physicists are providing primary contributions to advances in diagnostic and therapeutic medicine. Laser surgery, ultrasonics, nuclear medicine, radiotherapy and nuclear magnetic resonance imaging are examples of medical modalities developed and implemented by medical physicists. The medical physics specialization of the biomedical sciences doctoral program is designed for students who plan careers in medical research in industrial, hospital and academic settings. The curriculum is designed to prepare the student to engage in research in areas of physics applied to medicine. Ph.D. candidates may elect to do their dissertation research either with one of a number of Oakland University faculty currently involved in biomedical research or with one of the scientists in area hospitals which collaborate closely with the university. Among these are: Henry Ford Hospital, Detroit; and William Beaumont Hospital, Royal Oak. In addition to available Oakland University graduate assistantships, hospitals participating in this program may provide support for qualified students. Interested students should consult the program coordinator for details.

Admissions terms and deadlines

For information on admission criteria and general degree requirements for the biomedical sciences Ph.D. programs, see the Biomedical Sciences Doctoral Program section in the catalog.

Required areas of proficiency

Within twelve months after entering the program, each student must demonstrate proficiency at the intermediate undergraduate level in the following areas: modern physics (PHY 371); physical chemistry (CHM 343); and at least three of the following: computer sciences, statistics (STA 226), differential equations (APM 257), electronics (PHY 341, 347), electricity and magnetism (PHY 381), and physiology (BIO 321). Proficiency may be demonstrated through previous coursework or special examinations. Students may satisfy proficiency requirements by completion with a grade of 3.0 or higher in the appropriate courses listed above.

Areas of graduate-level proficiency required for the medical physics specialization are: theoretical physics, mathematical methods in scientific research, biophysical sciences and laboratories. Proficiency in theoretical physics would typically be established by taking several of the following courses: PHY 472, 482, 522, 552 and 562. Courses used to satisfy the mathematical methods area might include: STA 425, 427, or 501 and APM 533, 534. The biophysical sciences area proficiencies could be met by taking: BIO 401, CHM 234, 235 and 342, PHY 525 and 726. Laboratory proficiency may be satisfied by laboratory courses or by research.

■ Master of Science in Physics

Coordinator:

Gopalan Srinivasan

Description

The program leading to the degree of Master of Science in physics consists of courses, research, seminar participation and a final research report or critical essay. A formal thesis is not required. Students receiving the degree will be prepared to work toward the Doctor of Philosophy in physics, to teach at the junior college level or to work in industry.

The average candidate entering in the fall semester will usually require two academic years to complete the degree. A very well-prepared candidate should complete the required courses and research credits in three semesters. Each student's program will be adjusted to his/her interests and background.

Admission requirements

An applicant for admission to the M.S. program must have a bachelor's degree from a regionally accredited university. The applicant's background should be strong in physics and mathematics.

Degree requirements

The basic degree requirement is successful completion of 36 credits of graduate courses distributed as follows: 4 credits of PHY 673 (Quantum Mechanics); 1 credit of PHY 600 (Seminar); 23 credits of additional 400-, 500-, or 600-level courses approved by the department; 8 credits of research, including a final written report or critical essay.

Research fields and facilities

The Department of Physics faculty are currently involved in research in three broad areas: biophysics and medical physics, condensed matter physics theory and experiment, and gravitational physics theory. Specifically, the biophysics and medical physics group has been studying the mechanisms underlying bioelectromagnetic interactions, biomedical aspects of biomagnetism, NMR imaging, NMR microscopy, *in vivo* NMR spectroscopy, neuromagnetism, photodynamic therapy, and the biophysics and biomechanics of osteoarthritis, stroke, cerebrovascular disease, brain tumor, migraine headache, and hyperthermia. The condensed matter physics group conducts theoretical studies of the linear and nonlinear dynamics of spin waves and phenomena associated with phase transitions and experiments on magnetic properties of technologically useful materials, optical properties of semiconductors and carbon nanotubes under high pressure, and crystal growth of diamond films and silicon ribbons. The gravitational theory group's research centers on critical phenomena, chaos, and the nature of generic singularities in Einstein's theory of general relativity.

Research facilities in the high pressure optics laboratory include Raman spectrometers with single or multi-channel detectors, facilities for photoluminescence studies in the visible and infrared regions, argon ion and Ti: sapphire lasers, high pressure cells capable of generating 10 GPa, and closed cycle helium refrigerators. Research facilities in the condensed matter physics laboratories include a Faraday Magnetometer, an AC susceptometer, a ferromagnetic resonance spectrometer at x-band, a Philips x-ray diffractometer, one and two kilowatt RF power supplies with 50W matching networks for silicon ribbon growth, and a vacuum facilities for thin film evaporation and fullerene preparation. Research facilities in the biomagnetism laboratories include the non-magnetic environment of the Kettering Magnetics Laboratory and an underground shielded room for research demanding ultra-low AC backgrounds. Research facilities in the NMR microscopy laboratory include a Bruker AMX 300 NMR spectrometer with a 7-Tesla/89-mm vertical bore superconducting magnet and micro-imaging accessories. The department also has ultrasonic equipment in the frequency range from 100 kHz to 10 GHz. Supporting facilities include electronics and mechanical workshops staffed by experienced technical personnel. Computer facilities include a number of DEC-alpha and SGI workstations, and numerous Macintosh and IBM computers. Most research laboratories are located in the modern Science and Engineering Building on campus.

Among research facilities in neighboring hospitals available to medical physics students are a 3.0-Tesla whole-body NMR system and a 7.0-Tesla/20-cm horizontal bore magnet NMR system for imaging and *in vivo* spectroscopy, a megawatt tuneable dye laser and argon ion laser for photodynamic therapy research, a 148-channel whole-head SQUID neuromagnetometer, a nuclear medicine laboratory, radiology and CT scanning facilities, advanced modalities cancer therapy laboratory, including radiotherapy and hyperthermia, diagnostic ultrasonic equipment, a laser surgery laboratory, and major hospital medical libraries.

■ DEPARTMENT OF POLITICAL SCIENCE

418 Varner Hall • (248) 370-2352 • Fax (248) 370-4299
<http://www.oakland.edu/mpa>

Chair:

John S. Klemanski

Director of Master of Public Administration program:

Dale K. Nesbary

Distinguished professor emeritus:

Sheldon Appleton, Ph.D., University of Minnesota

Professors emeriti:

Thomas W. Casstevens, Ph.D., Michigan State University
Edward J. Heubel, Ph.D., University of Minnesota
Roger H. Marz, Ph.D., Michigan State University
James R. Ozinga, Ph.D., Michigan State University

Professors:

Vincent B. Khapoya, Ph.D., University of Denver
John S. Klemanski, Ph.D., Wayne State University

Associate professors:

Paul J. Kubicek, Ph.D., University of Michigan
*Emmett N. Lombard, Ph.D., Colorado State University
William A. Macauley, Ph.D., University of Houston
*Dale K. Nesbary, Ph.D., Northeastern University
*C. Michelle Piskulich, Ph.D., State University of New York at Binghamton
*J. Patrick Piskulich, Ph.D., State University of New York at Binghamton
Martha T. Zingo, Ph.D., University of Maryland, College Park

Assistant professors:

David A. Dulio, Ph.D., American University
Roger T. Larocca, Ph.D., University of Chicago
Peter F. Trumbore, Ph.D., University of Connecticut
Julie K. Walters, Ph.D., George Mason University

Adjunct assistant professors:

*Annette Graziani-Lozen, M.P.A., Wayne State University
*Robert Mourning, J.D., University of Michigan
*Suzanne Morkin, M.P.A., Oakland University
*Donna Petras, M.P.A., Oakland University

*Participants in the public administration program

Degree programs

Master of Public Administration (M.P.A.)

Certificate programs

Post-Master's Certificate in Local Government Management
Post-master's Certificate in Non-profit Organization and Management

■ Master of Public Administration (M.P.A.)

Graduate adviser:

Dale K. Nesbary

Director of internships:

Emmett Lombard

Description

The master's degree program in public administration and public policy has been established to provide a challenging education for persons seeking professional careers in governmental and other public and not-for-profit agencies. The need for such programs is recognized, given the growth in the number and the complexity of agencies at the state and local levels and the concern for both responsive and effective public service at all levels. The M.P.A. program seeks a generalist focus through a set of core courses and provides an opportunity for specialization through the electives and the directed project/internship option. Persons with significant experience in public service will be advised to undertake a directed project; those seeking a transition to a public service career will be assisted in an assignment to a public administration internship in one of the area agencies.

The Oakland University M.P.A. program is accredited by the National Association of Schools of Public Affairs and Administration (NASPAA).

Admission requirements

Admission to the program is selective. Applicants must hold a baccalaureate from a regionally accredited undergraduate institution and must have a grade record that indicates superior work. The program is designed to accommodate students with a wide variety of undergraduate preparations, provided that certain courses have been taken and skills acquired as part of those programs. Applicants must meet the university's general requirements for admission to graduate studies. Conditional admission status may be granted to students who need minor improvements to their records, subject to approval by Graduate Study and Lifelong Learning. In addition to these requirements, the Department of Political Science will interview the applicants and assess their writing abilities.

Undergraduate preparation for the M.P.A.

Degrees in a wide variety of majors will prepare the student for admission, providing that the record includes:

1. Basic courses in political science, government, or public administration
2. Principles of macro economics
3. Principles of accounting.

Students otherwise qualified for admission to the program but lacking in these areas may be admitted conditionally with the requirement that the deficiency be corrected during the first year of the program by an appropriate undergraduate course. A departmental adviser will plan with the student an appropriate way of meeting these prerequisites. Undergraduate credits earned to meet these standards will not be counted toward the total of graduate credits needed for the degree.

Degree requirements

The requirement for the M.P.A. is 40 credits. All required courses are offered during weekday evenings. If the student successfully carries a normal load, it will be possible to complete the program in two calendar years, starting in the fall of one year and ending in the spring/summer of the next academic year.

Core program (24 credits)

The following core courses are required. All of these courses must be taken in Oakland University's M.P.A. program unless prior departmental written permission is obtained.

PA 601	Public Administration: Theory	4
PA 620	Quantitative Methods in Public Administration*	4
PA 621	Government Information Systems	4
PA 653	Public Budgeting and Finance	4
PA 654	Human Resources Management in the Public Sector	4
PA 655	Program and Policy Evaluation	4
Electives		12
Internship or Project		4
Total M.P.A. credits:		40

*Students with little or no experience with statistics are advised to enroll in PA 522 prior to taking PA 620.

The student is expected to complete 12 credits of electives from the public administration offerings and from designated graduate course listings in other schools or programs at Oakland University. At the end of coursework, the student who has not had significant public service experience will be assigned an internship; others will be expected to complete a research project.

Assuming a yearly fall admission to the program, students may take core courses and electives as follows:

	Fall	Winter	Spring/Summer
Year 1	PA 601	PA 621	Electives
	PA 653	PA 654	
Year 2	PA 655	PA 620	Internship or Project
	Elective		Elective

Conditional and special graduate status

Students who are conditionally admitted to the program must have the condition removed before undertaking the second year of the program. Students who have special graduate status may take up to three courses in the program without formal admission to the program; to proceed further in the course sequence requires admission to the program. Upon attaining full graduate status, the student will receive credit toward the program for the work done as a special graduate student.

Academic progress

Although credit for completion of a course in the M.P.A. program will be given for grades of 2.0 or above, the minimum satisfactory grade for graduate work is 3.0. A student's academic progress is monitored by the director of the M.P.A. program. If a student receives a grade for any M.P.A. course below 3.0, an academic warning letter is sent to the student. With a second grade below a 3.0, the student receives written notification that he or she is on academic probation. A student placed on probation may be required to meet new standards to remain in the M.P.A. program. With a third grade below a 3.0, the student is notified in writing that he or she is subject to dismissal pending a review of the student's entire record by the M.P.A. director and the Executive Director of Graduate Study and Lifelong Learning. Regardless of their standing, all M.P.A. students are encouraged to consult with their individual instructors and the M.P.A. academic adviser concerning their academic progress.

Concentrations in Health Care Administration; Nonprofit Organization and Management; Local Government Management; or Criminal Justice Leadership

In addition to the 24 credits in the core curriculum, a student may take all 12 of his or her elective credits in one of health care administration, non-profit organization and management, local government management or criminal justice leadership. Such a focus in one of these concentrations can provide the student with those special skills necessary to cope with the many changes occurring in these dynamic fields. Students who pursue a concentration may need an additional semester to complete elective requirements.

Health Care Administration – Choose from the following courses:

PA 548	Administrative Ethics	2
PA 559	Public Policy and Health Care	4
PA 568	Health Planning: Policies and Processes	4
PA 569	Organization & Administration of Health and Medical Care Programs	4
PA 603	Contemporary Public Management Techniques	4
PA 610	Strategic Planning	4
PA 634	Risk Management	2

Nonprofit Organization and Management – Choose from the following courses:

PA 510	Nonprofit Organization and Management	4
PA 511	Fundraising and Philanthropy	4
PA 548	Administrative Ethics	2
PA 603	Contemporary Public Management Techniques	4
PA 610	Strategic Planning	4
PA 631	Grants: Politics and Administration	2 to 4
PA 634	Risk Management	2

Local Government Management – Choose from the following courses:

PA 503	Intergovernmental Relations	4
PA 542	Law and Administration Local Perspectives	2
PA 543	Law and Administration: State Perspectives	2
PA 548	Administrative Ethics	2
PA 603	Contemporary Public Management Techniques	4
PA 610	Strategic Planning	4
PA 630	Local Government Management	4
PA 631	Grants: Politics and Administration	2 to 4
PA 634	Risk Management	2
PA 669	Community Planning and Zoning	4

Criminal Justice Leadership – Choose from the following courses:

PA 548	Administrative Ethics	2
PA 560	Criminal Justice Leadership	4
PA 561	Law Enforcement Leadership	4
PA 562	Security Leadership	4
PA 563	Corrections Leadership	4
PA 610	Strategic Planning	4
PA 630	Local Government Management	4

■ Post-Master's Certificate Program

Program coordinator:

Dale K. Nesbary

Description

The Post-Master's Certificate program, offered by the Mater of Public Administration program is designed to provide students who have already earned an M.P.A. or a similar degree with additional education and training in specialized areas of public management and administration. Students will be required to take at least 16 hours of graduate work beyond the Master's degree in one of the two post-master's program areas of Local Government management and Nonprofit Organization and Management. These specialty areas are based on elective coursework in two of the concentrations currently offered by the M.P.A. program. Students in the post-master's certificate program will be required to earn a grade of 3.0 or above in each course required for the certificate.

Admission requirements

Applicants to the Post-Master's Certificate program must hold an M.P.A. or equivalent degree to be considered for admission. If the degree is not from a NASPAA accredited program, the M.P.A. director, in consultation with the M.P.A. faculty group, will determine whether a specific degree program provides an adequate background training.

Applicants should have a cumulative G.P.A. of 3.00 or better in the M.P.A. or MPA-type degree. The applicant must submit the following materials:

1. Application for Graduate Study
2. Application fee
3. M.P.A. supplemental application form (essays)
4. Official transcripts of the M.P.A. or equivalent degree.

General program requirements

The Post-Master's Certificate programs required the following of all students. Specific course requirements are listed under each of the certificate programs listed below.

1. Software skills: proficiency in the use of Microsoft Professional Suite (or comparable package), and use of the internet. Student deficient in these skills may take an approved PC skills course which will not apply toward the certificate program.
2. Academic probation: Students admitted to a certificate program will be subject to the same policies governing academic progress for regularly matriculated M.P.A. students.
3. GPA requirements: Students must earn a grade of 3.0 or above in each course required for the certificate in order to qualify for the certificate. Students may repeat any course once in order to achieve the minimum grade for that course.
4. Number of certificates: Students may earn more than one certificate, but cannot use (double count) any specific course to meet the requirements of two certificate programs.

5. Transfer credit: Up to four (4) credits of graduate work taken at another institution may be transferred to Oakland to meet part of the 16-credit requirement. These credits may not be used toward another certificate or degree program.
6. Course requirements: Courses used toward the certificate requirements must be beyond those earned for the master's degree.

Students who have completed any of the specific courses required for the certificate as part of their master's program will be required to take additional courses to produce a total of 16 credits for the certificate beyond the credits earned in their master's program.

■ Post-Master's Certificate in Local Government Management

To provide specialized work in local government management the student is required to complete a minimum of 16 credits in the courses listed below. Students who have completed any of these courses for their master's program or another certificate program will be required to take additional courses to complete the 16 credits required for this certificate.

Core (4 credits)

PA 630	Local Government Management	4
		4

Elective courses (12 credits)

PA 503	Intergovernmental Relations	4
PA 542	Law and Administration: Local Perspectives	2
PA 548	Administrative Ethics	2
PA 603	Contemporary Public Management Techniques	4
PA 610	Strategic Planning	4
PA 631	Grants: Politics and Administration	2
PA 634	Risk Management	2
PA 669	Community Planning and Zoning	4

■ Post-Master's Certificate in Nonprofit Organization & Management

To provide specialized work in local government management the student is required to complete a minimum of 16 credits in the courses listed below. Students who have completed any of these courses for their master's program or another certificate program will be required to take additional courses to complete the 16 credits required for this certificate.

Core (8 credits)

PA 510	Nonprofit Organization and Management	4
PA 511	Fundraising and Philanthropy	4
		4

Elective courses (8 credits)

PA 548	Administrative Ethics	2
PA 603	Contemporary Public Management Techniques	4
PA 610	Strategic Planning	4
PA 631	Grants: Politics and Administration	2
PA 634	Risk Management	2

■ THE MASTER OF ARTS IN LIBERAL STUDIES

221 Varner Hall • (248) 370-2539 • Fax (248) 370-4280
<http://www2.oakland.edu/mals>

■ MASTER OF ARTS IN LIBERAL STUDIES

Program coordinator:

Natalie Bell Cole

Executive committee:

Tamara Machmut-Jhashi (Art History)
Feona M. Hansen (Biology)
Barbara Mabee (German)
David R. Maines (Sociology)

Description

The College of Arts and Sciences offers a graduate degree program leading to a Master of Arts in Liberal Studies. This program is an innovative and rigorous interdisciplinary approach to graduate education designed for adult post-baccalaureate students wishing to explore new subjects, develop their intellectual resources, and extend their range of knowledge. The objectives of this program are in harmony with the goals of a liberal education: that is, to cultivate the individual's ability to integrate diverse fields of human knowledge and activity.

This program is neither vocational nor professional in its orientation. It is not intended for students seeking to certify or credential; nor is it an intermediate step into a Ph.D. program. It is rather intended to help students develop critical thinking skills, encourage creativity and intellectual flexibility, and cultivate exploration of the liberal arts.

Admission requirements

Admission to the Master of Arts in Liberal Studies degree program is selective. Applicants must hold a bachelor's degree from a regionally accredited college or university and must have earned a minimum 3.00 grade-point average on a 4.00 point scale in the latter half of the undergraduate program. Applicants must write a one-page statement outlining their objectives in entering the program. (Students who do not meet the grade requirements may be admitted on a provisional basis, pending completion of three liberal-arts courses with grades of 3.0 or above and favorable recommendations from the instructors.)

Prospective students must submit transcripts verifying their previous academic record, and an admission interview with the program director will be required. All students in the program will be expected to maintain at least a 3.00 average, or they may be subject to dismissal from the program. Two grades below 3.0 automatically

render a student subject to dismissal, as does one grade below 2.5. No credit will be granted for courses in which students have received grades below 2.7.

Degree requirements

Candidates for the degree of Master of Arts in Liberal Studies will complete 36 credit hours of coursework beyond the bachelor's degree. All students must complete a core of three courses (4 credit hours each, 12 credit hours total); an introductory colloquium and two core seminars. Students will then choose five liberal studies electives (4 credit hours each, 20 credit hours total), cross listed with the college's graduate course offerings (or in the case of departments with no graduate program, 300-400 level courses in which extra advanced work would be required), taking a minimum of four (4) credit hours in each of the four designated areas: languages and literatures, humanities, social sciences, and science, and the master's project. No more than eight (8) credit hours may be taken as independent study or independent reading courses at the graduate level.

All students admitted to the program will be assigned a faculty adviser.

Master's project

All students will complete a final master's project, which will integrate at least two of the designated areas (4 credit hours). Students must complete the core courses and four electives before beginning their master's project, for the project represents the culmination of the student's liberal studies. Project proposals must be approved by the program's executive committee and will require a three-person project committee which also must be approved by the program's executive committee, and which will consist of a chair and two additional members.

Transfer credits

Up to eight (8) graduate credits completed in residence at another accredited institution may be applied toward the 37-credit minimum degree requirement. Transfer of credits must be approved by the program's executive committee and is subject to the conditions indicated in Oakland University's "Transfer Credit Policy" in the graduate catalog.

In addition, up to eight (8) graduate credit hours may be applied from another Oakland University school, subject to the approval of the program's executive committee.

■ SPECIAL COURSES

Occasionally, with the approval of Graduate Study and Lifelong Learning, departments which do not have graduate programs may offer certain courses which carry graduate credit. The following courses have been approved by the Graduate Council for these special offerings.

AH 505
African Art (4)

AH 555
Michigan Architecture (4)

JRN 505
Supervising High School Publications (4)

JRN 506
Newspapers in Education (2)

ML 504
Foreign Language Seminar: Language and Culture (3)

ML 505
Foreign Language Seminar: Conversation and Culture (3)

ML 520
Grammar Review Through Translation: French, German or Spanish (4)

ML 521
Advanced Composition: French, German or Spanish (4)

ML 522
Advanced Oral Practice: French, German or Spanish (4)

PSY 510
Developmental Psychology (4)

PSY 552
Sensation and Perception (4)

PSY 553
Cognitive Psychology (4)

PSY 590
Seminar: The Psychology of Reading (4)

PSY 591
Seminar: The Development of Reading Ability, Individual Differences, and Learning Disabilities (4)

RHT 514
Writing Project Programs (2 or 4)

RHT 515
Meadow Brook Writing Project (2 or 4)

RHT 516
Advanced Workshop (1 to 4)

RHT 520
Peer Tutoring in Composition (4)

RHT 530
Rhetoric and the Internet (4)

RHT 614
Teaching Writing (4)

SOC 500
Sociological Theory (4)

SOC 502
Specialized Field Techniques of Social Research (4)

SOC 514
Social Context of Social Work (4)

SOC 527
Police and Society (4)

SOC 537
Sociology of the Courts (4)

SCHOOL OF BUSINESS ADMINISTRATION

432 Elliott Hall • (248) 370-3287 • Fax (248) 370-4964
<http://www.sba.oakland.edu>

Dean:

Jonathan Silberman

Assistant dean:

Marcia L. Lichty

Coordinator, graduate business programs:

Donna K. Free

Department chairpersons:

Ravi Parameswaran, Management and Marketing
Edward J. Farragher, Accounting and Finance
Thomas W. Lauer, Decision and Information Sciences
Addington M. Coppin, Economics

Distinguished professor emeritus:

Karl D. Gregory, Ph.D., University of Michigan

Professors emeriti:

Eleftherios N. Botsas, Ph.D., Wayne State University
Daniel N. Braunstein, Ph.D., Purdue University
Ronald M. Horwitz, Ph.D., Michigan State University, CPA
Sid Mittra, Ph.D., University of Florida

Professors:

Lizabeth A. Barclay, Ph.D., Wayne State University, SPHR
Mohammad S. Bazaz, Ph.D., University of Oklahoma
Joseph H. Callaghan, Ph.D., University of Illinois, Urbana-Champaign
Addington M. Coppin, Ph.D., University of Illinois, Urbana-Champaign
Mohammad Dadashzaduh, Ph.D., University of Massachusetts, Amherst
Gadis J. Dillon, Ph.D., University of Michigan, CPA
David P. Doane, Ph.D., Purdue University
Edward J. Farragher, Ph.D., University of Illinois, Urbana-Champaign
Oded Izraeli, Ph.D., University of Chicago
Thomas W. Lauer, Ph.D., Indiana University
Paul S. Licker, Ph.D., University of Pennsylvania
Donald O. Mayer, L.L.M., Georgetown University
J. Austin Murphy, Ph.D., University of Georgia
Kevin J. Murphy, Ph.D., Michigan State University
Ravi Parameswaran, Ph.D., Georgia State University
Anandi P. Sahu, Ph.D., Washington University
Howard S. Schwartz, Ph.D., Cornell University
Miron Stano, Ph.D., Cornell University
Kenneth M. York, Ph.D., Bowling Green State University

Associate professors:

Mukesh Bhargava, Ph.D., University of Texas at Austin
Eugene B. Fliedner, D.B.A., Indiana University
Sherman T. Folland, Ph.D., University of Iowa
John W. Henke, Jr., Ph.D., Michigan State University
Mark W. Isken, Ph.D., University of Michigan
John D. Kim, Ph.D., University of Cincinnati
Kieran D. Mathieson, Ph.D., Indiana University
Nivedita Mukherji, Ph.D., Virginia Polytechnic Institute and State University

Mohinder Parkash, Ph.D., University of Arizona
Sandra H. Pelfrey, M.B.A., Wright State University, CPA
R. Mohan Pisharodi, Ph.D., University of Tennessee
Balaji Rajagopalan, Ph.D., Memphis State University
Srinrayan Sharma, D.B.A., Southern Illinois University at Carbondale
Mark Simon, Ph.D., Georgia State University
Vijayan Sugumaran, Ph.D., George Mason University
Ronald L. Tracy, Ph.D., Michigan State University
T. J. Wharton, Ph.D., University of Minnesota
Floyd G. Willoughby, Ph.D., Michigan State University

Assistant professors:

Henry Aigbedo, Ph.D., University of Tsukuba (Japan)
Matej Blasko, Ph.D., University of Georgia
Anthony J. Cataldo, Ph.D., Virginia Polytechnic Institute
Xiaodong Deng, Ph.D., University of Toledo
M. H. Carol Liu, Ph.D., University of Buffalo
Karl Majeske, Ph.D., University of Michigan
Karen S. Markel, Ph.D., Michigan State University
Cynthia E. Miree-Coppin, Ph.D., Florida A&M
Robert A. Nehmer, Ph.D., University of Illinois, Urbana-Champaign
Ram Orzach, Ph.D., Tel Aviv University
Joseph Schiele, Ph.D., University of Ontario (Canada)
James S. Serocki, L.L.M., Wayne State University
Rajeev Singhal, Ph.D., University of Utah
Kasaundra M. Tomlin, Ph.D., University of Oregon
Catherine L. Tyler, Ph.D., Florida Atlantic University
Yun Zhu, Ph.D., Michigan State University

Instructors:

Faud Hasanov, Ph.D., University of Texas, Austin
Janell Townsend, M.B.A., Wayne State University
Xie Zhu, M.A., Tulane University

Special instructor:

David D. Sidaway, M.Acc., Ohio State University, CPA

Board of Visitors

The Board of Visitors of the School of Business Administration provides a direct link between the industrial community and the School. The Board is composed of outstanding corporate and professional leaders from the Detroit metropolitan area. Board members assist the faculty on several projects and provide consultation on goals and objectives, curricula designs and research programs.

Board members:

Joseph B. Anderson Jr., Chair and Chief Executive Officer, TAG Holdings, LLC
Paul H. Campbell, Former Chief Executive Officer, Hutchinson FTS, Inc.
John R. Crary, Vice President, Information Technology, Lear Corporation
Nino DiCosmo, Chairman, President and CEO, AutoWeb Communications, Inc.
Stuart A. Doyle, Senior Director Customer Solutions, US Manufacturing, Cisco Systems, Inc.
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William H. Sandy, Founder, Sandy Corporation
John M. Savio, Vice President, Branch Operations, Oakland University Branch, MSU Federal Credit Union
Jonathan Silberman (ex officio), Dean SBA, Oakland University
Rebecca R. Smith, Former Executive Vice President, Commercial Banking Division, Fifth Third Bank
Craig Stinson, Chief Executive Officer, Breeze Industrial Products, Inc.
Dennis Toffolo, Director, Community and Economic Development, Oakland County
Bette Walker, Chief Information Officer, Delphi Automotive
Ted D. Wasson, President and Chief Executive Officer, William Beaumont Hospital Corp.

Complementing the Board of Visitors of the School of Business Administration are the following department or program advisory boards:

The Accounting and Finance Advisory Board is a group of distinguished individuals in public accounting, industry and government. The Board's objective is to enhance the ties between the School of Business Administration's accounting faculty and students and the business and professional accounting community.

The Marketing Advisory Board enhances the relationship between the marketing faculty and students and the business marketing community in southeastern Michigan. Students and faculty benefit by having access to a variety of business resources, which enhances the

marketing program's educational, research and service activities. Members of the Marketing Advisory Board benefit by having the opportunity to provide advice, direction and support for Oakland University's educational and research activities.

The Human Resources Management Advisory Board enhances the relationship between the human resources faculty and students and the business human resources community. Students and faculty benefit by having access to a variety of resources that improve the HRM program's educational, research and service activities.

The Decision and Information Sciences Advisory Board enhances the education of MIS students at Oakland University and assists in providing well-educated MIS professionals to the business community.

The Executive MBA in Health Care Management Advisory Board is made up of senior executives from major hospitals, HMOs and healthcare community organizations, as well as business representatives. They help the Dean and Director formulate strategic program policies and provide a focus on emerging health care issues which will be treated in special topic courses.

■ Graduate Business Degree Programs

Executive MBA in Health Care Management (EMBA-HCM)

Master of Business Administration (MBA) with concentrations in:
Accounting
Business Economics
Entrepreneurship
Finance
Human Resources Management
International Business
Management Information Systems
Marketing
Production/Operations Management
Supply Chain Management

Master of Accounting (MAcc)

Master of Science in Information Technology Management (MSITM)

The SBA also participates in the Master of Science in Engineering Management offered by the School of Engineering and Computer Science and detailed in the engineering section of this catalog.

■ Post-Master's Certificate Programs

For students with an MBA, the School of Business Administration offers post-master's certificate programs in:

Accounting
Business Economics
Entrepreneurship
Finance
Human Resources Management

International Business
Management Information Systems
Marketing
Production/Operations Management

For students with a master's degree in a non-business field, the School of Business Administration offers the Post-Master's Certificate in General Management.

General Information

Accreditation

Oakland University's School of Business Administration programs are accredited by AACSB International — the Association to Advance Collegiate Schools of Business. AACSB International is the premier accreditation organization for business schools. In addition, the accounting program, including the MAcc has achieved separate AACSB Accounting accreditation.

Assessment

To assist in the continuous improvement of its programs, the SBA engages in a range of assessment efforts. Students are expected to actively participate in these assessment and improvement efforts.

Graduate assistantships

A limited number of graduate assistantships are awarded each academic semester, on a competitive basis, to full-time students in the MBA, MSITM and MAcc programs. Assistantships include a stipend and an award of 9 credits of tuition and accompanying fees per fall and winter semesters. In return, graduate assistants work up to 20 hours per week assisting one or more faculty members in their research efforts. Additional information and applications may be obtained from the Office of Graduate Business Programs.

Transfer credit

In accordance with the regulations of the Graduate Council, up to 9 credits of relevant equivalent coursework may be transferred from an MBA, MSITM or MAcc program at a regionally accredited institution. Up to 3 credits of relevant graduate coursework may be transferred for the post-master's certificate programs. For credit to transfer, the student must have earned a grade of 3.0 (B) or better in the course. The transfer credit will reduce the number of credits required in the graduate business program. The acceptance of transfer credit and the related course exemptions are determined after an evaluation of a student's transcript. They must be approved by the Office of Graduate Business Programs and Graduate Study and Lifelong Learning.

Student evaluation and grading

In accordance with the university requirements for graduate students, a grade point average of 3.00 is required for graduation. Students, therefore, should maintain at least a 3.00 GPA. Students may be dismissed if they do not maintain a GPA of 3.00 or appropriate progress toward the degree as determined by the Office of Graduate Business Programs. Any course resulting in a grade below 2.0 must be repeated. Students who do not complete a graduate course for two years must formally apply for readmission to the MBA, MAcc, MSITM or Post-Master Certificate program.

Graduate Management Admission Test (GMAT)

All applicants for admission to the MBA, MSITM or MAcc programs must submit official scores for the GMAT. This test is administered throughout the world by the Education Testing Service. For more information visit the Graduate Management Admissions Council website at www.mba.com or write GMAT, Educational Testing Service, P. O. Box 6103, Princeton, New Jersey 08541-6103 or call (609) 771-7330. The GMAT is an important part of the admission process and either careful study of a GMAT review manual or the completion of a review class is strongly recommended. Applicants with GMAT test scores older than five years may be required to retake the GMAT.

■ Executive MBA in Health Care Management

Description

The Executive MBA in Health Care Management (EMBA-HCM) is designed to give health care professionals a fuller understanding of the concepts and skills necessary to become more effective managers. The program consists of 39 credit hours taken over 21 months. In addition to foundation courses, students will also take 10 credit hours of health care-related electives. Course content has a definite health care focus. Special topic courses that deal with emerging issues in health care will be presented each semester. Courses are designed and taught by a combination of faculty from Oakland University's School of Business Administration and experienced professionals and practitioners from various health care fields.

Likely candidates for the program include physicians; middle managers at hospitals, HMOs, and other health care facilities; insurance company administrators; and corporate benefits administrators. Enrollment in the program will be selective, based on candidates' backgrounds. Certain competencies, including knowledge of quantitative methods and basic computer-related skills, are required. Candidates will have the opportunity to attend workshops to meet competency requirements.

In order to assure effective instruction and interaction, classes will be strictly limited to a maximum of 30 students. This "cohort group" will move through the program together, with all participants taking the same classes and electives. Classes are scheduled to accommodate the time demands of busy health care professionals. They meet Friday afternoon and all day Saturday on alternate weekends, over a period of 21 months.

Admission terms and deadlines

Students may be admitted only in the fall term.

All application materials for the EMBA-HCM must be received by June 1.

Application requirements

- Required application materials include:
1. Application for Admission to Graduate Study.
 2. \$50 application fee.
 3. Official transcripts from all previous colleges and universities attended.
 4. Official GMAT scores (for those not holding a graduate degree).
 5. A letter of endorsement from the employer to attend alternate weekend classes on Friday afternoons and Saturday.

Admission requirements

The EMBA-HCM is selective and limited to an entering class of 30 students per year. The requirements for consideration for admission include:

- A minimum of five years experience in health care or a related field for applicants who possess a graduate degree.
- A minimum of five years of administrative/managerial experience in health care or a related field for applicants without a graduate degree.
- An undergraduate degree in any discipline.
- Employer endorsement to attend alternate weekend classes on Friday afternoons and Saturday.
- Scores from the Graduate Management Admission Test (GMAT) taken in the past five years for applicants not holding a graduate degree.

In general, applicants with a total score in the 60th percentile or above on the GMAT, placement in the 30th percentile or above in both the verbal and quantitative sections of the test, and an overall GPA of 3.20 or better will be considered for non-conditional admission. Applicants holding professional medical degrees (i.e., M.D., D. O.) will be exempt from taking the GMAT. Applicants with strong letters of recommendation from their employers or who have demonstrated the ability to handle such a rigorous program may be considered for conditional admission.

Degree requirements

The EMBA-HCM is a 39-credit-hour program consisting of traditional MBA courses that have been specifically geared toward the health care industry. Coursework in the program consists of foundation classes in the functional areas of business, as well as coursework dealing with specific issues currently facing health care managers. Classes will be highly interactive and will include individual and team projects and presentations. The foundation courses will be similar to those offered in the regular MBA program but geared toward managing in the health care industry.

Students in the program without evidence of the required skills in quantitative methods, computer skills and organizational behavior will be expected to complete the appropriate workshops in the summer before entering the EMBA-HCM program. The workshops in Quantitative Methods, Computer Skills and Organizational Behavior will be offered on the same Friday and Saturday schedule as the EMBA-HCM program schedule on three weekends during the summer before the EMBA-HCM program starts. A workshop fee will be assessed in addition to the program costs.

Program of study**Foundation courses**

Each student will be expected to complete the following 29 credit hours of foundation coursework:

HCM 504	Statistical Methods	3
HCM 512	Financial and Managerial Accounting	3
HCM 521	Managerial Economics	3
HCM 527	Health Economics	2
HCM 530	Teambuilding, Leadership and Communication	2
HCM 531	Human Resources Management	2
HCM 535	Strategic Management	3
HCM 540	Operations Management	2
HCM 545	Health Care Information Systems	2
HCM 550	Legal and Ethical Issues	2
HCM 560	Marketing Management	2
HCM 570	Financial Management	3
Total		29

Elective courses

Each student will be expected to complete 10 credit hours of elective coursework. The actual electives chosen will be based upon input from the students in the program, the faculty in the program, and health care professionals on the EMBA-HCM Advisory Board.

HCM 605	Forecasting in Health Care	2
HCM 606	Quality Improvement in Health Care	2
HCM 612	Cost Management in Health Care	2
HCM 624	Government Policy in Health Care	2
HCM 625	International Comparisons in Health Care	1
HCM 633	Managing Cultural Diversity	1
HCM 634	Hospital Administration	2
HCM 635	Transforming the Health Care Organization	2
HCM 636	Contract and Negotiation in Health Care	1
HCM 637	Outcomes Assessment in Health Care	1
HCM 638	New Ventures in Health Care	1
HCM 642	Facilities Planning and Evaluation	1
HCM 643	Project Management in Health Care	1
HCM 645	Managing Technology in Health Care	2
HCM 646	Data Warehousing in Health Care	1
HCM 661	Health Care Marketing and Consumer Satisfaction	2
HCM 662	New Health Care Services Development	1
HCM 670	Hospital Finance and Managed Care	3

For additional information on the EMBA-HCM, please contact Dr. Balaji Rajagopalan, Director of EMBA-HCM Program, at (248) 370-4958; fax: (248) 370-4604; e-mail: embahcm@oakland.edu.

■ Master of Business Administration

A program leading to the Master of Business Administration (MBA) with special emphasis in information technology and international business is offered by the School of Business Administration (SBA). It is designed to educate students for managerial roles in private, public or not-for-profit sectors of the economy. Courses are offered Monday through Thursday evenings at the Rochester campus and at OU Centers in Birmingham and in Macomb County. Saturday morning classes are also offered at the Rochester campus.

Program philosophy

The MBA program is designed for undergraduate majors from any discipline, including business or management. It is preferred that students with an undergraduate degree in business or one of the functional areas of management have two years of work experience before entering the MBA program. A typical entering class may consist of undergraduate majors from engineering, the natural sciences, the social sciences, computer science, mathematics, business, health care, education and the humanities.

The program is based on the belief that an education in management should:

1. Prepare students for careers involving problem identification, problem solving, decision making and leadership in any type of organization.
2. Emphasize the determination of goals and the effective utilization of scarce resources.
3. Help students understand and effectively interact with the emerging workplace issues of globalization and diversity.
4. Assist students in understanding the effects of, and successfully deal with, the changing social, legal, ethical and technological environments of the organization.
5. Stress understanding of human behavior and the organizational setting, for much of management relates to people — understanding them, communicating with them, working with them and leading them.
6. Stress the importance of the management of information and information resources in the successful operation of an organization.

MBA concentrations

In addition to the standard MBA program, students may choose to concentrate their elective work in a given discipline or interdisciplinary area. Currently the MBA program at Oakland University has areas of concentration in Accounting, Business Economics, Entrepreneurship, Finance, Human Resources Management, International Business, Management Information Systems, Marketing, and Production/Operations Management and Supply Chain Management.

Part-time status

The MBA program must be completed within six years from the date of entry into the program. The scheduling of MBA classes is based on the assumption that students will be enrolled in a standard part-time program: six courses per year (two courses in each of the

15-week fall and winter semesters, and one course in each of the eight-week spring and summer sessions).

Length of program

The length of the MBA program varies from 36 to 48 credits (not including prerequisites), depending on the student's prior preparation. The minimum program consists of 36 credits of required courses and electives that must be completed by all candidates.

Full-time students normally take 12 credits (four courses) in the fall and winter semesters and three credits (one course) in the spring and summer sessions. The full-time student can finish the complete 48-credit program in less than two years. Students with sufficient background in business courses may be able to complete the minimum 36-credit MBA program in 16 months of full-time study.

The part-time student taking six courses per year should finish the complete 48-credit program in two and two-thirds calendar years (32 months) in a year-round program.

In accordance with university regulations, all course credits used to meet requirements of the MBA program must be earned within six years of the date that the MBA is awarded.

Admission terms and deadlines

Students may begin the MBA program in the fall, winter, spring or summer sessions, depending upon their background.

All application materials for the MBA must be received by:

- August 1 for the fall semester
- December 1 for the winter semester
- April 1 for the spring session
- June 1 for the summer session

Deadlines for international students are May 1 for the fall semester and September 1 for the winter semester.

Application requirements

A complete application must be on file in Graduate Admissions, 160 North Foundation Hall. The applicant must submit:

1. Application for Admission to Graduate Study.
2. \$50 application fee.
3. Supplemental application for the graduate business programs.
4. Official transcripts from all previous colleges and universities attended.
5. Official GMAT scores.

International students will have additional application requirements. See the Graduate Study and Lifelong Learning web site for these additional requirements.

Applicants should take the GMAT at least three weeks before the deadline for their application to allow time for the official scores to be sent to Oakland University.

Admission requirements

Admissions to the MBA program are selective and depend on several elements, including scholarship and an ability to communicate effectively. Before an applicant can be admitted to the MBA program he or she must have completed:

1. A bachelor's degree from a regionally accredited institution.
2. The Graduate Management Admission Test (GMAT).

Applicants must also meet the general admission requirements for graduate study at Oakland University. Applications are considered by the Graduate Admission Committee of the School of Business Administration. In making admission recommendations, the admission committee assesses the potential of applicants for success in the MBA program by examining their undergraduate records, their GMAT scores, their responses to questions on the supplemental application and their work experience. Letters of recommendation are not required.

MBA program of study

The MBA program consists of four parts: the prerequisite courses, the core program, the integrative business policy course (MGT 535) and a set of at least five electives. Each part of the program is detailed below.

Prerequisite courses

Students admitted to the MBA program must demonstrate proficiency or complete coursework in the following areas. Students may be conditionally admitted with the condition that they complete those prerequisites during their first year of study in the MBA program.

1. A college course in the principles of microeconomics
2. A college course in the principles of macroeconomics
3. A college course in financial accounting
4. A recent college algebra course or mathematics at a higher level
5. A college course in calculus or a continuing education course in quantitative methods which included basic calculus
6. A college course, workshop, continuing education course or self-study in computer applications. Students must have experience with word processors, spreadsheets, graphics, database management systems, and the Internet.

MBA core program

The core program is designed to develop basic skills in management for the MBA student. Only students formally admitted into the MBA program, another graduate program at Oakland University (with approval of the Office of Graduate Business Programs), or guest students from an MBA program at another university may register for the MBA core classes.

Core course exemptions

To be exempted from some of the core courses the applicant must have passed an equivalent undergraduate course with a grade of 2.0 (C) or better within the previous 10 years. Exemption from a core course reduces the total credit requirement for the MBA. Students exempted from some or all the core courses will be required to take a minimum program of 36 MBA credits. As part of his or her program, the MBA student must take at least one graduate level course in each of the functional areas (i.e., at least one graduate course in ACC, FIN, MKT, and POM/QMM) either as one of the five MBA electives or in addition to these electives. Exemptions from core courses are determined by the Office of Graduate Business Programs after an evaluation of the student's transcript. A student will be allowed to take a core course from which he/she had been exempted only with prior written approval from the Office of Graduate Business Programs. Repeating waived courses will increase a student's MBA program beyond the minimum of 36 credit hours.

Core courses

ACC 512	Managerial Accounting Systems	3
QMM 510	Statistical Analysis for Managers	3
ECN 521	Economics for Managers	3
ORG 530	Organizational Behavior	3
MGT 550	Legal Environment of Business	3
MIS 524	Enterprise Information Systems	3
MKT 560	Marketing Management	3
POM 521	Operations Management	3
FIN 533	Financial Management	3
MGT 526	International Business	3

Integrative business policy course

The integrative business policy course, MGT 535, draws on all the coursework in the core of the MBA program in the analysis of real world cases in a team setting. MGT 535 is required of all MBA candidates.

MBA electives

MBA candidates complete their program by selecting a minimum of 15 credits of MBA electives. Of these, one course must be an information technology elective and one must be an international business elective (see website for current list of acceptable courses www.sba.oakland.edu/mba). The remaining 9 credits may be drawn from MBA elective courses offered by the School of Business Administration or from approved courses offered by other units of Oakland University. Six of the elective credits may be a master's project. MBA electives are numbered 500 and above for accounting and MIS electives and 600 and above for all other areas.

Concentrations

If MBA students want a more structured set of electives, they can take one of the MBA concentrations. A maximum of two concentrations can be noted on their transcripts. The MBA concentrations consist of the electives structured as noted under each MBA concentration listed below. A single class may not be counted toward more than one concentration. All courses are 3 credits, unless otherwise noted.

Accounting Concentration - To provide more background in accounting the student would be required to complete three electives from the following list for the concentration in Accounting:

ACC 505	Business Law for Accountants	3
ACC 518	Introduction to Accounting Information Systems & Databases	3
ACC 521	Federal Income Tax II	3
ACC 526	Accounting Information Systems: Audit and Control	3
ACC 533	Accounting Information Systems: Analysis and Design	3
ACC 601	Financial Analysis and Reporting	3

ACC 617	International Accounting	3
ACC 620	Cost Management	3
ACC 625	Federal Income Taxation for Business	3
ACC 631	Fraud Examination	3
ACC 650	Professional Issues in Accounting	3
ACC 660	Professional Accounting Research	3
ACC 680	Special Topics in Accounting	3
ACC 690	Independent Study in Accounting	3

Business Economics Concentration - To provide more background in the application of economics in business, the student would be required to complete three electives from the following program for a concentration in Business Economics:

ECN 605	Econometrics	3
ECN 618	Seminar in Economic Policy	3
ECN 620	Money, Financial Institutions and Markets	3
ECN 656	Public Finance	3
ECN 667	Economics of Health Care	3
ECN 673	International Trade and Finance	3
ECN 685	Economics of Industries	3
FIN 627	International Financial Management	3
FIN 633	Advanced Financial Management	3
QMM 652	Forecasting	3
ECN 680	Special Topics in Economics	3
ECN 690	Independent Study in Economics	3

Entrepreneurship Concentration - To provide more background in the strategic aspects of entrepreneurship, startups and small businesses, the student would be required to complete the following program for a concentration in Entrepreneurship:

MGT 656	Entrepreneurship	3
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Two electives from the following list:

ACC 625	Federal Income Taxation for Business	3
FIN 633	Advanced Financial Management	3
FIN 650	Real Estate Investment Analysis	3
MGT 660	Launching and Managing Small Businesses	3
MGT 670	Business Ethics	3
MGT 682	Special Topics in Entrepreneurship	3
MGT 692	Independent Study in Entrepreneurship	3
MKT 608	Strategic Marketing	3
ORG 635	Decision Making in Organizations	3
ORG 636	Leadership and Group Performance	3
ORG 640	Quality and Operational Excellence	3
POM 640	The Management and Control of Quality	3
POM 648	Project Management Techniques	3

Finance Concentration - To provide more background in finance, the student would be required to complete three electives from the following list for a concentration in Finance:

FIN 618	Investment Analysis	3
FIN 627	International Financial Management	3
FIN 633	Advanced Financial Management	3
FIN 650	Real Estate Investment Analysis	3
ACC 601	Financial Analysis and Reporting	3
FIN 680	Special Topics in Finance	3
FIN 690	Independent Study in Finance	3

Human Resources Management Concentration -

To provide more background in human resources management and personnel, the student would be required to complete the following for a concentration in Human Resources Management:

ORG 631	Human Resources Management	3
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Plus two electives from the following list:

MGT 638	Labor-Management Relations	3
MGT 670	Business Ethics	3
ORG 635	Decision Making in Organizations	3
ORG 636	Leadership and Group Performance	3
ORG 637	Motivation and Work Behavior	3
ORG 640	Quality and Operational Excellence	3
ORG 670	International Organizational Behavior and Human Resources	3
ORG 680	Special Topics in Organizational Behavior	3
ORG 690	Independent Study in Organizational Behavior	3

International Business Concentration - To provide more background in international business, the student would be required to complete three electives from the following list for a concentration in International Business:

ACC 617	International Accounting	3
ECN 673	International Trade and Finance	3
FIN 627	International Financial Management	3
MIS 648	Issues in International Information Technology	3
MKT 650	International Marketing	3
MKT 675	Customer and Supplier Relationships in the Global Enterprise	3
ORG 670	International Organizational Behavior and Human Resources	3
MGT 681	Special Topics in International Business	3
MGT 691	Independent Study in International Business	3

Management Information Systems

Concentration - To provide more background in MIS, the student would be required to complete three MIS electives for a concentration in Management Information Systems.

MIS 604	Database Management	3
MIS 606	Advanced Database Management Systems	3
MIS 618	Network Management	3
MIS 620	Electronic Commerce	3
MIS 622	Business Object Development	3
MIS 624	Business Application Architecture	3
MIS 625	IT Planning and Strategy	3
MIS 636	Decision Support Systems	3
MIS 638	Knowledge Management	3
MIS 640	IS Security	3
MIS 641	Privacy and Intellectual Property	3
MIS 642	IS Issues in Supply Chain Management	3
MIS 646	Business Analysis and Modeling	3
MIS 648	Issues in International Information Technology	3

Marketing Concentration - To provide more background in marketing, the student would be required to complete three electives from the following list for a concentration in Marketing:

MKT 604	Consumer Behavior	3
MKT 605	Marketing Research	3
MKT 608	Strategic Marketing	3
MKT 620	Distribution Channels Management and Logistics	3
MKT 625	Supply Chain Logistics	3
MKT 650	International Marketing	3
MKT 670	Business to Business Marketing	3
MKT 675	Customer and Supplier Relationships in the Global Enterprise	3
MKT 680	Special Topics in Marketing	3
MKT 690	Independent Study in Marketing	3

Production/Operations Management

Concentration - To provide more background in production and operations management, the student would be required to complete the following for a concentration in Production/Operations Management:

POM 641	Manufacturing Planning and Control	3
Plus two electives from the following list:		
ACC 620	Cost Management	3
POM 640	The Management and Control of Quality	3
POM 642	Supply Chain Management	3
POM 645	Cases in Operations Management	3

POM 648	Project Management Techniques	3
POM 680	Special Topics in POM	3 or 4
QMM 652	Forecasting	3
POM 690	Independent Study in Production and Operations Management	3

Supply Chain Management Concentration - To provide more background in supply chain management, the student would be required to complete three electives from the following list for a concentration in Supply Chain Management. POM 642 will be required for all students who do not have previous coursework in supply chain management.

POM 642	Supply Chain Management	3
MGT 642	Supply Chain Purchasing	3
MIS 642	IS Issues in Supply Chain Management	3
MKT 625	Supply Chain Logistics	3
MKT 675	Customer and Supplier Relationships in the Global Enterprise	3
POM 640	The Management and Control of Quality	3

Master's project (optional)

The optional master's project (equal to six elective credits) requires the application of classroom training and extra-classroom study to a practical management problem. It must involve collection and analysis of data in an actual organizational setting as well as cogent recommendations to management for resolving the problem. The master's project is not designed to be a theoretical master's "thesis." However, the student must follow presentation guidelines set forth by Graduate Study and Lifelong Learning on the preparation of a master's thesis/project. Two copies of the final project must be bound by Graduate Study and Lifelong Learning, with one copy being retained by the sponsoring faculty member and one by the Office of Graduate Business Programs. It should be organized around a management problem which requires input from several functional areas of management. Additional information about the master's project may be obtained from the Office of Graduate Business Programs.

■ Master of Accounting

The Master of Accounting (MAcc) is offered in the Department of Accounting and Finance within the School of Business Administration. The MAcc is designed for students who are interested in careers in public, corporate and non-business accounting.

The degree will assist accounting professionals in the dynamic corporate environment. Professionals in the field are required to be effective communicators, maintain a high level of expertise and uphold ethical responsibilities, while providing financial information, analysis of the economic environment and input in decision-making activities.

Keeping these qualities in view, the MAcc is designed to achieve the following goals:

1. Offer a graduate-level program developing superior technical knowledge and application skills beyond the baccalaureate accounting program
2. Enhance students' analytical, communication and decision making skills
3. Provide a sound base in ethics and professional behavior
4. Prepare students for careers in public, corporate and non-business accounting positions
5. Provide students with the educational requirements necessary to be eligible to take professional exams

Admission terms and deadlines

Students may begin the MAcc program in the fall, winter, spring or summer sessions depending upon their background.

All application materials for the MAcc must be received by:

- August 1 for the fall semester
- December 1 for the winter semester
- April 1 for the spring session
- June 1 for the summer session

Deadlines for international students are May 1 for the fall semester and September 1 for the winter semester.

Application requirements

A complete application must be on file in Graduate Admissions, 160 North Foundation Hall. The applicant must submit:

1. Application for Admission to Graduate Study.
2. \$50 application fee.
3. Supplemental application for the graduate business programs.
4. Official transcripts from all previous colleges and universities attended
5. Official GMAT scores

International students will have additional application requirements. See the Graduate Study and Lifelong Learning web site for these additional requirements.

Applicants should take the GMAT at least three weeks before the deadline for their application to allow time for the official scores to be sent to Oakland University.

Admission requirements

Admission to the Master of Accounting program is selective and depends on several elements, including scholarship and ability to communicate effectively. Before an applicant can be admitted to the Master of Accounting program, he/she must have completed:

1. A bachelor's degree from a regionally accredited institution
2. The Graduate Management Admission Test (GMAT)
3. College courses in:
 - Introductory Financial Accounting
 - Intermediate Financial Accounting I
 - Intermediate Financial Accounting II
 - Managerial and Cost Accounting I
 - Managerial and Cost Accounting II
4. A college course in either the principles of macroeconomics or microeconomics

Students may be conditionally admitted with the condition that they complete those prerequisites during their first year of study in the MAcc program.

Applicants must also meet the general admission requirements for graduate study at Oakland University. Applicants are required to have minimum proficiency in personal computing skills (i.e., word processing and spreadsheets). Applicants deemed deficient in this area may be required to complete a prerequisite course in computer workstation skills. Applications are considered by the Accounting Graduate Admissions Committee. In making admission recommendations, the admissions committee assesses the potential of applicants for success in the master's program by examining their undergraduate records, their GMAT scores, their responses to questions on the supplemental application and their work experience.

Program requirements

The MAcc program requires a minimum of 30 credits. It consists of two or three parts depending on a student's undergraduate education. Within the program there are 8 required business and accounting courses; these courses may be waived if an equivalent course was previously completed with a grade of "C" or better. All students must complete 4 courses (12 credits) from a list of approved graduate accounting and finance courses. MAcc students who are waived from accounting foundation courses will have the opportunity to select graduate business electives to fulfill their 30-credit hour program. No more than 12 credits of Oakland University courses may be obtained from courses numbered 400-499.

No course numbered below 400 will apply toward the graduate degree. Each part of the program will be detailed below. In compliance with University policy, no undergraduate courses will be transferred from another college or university and apply toward graduate degree requirements. Students must meet the prerequisites for all MAcc courses.

Required business and accounting foundation courses

The following courses are required of all MAcc students:

ACC 401	Advanced Financial Accounting	3
ACC 411	Auditing	3
ACC 415	Federal Income Taxation	3
ACC 518	Introduction to Accounting Information Systems and Databases	3
ACC 601	Financial Analysis & Reporting	3
ACC 660	Professional Accounting Research	3
FIN 533	Financial Management	3
QMM 510	Statistical Analysis for Managers	3

Students who have taken an equivalent undergraduate course with a grade of 2.0 (C) or better within the previous 10 years will be exempt from the required course. Students exempted from some or all of the required courses will be required to take additional open elective courses to maintain the 30-credit minimum required for the degree.

Accounting electives

Each MAcc student will be required to take a minimum of 12 credits of accounting electives from the following list. All courses are 3 credits unless otherwise noted.

ACC 412	Government and Not-for-profit Accounting	3
ACC 505	Business Law for Accountants	3
ACC 521	Federal Income Tax II	3
ACC 526	Accounting Information Systems: Audit and Control	3
ACC 533	Accounting Information Systems: Analysis and Design	3
ACC 617	International Accounting	3
ACC 620	Cost Management	3
ACC 625	Federal Income Taxation for Business	3
ACC 630	Accounting and Communications	3
ACC 631	Fraud Examination	3
ACC 650	Professional Issues in Accounting	3
ACC 680	Special Topics in Accounting	3
ACC 690	Independent Study in Accounting	3
FIN 633	Advanced Financial Management	3
FIS 680	Special Topics in Finance	3

Other electives (0-12 credits)

MAcc students will choose graduate business electives to complete their 30-credit hour program.

Deadlines for international students are May 1 for the fall semester and September 1 for the winter semester.

Application requirements

A complete application must be on file in Graduate Admissions, 160 North Foundation Hall. The applicant must submit:

1. Application for Admission to Graduate Study
2. \$50 application fee
3. Supplemental application for the graduate business programs.
4. Official transcripts from all previous colleges and universities attended
5. Official GMAT scores.

International students will have additional application requirements. See the Graduate Study and Lifelong Learning web site for these additional requirements. Applicants should take the GMAT at least three weeks before the deadline for their application to allow time for the official scores to be sent to Oakland University.

Admission requirements

Admission to the Master of Science in Information Technology Management program is selective and depends on several elements, including scholarship and ability to communicate effectively. Before an applicant can be admitted to the MSITM Program, he/she must have completed:

1. A bachelor's degree from a regionally accredited institution
2. The Graduate Management Admission Test (GMAT)
3. A college course in Financial Accounting. (May be taken during the first year of study in the MSITM program)

Applicants must also meet the general admission requirements for graduate study at Oakland University. Applications are considered by the Graduate Admissions Committee. In making admission recommendations, the committee assesses the applicants' undergraduate records, their GMAT scores, their responses to questions on the supplemental application and their work experience.

Program requirements

The MSITM program requires a minimum of 33 credits. It consists of six parts: a prerequisite course, a management core consisting of four courses; an IS core consisting of two courses; IS foundations consisting of three courses; a set of at least 21 credits of MIS graduate electives; and a capstone project course. No course numbered below 400 will apply toward the degree requirements. Each part of the program is detailed below.

Prerequisites

All applicants must complete a course in financial accounting. Applicants may be admitted with the condition that they complete this prerequisite within the first year of the program. Students must meet the prerequisites for all MSITM courses. Specific course prerequisites are listed in the course offerings.

■ Master of Science in Information Technology Management

The Master of Science in Information Technology Management (MSITM) is offered in the Department of Decision and Information Sciences within the School of Business Administration. The goal of the program is to provide a strong technical and managerial background to those who are interested in using information technology for competitive advantage. It is intended to provide business professionals with the knowledge they need to effectively manage information technology in support of their decision making. It is also intended to provide information systems professionals with knowledge on the latest technologies and their use in application development.

Admission terms and deadlines

Students may begin the MSITM program in the fall, winter, spring or summer sessions depending upon their background.

All application materials for the MSITM must be received by:

- August 1 for the fall semester
- December 1 for the winter semester
- April 1 for the spring session
- June 1 for the summer session

Business core (4 courses totaling 12 credits)

ACC 512	Managerial Accounting Systems	3
MKT 560	Marketing Management	3
ORG 530	Organizational Behavior	3
and one of the following:		
POM 521	Operations Management	3
FIN 533	Financial Management	3

Most IT management activities call for a general understanding of cost-related issues, marketing of technology and its application to users/other clients, and an understanding of the organizational behavior for the purposes of change management and strategy. Depending on a student's orientation with regard to service or manufacturing firms, we provide a choice of either finance or operations management.

These courses may be waived based on evidence of an equivalent course taken within ten years. Each of these courses or an equivalent course is offered regularly as part of the MBA program at Oakland University.

IS core (2 courses totaling 6 credits)

MIS 504	Introduction to IS Management	3
MIS 505	Technology of Information Systems	3

These courses may be waived based on experience or evidence of an equivalent course taken within five years.

IT foundation (3 courses totaling 9 credits)

MIS 514	Systems Analysis	3
MIS 515	Systems Design	3
MIS 516	Software Project Management	3

These three courses provide a common foundation for all MSITM students. The courses consider the way business processes are analyzed, designed and implemented for IT support. Database and network management will be integrated throughout.

These courses may be waived, given evidence of an equivalent course taken within five years. If waived, a foundation course must be replaced by an elective course.

Elective courses (7 courses totaling 21 credits)

After the students have built a solid foundation, they will be able to choose seven courses from a host of electives on emerging information technologies and topics of contemporary interest. Students seeking a more technical focus will be able to select from courses on advanced database management systems, decision support systems, and electronic commerce, among others. Students seeking to work more closely with business process issues may tailor their program using courses on IS planning and strategy, supply chain management, IS privacy and security, business analysis and modeling, etc.

Electives:
Related to IS Development

MIS 618	Network Management	3
MIS 620	Electronic Commerce	3
MIS 622	Business Object Development	3
MIS 624	Business Application Architecture	3

Related to IT Strategy and Management

MIS 625	IT Planning and Strategy	3
MIS 640	IS Security	3
MIS 641	Privacy and Intellectual Property	3
MIS 642	IS Issues in Supply Chain Management	3
MIS 648	Issues in International Information Technology	3

Related to Data Management and Decision Making

MIS 604	Database Management	3
MIS 606	Advanced Database Management	3
MIS 636	Decision Support Systems	3
MIS 638	Knowledge Management	3
MIS 646	Business Analysis and Modeling	3

The seven electives include, but are not limited to the courses listed above. Other selected courses offered by the School of Business Administration in accounting and finance (e.g., Accounting Information Systems), marketing, economics and selected courses offered by the School of Engineering and Computer Science may also be accepted for the program.

Capstone Course

MIS 650	Project Seminar	3
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All students are required to take the Project Seminar course that ties IT strategy to business strategy. As part of this capstone course each student will complete a project that integrates strategic and technical IT issues.

■ Post-Master's Certificate in General Management

Description

The Post-Master's Certificate Program in General Management is a 15 credit-hour course of study designed for individuals with a graduate degree in a non-business field who seek core business knowledge. The program emphasizes coursework that covers the major disciplines within the field of business. Upon completion, students will have general knowledge of common business practices and corporate procedures.

Completing the prescribed course of study leads to a certificate officially granted by the university. Coursework completed within this program can be transferred to a graduate business degree program if the student wishes to continue. This transfer must be completed before the certificate is issued.

The Post-Master's Certificate Program requires the following of all admitted students:

1. Personal Computer (PC) Skills: Students will be required to have proficiency in the use of word processors, spreadsheets, graphics, database management systems, and the Internet. If a student is deficient in these skills, the student would be required to take a college course, workshop or continuing education course in PC skills as a prerequisite to the program.
2. Minimum Grade Requirement: To qualify for the certificate, the student must complete the designated set of courses with a grade of 3.0 or better in each course.

Admission terms and deadlines

Students may begin the Post-Master's Certificate program in the fall, winter, spring or summer sessions depending upon their background.

All application materials must be received by: August 1 for the fall semester, December 1 for the winter semester, April 1 for the spring session, and June 1 for the summer session. Deadlines for international students are May 1 for the fall semester and September 1 for the winter semester.

Application requirements

A complete application must be on file in Graduate Admissions, 160 North Foundation Hall. The applicant must submit:

1. Application for Admission to Graduate Study.
2. \$50 application fee.
3. Supplemental application for the graduate business programs.
4. Official transcripts from all previous colleges and universities attended.

Admission requirements

Applicants to the Post-Master's Certificate Program must hold a graduate degree in a non-business field. The applicant should have a cumulative GPA of 3.00 or better in their graduate degree. The applicant must have completed a college course in calculus and statistics to be eligible for the program.

The GMAT is not required for admission to the Post-Master Certificate Program.

Program requirements

Five courses (15 credits) are required from the following list of courses. (All course prerequisites will apply.)

ACC 511	Financial Accounting	3
ACC 512	Managerial Accounting Systems	3
ECN 521	Economics for Managers	3
FIN 533	Financial Management	3
MGT 526	International Business	3
MGT 550	Legal Environment of Business	3
MIS 524	Enterprise Information Systems	3
MKT 560	Marketing Management	3
ORG 530	Organizational Behavior	3
POM 521	Operations Management	3

■ Post-Master's Certificate Programs

The School of Business Administration offers Post-Master's Certificates in each of the major areas of business. These programs are designed to provide students who have an MBA degree, or the equivalent of an MBA degree, with additional coursework in a specialized area of business.

These Post-Master's Certificate Programs require the following of all admitted students:

1. Personal Computer (PC) Skills: Students will be required to have proficiency in the use of word processors, spreadsheets, graphics, database management systems, and the Internet. If a student is deficient in these skills, the student would be required to take a college course, workshop or continuing education course in PC skills as a prerequisite to the program.
2. Minimum Grade Requirement: To qualify for the certificate, the student must complete the designated set of courses with a grade of 3.0 or better in each course.

Number of certificates

A student may earn more than one certificate, but may not apply any specific course toward the requirement of more than one program. Certificates are available in Accounting, Business Economics, Entrepreneurship, Finance, Human Resources Management, International Business, Marketing, Management Information Systems, and Production/Operations Management. Each certificate requires a minimum of 15 credits.

Upon completion of a Post-Master's Certificate, the student must file an Application for Certificate with the Office of Academic Records to receive an Oakland University certificate and have it appear on his or her Oakland University transcript.

Admission terms and deadlines

Students may begin the Post-Master's Certificate program in the fall, winter, spring or summer sessions depending upon their background.

All application materials must be received by August 1 for the fall semester, December 1 for the winter semester, April 1 for the spring session, and June 1 for the summer session. Deadlines for international students are May 1 for the fall semester and September 1 for the winter semester.

Application requirements

- A complete application must be on file in the Office of Graduate Admissions, 160 North Foundation Hall. The applicant must submit:
1. Application for Admission to Graduate Study
 2. \$50 application fee
 3. Supplemental application for the graduate business programs.
 4. Official transcripts from all previous colleges and universities attended.

Admission requirements

Applicants to the Post-Master's Certificate Program must hold an MBA or the equivalent of an MBA degree to be considered for admission. Applicants who do not hold an MBA degree may have their degree evaluated by the Office of Graduate Business Programs to determine eligibility for the program. Graduates of the Oakland University Master of Science in Engineering Management program are eligible for admission. The applicant should have a cumulative GPA of 3.00 or better in the MBA or MBA equivalent master's degree. The GMAT is not required for admission to the Post-Master's Certificate Program.

■ Post-Master's Certificate Program in Accounting

Required courses

ACC 512	Managerial Accounting Systems	3
Four additional courses (12 credits) from the following:		
ACC 505	Business Law for Accountants	3
ACC 518	Introduction to Accounting Information Systems and Databases	3
ACC 521	Federal Income Tax II	3
ACC 526	Accounting Information Systems: Audit and Control	3
ACC 533	Accounting Information Systems: Analysis and Design	3
ACC 601	Financial Analysis and Reporting	3
ACC 617	International Accounting	3
ACC 620	Cost Management	3
ACC 625	Federal Income Taxation for Business	3
ACC 631	Fraud Examination	3
ACC 650	Professional Issues in Accounting	3

ACC 660	Professional Accounting Research	3
ACC 680	Special Topics in Accounting	3
ACC 690	Independent Study in Accounting	3

Students who have completed ACC 512 or its equivalent will be required to take an additional course from the accounting elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Business Economics

Required courses

ECN 521	Economics for Managers	3
Four additional courses (12 credits) from the following:		
ECN 605	Econometrics	3
ECN 618	Seminar in Economic Policy	3
ECN 620	Money, Financial Institutions and Markets	3
ECN 656	Public Finance	3
ECN 667	Economics of Health Care	3
ECN 673	International Trade and Finance	3
ECN 685	Economics of Industries	3
FIN 627	International Financial Management	3
FIN 633	Advanced Financial Management	3
QMM 652	Forecasting	3
ECN 680	Special Topics in Economics	3
ECN 690	Independent Study in Economics	3

Students who have completed ECN 521 or its equivalent will be required to take an additional course from the Business Economics elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Entrepreneurship

Required courses

MGT 656	Entrepreneurship	3
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Four additional courses (12 Credits) from the following:

ACC 625	Federal Income Taxation for Business	3
FIN 633	Advanced Financial Management	3
FIN 650	Real Estate Investment Analysis	3
MGT 526	International Business	3
MGT 660	Launching and Managing Small Businesses	3
MGT 670	Business Ethics	3
MGT 682	Special Topics in Entrepreneurship	3
MGT 692	Independent Study in Entrepreneurship	3
MKT 608	Strategic Marketing	3
ORG 635	Decision Making in Organizations	3
ORG 636	Leadership and Group Performance	3
ORG 640	Quality and Operational Excellence	3
POM 640	The Management and Control of Quality	3
POM 648	Project Management Techniques	3

Students who have completed MGT 656 or its equivalent, will be required to take an additional course from the Entrepreneurship elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

Students who have completed FIN 533, or its equivalents, will be required to take an additional course from the Finance elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Human Resources Management

Required courses

ORG 530	Organizational Behavior	3
ORG 631	Human Resources Management	3

Three additional courses (9 credits) from the following:

MGT 638	Labor-Management Relations	3
MGT 670	Business Ethics	3
ORG 635	Decision Making in Organizations	3
ORG 636	Leadership and Group Performance	3
ORG 637	Motivation and Work Behavior	3
ORG 640	Quality and Operational Excellence	3
ORG 670	International Organizational Behavior and Human Resources	3
ORG 680	Special Topics in Organizational Behavior	3
ORG 690	Independent Study in Organizational Behavior	3

Students who have completed ORG 530, ORG 631, or their equivalents, will be required to take additional courses from the Human Resources Management elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Finance

Required courses

FIN 533	Financial Management	3
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Two additional courses (6 credits) from the following:

FIN 618	Investment Analysis	3
FIN 627	International Financial Management	3
FIN 633	Advanced Financial Management	3
FIN 650	Real Estate Investment Analysis	3
ACC 601	Financial Analysis and Reporting	3
ECN 620	Money, Financial Institutions and Markets	3
FIN 680	Special Topics in Finance	3
FIN 690	Independent Study in Finance	3

■ Post-Master's Certificate Program in International Business

Required courses

MGT 526	International Business	3
Four additional courses (12 credits) from the following:		
ACC 617	International Accounting	3
ECN 673	International Trade and Finance	3
FIN 627	International Financial Management	3
MIS 648	Issues in International Information Technology	3
MKT 650	International Marketing	3
MKT 675	Customer and Supplier Relationships in the Global Enterprise	3
ORG 670	International Organizational Behavior and Human Resources	3
MGT 681	Special Topics in International Business	3
MGT 691	Independent Study in International Business	3

Students who have completed MGT 526 or its equivalent will be required to take an additional course from the International Business elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Management Information Systems

Required courses

MIS 524	Enterprise Information Systems	3
Four additional courses (12 credits) from the following:		
MIS 604	Database Management	3
MIS 606	Advanced Database Management Systems	3
MIS 618	Network Management	3
MIS 620	Electronic Commerce	3
MIS 622	Business Object Development	3
MIS 624	Business Application Architecture	3
MIS 625	IT Planning and Strategy	3
MIS 636	Decision Support Systems	3
MIS 638	Knowledge Management	3

MIS 640	IS Security	3
MIS 641	Privacy and Intellectual Property	3
MIS 642	IS Issues in Supply Chain Management	3
MIS 646	Business Analysis and Modeling	3
MIS 648	Issues in International Information Technology	3
MIS 680	Special Topics in Management Information Systems	3
MIS 690	Independent Study in Management Information Systems	3

Students who have completed MIS 524 or its equivalent will be required to take an additional course from the Management Information Systems elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Marketing

Required courses

MKT 560	Marketing Management	3
MKT 608	Strategic Marketing	3

Three additional courses (9 credits) from the following:

MKT 604	Consumer Behavior	3
MKT 605	Marketing Research	3
MKT 620	Distribution Channels Management and Logistics	3
MKT 625	Supply Chain Logistics	3
MKT 650	International Marketing	3
MKT 670	Business to Business Marketing	3
MKT 675	Customer and Supplier Relationships in the Global Enterprise	3
MKT 680	Special Topics in Marketing	3
MKT 690	Independent Study in Marketing	3

Students who have completed MKT 560, MKT 608, or their equivalents, will be required to take additional courses from the Marketing elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

■ Post-Master's Certificate Program in Production and Operations Management

Required courses

POM 521	Operations Management	3
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Four additional courses (12 credits) from the following:

ACC 620	Cost Management	3
POM 640	The Management and Control of Quality	3
POM 641	Manufacturing Planning and Control	3
POM 642	Supply Chain Management	3
POM 645	Cases in Operations Management	3
POM 648	Project Management Techniques	3
QMM 652	Forecasting	3
POM 680	Special Topics in Production and Operations Management	3 or 4
POM 690	Independent Study in Production and Operations Management	3

Students who have completed POM 521 or its equivalent will be required to take an additional course from the Production and Operations Management elective list above to produce a total of 15 credits, beyond the credits earned in their master's degree program or another certificate program.

For more information on Graduate Business Programs

For more information on Oakland University's graduate business programs, including an application for graduate study, a GMAT booklet, and answers to common questions, please either:

Write to:

Office of Graduate Business Programs
School of Business Administration
Oakland University, Rochester, MI 48309-4493.

Fax a request to:

Graduate Business Programs at (248) 370-4964.

E-mail a request to the following Internet address:

gbp@lists.oakland.edu

Call the staff of the Office of Graduate Business Programs at:

(248) 370-3287.

Or visit our website: www.sba.oakland.edu/.

■ The Master of Science in Engineering Management

The Master of Science program in Engineering Management is offered by the School of Engineering and Computer Science in cooperation with the School of Business Administration. Intended for students with a bachelor's degree in engineering or computer science, the program has as its goal the provision of the tools and skills necessary for making sound management decisions in industry and business while retaining one's commitment to a specialized field of endeavor. Please consult the engineering section of this catalog for information on the Master of Science in Engineering Management.

■ SCHOOL OF EDUCATION AND HUMAN SERVICES

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Mary L. Otto, Ed.D., Indiana University
Sandra P. Packard, Ed.D., Indiana University
Robert M. Schwartz, Ph.D., University of Illinois
Ronald M. Swartz, Ph.D., New York University
Dyanne M. Tracy, Ph.D., Indiana University
Toni S. Walters, Ph.D., Oakland University

Associate professors:

Sandra M. Alber, Ed.D., Wayne State University
Susan M. Awbrey, Ph.D., Michigan State University
Richard F. Barron, Ph.D., Syracuse University
Ambika P. Bhargava, Ph.D., University of Texas, Austin
Thomas W. Blume, Ph.D., Texas Technological University
Marc E. Briod, Ph.D., Northwestern University
James F. Cipielewski, Ph.D., Oakland University

Elyce A. Cron, Ph.D., University of Toledo
Robert S. Fink, Ph.D., State University of New York, Buffalo
Sarah L. Gibson, Ph.D., Wayne State University
Andrew S. Gunsberg, Ph.D., University of Illinois
James T. Hansen, Ph.D., University of Detroit
Lisa D. Hawley, Ph.D., University of South Carolina
William G. Keane, Ed.D., Columbia University
Michael P. Long, J.D., Detroit College of Law
M. Shannan McNair, Ed.D., University of Michigan
Billy Joe Minor, Ph.D., Indiana University
Sherri L. Oden, Ph.D., University of Illinois
Linda M. Pavonetti, Ed.D., University of Houston
Dawn M. Pickard, Ph.D., Purdue University
Richard C. Pipan, Ed.D., University of North Carolina
Anne E. Porter, Ph.D., Wayne State University
James Quinn, Ph.D., University of Iowa
Luellen Ramey, Ph.D., University of Florida
Julia B. Smith, Ed.D., University of Michigan
Mary T. Stein, Ph.D., State University of New York, Buffalo
Carol A. Swift, Ph.D., University of Arizona
B. Joyce Wiencek, Ph.D., University of Maryland
Robert A. Wiggins, Ph.D. University of Illinois, Urbana-Champaign

Assistant professors:

Babette M. Benken, Ph.D., University of Michigan
Karen Bolak, Ed.D., Wayne State University
Nancy A. Brown, Ph.D., University of Michigan
Michael P. Chaney, Ph.D., Georgia State University
Susan T. Fascio-Vareen, Ph.D., Mississippi State University
Shannon R. Flumerfelt, Ph.D., Oakland University
Tomas R. Giberson, Ph.D., Wayne State University
Janet E. Graetz, Ph.D. George Mason University
Ilene L. Ingram, Ed.D., Wayne State University
James M. Javorsky, Ph.D., Purdue University
Eileen S. Johnson, Ph.D., University of Houston
Young J. Kim, Ph.D., University of Illinois, Chicago
Timothy G. Larrabee, Ph.D., University of California, Davis
Ji Eun Lee, Ed.D., State University of New York, Binghamton
Ledong Li, Ph.D., Oakland University
Todd W. Leibert, Ph.D., University of Florida
Mary K. Lose, Ed.D., Drake University
Michael G. MacDonald, Ph.D., University of Calgary (Canada)
C. Robert Maxfield, Jr., Ed.D., Wayne State University
Nancy A. Melamed-Brown, M.Ed., University of Michigan
Gwendolyn M. McMillon, Ph.D., Michigan State University
Carolyn J. O'Mahony, Ph.D., Michigan State University
Diane L. Parfitt, Ph.D., University of Toledo
Thomas Pedroni, Ph.D., Wisconsin University
Julie A. Ricks-Doneen, Ph.D., Michigan State University
Margaret A. Roytek, Ph.D., Wayne State University
Erica A. Ruegg, Ed.D., Texas Technological University
Chaunda L. Scott, Ed.D., Columbia University
Brian J. Taber, Ph.D., Kent State University
Monica W. Tracey, Ph.D., Wayne State University
Caryn M. Wells, Ph.D. Michigan State University

Visiting assistant professors:

Mark S. Doman, J.D., University of Minnesota
James A. Gall, Ph.D., Wayne State University
Pamela Morehead, Ph.D., Oakland University

Annette M. Osborne, Ph.D., Oakland University
Jumanne R. Sledge, Ph.D., Wayne State University
Tonya Tookes-Reznik, M.A., Wayne State University

Special instructors:

Brian O. Clark, Ed.D., Wayne State University
Linda K. Tyson, M.A., University of Michigan
Mary F. Zepplin, M.S., Oakland University

Adjunct professor:

Asa G. Hilliard, III, Ed.D., University of Denver

The School of Education and Human Services offers programs leading to:

- Doctor of Philosophy in reading education
- Doctor of Philosophy in education with majors in:
 - counseling
 - early childhood education
 - educational leadership
- Education Specialist in school administration
- Master of Arts in Teaching in reading and language arts
- Master of Arts in Teaching (elementary and secondary education)
- Master of Education in four areas:
 - early childhood
 - educational leadership
 - educational studies
 - special education
- Master of Arts in counseling
- Master of Training and Development
- Post-Master's Graduate Certificate in Higher Education
- Graduate Certificate in Educational Administration
- Graduate Certificate in Microcomputer Applications
- Professional Certification
- Endorsements

In order to remain in good standing, students must earn a grade point average of 3.00. No grade below 2.0 (2.8 for CIL and MTD) can be applied toward a graduate degree. Two course grades below 3.0 or one below 2.0 automatically lead to an evaluation of progress and possible dismissal.

Students will be allowed to take no more than 12 credits before admission to a program.

■ Michigan professional certification requirements

General information

To meet the professional (formerly continuing) certification requirements of the State of Michigan, candidates must complete the following: 1) three years of experience within their certificate level;

2) 18 semester hours of coursework in an approved planned program or master's degree; and 3) both elementary and secondary candidates must show evidence of completing coursework in methods of teaching reading. (Course work taken in the undergraduate degree will apply.) Six semester hours of reading are required for elementary candidates and three semester hours are required for secondary candidates.

If additional courses in reading need to be taken, the approved coursework for Oakland University is as follows:

For elementary teachers

RDG 500	Foundations of Reading Instruction	4
RDG 534	Reading and Language Arts Instruction	4

For secondary teachers

RDG 538	Guiding Reading-Learning in Content Subjects	4
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For those students enrolled in the MAT in reading and language arts only, RDG 632 and RDG 633 may be used. This reading requirement applies to students seeking professional certification after July 1, 1983.

Candidates for professional certification are urged to complete their 18 semester hours as part of a master's degree. This choice offers maximum flexibility. As an alternative, students may choose non-degree planned programs. Oakland University will accept 6 to 9 credits from another institution toward certification requirements upon adviser approval.

Those teachers who wish to renew a lapsed provisional certificate may be recommended to the State of Michigan upon successful completion of 10 semester hours of coursework within their planned program. For more information about planned programs, consult the following department sections in this catalog:

Educational Leadership
Educational Studies
Early Childhood
Microcomputer Applications in Education
Reading and Language Arts

Upon successful completion of coursework (3.0 for graduate courses, 2.0 for under-graduate), students must apply for certificate renewal or professional certification through the Teacher Education Advising Office, 363 Pawley Hall. The Michigan Department of Education charges for all certifications and renewals. A copy of the fee structure is available through the Teacher Education Advising Office, 363 Pawley Hall.

Those teachers who wish to renew a lapsed continuing or permanent certificate, and do not possess a master's degree, must complete six credits at the graduate or undergraduate level. These credits do not have to be in a planned program. On completion, the student must apply for validation directly to the Michigan Department of Education, Teacher Certification, Box 30008, Lansing, MI, 48909.

Professional teacher certification renewal

As of July 1, 1992, persons receiving a professional (formerly continuing) certificate are required to renew that certificate every five years on the basis of six semester hours of academic credit earned from an approved teacher preparation institution or the equivalent in State Board approved teacher development programs or activities that will award credits obtained as State Board Continuing Education Units (SB-CEUs). Continuing certificates issued before the above date remain valid as long as the holder serves in an educational capacity 100 days within a five-year period.

Initial certification in elementary education

For students who hold a bachelor's degree and may wish to obtain initial teaching certification by completing a second undergraduate degree in elementary education or the MATEE with initial certification, contact the SEHS Advising Office (248) 370-4182 for an advising appointment.

Initial certification in secondary education

Initial certification in secondary education is available for students who already hold a bachelor's degree. Please contact the Teacher Education Advising Office, 363 Pawley Hall, (248) 370-4182 for more information. Please note that secondary certificates are given in the following subjects only: mathematics, biology, chemistry, physics, French, German, Spanish, English, music and history.

Endorsements

Endorsements refer to any subject areas, specializations or changes of grade level which are added to a certificate. No undergraduate grade below 2.0 or graduate grade below 3.0 can be applied to an endorsement program.

1. These endorsements require the completion of a master's degree at Oakland University:

Counseling

Reading

Special Education: Learning Disabilities and Emotionally Impaired

Students who wish to pursue these programs should apply to the master's program in the appropriate department.

2. The following endorsements do not require completion of a master's degree:

Major/minor subject area endorsements

Endorsements may be added in any of the areas approved by the State of Michigan for Oakland University.

They are as follows:

Secondary Education:

biology, chemistry, dance, economics, English, history, mathematics, modern languages (French, German, Spanish), physics, political science, sociology, and English as a Second Language.

Elementary Education:

language arts, mathematics, modern languages (French, German, and Spanish), integrated science, social studies.

Early Childhood Education:

Course work follows the planned program listed under the Department of Human Development and Child Studies (Early Childhood Education).

Special Education:

An endorsement may be earned in Autism, for students holding a prior endorsement in another area of special education.

Graduate Certificate in Educational Administration

The Department of Educational Leadership offers a Graduate Certificate in Educational Administration. Contact that department for more information at (248) 370-3070.

Admission**Initial certification**

Apply for admission through the Office of Admissions and Orientation (undergraduate admissions) at 101 North Foundation Hall.

Major/minor subject area endorsement

Apply through the Office of Admissions and Orientation for post-baccalaureate status (PB).

Departmental planned program

Students who wish to complete requirements for professional certification in a non-degree departmental planned program apply through Graduate Admissions, 160 North Foundation Hall.

Master's program

Students who wish to obtain a master's degree apply through Graduate Admissions, 160 North Foundation Hall.

Advising

All students must schedule a program planning appointment with an adviser after being notified of acceptance to a program, as follows:

Students accepted into master's programs should call the faculty advisers identified in their letters of acceptance.

All other students must contact the SEHS Advising Office at (248) 370-4182 for an appointment to complete a required plan of work.

■ The School of Education and Human Services Doctor of Philosophy Degrees

The School of Education and Human Services offers two Doctor of Philosophy degrees:

1. Doctor of Philosophy in Reading Education

See Department of Reading and Language Arts section for program requirements.

2. Doctor of Philosophy in Education

with a major in counseling, early childhood education or educational leadership

Degree requirements

The Ph.D. in Education program requires a minimum of 76 credits beyond the master's degree (see department for specific requirements). Each student develops an individual plan of study with the assistance and approval of a Doctoral Advisory Committee, taking into consideration the student's goals, previous academic work and professional experiences, and the program goals. The plan of study framework includes the following coursework:

Foundation core (12 credit hours)

Professional Seminar I	2
Professional Seminar II	2
Research Methodology	4
Analytical Methods	4

Department core (20-32 credit hours)

Courses designated by major departments

Cognate (20-28 credit hours)

See major department for cognate requirements.

Dissertation (minimum 16 credit hours)

The foundational core develops an understanding of doctoral inquiry, leadership, multicultural and diversity issues, and an interdisciplinary view of education. The department core increases the student's general knowledge base in the major area of study. The cognate develops specialized knowledge and skills related to the major area of study. The dissertation requires the student to add new knowledge to the major area of study. Policies, procedures and other requirements relating to residence, examinations, candidacy and the dissertation are developed by the major department.

■ DEPARTMENT OF COUNSELING

491B Pawley Hall • (248) 370-4179
<http://www.oakland.edu/sehs>

Chair:

Luellen Ramey

Professors emeriti:

Jane Goodman, Ph.D., Wayne State University
Howard Splete, Ph.D., Michigan State University

Professor:

Mary L. Otto, Ed.D., Indiana University

Associate professors:

Thomas W. Blume, Ph.D., Texas Technological University
Elyce A. Cron, Ph.D., University of Toledo
Robert S. Fink, Ph.D., State University of New York, Buffalo
James T. Hansen, Ph.D., University of Detroit
Lisa D. Hawley, Ph.D., University of South Carolina
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Assistant professors:

Michael P. Chaney, Ph.D., Georgia State University
Diane L. Parfitt, Ph.D., University of Toledo
Brian J. Taber, Ph.D., Kent State University

Visiting assistant professor:

Tonya Tookes-Reznik, M.A., Wayne State University

The Department of Counseling offers:

Doctor of Philosophy in Education with a major in counseling
Master of Arts in counseling, emphasis in community/agency settings
Master of Arts in counseling, emphasis in school counseling

Advanced specializations are available in career counseling, child and adolescent counseling, couple and family counseling, mental health counseling, and wellness counseling. A post-master's school counseling specialization for students without teacher certification is available through Professional Development.

Ethical Standards and Counselor Fitness

Oakland University's CACREP accreditation obligates the program to comply with the American Counseling Association's Code of Ethics which requires the faculty to be "aware of the academic and personal limitations of students and supervisees that might impede performance" and to "assist students and supervisees in securing remedial assistance when needed, and dismiss from the training programs supervisees who are unable to provide competent service due to academic or personal limitations." (ACA Code of Ethics and Standards of Practice, Section F.3). Applicants to counseling programs are assessed for interpersonal competence in the

admission process, and those rated unacceptable on academic or personal fitness for counseling will not be admitted. Students are assessed for fitness throughout their coursework, including practical experience courses in which performance is an essential part of the grade. A student whose ethical behavior or psychological health is questionable will be reviewed according to published departmental policies and may be referred for external evaluation. Such evaluation may lead to a remediation plan or dismissal from the program.

■ Doctor of Philosophy in Education: Major in Counseling

Graduate Coordinator:

Thomas W. Blume

The Ph.D. in Education with a major in counseling prepares students for leadership roles within the field in the areas of advanced clinical practice, advanced school counseling practice, administration, research and supervision. The curriculum has been established according to the guidelines set forth by the Council on the Accreditation of Counseling and Related Educational Programs (CACREP), and CACREP accreditation of the program is being requested.

The program allows students to pursue one of six cognate areas: career counseling, child and adolescent counseling, couple and family counseling, wellness counseling, school counseling, and mental health counseling. Additionally, in compliance with the CACREP guidelines, the program provides for advanced preparation in the following content areas: theories pertaining to the principles and practice of counseling, career development, group work, systems, and consultation; theories and practices of counselor supervision; instructional theory and methods relevant to counselor education; pedagogy relevant to current social and cultural issues, including social change theory and advocacy action planning; design and implementation of quantitative research and methodology, including univariate, multivariate, and single-subject design; design and implementation of qualitative research, including grounded theory, ethnographic, and phenomenological methodologies; models and methods of assessment and use of data; ethical and legal considerations in counselor education and supervision (e.g., the ACA Code of Ethics); and the role of racial, ethnic, and cultural heritage, nationality, socioeconomic status, family structure, age, gender, sexual orientation, religious and spiritual beliefs, occupation, physical, and mental status, local, regional, national, international perspective, and equity issues in counselor education programs

Admission

Admission to the Ph.D. program is a multi-step process. First, the admissions committee evaluates candidates in the following areas: prior coursework and GPA at the graduate level, professional experience, written statement of purpose, professional letters of recommendation, and official standardized test scores (GRE). Applicants selected for further consideration are required to pass a departmental written examination and/or submit a video sample of their counseling. The final step is an interview by the faculty.

Final admission recommendations are forwarded to Graduate Admissions by the counseling department faculty. The program is cohort based and allows for the admission of no more than eight doctoral students every year. Applications will be accepted until March 1 of each year.

Academic advising

Upon admission to the program each student is assigned an interim faculty adviser. Within the first year of study, the student is required to select an advisory committee consisting of a tenured chair and a second tenure-track faculty member. The committee assists the student in developing and implementing a plan of study, meeting at least annually to evaluate the student's progress. In order to remain in good standing, a student must maintain an overall GPA of at least 3.00 and make satisfactory progress toward the degree.

Course of study

The program requires a minimum of 84 credit hours beyond the master's degree: 12 credits in the foundation core, 32 credits in the department core, 20 credits in the cognate, 4 credits in the internship, and a minimum of 16 credits for work toward the completion of a dissertation.

Foundation core (12 credit hours)

CNS 730	Doctoral Professional Seminar I	2
CNS 731	Doctoral Professional Seminar II	2
CNS 732	Research Methodology	4
CNS 733	Analytical Methods	4

Department core (32 credit hours)

CNS 667	Advanced Theories of Counseling	4
CNS 669	Legal and Ethical Issues in Counseling	2
CNS 670	Sociocultural Issues in Counseling	2
CNS 671	Instructional Theory and Methods in Counseling	4
CNS 672	Seminar in Counselor Supervision	4
CNS 673	Advanced Group Counseling	4
CNS 674	Advanced Consultation Techniques	2
CNS 683	Advanced Appraisal: Models and Methods	4
CNS 691	Program Evaluation	2
CNS 780	Advanced Practicum	4

Cognate (20 minimum credit hours)

Each student's cognate includes one of the areas of advanced specializations. The student in conjunction with the Advisory Committee selects courses from other cognate areas to complete the 20-credit hour requirement.

Internship (4 credit hours)

CNS 790	Doctoral Internship	4
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Qualifying examinations and candidacy

Comprehensive examinations must be passed after the completion of all coursework except the dissertation sequence. The examinations, consisting of written responses to a series of questions written and graded by department faculty, are administered annually. Content includes required program elements and specialized information unique to the student's cognate. A student may be required to orally defend a response and the student's advisory committee may recommend additional learning experiences before the student is encouraged to retake portions not passed; all portions must be satisfactory before the student is advanced to doctoral candidacy and permitted to assemble a dissertation committee.

Dissertation (16 minimum credit hours)

The dissertation is an original scholarly contribution that is designed and conducted under the supervision of an advisory committee of four members. The committee is formed under the guidance of a chairperson nominated by the candidate, who must be a tenured faculty member within the department.

With advice from the chairperson, the candidate identifies two additional members who are full-time faculty within the department, and a fourth doctoral-level committee member who does not hold a full-time appointment within the department. Selection of the doctoral committee is not official until the department doctoral committee approves it. The candidate is required to remain continuously enrolled during the dissertation process.

The candidate is required to submit a formal proposal to the committee before beginning the dissertation project, and to schedule and pass a defense of the proposal before the committee. If the proposal is not accepted, the candidate is required to coordinate with the chair to receive specific feedback and to reschedule. The committee is charged with ensuring that the dissertation meets acceptable standards of scholarly originality and rigor in its conceptualization and implementation. To this end, the committee may strongly encourage a doctoral candidate to participate in seminars, study groups, or research teams to refine specialized knowledge and skills.

Upon completion of the approved dissertation project, the candidate is required to secure approval from all committee members and schedule a public dissertation defense. At the defense, attended by the committee and members of the academic community, the candidate must successfully present the project and address questions. At the end of the defense, the committee can set conditions for satisfactory completion, and the candidate must demonstrate that these conditions have been met before the candidate is recommended for graduation.

The following course sequence is an essential part of the dissertation process; if a student's dissertation is completed ahead of a scheduled seminar the student will be expected to sign up for an equivalent number of credit hours of CNS 799.

CNS 794	Counseling Inquiry: Proposal Planning and Development	4
CNS 795	Dissertation Research I: Data Analysis Lab	4
CNS 796	Dissertation Research II: Group Seminar	4
CNS 799	Dissertation Research III: Implementation and Writing (minimum)	4

Doctoral students must be continuously enrolled (excluding spring/summer sessions) until the dissertation is completed.

■ Master of Arts in Counseling

The Department of Counseling offers a Master of Arts degree in counseling for individuals who wish to work in professional counseling roles with children, youths, adults and families in school and community settings. The program can accommodate both full-time and part-time students.

Accreditation

The master's degree program is fully accredited by the Council for the Accreditation of Counseling and Related Educational Programs (CACREP) in two areas: Community Counseling and School Counseling. Graduates are prepared for state counseling licensure.

Admission to program

The department will consider applicants who hold a bachelor's degree from a regionally accredited institution and whose credentials, including transcripts and letters of recommendation, provide clear evidence of academic distinction. Admission is selective.

A grade point average of 3.00 in all undergraduate coursework is ordinarily considered the minimum standard for admission. Applicants must have completed a minimum of 24 semester hours of undergraduate or graduate credits in the behavioral sciences such as psychology and sociology before admission to the program (this requirement is evaluated by the admissions committee). Transcripts of previous work can be evaluated by the faculty of the counseling department before formal application is made.

All applicants must submit a written statement of purpose that explains reasons for entering the counseling program and employment goals. Applicants should describe experiences and accomplishments in working with children, youth and adults.

Recommendations are important to the application procedure. The two required references must be from professionals, professors, or employers who can attest to the applicant's academic ability and effective interaction with youth and adults.

All applicants must successfully complete a group interpersonal skills interview with the Department of Counseling.

Admission is a selective process; meeting minimum criteria does not guarantee acceptance into the program.

Application deadlines

The application deadlines are as follows:

- Full-time or part-time Fall Admission on OU campus: April 15
- Full-time Macomb University Program: April 15
- Winter Admission: October 1

Academic standing

In order to remain in good standing a student must maintain an overall GPA of at least 3.00 and make satisfactory progress toward the degree. With one grade under 3.0, a student is on academic probation, and their status will be reviewed by the faculty. No grade

below 2.0 can be applied toward a degree and two grades below 3.0 or one below 2.0 will automatically lead to an evaluation of progress and possible dismissal.

Code of ethics

Along with scholarship preparation, high levels of ethical conduct are considered essential for those who are involved in counseling adults and children. Students are expected to comply with current Code of Ethics of the American Counseling Association. Violations will be brought before the faculty and could result in dismissal from the program.

Graduation requirements

At least 48 graduate-level credits are required for the degree. Students who complete the degree and who have a valid teaching certificate may be recommended for counselor endorsement at the K-9, 7-12 or K-12 level, depending on completion of the specific course requirements for each endorsement level. Students must consult with the internship instructor or internship coordinator regarding endorsement.

All graduates of the program are eligible to apply for a professional counselor license issued by the State of Michigan. Graduates may also qualify for other credentials; consult your adviser for further information.

Required core courses

All candidates for the M.A. in counseling must take five core courses:

CNS 500	Introduction to the Counseling Profession	2
CNS 510	Counseling in a Diverse Society	2
CNS 520	Theories of Counseling	4
CNS 530	Developmental Counseling	4
CNS 540	Testing and Assessment in Counseling	4

*CNS 500 and CNS 510 are prerequisite or corequisite to all other counseling courses. Students must select an emphasis either in school or community counseling as the setting for their coursework, research and internship. The courses required for each emphasis and setting is listed on the next page. A plan of work must be on file by the completion of the first course.

Both concentrations permit students to gain expertise and experience in areas of interest and required disciplines by taking four credits of electives, as well as the following six courses:

CNS 640	Career Development Theory and Practice	4
CNS 660	Research in Counseling	4
CNS 661	Techniques of Counseling	4
CNS 663	Group Counseling	4
CNS 664	Counseling Practicum	4
CNS 666	Internship in Counseling	4

NOTE: Since clinical courses must be taken in sequence, students are urged to take CNS 661 immediately after their core courses.

Counseling emphasis in community/agency settings

Students who are preparing for counseling positions in community, business and agency settings take:

CNS 564	Introduction to Community/Agency Counseling	2
CNS 574	Case Conceptualization and Treatment Planning in Counseling	2

Internship work is then done at an appropriate community/agency site.

Counseling emphasis in school settings

Students who are seeking endorsement as a school counselor or who are preparing for the School Counselor License must take:

CNS 561	Introduction to School Counseling	2
CNS 571	Consultation Theory and Practice	2

Students in this emphasis must take sections of all of the following courses, which are designated as school counseling emphasis:

CNS 540	Testing and Assessment in Counseling	4
CNS 640	Career Development Theory and Practice	4
CNS 663	Group Counseling	4

Internship work is then done at an appropriate school site. Michigan now has provisions for Preliminary Authorizations for Employment as a School Counselor, which allows students to become employed after all coursework is completed except the internship and the elective. Preliminary Authorization for Employment expires after three years, at which time the master's must have been completed.

With the above coursework, students with valid Michigan teaching certificates can be endorsed in Guidance and Counseling on their teaching certificate. A state exam is required.

Those who choose not to be teacher certified will need to take the additional 12 credit hours in the post-master's school counseling specialization which leads to OU recommendation for the new School Counselor License.

Electives (4 credits required)

CNS 573	Introduction to Family and Couple Counseling	4
CNS 577	Reaction to Significant Loss	4
CNS 578	Introduction to Chemical Dependency	4
CNS 697	Seminar in Couple and Family Counseling: Ethics	2
CNS 697	Seminar in Couple and Family Counseling: Human Sexuality	2

Note: A proposal for independent research in an area of special interest may also be submitted for approval as an elective under CNS 560. The student must first obtain a commitment from an interested faculty member to sponsor this work.

Petition of Exception

Students may request waivers or modifications of specific program requirements by filing a Petition of Exception form with the Chair of the department. The Chair will make recommendations to Graduate Study and Lifelong Learning, who will review the petition and notify students of any action taken. Petition of Exception forms may be obtained in Graduate Study and Lifelong Learning or from the administrative secretary.

Student advising

Upon admission to the counseling program, students are assigned faculty advisers. All students are required to complete a degree program plan, which must be approved by their assigned adviser before the completion of CNS 500. It is expected that students will maintain contact with their adviser throughout their program. Open advising is also available. Contact the Counseling Department for open advising hours.

Program Options**Main Campus**

Students are admitted for fall or winter semesters and may plan an intensive two-year concentrated program or a part-time flexible program.

An intensive two-year, concentrated program is most appropriate for students with strong undergraduate preparation in areas such as psychology, sociology, social work, or other related helping fields. Students who enroll for 12 credits are usually not employed full-time during the program.

Sample two-year program plan

	Year 1	Year 2
Fall	CNS 500	CNS 664
	CNS 510	CNS 660
	CNS 520	
	CNS 530	
Winter	CNS 661	CNS 666
	CNS 540	Elective
	CNS 640	
Spring	CNS 564/574	
	(Community/Agency emphasis)	
Summer	CNS 663	
	CNS 561/571	
	(School setting emphasis)	
	CNS 663	

Sample part-time two year program plan

	Year 1	Year 2	Year 3	Year 4
Fall	CNS 500	CNS 540	CNS 660	CNS 664
	CNS 510			
Winter	CNS 510	Elective	CNS 661	CNS 666
Spring	CNS 564/574	CNS 640	CNS 663	
Summer	CNS 530	CNS 561/571		

Macomb University Center

The Macomb University Center Program is an off-campus master's program in counseling for students residing or working in the Macomb County area. The program is cohort based and allows completion of the degree in two full years and one semester. Students are admitted to the program as a cohort in fall only and must take all courses (except laboratory classes and electives) at the Macomb Center and in the prescribed sequence. Admission to the program is selective and applicants must meet all regular admission requirements. A completed application for fall admission must be received by April 15.

Typical Macomb University Center cohort program plan

	Year 1	Year 2	Year 3
Fall	CNS 500	CNS 640	CNS 666
	CNS 510	CNS 660	
	CNS 520		
Winter	CNS 530	CNS 663	
	CNS 540	Elective	
Spring	CNS 661	CNS 664	
	CNS 564/574		
Summer	CNS 561/571		
	CNS 661	CNS 664	

Advanced specializations

The department offers advanced specializations for current students who desire to specialize at the master's level and for post-master students who wish to add advanced skills. (Specializations may be taken concurrently with the master's program.) Admission to specializations is limited and competitive. Prospective students can obtain admission information from the specialization coordinator. Students who are admitted are expected to complete the specializations in sequence and within one calendar year. Each specialization consists of advanced theoretical coursework, advanced techniques and an advanced clinical internship.

**Specialization in Advanced Career Counseling (12 credits)
(Begins Fall 2006)****Coordinator:**

Brian J. Taber

Prerequisites: CNS 640 and coordinator permission.

CNS 675	Advanced Career Counseling	4
CNS 676	Leadership in Career Counseling	4
CNS 677	Fieldwork in Career Counseling	4

**Specialization in Child and Adolescent Counseling (12 credits)
(Begins each Fall)****Coordinator:**

Robert S. Fink

Prerequisites: CNS 661 and coordinator permission.

CNS 680	Counseling in Infancy and Early Childhood	4
CNS 681	Counseling the Older Child and Adolescent	4
CNS 682	Fieldwork in Child and Adolescent Counseling	4

**Specialization in Couple and Family
Counseling (12 or 20 credits*)
(Begins each Fall)**

Coordinator:

Elyce A. Cron

Prerequisites: CNS 573 and coordinator permission.

CNS 693	Advanced Couple and Family Theory	2
CNS 694	Couple and Family Methods and Techniques	2
CNS 695	Advanced Couple and Family Development	2
CNS 696	Couple and Family Assessment	2
CNS 697	Seminar in Couple and Family Counseling	2 + 2
CNS 698	Advanced Methods of Couple and Family Counseling	4
CNS 699	Fieldwork in Couple and Family Counseling	4

* 12 credits for certificate; 20 credits for LLMFT license eligibility

**Specialization in School Counseling
(12 credits)
(Begins each Fall)**

Must apply through Professional Development: 248-370-3033

TD 500	Introduction to the School and Society	2
TD 511	Learning Theory	2
TD 554	Advanced Interaction Laboratory for Teacher Development	4
SE 500	The Exceptional Student	2
CNS 688	Issues in School Counseling	2

**Specialization in Mental Health Counseling
(12 credits)
(Begins each Spring)**

Coordinator:

James T. Hansen

Prerequisites: CNS 540, CNS 661 and coordinator permission

CNS 684	Intelligence and Personality Assessment	4
CNS 685	Psychopathology	4
CNS 686	Fieldwork in Mental Health Counseling	4

**Specialization in Wellness Counseling
(12 credits)**

Coordinator:

Tonya Tookes-Reznik

Prerequisites: Graduate status and coordinator permission

CNS 651	Mind-Body Medicine	2
CNS 652	Advanced Mind-Body Medicine	2
CNS 653	Counseling for Wellness	2
HS 630	Complementary Medicine and Wellness Seminar	2
HS 693	Directed Study in Complementary Medicine and Wellness	4

■ DEPARTMENT OF EDUCATIONAL LEADERSHIP

480D Pawley Hall • (248) 370-3070
<http://www.oakland.edu/sehs> • Fax (248) 370-4605

Chair:

William G. Keane

Professors emeriti:

James W. Hughes, Ed.D., University of New Mexico
Patrick J. Johnson, Ed.D., Wayne State University
Sharon P. Muir, Ph.D., University of Nebraska

Professors:

Eric J. Follo, Ed.D., Wayne State University
Jacqueline I. Lougheed, Ed.D., Wayne State University
Sandra P. Packard, Ed.D., Indiana University

Associate professors:

Sarah L. Gibson, Ph.D., Wayne State University
William G. Keane, Ed.D., Columbia University
Julia B. Smith, Ed.D., University of Michigan
Robert A. Wiggins, Ph.D., University of Illinois, Urbana-Champaign

Assistant professors:

Ilene L. Ingram, Ed.D., Wayne State University
Eileen S. Johnson, Ph.D., University of Houston
Caryn M. Wells, Ph.D., Michigan State University
C. Robert Maxfield, Jr., Ed.D., Wayne State University
Shannon R. Flumerfelt, Ph.D., Oakland University

Special instructor:

Brian O. Clark, Ed.D., Wayne State University

Degree programs

Doctor of Philosophy in Education with a major in educational leadership
Education Specialist in school administration
Master of Education in educational leadership

Graduate certificates

Graduate Certificate in Educational Administration
Post-Master's Graduate Certificate in Higher Education

■ Doctor of Philosophy in Education: Major in Educational Leadership

Coordinator:

Julia B. Smith

The Ph.D. in Education with a major in educational leadership is designed to develop individuals who can provide leadership to educational practice in the 21st Century, whether through roles in public and private schools or by contributing to research and teaching about educational policy and practice. Core concepts in the program include systems thinking, learning theory and research methodology.

Admission

Candidates for the Ph.D. in Education with a major in educational leadership will be selected based on experience, especially leadership experience, as reflected in an analysis of several criteria:

1. The vita
2. The content of three references to be solicited by the applicant
3. The candidate's graduate grade point average as reported on official transcripts
4. The score on the Graduate Record Examination (GRE)
5. A goal statement
6. The score on a department examination
7. An interview with the department.

Official GRE scores should be submitted with other application materials. Applications will be accepted until March 1 of each year.

Academic advising

Upon acceptance into the program, the Ph.D. program coordinator advises students initially. Students who must complete a cognate will be assigned to a program adviser to assist in planning a cognate course of study. Within the second year of study, each student will seek a dissertation chairperson.

Course of study

The program requires a minimum of 76 credits beyond the master's degree: 12 credits in the foundation core, 20 credits in the department core, 28 credits in the cognate, and a minimum of 16 credits for the dissertation.

Students must complete a residency for the purpose of concentrating study and fostering close and continuous contact with faculty, fellow graduate students and other professionals. The residency is met by completing 16 credits, excluding dissertation, in two consecutive semesters or 20 credits, excluding dissertation, in one calendar year.

Foundation core (12 credits)

ED 730	Professional Seminar I	2
ED 731	Professional Seminar II	2
ED 732	Research Methodology	4
ED 733	Analytical Methods	4

Department core (20 credits)

ED 801	Philosophical and Ethical Issues in Leadership	4
ED 802	Advanced Education Politics and Policy	4
ED 804	Learning Theories and Psychological Issues in Education	4
ED 901	Field-Based Mentorship Issues I	2
ED 902	Field-Based Mentorship Issues II	2
ED 903	Leadership Research Issues and Proposal Development	4
		20

Cognate (28 credits)

28

Dissertation (16 minimum credits)

16

Total program credits

76

Students may complete their cognate requirement in an allied field of study or through a personalized cognate plan developed in conjunction with the program adviser.

Students who have completed an Education Specialist degree from Oakland University or another accredited university may receive cognate credit up to 28 credits for their work on this degree. Students who have completed doctoral level work in Leadership at another university may also receive up to 28 credits toward the cognate requirement.

Cognate in Higher Education Administration

A cognate in Higher Education Administration is available for students interested in higher education administration in a college or university, or in higher education planning and policy formation in a governmental, accreditation, or other related agency or organization. Prior admission into the Ph.D. in Education program is not required for enrollment in Higher Education Administration cognate courses.

Cognate in Higher Education Administration (28 credits)

credits of required courses	12
credits of internship	4 – 8
credits of internship project	4
elective credits	4-8

Required courses (12 credits)

ED 911	Contemporary American Higher Education	4
ED 912	Administering the College or University	4
ED 913	Executive Processes of Leadership and Management	4

Internship courses (4-8 credits)

ED 914	Internship in Higher Education I	4
ED 915	Internship in Higher Education II	4

Internship project (4 credits)

ED 918	Internship Project in Higher Education	4
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Electives (4 – 8 credits)

ED 919	Student Services Administration in Higher Education	4-8
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Students may use any four credits earned in one or more related courses at the 500-level or above.

Cognate in Music Education

The Department of Music, Theatre and Dance has designed a music education cognate for the educational leadership major of the Ph.D. in Education program. This cognate prepares candidates for leadership in music education as teacher educators, music education administrators and music education curricular leaders.

To be eligible for the Music Education cognate, a student must hold a master's degree in either music education or music. Teaching experience relevant to the candidate's intended area of study is also required. Students must adhere to guidelines established by the School of Education and Human Services, with the doctoral committee being responsible for final approval of all cognates. The dissertation committee would consist of at least one faculty member from:

- a. the Leadership faculty of the School of Education and Human Services and at least one faculty member from the Department of Music, Theatre and Dance,
- or
- b. a combination of Department of Music, Theatre and Dance, School of Education and Human Services, and/or College of Arts and Sciences faculty with appropriate expertise.

Cognate in Music Education (28 credits)

credits of required courses	20
credits of leadership electives	8

Required courses (20 credits)

MUS 730	Doctoral Seminar: Music Education	4
MUS 731	Historical and Philosophical Foundations of Music Education	4
MUS 732	Psychological Foundations of Music Education	4
MUS 789	Research in Music Education	4

Music Education elective (4 credits)

MUS 720	Conducting Apprenticeship	2
MUS 756	Survey and Study of Choral Literature	2
MUS 780	Advanced Choral Interpretation and Conducting Technique	2
MUS 790	Special Topics in Music and Music Education	1-4
MUS 799	Independent Study	1-4
MUA 5	Applied Study (vocal or instrumental studio instruction)	2

Educational Leadership electives (8 credits)

ED 911	Contemporary American Higher Education	4
ED 912	Administering the College or University	4
ED 913	Executive Processes of Leadership and Management	4
EA 740	School as a Formal Organization	4
EA 744	Long-Range Planning	2
EA 746	Curriculum and Staff Development	4
EA 747	Program Assessment	4
EA 754	Human Resource Management and Supervision	4

Degree requirements

The Education Specialist degree in school administration requires 36 credits beyond the master's degree. One required course will be offered during the evening or late afternoon of each term (fall, winter and spring) and three required courses will be offered during the first summer. The action research project required by the program will be started during the first semester and will be scheduled for completion by the end of the last semester of the program.

Program courses

EA 701	Internship Experience I	1
EA 702	Internship Experience II	1
EA 740	School as a Formal Organization	4
EA 741	School Business Management	4
EA 742	Education Law	4
EA 743	Professional Seminar	2
EA 744	Long-Range Planning	2
EA 746	Curriculum and Staff Development	4
EA 747	Program Assessment	2
EA 748	School/Community Development	2
EA 750	Action Research I	2
EA 751	Action Research II	2
EA 752	Action Research III	2
EA 754	Human Resource Management & Supervision	4

Field experiences and mentoring

All program participants will be paired with a mentor who is currently a practicing administrator. The purpose of the mentorship is to provide opportunities for field experiences in schools and specific activities with mentors, including reflective interviewing, shadowing, obtaining feedback and assistance, assessing professional craft knowledge and career planning. These field experiences will relate class discussions and assignments to actual practice in school and district settings.

Graduate Certificate in Educational Administration

Candidates successfully completing the Education Specialist program in school administration and possessing a valid Michigan teaching certificate with three years of successful teaching experience will be eligible to receive a Graduate Certificate in Educational Administration issued by the university.

■ Education Specialist

Co-Coordinators: Brian O. Clark, Ilene L. Ingram, Sandra P. Packard

Admission

The Faculty Council for the Education Specialist program will screen candidates in five areas after the following have been received by Graduate Admissions:

1. Application for admission and \$50 application fee
2. Official transcripts from all undergraduate and graduate work
3. Evidence of a master's degree from a regionally accredited institution
4. Two letters of recommendation from professional colleagues or supervisors familiar with the candidate's current position;
5. A statement indicating willingness to make a two-year commitment to the program and a statement of personal goals after completing the school administration program.

Candidates will be interviewed by the program coordinator, who will make admission recommendations to Graduate Admissions. Admission to the program will be made only for the fall semester. Therefore, all application materials should be received by Graduate Admissions no later than July 1.

■ Master of Education in Educational Leadership

Coordinator:

Eric J. Follo

Admission

Applicants to the M.Ed. program apply to Oakland University and the Department of Educational Leadership through Graduate Admissions. Application forms for the university and for the department are available from that office. Admission is a selective process; meeting minimum criteria does not guarantee acceptance into the program. Students are notified of their admission status by Graduate Admissions.

Admission requirements

Applicants must submit the following:

1. An undergraduate GPA of at least 3.00
2. A teaching certificate
3. For the leadership M.Ed. leading to Oakland University's Graduate Certificate in Educational Administration, applicant must have taught for three years
4. Two letters of recommendation from individuals in a supervisory relationship to the applicant
5. A goal statement. Students who are conditionally admitted to the program because of a lower GPA or lack of recommendations must complete a minimum of 8 credit hours (EL 500 and one other core class) with a grade of at least 3.0 in each course and an overall average of 3.2.

Applications for special graduate status are available from and processed through Graduate Admissions.

Program requirements

The program requires a minimum of 36 credits. Upon admission, a plan of study is prepared jointly by the student and the faculty adviser. No grade below 2.8 may be applied to the degree and an overall GPA of 3.00 must be maintained.

Course of study:

EL 500	Introduction to Educational Leadership	4
EL 520	Schools, Students and Educational Equity	4
EL 530	Theories and Techniques of Leadership	4
EL 540	Educational Administration	4
EL 550	School Finance and Business Administration	4
EL 560	Staff and Curriculum Development for School Improvement	4
EL 620	Law for Teachers and Administrators	4
EL 630	Internship for School Leaders I	2
EL 640	Internship for School Leaders II	2
EL 690	Culminating Master's Practicum in Educational Leadership	4

Additional courses:

EL 570	Issues in Educational Leadership	1-6
EL 590	Special Studies in Educational Leadership	1-4
EL 697	Master's Project in Educational Leadership	4
EL 699	Master's Thesis in Educational Leadership	8

Michigan professional certification

Teachers may be recommended for professional certification upon completion of a planned program in educational leadership consisting of EL 500, EL 520, EL 540 or EL 620, and 6 elective credits.

■ Graduate Certificate in Educational Administration

A minimum of three years teaching experience and a master's degree are required. The department offers a planned program leading to a Graduate Certificate in Educational Administration. Admission requirements to the program are:

1. A master's degree or admission to a master's degree program at Oakland University
2. A current teaching certificate
3. An undergraduate GPA of at least 3.00, or a GPA of at least 3.00 in a minimum of 12 graduate credits
4. Compliance with regulations established by the Michigan Department of Education regarding criminal convictions

The Graduate Certificate in Educational Administration is also available for students enrolled in the MAT in reading and language arts. Applicants must first be admitted to the MAT in reading and language arts and must subsequently be approved and meet all criteria for admission to this program by the Educational Leadership Department.

Program requirements

EL 530, 620, 540, 550, 560, 630, 640

A minimum of 12 credits must be completed at Oakland University, and coursework must be completed within 6 years of applying for each endorsement.

■ Post-Master's Graduate Certificate in Higher Education

Coordinator:

Sandra P. Packard

The Post-Master's Graduate Certificate in Higher Education is designed for individuals who would like to begin a career in higher education or for practicing university or college administrators who may already possess a doctoral degree, or who do not wish to pursue a doctoral degree at the present time, but wish to update and advance their professional knowledge and skills. It also serves mid-career professionals in other related work who wish to explore a career change. Through relevant course work and administrative projects, students will gain a broad understanding of higher education practices, systems, policies and issues. They will also advance their skills and dispositions for successful leadership and management in higher education settings.

Admission

Students must have successfully completed a master's degree at an accredited college or university and meet Oakland University requirements for post-graduate enrollment.

Admission requirements

1. Application for Admission to Graduate Study
2. A non-refundable application fee
3. Official transcripts from degree-granting institutions.

Program requirements

The approved Graduate Certificate in Higher Education consists of 16 credit hours. Twelve of the credit hours are required courses and four of the credit hours are related graduate electives.

Course of study

EL 611	Contemporary American Higher Education	4
EL 612	Administering the College or University	4
EL 613	Executive Process of Leadership and Management	4

Electives: Any related master's or doctoral course as approved by the program coordinator.

■ DEPARTMENT OF HUMAN DEVELOPMENT AND CHILD STUDIES

405B Pawley Hall • (248) 370-3077
Fax (248) 370-4242 • <http://www.oakland.edu/sehs>

Chair:

Carol A. Swift

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Ronald M. Swartz, Ph.D., New York University

Associate professors:

Sandra M. Alber, Ed.D., Wayne State University
Ambika P. Bhargava, Ph.D., University of Texas, Austin
Marc E. Briod, Ph.D., Northwestern University
Andrew S. Gunsberg, Ph.D., University of Illinois
M. Shannan McNair, Ed.D., University of Michigan
Sherri L. Oden, Ph.D., University of Illinois
Richard C. Pipan, Ed.D., University of North Carolina
Carol A. Swift, Ph.D., University of Arizona

Assistant professors:

Janet E. Graetz, Ph.D., George Mason University
James M. Javorsky, Ph.D., Purdue University
Julie A. Ricks-Doneen, Ph.D., Michigan State University
Erica A. Ruegg, Ed.D., Texas Technological University
Susan T. Fascio-Veree, Ph.D., Mississippi State University

Degree programs

Doctor of Philosophy in Education with a major in early childhood education
Master of Education in Early Childhood Education
Master of Education in Special Education

Endorsement programs

Early Childhood Education
Special Education
Autism
Learning Disabilities
Emotional Impairment
Dual Endorsement: Learning Disabilities/Emotional Impairment

The Department of Human Development and Child Studies offers programs leading to a Doctor of Philosophy in Education with a major in early childhood education, degrees of Master of Education (M.Ed.) in early childhood education and in special education, teaching endorsements, and professional certification. The M.Ed. in early childhood education includes the professional certification and/or EC endorsement. Endorsements in learning disabilities (LD),

emotionally impaired (EI) and autism are offered with a M.Ed. in special education. All special education programs are currently under revision, as is the M.Ed. in Early Childhood Education. Please check with your adviser for potential changes in program requirements.

■ Doctor of Philosophy in Education: Major in Early Childhood Education

Coordinator:

Sherri L. Oden

Description

The Ph.D. in Education with a major in early childhood education is designed to prepare leaders for the field. The goals of the program are to develop and support leadership, research, and policy that will inform, support, and promote education for young children. Major areas of focus include early childhood development and educational theories, research, and policies, curricular and program approaches, literacy, cultural diversity, and transition to preschool and primary school classrooms.

The program provides preparation in quantitative and qualitative research methods. Students also select a cognate in complementary areas including special education, reading, educational leadership and administration, curriculum, professional development or other academic areas.

Graduates of the program are prepared to assume leadership, teaching, or research and policy positions in early childhood care and education settings, school systems, colleges and universities, early childhood organizations and government.

Admission terms and deadlines

Students are admitted in the fall semester only. Applications will be accepted until June 1 for the following fall semester.

Application requirements

The application materials and steps to be completed are:

1. Application for Admission to Graduate Study and \$50 application fee
2. Official transcripts of all previous undergraduate and graduate level academic work
3. Three letters of recommendation, at least one from a graduate academic source and one from a professional in the field
4. Official scores for the Graduate Record Examination (GRE)
5. Official scores for the Test of English as a Foreign Language (TOEFL) from applicants who are graduates of programs taught in a language other than English
6. Professional curriculum vitae
7. Personal essay statement, describing professional goals, experiences and philosophy

8. Two writing samples related to early childhood education, which may include professional reports, academic course papers, publications or presentations
9. An interview (to be scheduled by the program coordinator) with the program coordinator and other faculty members, and written assignment to be completed as part of the interview.

Admission requirements

Finalists will be selected based upon a review of the following criteria, as well as the personal statement, samples of writing, letters of recommendation, and the interview and written assignment:

1. Completion of a master's degree or equivalent in early childhood education or an allied field
2. Minimum graduate grade point average of 3.60
3. Three years of professional experience in early childhood education or an allied field.

Academic advising

Upon acceptance into the program, students are advised initially by the early childhood Ph.D. program coordinator. Toward the end of the first year of study, each student, in consultation with the program coordinator and faculty members, selects a faculty adviser who guides the student in planning a program of study, including establishment of a portfolio, design of a cognate, and preparation for completion of qualifying comprehensive exams and the dissertation. The adviser and program coordinator advise the student to form faculty committees who will provide further guidance and evaluation for the exams and the dissertation.

Degree requirements

The program requires a minimum of 80 credit hours beyond the master's degree: 12 credits in the foundation core, 32 credits in the department core, 20 credits in the cognate, and a minimum of 16 credits for the dissertation. Previously earned graduate credits may apply if they did not count towards the qualifying master's degree, and if they are equivalent to a required course for the program or are part of an approved cognate.

Foundation core (12 credit hours)

EC 730	Doctoral Professional Seminar I	2
EC 731	Doctoral Professional Seminar II	2
EC 732	Research Methodology	4
EC 733	Analytical Methods	4

Department core (32 credits)

EC 809	Development and Early Learning: Theories and Research Studies	4
EC 844	Paradigms of Early Education and Curriculum Design	4
EC 851	Field-Based Project I	4
EC 852	Field-Based Project II	4
EC 862	Curriculum Investigation: Practice and Theory	4

FE 802	Ecology of Early Learning: Health Care and Education	4
FE 873	Policy Studies in Early Education: Culture, Economics and Politics	4
SE 861	Special Education: Early Childhood Seminar	4

Cognate (20 minimum credits)

The cognate courses should complement the core foundation and department courses. The cognate area of study may include courses within or outside the department upon advisement by the adviser and the program coordinator.

Dissertation (16 minimum credit hours)

FE 994	Dissertation Proposal Planning	4
EC 995	Dissertation Development Seminar	2 to 8
EC 999	Dissertation Implementation and Writing	2 to 8
FE 996	Dissertation Data Analysis Lab	2 to 8

Residency

Students must complete at least 16 hours of graduate credit (excluding dissertation credits) during one of the academic (or calendar) years of the student's program of doctoral study. Further, students are required to register for course credit every fall and winter after their admission to the program. Exceptions to this policy must be approved by the program coordinator.

Qualifying comprehensive examinations

To prepare for exams, the student and the student adviser and a minimum of two additional faculty members comprise the Doctoral Advisory Exam Committee and review the student's portfolio — a major source for determining the student's interests, strengths, and areas for further development. When the student elects to take the exams, the committee either grants approval or proposes a plan for further study, coursework, or other appropriate preparation necessary for taking the exams. Exam questions assess the student's knowledge with respect to challenging issues in the field, e.g., comparing and contrasting major theories, approaches, and policies in early childhood education and care; implications of the knowledge base for child care and education, preschool, and primary school early childhood curricula/programs; and for designing early childhood curricula and program approaches, evaluations, research studies, and policy initiatives.

To pass qualifying exams, the student must demonstrate competence in the following four segments:

1. Comprehensive knowledge of the foundational core and early childhood education. This exam segment assesses the student's knowledge of the foundational and early childhood core coursework areas, including the major theories, research methods and findings, educational practices, and public policies. This segment of the exam is conducted on a "take-home" basis, with a limited time frame.
2. In-depth knowledge of a specific area in early childhood education. This segment of the exam is a qualifying paper that demonstrates an in-depth knowledge of a particular area of focus. The topic must be approved by the chair of the Doctoral Advisory

Committee, who also sets a minimum page requirement and a style format. The paper must be completed by a date set by the committee as a part of the exam process.

3. Comprehensive knowledge of a cognate area. This exam segment assesses the student's knowledge in a cognate area (a complementary area of study). This segment of the exam is conducted on a "take-home" basis, with a limited time frame.
4. The oral examination. Upon successful completion of the written segments of the qualifying comprehensive exam (parts 1, 2, and 3) explained above, the student proceeds to take the oral segment of the exams. This exam segment provides an opportunity for the student to make a presentation in an area of special interest and to demonstrate the ability to respond to questions from the faculty about the presentation and related issues.

The Doctoral Advisory Committee assesses the student's performance on the written and oral parts of the exam to determine if the student is adequately prepared to proceed as a candidate for dissertation preparation. If the student's qualifying exam performance is determined to be inadequate, the Doctoral Advisory Committee may recommend further preparation, e.g., coursework, writing, or study.

Dissertation

The dissertation is an original contribution to the field of study through disciplined inquiry. Conducting, writing, and defending a dissertation should be accomplished in accordance with the highest professional standards. The student's dissertation adviser and a minimum of three additional faculty members (one external to the department) comprise the dissertation committee and advises the student on the formation of a dissertation proposal. The written format for the proposal is specified by the committee, and the student orally presents and defends the dissertation proposal. The committee assesses the student's written and oral presentation of the proposal and determines if modifications in the proposal are needed prior to the student's conducting the research. The committee members, led by the dissertation adviser, continue to advise the student throughout the research and the preparation of the dissertation manuscript. Students must obtain a copy of the dissertation format requirements of Graduate Study and Lifelong Learning so that the dissertation manuscript conforms to university standards.

Final oral examination and dissertation defense

The oral defense of the dissertation may be held after it is completed and approved by the committee. The purpose of the oral defense is to enable the dissertation committee to judge the quality of the investigation and the student's ability to defend and communicate the work. A copy of the dissertation is made available for review in the Office of The Dean of the School of Education and Human Services, and the announcement of the date, time, and location of the defense, along with a one-page abstract, is distributed to the faculty. The oral defense must be attended by no fewer than four members of the Dissertation Committee and is open to all School of Education and Human Services faculty, invited guests, and the university community. Final approval and acceptance of the doctoral dissertation requires a favorable vote of the Dissertation Committee with no more than one dissenting vote. The Dissertation Committee determines the adequacy of the student's oral defense and if there are to be modifications for the dissertation manuscript, which is then

subject to final approval by the committee. The committee may permit reexamination, if the initial dissertation defense is deemed inadequate.

Time limits

If more than six years have passed since the student has been admitted to the doctoral program, and all requirements (including an approved dissertation) have not been completed, the student must petition the program coordinator and Graduate Study and Lifelong Learning for an extension. Students who are deemed inactive may be dropped from the program, although they may petition for reinstatement.

Graduation

Three copies of the approved dissertation manuscript must be delivered to Graduate Study and Lifelong Learning by the date published in the Schedule of Classes for the term in which the student expects to graduate.

■ Master of Education in Early Childhood Education

Coordinator:

Andrew Gunsberg

Description

The program prepares professionals to work with children from birth through age eight in public and private schools and agency settings. It also provides training for the direction and evaluation of early childhood programs and the coordination of community resources for young children and families. The program combines theory with observation and participation in clinical, community and school practicum settings.

The program emphasizes a broad interdisciplinary view of early childhood education and child development. Also emphasized are multicultural issues concerning young children and their families, and the need for educational programs to respect and respond to children's developmental variabilities and exceptionalities.

Admission terms and deadlines

June 1 for fall admission, October 1 for winter admission, April 1 for summer admission.

Application requirements

Applicants for admission must submit the following:

1. Application for Admission to Graduate Study and \$50 application fee
2. Official transcripts from all colleges and universities attended
3. Two letters of recommendation from individuals who are in a supervisory relationship to the applicant
4. Goal statement which includes the reasons for application, the intended focus of graduate study, professional and career goals, and a description of experiences and accomplishments in working with children and their families.

Admission requirements

Minimum criteria for acceptance into the program are: 1) an undergraduate degree from a regionally accredited institution, with a minimum GPA of 3.00 (applicants who do not meet this standard may be considered for conditional admit, but will be required to achieve a grade of 3.0 or above for the first 12 credit hours); 2) completion of a minimum of 24 semester credit hours at the undergraduate or graduate level in education, humanities, social sciences, health or an appropriate related field (this requirement is carefully weighed by the department's faculty admissions committees). Admission is selective. Meeting minimum criteria does not guarantee acceptance.

Degree requirements

To fulfill the degree requirements, the student must complete the planned program of 36 credits, with a GPA of 3.0 or above within the six-year period allowed for the degree. Students must apply to graduate by the deadlines imposed by the university to be eligible for graduation.

Level I (20 credits):

EC 540	Theories of Child Development and Education	4
EC 542	Applied Developmental Principles	4
EC 543	Teacher as Child Advocate and Adult Educator	4
EC 544	Adult-Child Interaction: Play and Mediation of Learning	4
EC 645	Observation and Assessment of the Young Child	4

Level II (12 credits):

Prerequisite is completion of all courses in Level I

FE 509	Family, Child and Learning in Cultural Context	4
FE 593	Research Project in Early Childhood Education: Phase I	4
ED 546	Workshop in Early Childhood Curriculum (or equivalent)	2-8

Possible EC 546 equivalent courses:

EC 545	Administration and Direction of Early Childhood Programs	4
EC 547	Infants: Normal and Exceptional Development and Programming	4
EC 548	Toddlers: Normal and Exceptional Development and Programming	4
EC 550	Special Problems in Education — Early Childhood	2, 4 or 8
EC 549	Development of the Young Exceptional Child	4
EC 644	Play and Development of the Hospitalized Child	4
EC 651	Gifted and Talented Young Children	4

A Petition of Exception is required for approval of an equivalent course not listed here.

Level III (4 credits)

Prerequisite: Completion of all courses in Level II

EC 650	Research Project in Early Childhood Education: Phase II	4
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This is the final requirement of the program and consists of class meetings, seminars and the completion of an action project and a project report.

■ Master of Education in Special Education

Coordinator:

Carol A. Swift

Description

The master's program in special education is a degree focusing on (1) the broader concepts of exceptionality — learning, instruction, and development and (2) an in depth preparation for one area of exceptionality. Exploration of theory and research and advanced application in instruction and assessment with selected populations are integrated throughout the program. The degree incorporates one or more endorsements in learning disabilities, emotional impairment, or autism.

Admission terms and deadlines

July 1 for Fall admission, November 1 for Winter admission, March 1 for Spring admission, May 1 for summer admission.

Application requirements

Applicants for admission must submit the following:

1. Application for Admission to Graduate Study and \$50 application fee
2. Official transcripts from all undergraduate and graduate work
3. Two recommendations from those who can attest to the applicant's potential for successful graduate study
4. Copy of current (or most recent) teaching certificate
5. Goal statement, which includes the reason for application, the intended focus of graduate study, a description of professional experiences and accomplishments, and professional and career goals
6. Supplemental application.

Admission requirements

Applicants for admission must:

1. Hold a Bachelor's degree from a regionally accredited institution
2. Demonstrate an undergraduate or graduate GPA of 3.0 or above
3. Hold, or be eligible for, a valid Michigan teacher's certificate
4. Have completed SE 501 and FE 506, or the equivalents

Degree requirements

Students must complete the 48 credits required for the degree with a GPA of 3.00 or higher within the six-year period required by the university. Students must apply to graduate by the deadlines set by the university, in order to be eligible for graduation.

Requirements for the M.Ed. in special education with an endorsement in learning disabilities

Prerequisites (8 credits):

SE 501	Introduction to the Student with Special Needs (or equivalent)	4
FE 506	Child Development, Variability and Learning (or equivalent)	4

Block 1 (28 credits):

SE 518	Organization and Management of Instructional Behaviors and Environments	4
SE 517	Language and Exceptional Children and Youth	4
SE 502	Legal Issues in Special Education	4
RDG 536	Teaching Reading to the Student with Special Needs	4
EST 532	Diagnosis and Remediation in Mathematics	4
SE 601	Issues and Trends in Special Education	4
Elective	Must have adviser approval	4

Block 2 (8 credits):

SE 524	Assessment in Special Education	4
or		
SE 624	Advanced Diagnostics	4

Block 3 (8 credits):

SE 619	Theory, Research and Practice in Special Education	4
SE 592	Practicum: Learning Disabilities K-12	4

Block 4 (4 credits):

SE 699	Final Project in Special Education	4
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Requirements for the M.Ed. in special education with an endorsement in emotional impairment

Prerequisites (8 credits):

SE 501	Introduction to the Student with Special Needs (or equivalent)	4
FE 506	Child Development, Variability and Learning (or equivalent)	4

Block 1 (16 credits):

SE 518	Organization and Management of Instructional Behaviors and Environments	4
SE 517	Language and Exceptional Children and Youth	4
SE 502	Legal Issues in Special Education	4
SE 601	Issues and Trends in Special Education	4

Block 2 (20 credits):

SE 510	Students with Behavioral and/or Emotional Impairments	4
SE 520	Educational Procedures for Students with Emotional Impairments	4
SE 620	Advanced Interventions and Resources for Students with Emotional Impairments	4
SE 524	Assessment in Special Education	4
or		
SE 624	Advanced Diagnostics	4
Elective	Must have adviser approval	4

Block 3 (8 credits):

SE 619	Theory, Research and Practice in Special Education	4
SE 594	Practicum: Emotional Impairment K-12	4

Block 4 (4 credits):

SE 699	Final Project in Special Education	4
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Requirements for the M.Ed. in special education with an endorsement in autism

Prerequisite

A prior endorsement in special education is required. Although state rules have been amended to allow autism as a first special education endorsement, approval for Oakland University's program under that status is still in progress.

Block 1 (24 credits):

SE 559	Overview of Autism Spectrum Disorders	4
SE 527	Educational Procedures for Students with Autism Spectrum Disorders	4
SE 578	Communication and Language Issues in Autism Spectrum Disorders	4
SE 579	Behavioral and Social Issues in Students with Autism Spectrum Disorders	4
SE 596	Collaboration and Consultation Skills for Special Education Teachers	4
SE 591	Practicum: Autism K-12	4

Note: Endorsement may be recommended after completion of Block 1 coursework

Block 2 (16 credits):

SE 502	Legal Issues in Special Education	4
SE 601	Issues and Trends in Special Education	4
SE 524	Assessment in Special Education	4
or		
SE 624	Advanced Diagnostics	4
Elective	Must have adviser approval	4

Note: Block 2 courses may be taken concurrently with Block 1 courses

Block 3 (8 credits):

SE 619	Theory, Research and Practice in Special Education	4
SE 699	Final Project in Special Education	4

Requirements for the M.Ed. in special education dual endorsement: learning disabilities and emotionally impaired

Prerequisite:

SE 501	Introduction to the Student with Special Needs	4
or		
SE 355	approved equivalent	

Corequisite:

FE 506	Child Development, Variability and Learning	4
or		
FE 215	approved equivalent	

Block 1

SE 518	Organization and Management of Instructional Behaviors and Environments	4
SE 517	Language and Exceptional Children and Youth	4
SE 502	Legal Issues in Special Education	4
RDG 536	Teaching Reading to the Student with Special Needs	4
EST 532	Diagnosis and Remediation in Mathematics	4
SE 510	Students with Behavioral and/or Emotional Impairments	4
SE 520	Educational Procedures for Students with Emotional Impairments (Prerequisite: SE 518)	4
SE 601	Issues and Trends in Special Education	4

Block 2

Prerequisite: Completion of Block 1 courses, with exception of SE 601, which can be taken at any time during the program.

SE 524	Assessment in Special Education	4
or		
SE 624	Advanced Diagnostics	4
SE 523	Educational Procedures for Students with Learning Disabilities	4

Block 3

Prerequisite: Completion of Blocks 1 and 2

SE 619	Theory, Research, and Practice in Special Education	4
SE 592	Practicum: Learning Disabilities K-12	2 or 4
SE 594	Practicum: Emotional Impairment K-12 (Prerequisite: All coursework; may take concurrently with SE 619)	2 or 4
Total		52-56

■ Endorsement Programs in Early Childhood Education and Special Education

Endorsements generally refer to any content areas or specializations that are added to a teaching certificate and can be used as planned programs for professional certification. Only those individuals who hold a teaching certificate are eligible for an endorsement. Both coursework and a practicum experience are required. The endorsement program in Early Childhood Education requires 22-24 credits.

Early Childhood Education Endorsement

Description

This program consists of the five courses in Level 1 of the M.Ed. plus a 2-credit state-mandated practicum (EC 546) and may be applied for as an endorsement only program. Credits vary from 22-24, depending upon the student's background and the need to fulfill practicum requirements. The students in the M.Ed. program may apply for the endorsement upon completion of Block 1 requirements, plus the practicum, and successful completion of the state competency exam.

Application requirements

Same as for the M.Ed. program.

Admission requirements

Same as for the M.Ed. program

Relationship to the Master of Education in Early Childhood Education

The endorsement is attained through completion of Block 1 courses, for those students who are eligible (hold a teaching certificate). Courses taken prior to admission to the degree may count toward the degree if completed within the six-year time frame allowed for the degree.

Special Education Endorsements

Description

Endorsements are available in three categorical areas: Learning Disabilities, Emotional Impairment, and Autism. The endorsements are contained within the degree program, and completion of the degree (with the exception of the elective and SE 699) is required prior to application. The exception is the endorsement in autism, which is offered as a stand-alone program for those who already hold a prior endorsement in at least one other area of special education. Those who hold a prior master's degree in special education or a related field may be able to complete an endorsement in fewer credits than required by the degree. Interested applicants should contact the program coordinator for a review of transcripts. Completion of a practicum is required. Students should contact the program coordinator to confirm application procedures and deadlines.

Application requirements

Same as for the M.Ed. program.

Admission requirements

Same as for the M.Ed. program

Relationship to the Master of Education in Special Education

Requirements for the endorsement are contained within the degree programs. Courses taken in an endorsement only program may apply to the M.Ed. if taken within the six-year time frame allowed for the degree.

■ DEPARTMENT OF HUMAN RESOURCE DEVELOPMENT

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Chair:

Michael P. Long

Professors emeriti:

William C. Fish, Ed.D., Columbia University
William F. Moorhouse, Ed.D., University of Wyoming
Robert G. Payne, Ph.D., University of Michigan

Associate professors:

Susan M. Awbrey, Ph.D., Michigan State University
Michael P. Long, J.D., Detroit College of Law
Billy Joe Minor, Ph.D., Indiana University
James Quinn, Ph.D., University of Iowa

Assistant professors:

Tomas R. Giberson, Ph.D., Wayne State University
Margaret A. Roytek, Ph.D., Wayne State University
Chaunda L. Scott, Ed.D., Columbia University
Monica W. Tracey, Ph.D., Wayne State University

Technology consultant:

George Preisinger

■ Master of Training and Development

Description

The program is designed to develop practitioners with the knowledge and skills required to enhance individual and organization development and performance. Graduates of the program will be able to lead and support interventions and processes associated with diagnosing individual and organization performance problems and opportunities, designing and implementing solutions, and evaluating results.

Graduates of the program will be qualified to work as human resource development professionals, including directors of training centers, organization development consultants, instructional designers, and performance technologists.

The MTD program is offered as an off-campus program delivered at the Seaholm High School facility in Birmingham, Michigan and the Macomb University Center in Clinton Township, Michigan. Students are admitted on a full-time and part-time basis and must complete the program in six years. Full-time students can complete the program in two and a half years.

Admission terms

Students are admitted for the fall and winter semesters. Application to the MTD program is initiated through Oakland University Graduate Admissions. Graduate Admissions must receive all application materials at least five weeks prior to the beginning of the semester in which the applicant wishes to enroll. Completed applications are reviewed by the graduate admissions committee in the Department of Human Resource Development four weeks prior to the beginning of each semester.

Application requirements

Applicants for the degree of Master of Training and Development must submit the following:

1. Official transcripts for undergraduate and graduate course work, showing a bachelor's degree from a regionally accredited institution with a cumulative grade point average of 3.00 or better. Applicants who do not meet this standard may be conditionally admitted and must complete the first 12 credits of the graduate program with a grade of 3.2 or above before conditional status is removed.
2. A formal statement detailing work and life experiences of preferably one year or longer that have led to the desire to pursue the Master of Training and Development degree program. The statement must be between 1000 and 1500 words. The formal statement is evaluated on the basis of quality of writing, organization of ideas, clarity of expression, and compatibility with program goals.
3. Three recommendations that attest to the quality and scope of the applicant's academic and professional ability.

An interview and supervised writing sample will be required of all students. Admission to the MTD program is competitive and meeting the minimum requirements does not guarantee admission into the program.

Academic advising

Upon admission, each student is assigned an academic adviser who is a faculty member in the Department of Human Resource Development. Together the student and the academic adviser establish a program plan, and meet each term prior to course enrollment to facilitate successful completion of the degree program.

Degree requirements

Successful completion of the program requires:

1. Completion of 36 approved credits with an overall grade point average of 3.00 or better. Credit toward the degree will not be given for courses with grades under 2.8.
2. Completion of five core courses:

HRD 503	Instructional Design	4
HRD 506	Theoretical Foundations in Training and Development (formerly HRD 502)	4
HRD 507	Needs Assessment	4
HRD 605	Program Evaluation	4
HRD 611	Program Administration	4

3. Students will select the remaining four courses, with the approval of the academic adviser, within one of the two following paths:

Instructional Design and Technology

HRD 550	Trends and Issues in Technology-based Training	4
HRD 603	Advanced Instructional Design	4
HRD 625	Instructional Design Theory to Practice	4
500 or 600-level HRD course	With approval of MTD adviser	4

Organization Development and Leadership

HRD 504	Organization Development	4
HRD 530	Team Development	4
HRD 635	Leadership Theory and Development	4
500 or 600-level HRD course	With approval of MTD adviser	4

■ DEPARTMENT OF READING AND LANGUAGE ARTS

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Chair:

Robert M. Schwartz

Professors emeriti:

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Gloria T. Blatt, Ph.D., Michigan State University
Robert J. Christina Ph.D., Syracuse University
George E. Coon, Ed.D., Wayne State University

Distinguished professor:

Ronald L. Cramer, Ph.D., University of Delaware

Professors:

John E. McEneaney, Ph.D., University of Georgia
Robert M. Schwartz, Ph.D., University of Illinois
Toni S. Walters, Ph.D., Oakland University

Associate professors:

Richard F. Barron, Ph.D., Syracuse University
James F. Cipielewski, Ph.D., Oakland University
Linda M. Pavonetti, Ed.D., University of Houston
Anne E. Porter, Ph.D., Wayne State University
B. Joyce Wiencek, Ph.D., University of Maryland

Assistant professors:

LeDong Li, Ph.D., Oakland University
Mary K. Lose, Ed.D., Drake University
Gwendolyn M. McMillon, Ph.D., Michigan State University

Visiting assistant professor:

Annette M. Osborne, Ph.D., Oakland University

The Department of Reading and Language Arts offers:

Doctor of Philosophy in Reading Education
Master of Arts in Teaching in Reading and Language Arts
Master of Arts in Teaching with Endorsement in Early Childhood (ZA)
Microcomputer Applications Graduate Certificate
Advanced Microcomputer Applications Graduate Certificate
Certificate Endorsement in Reading
Post-Master's Certificate in Reading and Language Arts
Post-Master's Advanced Certificate in Reading and Language Arts

■ Doctor of Philosophy in Reading Education

Coordinator:

John E. McEneaney

Reading and language arts education is predicated upon an understanding of such diverse domains of knowledge as linguistics, psychology, psychometrics and educational psychology, to mention just a few. A well-prepared reading and language arts professional must have a solid foundation in: learning theory, language development, literature, composition, comprehension, word recognition diagnosis and correction of reading performance, theoretical models of reading, as well as a historical perspective on reading and language arts as it has developed over the past century. Well-versed reading and language arts experts must possess a solid theoretical background, as well as the practical knowledge required to teach reading and the related language arts in classrooms, clinical settings, or in university programs.

The Reading and Language Arts Department is committed to offering a program of study that prepares students to conduct and evaluate research, to master the art of teaching children and adults to read and write, and to understand and appreciate the wealth of knowledge that related disciplines can contribute to literacy instruction.

Admission

Admission to the Ph.D. program is a two-step process. First, the screening committee evaluates candidates in five areas: letters of recommendation, prior coursework at the undergraduate and graduate levels, writing ability as revealed through a personal essay, professional background is indicated in a curriculum vita, and scores on the Miller Analogies Test. Second, applicants who score highest on the screening steps are interviewed by the faculty. Final admission recommendations are then made by the reading and language arts faculty working as a committee of the whole. Applications for fall admission are reviewed during the previous winter semester. All application materials must be received by Graduate Admissions by March 1.

Residence

Students must complete at least one semester of full-time study during which they earn at least 8 credits. The combined spring/summer sessions count as one semester toward residency. During residency, students may be assigned experiences not ordinarily available through coursework. Examples of such experiences may include tutoring children and adults in the reading clinic, assisting faculty in the conduct of research, and teaching undergraduate or graduate courses under departmental supervision. Graduate assistantships, which include a stipend and tuition and fees, are available on a competitive basis to students pursuing full-time study. Assistantships cannot be granted to students who are employed full time.

Academic advising

Upon acceptance into the program, students are advised by the Ph.D. program coordinator. During the first semester of study, students are assigned an initial academic adviser.

The initial academic adviser provides academic counseling early in the course of study and assists the student in developing a preliminary plan of study.

Course of study

The Ph.D. program consists of four parts: the reading and language arts core component, the research core component, the planned sequence component, and the dissertation component. Required course credits include 28 credits in the reading and language arts core and research components, 24 or 28 credits in research, 16 or 20 credits in the planned sequence, and 20 dissertation credits. When appropriate, up to 36 graduate credits earned in a master's degree at Oakland University or other accredited universities may be applied toward the Ph.D. degree, upon approval of the faculty and Graduate Study and Lifelong Learning.

The reading and language arts core and research components consist of 13 or 14 advanced courses taught in seminar fashion. The reading and language arts seminars cover topics such as theoretical models of reading, comprehension, cognitive psychology, children's literature, advanced diagnosis and correction, composing processes, and instructional technology. The research seminars cover topics such as systematic inquiry, research design, qualitative and quantitative approaches to research, methods and tools of research, applied research, and actively engage students in conducting research. Depending on previous professional experiences and training, doctoral students may be asked to take a limited number of courses prior to the 700-level courses of the core program.

The following courses make up the reading and language arts core component, followed by the courses for the research component.

Reading and Language Arts core component

RDG 703	Advanced Diagnostic and Corrective Reading	4
RDG 704	Perspectives in Literature	4
RDG 705	Perspectives in Writing	4
IST 706	Perspectives in Instructional Systems Technology	4
RDG 707	Theoretical Models and Historical Perspectives	4
RDG 708	The Psychology of Reading	4
RDG 709	Doctoral Seminar in Reading	4

Research component

RDG 706	Critical Inquiry in Reading and Language Arts	4
RDG 710	Educational Research in Reading and Language Arts	4

RDG 720	Qualitative Research Design and Methods in Reading and Language Arts	4
RDG 725	Quantitative Research Design and Methods in Reading and Language Arts	4
RDG 730*	Advanced Qualitative Research Design and Methods in Reading and Language Arts	4
RDG 735*	Advanced Quantitative Research Design and Methods in Reading and Language Arts	4
RDG 750	Research Practicum in Reading and Language Arts	4

* Students must select one Advanced Design and Methods course, as part of their research program of study. When students opt to take both Advanced Design and Methods courses, then their planned sequence course work will be a minimum of 16 semester hours, and their research core component will be 28 semester hours.

The planned sequence component consists of 16 or 20 semester hours of study selected by the student with the advice of an adviser to serve that student's needs and interests. The planned sequence must be approved and signed by the student's adviser. The planned sequence may include study in related disciplines such as linguistics, psychology, English, instructional system's technology, school administration, children's literature, composition, or guidance and counseling.

The dissertation component consists of course work guided by the student's dissertation chair and committee members and is designed to assist the student in the research and writing process involved in successful completion of the dissertation. A dissertation proposal (written paper) and oral proposal defense are required, as well as a dissertation and oral defense of the dissertation. Dissertations may investigate any faculty-approved theoretical or practical issue in reading and language arts and literacy related issues in instructional technology.

Qualifying examination

Before admission to candidacy, each student must pass a written and oral qualifying examination. The examination is taken after the bulk of course work is completed. Portions of the examination that all doctoral students must complete are prepared by the Departmental Qualifying Examination (DQE) Committee. Portions of the examination specifically addressing the interests, needs, and objectives of individual students are prepared by a Student Qualifying Examination (SQE) Committee selected especially for the student. If a student is completing a planned sequence of courses within the department, the SQE committee will consist of three Reading and Language Arts faculty members. If the student is completing a planned sequence of courses in another department, then a 4th member representing that discipline is required.

The qualifying examination is administered twice each academic year, in the fall and winter semesters. Normally, students will have passed their qualifying examination before final approval of the dissertation proposal is given. However, the dissertation adviser can make an exception to this norm when appropriate.

The qualifying examination consists of a written examination designed to assess an individual student's knowledge about theory, research, and practice in reading and language arts and in the

planned sequence area. Qualifying examinations are administered over three days. The members of the Student Qualifying Examination Committee read the student's written responses and, if a student has successfully completed the written portion of examination, the student is invited to orally defend their responses for this committee.

The Student Qualifying Examination Committee may permit a student to repeat the qualifying examination. An unacceptable performance on the qualifying examination may result in educational requirements and experiences in addition to those specified in the regular course of study. Passing evaluations on either the written or oral portions of the examination do not preclude the faculty from requiring additional courses or learning experiences if the Student Qualifying Examination Committee deems such actions warranted.

Dissertation

Each candidate must complete a dissertation that makes a contribution to the major field of study. When a student is ready to initiate a dissertation proposal, he or she should nominate a dissertation committee chairperson. The dissertation committee is then formed in consultation with the student's dissertation chairperson. The dissertation committee consists of four Oakland University faculty members, including at least three members from the Department of Reading and Language Arts, at least one member from outside the Department of Reading and Language Arts and at least one member from the student's area of minor concentration. An Oakland faculty member at large or a faculty member from another university may be asked to serve on the committee if approved by the committee chair and the Ph.D. coordinator. The student's nominees are subject to availability and other constraints. The coordinator of the doctoral program must approve the selection of the dissertation committee.

The dissertation committee chairperson advises the candidate through the stages of dissertation preparation. When the dissertation committee chairperson and the student have agreed on a dissertation topic, the student must prepare a written dissertation proposal. Requirements of the dissertation proposal shall be specified by the dissertation chairperson in consultation with the dissertation committee. The student shall present and orally defend the proposal before the dissertation committee, insuring that all relevant issues pertaining to the dissertation are considered. Once the dissertation committee approves the proposal, the student may initiate the study.

A penultimate draft of the dissertation must be submitted to the committee for modification and approval before the final copy is prepared and approved by the dissertation committee. The completed dissertation must be filed with UMI Dissertation Publishing. Eleven bound copies of the dissertation are required and are distributed as follows: 1 to Graduate Study and Lifelong Learning, 2 to Kresge Library, 3 to the Ph.D. coordinator of the Department of Reading and Language Arts, and 1 for each member of the dissertation committee.

Twenty credits in RDG 799 are required of all doctoral students. Merely amassing dissertation credits does not indicate satisfactory progress toward, or completion of, the dissertation. The dissertation is deemed completed only after a successful oral defense and after final approval of the completed dissertation by the dissertation committee.

Oral final examination

Each candidate must orally defend the dissertation before the dissertation committee. The examination is scheduled after the dissertation committee has had at least two weeks to review the dissertation. While interested faculty and outside observers may make comments and ask questions, only the dissertation committee certifies approval of the dissertation. The dissertation committee may permit reexamination if the initial dissertation defense is deemed inadequate.

Time limits

All requirements, including the dissertation, must be completed within eight years after admission to the program. An extension may be granted with the approval of the Ph.D. coordinator and Graduate Study and Lifelong Learning

If six consecutive semesters elapse where no credits are accumulated toward the degree, the student will be considered inactive and may be dropped from the program. Students who are deemed inactive or dropped from the program may be reinstated upon approval of the Ph.D. coordinator and Graduate Study and Lifelong Learning.

Graduation

Students expecting to graduate in a given semester must be registered and file an Application for Degree by the deadline published in the Schedule of Classes. Failure to do so on time will preclude graduation in that semester.

■ Master of Arts in Teaching in Reading and Language Arts

Coordinator:

Robert M. Schwartz

Most MAT students are classroom teachers whose daily work requires them to deal with the literacy needs of young children, adolescents or adults. Instruction in the MAT program prepares classroom teachers to work effectively and efficiently in settings where class sizes may range from 5 to 40 or more learners. The MAT program allows certified teachers to add a Michigan endorsement as a Classroom Reading Teacher (BT), a Language Arts Teacher (BX) or a building level Reading Specialist (BR). The core program is the same for each endorsement but Oakland can only recommend students for one endorsement program based on those courses. Requirements and elective options vary according to the intended endorsement program. Endorsement candidates must complete the coursework and pass the appropriate State of Michigan certification endorsement test before the endorsement can be issued by the State.

Admission

Applicants to the MAT degree in reading and language arts apply for admission through Graduate Admissions. Applications are accepted at any time. Applicants are notified of their status after submitting all required documents.

The department considers only those applicants who hold baccalaureate degrees from regionally accredited institutions. While an undergraduate grade point average of at least 3.00 is the minimum standard for admission, other factors bearing on potential academic success are given due consideration. An application for admission, an application fee, two letters of recommendation and official transcripts of previous academic work must be submitted to Graduate Admissions before the application can be reviewed by the department.

Requirements

The requirement for the MAT in reading and language arts is 36 credits; if the two-course option, in lieu of RDG 699 Master's Project is selected, the program requires 40 credits.

MAT core courses

RDG 500	Foundations of Reading Instruction	4
RDG 571	Foundations of Literature for Children and Young Adults	4
RDG 575	Teaching Writing in the Elementary and Secondary Schools	4
RDG 632	Diagnosis of Reading Disabilities	4
RDG 633	Correction of Reading Disabilities	4
RDG 699*	Master's Project	4

*Students may substitute two-elective courses in lieu of RDG 699. This option necessitates 40 credits for graduation.

Endorsement requirements and elective courses

The MAT plus Classroom Reading Teacher (BT) endorsement provides the most flexibility in choice of electives. The program consists of the core courses plus twelve credits of electives in Reading (RDG) or Instructional Systems Technology (IST). Any 500- or 600-level course with a RDG or IST designation preceding the course number constitutes an acceptable elective. In addition, RDG or IST 700-level courses may serve as electives, but only with adviser and course instructor permission. If you choose to substitute two additional electives for RDG 699 this would allow five electives.

Teachers can design a focus area for their program through the selection of electives. An Elementary focus would include electives like RDG 532, 534, 537, 539, 560, 561, 570 and/or 574. A Middle School and Secondary focus would include electives like RDG 538, 565, 570, 573, 577 and/or 578. A Research focus would include electives like RDG 564, 590, 706 and/or 710.

The MAT plus Reading Specialist (BR) endorsement consists of the core requirements plus RDG 538 and RDG 540 plus one elective. If you choose to substitute two additional electives for RDG 699 this would allow three electives.

The MAT plus Language Arts (BX) endorsement consists of the core requirements plus RDG 534 and two electives. These electives must fulfill the English and Linguistics requirements for this endorsement. If these requirements have been met with undergraduate courses then RDG or IST electives can be substituted to fulfill the needed electives. If you choose to

substitute two additional electives for RDG 699 this would allow four electives.

Michigan professional certificate

Candidates for the Michigan Elementary Professional Certificate (formerly Continuing Certificate) must elect RDG 534 if they have not previously met the six credit hour requirement for reading methods courses in your undergraduate program.

Candidates for the Michigan Secondary Professional Certificate must elect RDG 538 if they have not previously completed an equivalent three credit hour reading course in their undergraduate program.

It is the student's responsibility to confirm with the School of Education and Human Services' advising office whether or not prior coursework fulfills state requirements for the Professional Certificate.

■ MAT in Reading and Language Arts with Endorsement in Early Childhood Education (ZA)

Coordinator:

B. Joyce Wiencek

A limited number of reading and language arts students will be admitted to the early childhood endorsement sequence. Candidates for admission to the certificate endorsement sequence in early childhood must first be admitted to the MAT in reading and language arts program and then apply to the early childhood program by the June 1 deadline for fall admission (see graduate catalog for the early childhood area). Students admitted to this sequence must schedule an advising appointment with the program coordinator before taking courses.

This program can lead to two combinations of endorsement: the Early Childhood (ZA) endorsement and either the Classroom Reading Teacher (BT) or Reading Specialist (BR) endorsement.

The BT plus ZA program consists of the MAT core courses, RDG 560 and the 22-credit hour Early Childhood (EC) sequence shown below. This is a total of 50 credit hours, if you choose to substitute two electives for RDG 699 this increases the total to 54 credit hours.

The BR plus ZA program consists of the MAT core courses (not including RDG 699), RDG 538, 540 and 560 and the 22 credit hour EC sequence. This is a total of 54 credit hours (RDG 538 & 540 substitute for RDG 699).

Early Childhood endorsement sequence

EC 540	Theories of Child Development and Education	4
EC 544	Adult-Child Interaction: Play and Mediation of Learning	4
EC 542	Applied Developmental Principles	4
EC 543	Teacher as Child Advocate and Adult Educator	4
EC 546	Workshop in Early Childhood Curriculum	2
EC 645	Observation and Assessment of the Young Child	4

■ Microcomputer Applications Graduate Certificate

Coordinator:

Anne E. Porter

The Reading and Language Arts Department offers a 16-credit certificate indicating focused training in educational applications of microcomputers and related technologies. This program is intended for teachers, administrators and professional staff representing a variety of educational and training levels. The certificate program meets the needs of educators in the challenging and rapidly changing field of technology in education as it relates to literacy, learning and the school curriculum.

Admission to this program requires basic computer literacy skills. Prior to entering the program students should be comfortable using computer applications such as word processing and curriculum related software to meet their general personal and professional needs.

Students enrolled in the MAT program in reading and language arts may earn the certificate as part of the master's degree program. Under this option, students will complete the elective portion of the MAT by enrolling in IST 594, 595 and 679. IST 699 will be substituted for RDG 699. Note: 4 credits of IST 630 may be substituted for IST 595 only.

■ Advanced Microcomputer Applications Graduate Certificate

Coordinator:

Anne E. Porter

For holders of the Certificate of Microcomputer Applications in Education (or the equivalent), the Department of Reading and Language Arts offers a 16-credit certificate of advanced study in

the theory and application of instructional systems technology in the enhancement of learning environments. This program provides an opportunity for focused inquiry in specific areas of interest relating to the impact of advanced technologies on teaching, learning and literacy in a variety of settings.

Doctoral students may pursue this certificate as part of their minor concentration. Students enrolled in the MAT in reading and language arts program may use these courses as part of their elective sequence with permission from their adviser. Students may also enroll in the certificate program without pursuing a graduate degree. Students will receive the certificate upon the successful completion of IST 630, 703, 706 and 780.

■ Certificate Endorsement in Reading

Coordinator:

James F. Cipielewski

For teachers that have successfully completed a master's degree in an allied or related field of study, the Department of Reading and Language Arts offers programs leading to a Michigan Certificate Endorsement in Reading. The Classroom Reading Teacher endorsement (BT) courses are RDG 500, 571, 575, 632, 633 and one elective. The Reading Specialist endorsement (BR) courses are RDG 500, 571, 575, 632, 633, 538 and 540. Endorsement seekers must also pass the appropriate State of Michigan reading endorsement certification examination. Students considering pursuing this endorsement must schedule an advising appointment prior to beginning the program.

■ Post-Master's Graduate Certificates in Reading, Language Arts and Literature: 16 credits and 32 credits

Coordinator:

James F. Cipielewski

The 16- and 32-credit graduate certificates in reading, language arts and literature are intended for two different groups of students:

1. Students with little background in reading and,
2. Students who have completed a MAT in reading and language arts.

If you have little or no reading, language arts or children's literature background, the options available will enable you to gain a basic understanding of literacy instruction and provide invaluable information on current trends and issues in the field.

Since some school districts now require planned 15- and 30-hour programs, the Post Master's Certificate Programs in reading, language arts and literature will meet the need for a planned program. Students wishing to pursue this program option should schedule an advising appointment with the program coordinator.

■ DEPARTMENT OF TEACHER DEVELOPMENT AND EDUCATIONAL STUDIES

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Chair:

Dyanne M. Tracy

Professors emeriti:

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Patrick J. Johnson, Ed.D., Wayne State University
M. Sharon P. Muir, Ph.D., University of Nebraska

Professor:

Dyanne M. Tracy, Ph.D., Indiana University

Associate professors:

Dawn M. Pickard, Ph.D., Purdue University
Mary T. Stein, Ph.D., State University of New York, Buffalo
Robert A. Wiggins, Ph.D., University of Illinois

Assistant professors:

Babette M. Benken, Ph.D., University of Michigan
Karen Bolak, Ed.D., Wayne State University
Nancy A. Brown, Ph.D., University of Michigan
Young J. Kim, Ph.D., University of Illinois, Chicago
Timothy G. Larrabee, Ph.D., University of California, Davis
Ji-Eun Lee, Ed.D., State University of New York, Binghamton
Michael G. MacDonald, Ph.D., University of Calgary (Canada)
Carolyn J. O'Mahony, Ph.D., Michigan State University
Thomas Pedroni, Ph.D., University of Wisconsin

Visiting assistant professors:

Pamela A. Morehead, Ph.D., Oakland University
Jumanne R. Sledge, Ph.D., Wayne State University

Special instructors:

Linda K. Tyson, M.A., University of Michigan
Mary F. Zeppelin, M.S., Oakland University

Degree programs

Master of Education in Educational Studies
Master of Arts in Teaching (elementary education)
Master of Arts in Teaching (secondary education)

■ Master of Education in Educational Studies

Coordinator:

Michael G. MacDonald

Admission

Applicants to the M.Ed. program apply to Oakland University and the Department of Teacher Development and Educational Studies through Graduate Admissions. Application forms for the university and for the department are available from that office. Admission is a selective process. Meeting minimum criteria does not guarantee acceptance into the program. Students are notified of their admission status by Graduate Admissions.

Admission requirements

1. An undergraduate GPA of at least 3.00
2. A teaching certificate
3. Ready access to K-12 classrooms
4. K-12 teaching experience
5. Two letters of recommendation from individuals in a supervisory relationship to the applicant
6. A statement of professional goals
7. Communication skills commensurate with graduate-level scholarship. Students who are conditionally admitted to the program because of a lower GPA or lack of recommendations must complete a minimum of 8 credit hours (EST 601 and one other core course) with a grade of at least 3.0 in each course.

Applications for special graduate status are available from and processed through Graduate Admissions.

Program requirements

The program requires a minimum of 35 credits. Upon admission, a plan of study is prepared jointly by the student and the faculty adviser. No grade below 3.00 may be applied to the degree. The program consists of a 16-credit core, a minimum of 15 elective credits approved by student's faculty adviser, and a 4-credit exit plan of EST 609. Elective courses must be taken for at least 3 credits to be counted toward the M.Ed. program. Four Oakland University credits may be applied from outside the listed electives; exceptions to this policy require approval of a Petition of Exception by department faculty and Graduate Study and Lifelong Learning. Up to six graduate credits from other accredited colleges or universities may be applied to the Master of Education degree with faculty adviser approval.

Required core (16 credits):

EST 601	Introduction to Educational Studies (must be taken as first course in M.Ed. program)	4
EST 602	Diverse Learners and the Curriculum	4
EST 603	Teachers and the Curriculum	4
EST 604	Advanced Instructional Design	4

Educational Studies electives

Educational Studies Electives
Choose 15 credits from the following as outlined in one of eight Focus Areas:

EST 500	Art for the Classroom Teacher	4
EST 530	Teaching Mathematics in the Middle School	1 to 4
EST 532	Diagnosis and Remediation in Mathematics	1 to 4
EST 533*	Number and Operations for Middle School Mathematics Teachers	3
EST 534*	Algebra and Functions for Middle School Mathematics Teachers	3
EST 535*	Measurement and Geometry for Middle School Mathematics Teachers	3
EST 536*	Data Analysis, Statistics and Probability for Middle School Teachers	3
EST 560	Science and Children	4
EST 561	Outdoor and Environmental Education	1 to 4
EST 566*	Understanding the Geosphere Through Real World Connections	3
EST 567*	Understanding Our Solar System and the Universe Through Real World Connections	3
EST 568*	Understanding the Hydrosphere, Weather, and Atmosphere Through Real World Connections	3
EST 569*	Understanding the Science Through Field Experiences	1
EST 570	The International Experience	2 to 4
EST 571	Social Studies in the Schools	4
EST 572	Global Education in the Schools	4
EST 573	Multicultural Education in the Schools	1 to 4
EST 590	Trends and Practices in Middle Level Education	4
EST 581	Gender Socialization in Schools	1 to 4
EST 591	Middle Level Schools	2 or 4
EST 640	Integrating Disciplines in the Curriculum	4
EST 641	Applied Curriculum Studies	4
EST 642	Practicum: School wide Community-Building	4

EST 650	Special Studies in Teacher Development and Educational Studies	1 to 4
EST 651	Issues in Education	1 to 6
EST 660	Teacher Leadership in Mathematics and Science	1 to 4
EST 661	Supervisory Skills for Teachers and Administrators	2 or 4
CNS 561	Introduction to School Counseling	2
CNS 571	Consultation Theory and Practice	2
EC 540	Theories of Child Development and Education	4
EL 560	Staff and Curriculum Development for School Improvement	4
EL 620	Law for Teachers and Administrators	4
HRD 625	Instructional Design Theory To Practice	4
IST 594	Introduction to Technology Applications in the Classroom	4
RDG 500 or RDG 575	Foundations of Reading Instruction Teaching Writing in the Elementary and Secondary Schools	4
SE 510	Students with Behavioral and/or Emotional Impairments	4

* Note : No more than 6 credits may be applied to the M.Ed. in Educational Studies program.

Exit (4 credits):

EST 609 Collaborative Action Research 4

The exit plan is to be completed within the last calendar year of the program with the M.Ed. adviser's and supervising instructor's approval.

Michigan professional certification

Teachers may be recommended for professional certification upon completion of a planned program in Teacher Development and Educational Studies consisting of EST 601; EST 602; EST 603; and 6 elective credits.

SCHOOL OF ENGINEERING AND COMPUTER SCIENCE

248 Dodge Hall • (248) 370-2212 • <http://www.secs.oakland.edu>
Fax (248) 370-4261

Dean:

Pieter A. Frick

Associate dean:

Bhushan L. Bhatt

Assistant to the dean:

James L. Hargett

Department chairs:

Gary C. Barber, mechanical engineering
Manohar Das, interim, electrical and systems engineering
Ishwar Sethi, computer science and engineering
Christian C. Wagner, industrial and systems engineering

Professors emeriti:

David Boddy, Ph.D., Purdue University
Robert H. Edgerton, Ph.D., Cornell University
Glenn A. Jackson, Ph.D., University of Michigan
Naim A. Kheir, Ph.D., The Hungarian Academy of Sciences
Keith R. Kleckner, Ph.D., Cornell University
Gilbert L. Wedekind, Ph.D., University of Illinois
Tung H. Weng, Ph.D., University of Missouri, Columbia
Thomas G. Windeknecht, Ph.D., Case Institute of Technology
Howard R. Witt, Ph.D., Cornell University

Professors:

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Gary C. Barber, Ph.D., University of Michigan
Bhushan L. Bhatt, Ph.D., Oakland University
Ka Chai Cheok, Ph.D., Oakland University
Manohar Das, Ph.D., Colorado State University
Pieter A. Frick, Ph.D., London University
Subramaniam Ganesan, Ph.D., Indian Institute of Science
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Randy Gu, Ph.D., State University of New York, Buffalo
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Michael Y.Y. Hung, Ph.D., University of Illinois
Janusz W. Laski, Ph.D., Technical University of Gdansk (Poland)
Nan K. Loh, Ph.D., University of Waterloo
Fatma Mili, Ph.D., University of Paris
Michael P. Polis, Ph.D., Purdue University
Andrew Rusek, Ph.D., Technical University of Warsaw (Poland)
Ishwar Sethi, Ph.D., Indian Institute of Technology (Kharagpur)
Robert P. Van Til, Ph.D., Northwestern University
Sarma R. Vishnubhotla, Sc.D., Washington University, St. Louis
Mohamed A. Zohdy, Ph.D., University of Waterloo

Associate professors:

Patrick Dessert, Ph.D., Oakland University
Ching Long Ko, Ph.D., University of Oklahoma
Michael A. Latcha, Ph.D., Wayne State University
Keyu Li, Ph.D., Johns Hopkins University
Qingchong Liu, Ph.D., University of Southern California
Lunjin Lu, Ph.D., University of Birmingham (England)
Zissimos P. Mourelatos, Ph.D., University of Michigan
Sayed A. Nassar, Ph.D., University of Cincinnati
Barbara Oakley, Ph.D., Oakland University
Brian P. Sangeorzan, Ph.D., University of Wisconsin, Madison
Sankar Sengupta, Ph.D., Clemson University
Gautam B. Singh, Ph.D., Wayne State University
Ronald J. Sroda, Ph.D., University of Michigan
Christian C. Wagner, Ph.D., Michigan State University
Lianxiang Yang, Ph.D., University of Kassel (Germany)

Assistant professors:

Daniel Aloi, Ph.D., Ohio University
Djamel Bouchaffra, Ph.D., Universite Des Sciences Sociales, DeGrenoble II (France)
Yin-Ping Chang, Ph.D., Pennsylvania State University
Debatosh Debnath, Ph.D., Kyushu Institute of Technology (Japan)
Imad H. Elhajj, Ph.D., Michigan State University
Huirong Fu, Ph.D., Nanyang Technological University (Singapore)
Laila Guessous, Ph.D., University of Michigan
Darrin M. Hanna, Ph.D., Oakland University
Dae-Kyoo Kim, Ph.D., Colorado State University
Christopher Kobus, Ph.D., Oakland University
Jia Li, Ph.D., University of Michigan
Lorenzo M. Smith, Ph.D., Michigan State University
Xia Wang, Ph.D., Rensselaer Polytechnic Institute
Qian Zou, Ph.D., Tsinghua University (China)

Special instructor:

Jerry E. Marsh, M.S., Oakland University

Special lecturer:

Laura Dinsmoor, M.S., Oakland University

Adjunct professors:

Alex Alkidas, Ph.D., Georgia Institute of Technology
Ronald R. Beck, Ph.D., University of Iowa
Robert F. Bordley, Ph.D., University of California, Berkeley
Francis H. K. Chen, Ph.D., University of Illinois, Urbana-Champaign
Donald R. Falkenburg, Ph.D., Case Western Reserve University

Adjunct associate professors:

Preston L. Brooks, M.S.E.E., Stanford University, M.B.A.,
University of San Diego
Fang Chen, Ph.D., Oakland University
Yung Chiang, Ph.D., University of Wisconsin, Madison
Francis B. Hoogterp, Ph.D., Oakland University
Gerard R. Jozwiak, Ph.D., Wayne State University
Yung-Li Lee, Ph.D., University of Wisconsin, Madison
Peter Peng, Ph.D., McMaster University (Canada)
Mutashim Salman, Ph.D., University of Illinois, Champaign
Phil Szuba, Ph.D., Oakland University
Simon Chin-Yu Tung, Ph.D., Rensselaer Polytechnic Institute

Adjunct assistant professors:

Randy Graca, Ph.D., Oakland University
Suresh Ramalingham, Ph.D., Texas A&M University
Saeed Siavoshani, Ph.D., Oakland University
Gert Edzko Smid, Ph.D., Oakland University

Advisory Board

The Advisory Board for the School of Engineering and Computer Science is composed of leaders in industry. They assist the school in developing educational and research programs to meet the rapidly expanding requirements in the technical world. The Board is available as a body or individually for consultation on such matters as curriculum, research, facilities, equipment requirements, special subjects and long-range planning.

Board Members:

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Yogen N. Rahangdale, Executive Vice President, Chief Technology, American Axle
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Gerhard Schmidt, Ph.D., Vice President, Research, Ford Motor Company
Stephan Sharf, President, SICA
Jeffery Van Dorn, Officer, Android Industries

General information

The School of Engineering and Computer Science offers programs leading to the Master of Science degree in electrical and computer engineering, mechanical engineering, systems engineering, computer science and engineering, embedded systems, information systems engineering and software engineering and the Doctor of Philosophy

degrees in mechanical engineering, and systems engineering. It also offers a Master of Science program in engineering management in cooperation with the School of Business Administration.

The school is housed in Dodge Hall of Engineering, Hannah Hall and the Science and Engineering building, a modern facility with extensive laboratories for research and design studies. Laboratories cover automotive mechatronic systems, robotics, machine vision, experimental stress analysis, heat transfer, fluid flow, system simulation, circuits and communications, control, mechanical and electrical properties of materials, solid-state devices and microelectronics, microprocessors, mini-computers, computer integrated manufacturing, computer graphics and computer-aided design. Students have access to the various computing facilities of the school and the university's computer services, consisting of a Distributed Computing Environment integrating DEC, Sun work stations, Silicon Graphics and Windows. The school also has a large number of personal computers. Fully-equipped and staffed electronics, computer and machine shops complement these facilities.

Centers/Institutes

Center for Robotics and Advanced Automation (CRAA)

The School of Engineering and Computer Science has a Center for Robotics and Advanced Automation. The main goals of the center are to contribute to the demand for high technology and industrial productivity in the United States.

Fastening and Joining Research Institute (FAJRI)

Fastening and joining significantly affects the safety, quality and reliability of many mechanical and structural systems, machinery and equipment. The FAJRI is the only known academic facility of its kind in the world dedicated solely to the research and development of fastening and joining of materials in industries such as automotive, aerospace and nuclear. The research programs at FAJRI benefit both the commercial and defense sectors of the economy while improving the safety of the public.

Product Development and Manufacturing Center (PDMC)

Global competition in manufacturing mandates continual improvement in technology, business processes and employee capabilities. The manufacturing enterprise must also consider interdependencies between these three factors when affecting change. In recognition of this dynamic, the Product Development and Manufacturing Center at Oakland University focuses on improving the competitiveness of the automotive industry and its suppliers through application of new and existing technology, modified business practices and new educational and training paradigms.

Graduate assistantships/fellowships

A number of graduate assistantships and a limited number of fellowships are awarded each year on a competitive basis. They carry both stipend and tuition remuneration. Graduate assistants render 20 hours per week of teaching and/or research service to the university. No such service is required of graduate fellows. Graduate assistants or fellows at the master's level who plan to enter either the area of research and development in industry or a doctoral program are strongly encouraged to include a master's project or thesis as part of their program.

■ General Regulations for Doctoral Degree Programs

Admission

The Ph.D. programs are designed for students with academic backgrounds in engineering. Students with backgrounds in computer science, mathematics or the physical sciences may also be admitted to the program, but they will be required to build up basic engineering knowledge through remedial coursework. Normally a master's degree from an accredited institution is required for admission; however, students with outstanding undergraduate records may apply directly for admission to the doctoral programs.

Admission is highly selective; applicants should present transcripts of all previous academic work and recommendations from three faculty members of their most recent study program who can evaluate their scholarly achievement and potential. Applicants must submit scores from the Graduate Record Examination (GRE) if they graduated from an institution not accredited by a regional accrediting agency. The Test of English as a Foreign Language (TOEFL) must be submitted by applicants who are graduates of programs taught in a language other than English.

Entrance classification

All students who have been accepted for admission to doctoral study are classified as regular Ph.D. students and are subject to all of the general degree requirements listed below. Applicants with a master's degree who do not intend to pursue a degree program but wish merely to attend one or two courses are classified as professional development students. Credits earned as a professional development student are not applicable toward a doctoral degree, unless the student subsequently transfers to regular status and the courses are accepted as part of the Ph.D. program.

Post-master's students who have demonstrated outstanding achievement and who later wish to pursue a Ph.D. degree may apply for admission to the doctoral program. The applicant must complete a new application form, available from Graduate Admissions, and submit official transcripts and letters of reference if these were not included with the original application for admission. When considering changes of status, the applicant's performance at Oakland University will receive strong consideration.

Advisory committee

As soon as possible after admission, but prior to earning 16 credits of coursework, students must form an advisory committee, which will direct and guide the progress of their program. Such a committee is composed of four faculty members, specified as follows:

1. Three faculty members nominated by the student (one designated as chair and one selected from a department outside the School of Engineering and Computer Science).
2. One member appointed by the Dean of the School of Engineering and Computer Science.
3. Upon recommendation of the advisory committee, following successful completion of the Ph.D. comprehensive examination, one member from within or outside the university community may either be added to the committee or replace a member for the dissertation proposal and review.

The entire committee must have the approval of the Dean of the School of Engineering and Computer Science and Graduate Study and Lifelong Learning.

Initial advising

During the first semester after admission to the Ph.D. program, a student will be given a preliminary evaluation by a committee of two faculty members appointed by the Dean. The purpose of the preliminary evaluation is to examine the student's background and preparation to do independent research. The committee will formulate an initial Plan of Study for use until the student forms his/her advisory committee, thereby ensuring the benefit of faculty counsel throughout the Ph.D. program. The student's advisory committee can at any time update the Plan of Study.

■ Doctoral degree requirements

Students must meet the following doctoral degree requirements:

Course work credits

At least 56 credits must be earned for coursework beyond the bachelor's degree (exclusive of dissertation). The normal full-time load is 8 to 12 credits per semester. Students who have earned a master's degree may petition to have a maximum of 32 credits applied toward the 56. The advisory committee will evaluate the student's prior master's degree work and allow Ph.D. credits for courses relevant to the proposed Ph.D. course of study. All candidates must complete at least 24 credits of additional coursework exclusively at Oakland University. In the Ph.D. program, credit will not be awarded for courses in which a grade less than 3.0 is earned. All numerical grades earned are used in computing a student's grade point average.

Comprehensive examination

Each student is required to take a comprehensive examination after the student has completed all of his/her coursework, but before completing no more than 8 credits of dissertation research. The examination is designed to assess the student's analytical reasoning, theoretical understanding, and preparedness to do independent research. The examination is composed of a written component and an oral component. The written examination includes at least two discipline-specific areas relevant to the student's coursework and research interest. The student's advisory committee, based on the student's preparation, selects the areas for the examination. The oral examination follows within a month of the written examination. The written examination is commonly split into no more than three parts to be taken over a reasonable period of time (usually not to exceed one month). A student may repeat the comprehensive examination once.

Dissertation proposal

As soon as a candidate and the advisory committee chair agree on a specific research topic, the candidate must write a dissertation proposal. This document contains a formulation of the problem, the background work leading to the formulation and a plan for the

subsequent research. Candidates must orally present the proposal to their advisory committees and any other interested faculty, at which time the committee may question the preparedness of the student to carry out the research.

Research credits

Students who have advisory committee approval of their dissertation proposals and are conducting research should register for EGR 790 or ME 790. At least 24 research credits are required of all doctoral candidates. However, merely amassing credits does not indicate satisfactory progress toward or completion of the dissertation. These judgments are made by the advisory committee. The dissertation is judged completed upon successful completion of the final examination and acceptance of the dissertation by Graduate Study and Lifelong Learning.

Dissertation

Each candidate will submit a dissertation to the advisory committee. The dissertation must be the candidate's own work and must constitute a contribution to knowledge in his/her field of endeavor. All dissertations must conform to university standards (see "Master's thesis/doctoral dissertation" in the Policies and Procedures section of this catalog).

Residence

Writing a doctoral dissertation requires a full commitment to research. Such research cannot be effectively pursued in an environment, which places research in a secondary role. Doctoral students are required to be full-time students for at least one year of their active dissertation research. The doctoral student should arrange such a period of residency by (1) registering for at least 8 credits of doctoral dissertation research for two consecutive semesters, and (2) making a commitment, in a statement addressed to his/her advisory committee, to a program of full-time (at least 20 hours per week) research.

The above represents the normal residency requirement. However, if the present occupation of the candidate (e.g., industrial research or teaching) is conducive to the intended research, there is an alternative method to fulfilling the residency requirement. To arrange for that kind of residency, the candidate must apply in writing to his/her advisory committee at the time of the dissertation proposal review. The committee must be furnished with a written statement by the candidate's employer confirming that the dissertation research constitutes a major portion of the job assignment. If the advisory committee grants permission to pursue this option, the student must enroll in doctoral dissertation research (8 credits maximum) for at least two consecutive semesters.

The work of Ph.D. students described in the above paragraph will be documented by term reports, reviewed and accepted by the chair of the advisory committee. A copy of every report will be kept in the student's file. The advisory committee will review these reports. If the progress is unsatisfactory or the student and the employer are unable to fulfill the terms of the residency agreement, the advisory committee can declare the residency requirements unfulfilled.

Final examination

Each Ph.D. candidate must satisfactorily defend the dissertation in a final oral examination administered by the advisory committee. The examination is taken after the advisory committee certifies that the dissertation is ready for final review. At the committee's option, one

re-examination may be permitted if a candidate fails to pass the final examination.

Time limit

Students have a seven-year time limit to complete all requirements for the Ph.D., beginning with the first term of enrollment in the program. Credits earned prior to entry into the program will be evaluated by the advisory committee for their currency before completion of 24 credits of doctoral coursework at Oakland University by the student. Course work that is determined to be outdated will not be applicable toward the degree.

Graduation

Students expecting to graduate in a given semester must file an application for degree by the deadline published by the University. Failure to do so on time will preclude graduation in that semester.

■ Doctor of Philosophy in Systems Engineering

The field of engineering has evolved into a blending of disciplines that is well suited for dealing with such concerns as robotics and machine vision, electronic and communication systems, mechanics, material and manufacturing systems, fluid and thermal systems, dynamic systems and control, computer and microprocessor systems, industrial and production systems, and artificial intelligence and expert systems. The School of Engineering and Computer Science is concentrating its efforts in these areas at the Ph.D. level.

The Ph.D. program in systems engineering is for students who plan careers in industrial or governmental research and development laboratories or problem-oriented agencies, as well as in the academic field. Students can begin doctoral study on a part-time basis, availing themselves of late afternoon or evening courses while working full time in local industry. However, later phases of study and research will require full-time devotion to the program. Students must also fulfill a residency requirement.

Ph.D. discipline specializations

In keeping with the programs of study that are currently available through the Computer Science and Engineering Department, Electrical and Systems Engineering Department, Industrial and Systems Engineering Department and Mechanical Engineering Department, the student can follow any one of the following discipline specializations, depending upon his or her previous background and training.

• **Computer Systems:** The work in this discipline may be focused on hardware and software system design, artificial intelligence and expert systems, computer communication systems including parallel and distributed computing, computer graphic systems, computer vision and multimedia systems, pattern recognition and data mining, and software engineering systems.

• **Control Engineering and Dynamic Systems:** The work in this discipline may be focused on adaptive, intelligent, digital and optimal control systems, modeling and estimation of dynamic systems, robotic systems, fuzzy logic and neural network-based control systems.

- **Electrical Engineering Systems:** The work in this discipline may be focused on digital image and signal processing, microelectronic circuits and systems including VLSI, instrumentation and measurement systems, electromagnetic systems, and analog and digital communication systems.
- **Industrial Engineering Systems:** The work in this discipline may be focused on production systems, quality control, manufacturing systems, computer integrated manufacturing, flexible manufacturing systems, graphics and CAD/CAM, artificial intelligence in manufacturing systems, scheduling and systems integration.
- **Manufacturing Processes and Systems:** The work in this discipline may be focused on manufacturing processes including machining, metal forming, materials, automated inspection and evaluation systems.
- **Mechanical Engineering Systems:** The work in this discipline may be focused on engineering mechanics systems involving acoustics, vibrations, classical/experimental mechanics and non-destructive testing; fluid and thermal energy systems involving phase change, combustion, and energy transfer and conversion; tribology systems involving friction, lubrication and wear; and general manufacturing processes systems.

Systems approach

The field of systems engineering recognizes the inter-disciplinary nature of engineering, particularly in the areas of robotics, electronics, communications, mechanics, manufacturing systems, production systems, fluid and thermal systems, dynamic systems and control, computer hardware and software systems, software engineering, artificial intelligence and expert systems. The successful analysis and design of complex engineering systems in each of these areas involve two major perspectives. The first perspective, characterized by viewing individual elements of any phenomenon, process or system as being inter-related, with the form of the relationship influencing the behavior of the whole, requires that a systems approach be taken in the analysis, modeling or synthesis of the phenomenon, process or system under consideration. The second perspective is discipline-specific and requires a detailed understanding of the fundamental physical principles or concepts associated with the particular system under study.

A direct benefit of the above approach to problem solving is that it ties the contributions made to the fundamental knowledge in the field with the nuances and constraints imposed by the environment on the specific problem under investigation.

In other words, it makes the engineering research sensitive and relevant to practical applications. For example, consider the problem of computer vision. Research in this area will involve the fundamental principles of pattern recognition, digital signal processing, image enhancement, data communication, etc. However, a computer vision system that is associated with robotics in a classical or flexible assembly line manufacturing environment would be subjected to very different environmental conditions and constraints than would a computer vision system on an all-terrain, ground-based vehicle. Integration of such fundamental research, while recognizing the interaction with the environment, lends itself to a systems approach to problem solving.

It is this broad definition of engineering systems that forms the corner stone of the Ph.D. program in systems engineering at Oakland University. The program is multi-disciplinary, drawing its strength

and resources from the entire faculty of the School of Engineering and Computer Science.

Academic program

Because of the importance of the two perspectives outlined above, the Ph.D. program in systems engineering has two major components: systems concepts and discipline-specific options. The courses in the first component provide the necessary knowledge to apply a systems approach to problem solving.

The systems concepts required for the analysis and design of continuous systems are different from those required of discrete systems. Therefore, two tracks of courses have been identified to address the systems approach to these two different classes of systems. The two sets of courses are:

Continuous Systems (12 credits)

SYS 520	Signal and Linear Systems Analysis	4
or		
ME 610	Continuum Mechanics	4
APM 541 – APM 542	Mathematical Analysis for Engineers I and II	4

Discrete Systems (12 credits)

SYS 569	Computer Simulation in Engineering	4
or		
ISE 569	Computer Simulation in Manufacturing	4
APM 563	Discrete Mathematics I	4
APM 564	Discrete Mathematics II	4
or		
APM 581	Theory of Computation	4

Every student in the systems engineering Ph.D. program is required to elect one of the above two tracks.

Once the systems approach to problem solving has been established, a student will study several specific depth areas which relate to his/her research interest. These courses provide the discipline-specific component of the Ph.D. program. The student will concentrate on at least two of these areas, the selection of which will be the concerted effort of the student and the advisory committee. Although a student is expected to specialize in either continuous systems or discrete systems, he/she may select courses from other areas as deemed appropriate.

The current discipline-specific options offered by the School of Engineering and Computer Science include:

Continuous Systems

- Optimal Control
- Numerical Techniques
- Manufacturing Processes
- Dynamic Systems
- Robotics
- Quality and Reliability
- Advanced Systems Theory
- Tribology
- Optimization and Decision Theory
- Microelectronics, VLSI
- Analog and Digital Communications
- Energy Systems
- Thermal Energy Transport
- Signal and Image Processing
- Fluid Transport
- Instrumentation and Measurement
- Experimental Stress Analysis
- Electromagnetics
- Solid Mechanics and Materials
- Intelligent and Adaptive Control
- Dynamics, Vibrations and Noise
- Digital Control
- Automotive Mechatronics

Discrete Systems

- Manufacturing Systems
- Product Systems
- Quality Control
- Computer Communications
- Computer Integrated Manufacturing
- Artificial Intelligence
- Flexible Manufacturing Systems
- Software Engineering
- Graphics and CAD/CAM
- Theory of Computing Systems
- Computer Hardware Design
- Microprocessor Systems
- Software Systems
- Parallel Processing
- Pattern Recognition
- Data Mining
- Computer Vision
- Multimedia Systems

For example, a student interested in robotics would be required to take the continuous systems track and may elect the following three discipline-specific options: robotics, dynamic systems and microprocessors. These three options not only cross the boundaries of the two classes of systems but also include courses from all three

departments within the School of Engineering and Computer Science, yet they form a cohesive and intensive research program. This multidisciplinary approach is one of the unique features of the systems engineering Ph.D. program at Oakland University.

The requirement for the Ph.D. is completion of a unified program of formal coursework, as specified above, and independent research, directed and approved by the advisory committee. While the courses and examinations for a particular student are specified by the advisory committee, all programs are subject to the following general regulations.

■ Doctor of Philosophy in Mechanical Engineering

The field of mechanical engineering includes areas such as dynamics, vibrations and noise, energy systems, automotive engineering design, thermal energy transport, fluid transport, experimental stress analysis, solid mechanics, manufacturing processes and materials, tribology, numerical techniques, optical inspection, mechanics of metal forming, and fasteners and bolted joints. The Department of Mechanical Engineering is concentrating its efforts in these areas at the Ph.D. level.

The Ph.D. program in mechanical engineering is for students who plan careers in industrial or governmental research and development laboratories or problem-oriented agencies, as well as in the academic field. Alternatively, students can choose Ph.D. program in Systems Engineering, listed above. Students can begin doctoral study on a part-time basis, availing themselves of late afternoon or evening courses while working full time in local industry. However, later phases of study and research will require full-time devotion to the program. Students must also fulfill a residency requirement.

Academic program

To fulfill the requirements of a Ph.D. in Mechanical Engineering, a student must satisfy the following coursework:

Mathematics

APM 541	Mathematical Analysis for Engineers I	4
APM 542	Mathematical Analysis for Engineers II	4

Depth areas

Select at least two depth areas from the following:

- Manufacturing Processes and Materials
- Experimental Stress Analysis
- Dynamics, Vibrations and Noise
- Automotive Engineering Design
- Energy Systems
- Thermal Energy Transport
- Fluid Transport
- Solid Mechanics
- Tribology
- Numerical Techniques
- Optical Inspection
- Mechanics of Metal Forming
- Fasteners and Bolted Joints

A listing of the courses within each depth area is available from the ME department.

The depth areas should be selected in consultation with the Advisory Committee and related to student's research interests. Students can also select graduate electives from computer science and engineering, electrical engineering, systems engineering, mathematics, chemistry and physics, after consultation with the Advisory Committee. In addition to the 56 hours of coursework, students must also complete a minimum of 24 hours of research credits. Thus, a minimum of 80 graduate credits is required for the Ph.D. in Mechanical Engineering Program.

■ General Regulations for Master's Degree Programs

Admission

The engineering programs leading to a Master of Science degree build upon the preparation acquired in a baccalaureate engineering curriculum. A bachelor's degree in physics, mathematics or other field of science may be acceptable, but a student presenting such a degree should plan to spend additional time in residence to gain proficiency in the fundamentals of engineering.

A suitable background for the program leading to the Master of Science in computer science and engineering, embedded systems, information systems engineering, or software engineering is a baccalaureate in computer science, mathematics or engineering. A degree in another field may be acceptable but remedial coursework may be required to overcome deficiencies.

Admission to the Master of Science program in engineering management requires a bachelor's degree in engineering or computer science.

Admission to master's study is selective; applicants should have an undergraduate GPA of 3.00 or better in their major area of study and in their mathematics and science courses.

Applicants should present official academic transcripts from all institutions attended and recommendations from two members of the undergraduate major department who are familiar with their accomplishments and promise. These recommendations form an important part of the admission credentials. Graduate Record Examination (GRE) scores are required for a) graduates from institutions not accredited by a regional accrediting agency, b) graduates of programs not accredited by the Engineering Accreditation Commission of the Accreditation Board of Engineering and Technology (ABET), and encouraged for c) other applicants whose credentials do not meet regular admission criteria. The TOEFL score must be submitted by applicants who are graduates of programs taught in a language other than English. Additional entrance requirements for each engineering program are listed in the appropriate department section.

Entrance classification

A graduate student is classified in one of three categories or enters as a post-baccalaureate student for pre-requisite work:

Regular status: For students who meet normal entrance requirements and who are seeking the Master of Science degree.

Conditional status: For students whose credentials do not meet criteria for regular admission and who are seeking the Master of Science degree; this category is not used to admit students who present substantially weak credentials for graduate study. Conditional status may be granted for one or more semesters; the minimum requirement for continuation in the program is a GPA of 3.00.

Special graduate status: To be admitted to special graduate status, students must submit an application for admission, submit a transcript that provides evidence of a bachelor's degree awarded, and obtain approval from the chairperson of the department which offers the classes the student plans to attend. Credits earned as a special graduate student do not apply toward the Master of Science from Oakland University unless the student is admitted to regular status and the courses are accepted as part of the Master of Science program. In addition, no more than 12 credits earned in this status can be applied toward the degree.

Special graduates desiring regular status must submit official transcripts and letters of recommendation if these were not with the original application for admission. When considering changes of status, the faculty will weigh heavily the applicant's performance at Oakland University. A 3.00 cumulative average in graduate courses is a minimal requirement.

Post-baccalaureate status: For students who have a bachelor's degree from a regionally accredited college or university and wish to enroll in undergraduate courses to prepare for an advanced degree program. Application for this type of admission should be made through the undergraduate admissions office.

Master's adviser

The progress of each regular student toward the Master of Science degree is directed by the student's adviser, who is a faculty member of the School of Engineering and Computer Science, and is assigned at time of admission. Incoming students seeking the degree are urged to discuss their proposed concentration area with their adviser or faculty members in that area. Students who wish to change their adviser can do so with the approval of the chair of their department.

Master's project or thesis

Although the master's degree requirements may be satisfied by taking only coursework, either a graduate engineering project (690) or a directed master's thesis research (691) may be included as part of the program in place of elective courses. Students choosing the thesis option (691) must select an advisory committee, which is composed of at least three faculty members from the School of Engineering and Computer Science. The selection of the committee and the plan of study must be approved by the department chair. The chair (major professor) of the advisory committee will direct and guide the research. The student must propose a research topic to the committee for approval; however, a formal presentation of the proposal is not necessary. The completed thesis must conform to university standards (see "Master's thesis/ doctoral dissertation" in the Policies and Procedures section of this catalog). At the completion of the research and its documentation, the content of the thesis must be publicly presented and defended. Successful defense of the thesis is a prerequisite for earning the research credits.

Course credit

Normally, graduate credit is awarded only for courses numbered 500 or higher. However, up to 4 credits of Oakland University senior-level (400-499) courses in the major can be approved for graduate credit by the student's adviser. With the added approval of the graduate committee of the school, an additional 4 credits of senior-level courses can also be counted toward the required 32 credits. Course credit will not be awarded for work applied toward another degree. Students who have received credit for the 400-level version of a cross-listed senior/graduate course cannot receive credit toward a graduate degree for the 500-level version of that course.

Work load and scheduling

Full-time students must register for 8 to 12 credits per semester. Graduate assistants must be full-time students and commit 20 hours per week toward their research or teaching assistantship assignment. Graduate assistants normally register for only 8 credits per semester; however, a 12-credit load can be taken with the approval of the chair of their department.

For the convenience of part-time students employed in industry, courses are arranged in late afternoon and early evening. However, these students should be aware of the very real demands of graduate studies and should keep outside work commitments and their academic load in balance.

Academic progress

The minimum satisfactory grade for graduate work is 3.0. Credit for completion of a course in a Master of Science program will be given for grades of 2.5 or above but not more than two grades may be in the range of 2.5 to 2.9. Graduate credit will not be awarded for grades below 2.5. To repeat a course, a student must have the permission of the graduate committee of the school.

All grades received as a graduate student are used in computing the GPA except that, if a course has been repeated, the most recent grade is used in the calculation of the GPA. A graduate student is placed on academic probation if the student's overall GPA drops below 3.00 or if the student receives more than one grade below 3.0, including the original grade(s) of any repeated course(s). A graduate student receiving a grade less than 3.0 while on probation is subject to dismissal. A graduate student receiving more than two grades below 3.0 is subject to dismissal whether or not the student was put on probation previously.

In all programs the minimum grade point requirement is an average of at least 3.00. If a student's GPA is less than 3.00 after having attempted 16 credits, the student will be recommended for dismissal from the program.

■ General Master of Science degree requirements

To fulfill the requirements for a Master of Science degree in electrical and computer engineering, mechanical engineering or systems engineering programs, a student must:

1. Complete at least 32 credits of graduate-level work, of which at least 24 credits must be in approved courses offered by the School of Engineering and Computer Science.
2. Earn a cumulative GPA of at least 3.00 in courses applied toward the degree.
3. Complete the requirements specified for the program in electrical and computer engineering, mechanical engineering or systems engineering.
4. Satisfy all requirements concerning academic progress (see "Academic progress" under the General Regulations for Master's Degree Programs in the School of Engineering and Computer Science section of this catalog).

Approval by the master's degree adviser and the department chair is required for independent study, engineering projects, master's thesis or special topics courses that are used toward the degree. In addition, approval of the faculty administering the independent study, advising the thesis or project, or teaching the special topics course must be obtained before registering for these credits. No more than 8 thesis or project credits may be used toward the degree requirements. The completed thesis must conform to university standards (see "Master's thesis/doctoral dissertation" in the Policies and Procedures section of this catalog).

The degree requirements may be satisfied by taking only coursework. However, a graduate engineering project (690) or master's thesis research (691) provides a unique and valuable learning experience in which an individual student works with a faculty member in an area of mutual interest. Therefore, students are encouraged to include such an experience, as their program permits.

■ Master of Science Degree in Electrical and Computer Engineering

In addition to the general degree requirements, a student must fulfill the following program requirements to be awarded the Master of Science in electrical and computer engineering:

Total credits required for degree (32 credits)	
credits of theory courses	4-8
credits of required courses	16
credits of elective courses	8-12

Theory courses (4-8 credits)

APM 541	Mathematical Analysis for Engineers I	4
APM 542	Mathematical Analysis for Engineers II	4
APM 563	Applied Mathematics: Discrete Methods I	4
MTH 555	Complex Analysis	4
SYS 520	Signal and Linear Systems Analysis	4
EE 533	Random Signals and Processes	4

Required courses (16 credits)

Select three from the following:

EE 525	Instrumentation and Measurements	4
EE 534	Principles of Digital Communications	4
EE 537	Digital Signal Processing	4
EE 545	Electromagnetic Engineering	4
EE 585	VLSI Circuits and System Design of Digital Chips	4
SYS 520	Signal and Linear Systems Analysis	4

and one of the following:

CSE 564*	Computer Organization and Architecture	4
CSE 570*	Microprocessor-based Systems Design	4
CSE 571	Design of Embedded Software Computer Systems	4

Electives (8-12 credits)**

Students with specialized interests should consider choosing 8-12 credits of electives within one of the five depth areas listed below:

1. Communications

EE 527	High-Frequency Electronics	4
EE 533	Random Signals and Processes	4
EE 534	Principles of Digital Communications	4
EE 537	Digital Signal Processing	4
EE 545	Electromagnetic Engineering	4
EE 550	Satellite-based Positioning Systems	4
EE 632	Wireless Communications	4
EE 633	Signal Detection and Estimation Theory	4
EE 635	Modulation and Coding	4
EE 638	Digital Image Processing	4
EE 639	Advanced Digital Signal Processing	4

With approval:

EE	594, 595, 690, 691, 795
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2. Computers

EE 570*	Microprocessor-based Systems Design	4
EE 572	Microcomputer-based Control Systems	4
EE 581	Integrated Circuits and Devices	4
EE 585	VLSI Circuits and System Design of Digital Chips	4
CSE 564*	Computer Organization and Architecture	4
CSE 571	Design of Embedded Software Computer Systems	4
SYS 569*	Computer Simulation in Engineering	4
SYS 674	Digital Control Systems	4

With approval:

EE	594, 595, 690, 691, 795
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3. Controls

EE 525	Instrumentation and Measurements	4
EE 572*	Microcomputer-based Control Systems	4
EE 575*	Automotive Mechatronics I	4
EE 675	Automotive Mechatronics II	4
SYS 520	Signal and Linear Systems Analysis	4
SYS 630	Optimal Control Theory	4
SYS 631	Estimation and Control Theory	4
SYS 632	Analysis of Nonlinear Control Systems	4
	Control Systems	4
SYS 674	Digital Control Systems	4

With approval:

EE	594, 595, 690, 691, 795
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4. Electronics

EE 527	High-Frequency Electronics	4
EE 575*	Automotive Mechatronics I	4
EE 581	Integrated Circuits and Devices	4
EE 585*	VLSI Circuits and System Design of Digital Chips	4
EE 587*	Integrated Electronics	4
EE 625	Applications of Analog Integrated Circuits	4
EE 675	Automotive Mechatronics II	4
EE 682	Field-Effect Devices	4
EE 683	Advanced VLSI Analog/Digital Systems Design	4

With approval:

EE	594, 595, 690, 691, 795
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5. Energy

EE 525	Instrumentation and Measurements	4
SYS 520	Signal and Linear Systems Analysis	4
SYS 557	Energy Conservation Systems	4
SYS 558*	Electrical Energy Systems	4
SYS 721	Large-Scale Dynamic Systems	4
With approval:		
EE	594, 595, 690, 691, 795	

6. Option (with adviser consultation)

Students not interested in any one of the above depth areas are expected to consult with their adviser in selection of 8-12 credits of electives either from those listed under required courses or depth areas above and/or from the following:

EE	567, 620, 725,
SYS	510, 563*, 623, 722, 731, ISE 664
CSE	513, 547*, 571
PHY	562, 574, 583, 632, 673
EE	594, 595, 690, 691, 795
With approval:	
EE	594, 595, 690, 691, 795

Thesis Option

Students electing this option must accumulate a minimum of 8 credits of EE 691. Successful completion and defense of a thesis is a prerequisite for earning thesis credits. All theses must conform to university standards (see "Master's thesis/doctoral dissertation" in the Policies and Procedures section of this catalog).

*These courses are cross-listed as advanced undergraduate and graduate courses. If completed as a 400-level course or equivalent as part of baccalaureate degree, the course may be used to offset graduate program requirements. However, credit will not then be awarded and must be earned by completion of an approved substitute course.

** Other electives that are appropriate to the student's plan of study require prior approval of the faculty adviser and the department chair.

■ Master of Science Degree in Mechanical Engineering

In addition to the general degree requirements, a student must fulfill the following program requirements to be awarded the Master of Science in mechanical engineering:

Theory Courses (4 credits)

Select one of the following:

APM 541	Mathematical Analysis for Engineers I	4
APM 542	Mathematical Analysis for Engineers II	4
ME 539	Computational Fluid Dynamics	4
ME 549	Numerical Techniques in Heat Transfer and Fluid Flow	4
ME 569	Finite Elements	4

Students must take the theory course before completing 12 credits of their MS coursework.

Plus select one of the five options described below:**1. Engineering Mechanics Option****Required course (4 credits)**

ME 521	Dynamics	4
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Depth areas (16 credits)

Select two courses from each of the following depth areas:

a. Solid Mechanics

ME 563	Applied Elasticity	4
and one of the following:		
ME 522	Mechanical Vibrations	4
ME 523*	Acoustics and Noise Control	4
ME 562	Fatigue Analysis and Design	4
ME 564	Mechanics of Composite Materials	4
ME 569	Finite Elements	4
ME 571	Theory of Plasticity	4
ME 578	Mechanics of Metal Forming	4
ME 624	Vibration Analysis	4
ME 669	Advanced Finite Elements	4

b. Experimental Mechanics

ME 565	Experimental Stress Analysis	4
and one of the following:		
ME 567*	Optical Measurement and Quality Inspection	4
ME 665	Optical Methods in Experimental Mechanics	4

Electives (8 credits)**

Select 8 credits from:

ME	478, 561*, 572*, 574*, 575* or any other ME courses with level 500 and above;
SYS	510, 520, 630
ISE	684
With approval:	
ME	594, 595, 690, 691, 795
TOTAL CREDITS:	32

2. Fluid and Thermal Systems Option**Required course (4 credits)**

ME 582*	Fluid and Thermal Energy Systems	4
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Depth areas (16 credits)

Select two courses each from any two of the following depth areas:

a. Energy Systems

ME 554*	Solar and Alternate Energy Systems	4
ME 555	Combustion Processes	4

b. Thermal Energy Transport

ME 548 *	Thermal Energy Transport	4
ME 549*	Numerical Techniques in Heat Transfer and Fluid Flow	4
ME 648	Thermal Transport Phenomena	4

c. Fluid Transport

ME 538*	Fluid Transport	4
ME 539*	Computational Fluid Dynamics	4
ME 638	Convective Transport Phenomena	4

Electives (8 credits)**

Select 8 credits from:

ME	478, 550*, 557*, 639, 657; courses from remaining depth area above, or any other ME courses with level 500 and above
SYS	510, 520, 630
ISE	684
With approval:	
ME	594, 595, 690, 691, 795
TOTAL CREDITS:	32

3. Manufacturing Processes Option**Required course (4 credits)**

ME 572*	Material Properties and Processes	4
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Depth areas (16 credits)

Select two courses each from any two of the following depth areas:

a. Materials and Manufacturing Processes

ME 564	Mechanics of Composite Materials	4
ME 571	Theory of Plasticity	4
ME 574*	Manufacturing Processes	4
ME 575*	Lubrication, Friction and Wear	4
ME 578	Mechanics of Metal Forming	4
ME 589	Fasteners and Bolted Joints	4
ME 674	Machining Processes	4
ME 675	Advanced Tribology	4
ME 678	Advanced Metal Forming	4

b. Computer-Aided Engineering/Inspection

ME 567*	Optical Measurement and Quality Inspection	4
ME 569	Finite Elements	4
ME 576*	Product and Process Development	4
ME 577*	Concurrent Engineering	4
ME 586	Reliability Methods in Engineering Design	4
ME 587*	Mechanical Computer-Aided Engineering	4
ME 588	Mechanical Computer-Aided Manufacturing	4
ME 669	Advanced Finite Elements	4

c. Plastics and Composites Manufacturing Engineering

ME 543	Polymeric Materials	4
ME 544*	Plastics Processing Engineering	4
ME 545*	Plastics Product Design	4

Electives (8 credits)**

Select 8 credits from:

ME	478, 521, 624, 561*, 563, 565, 569, 610, 665, or any other ME courses with level 500 and above
SYS	510, 520, 630
ISE	517, 583*, 585*, 684
With approval:	
ME	594, 595, 690, 691, 795
TOTAL CREDITS:	32

4. Automotive Engineering Option**Required course (4 credits)**

Select one of the following:

ME 521	Dynamics	4
ME 572*	Material Properties and Processes	4
ME 557*	Internal Combustion Engines I	4

Depth areas (16 credits)

Select at least two courses from each of the following depth areas:

a. Automotive Engineering Design

ME 584*	Automotive Engineering Design I	4
and one of the following:		
ME 522	Mechanical Vibrations	4
ME 523*	Acoustics and Noise Control	4
ME 539*	Computational Fluid Dynamics	4
ME 562	Fatigue Analysis and Design	4
ME 565	Experimental Stress Analysis	4
ME 567	Optical Measurement and Quality Inspection	4
ME 586	Reliability Methods in Engineering Design	4
ME 624	Vibration Analysis	4
ME 684	Automotive Engineering Design II	4

b. Internal Combustion Engines

ME 557*	Internal combustion Engines I (Mandatory if not taken as a required course)	4
ME 548*	Thermal Energy Transport	4
ME 555	Combustion Processes	4
ME 559	Advanced Automotive Propulsion Systems	4
ME 575*	Lubrication, Friction and Wear	4
ME 657	Internal Combustion Engines II	4

Electives (8 credits)**

Select credits from:

ME	Any courses with level 500 and above,
EE	473, CSE 571, SYS 520
With approval:	
ME	594, 595, 690, 691, 795
TOTAL CREDITS:	32

5. General Mechanical Engineering Option**Required course (4 credits)**

Select one of:

ME 521	Dynamics	4
ME 572*	Material Properties and Processes	4
ME 582*	Fluid and Thermal Energy Systems	4

Depth areas (16 credits)

Select two courses each from any two of the depth areas listed under options 1, 2, 3 or 4 above.

Electives (8 credits)**

Select 8 credits from:

ME	Any courses with level 500 and above,
EE/SYS/ CSE	Any elective courses listed under options 1, 2, 3 or 4 above
With approval:	
ME	594, 595, 690, 691, 795
TOTAL CREDITS:	32

Thesis option

Students electing this option must accumulate a minimum of 8 credits of ME 691. Successful completion and defense of a thesis is a prerequisite for earning thesis credits. All theses must conform to university standards (see "Master's thesis/doctoral dissertation" in the Policies and Procedures section of this catalog).

*These courses are cross-listed as advanced undergraduate and graduate courses. If completed as a 400-level course or equivalent as part of baccalaureate degree, the course may be used to offset graduate program requirements. However, credit will not then be awarded and must be earned by completion of an approved substitute course.

**Other electives in engineering, mathematics, physics or chemistry that are appropriate to the student's plan of study require prior approval of the faculty adviser and the department chair.

■ Master of Science Degree in Systems Engineering

The Master of Science program in systems engineering is designed to prepare students for significant engineering-related careers in industry as well as simultaneously for further graduate study. Admission is open to students with a bachelor's degree in any engineering discipline. The program has five distinct options. The dynamic systems and control engineering option and the robotics engineering option are administered by the Electrical and Systems Engineering Department. The industrial and systems engineering option is administered by the Industrial and Systems Engineering Department. The remaining two options, system modeling and computer simulation, and general systems engineering are jointly administered by the ESE and ISE departments.

A student in the Master of Science in systems engineering program is required to select one of five options, as well as one of its associated depth areas. The five options are:

1. Dynamic systems and control engineering
2. Industrial and systems engineering
3. Robotic systems engineering
4. System modeling and computer simulation
5. General systems engineering

In addition to the general degree requirements, a student must fulfill the program requirements for one of the options to be awarded the Master of Science in systems engineering.

1. Dynamic Systems and Control Engineering Option

Theory courses (4 to 8 credits)

APM 541	Mathematical Analysis for Engineers I	4
APM 542	Mathematical Analysis for Engineers II	4
APM 553	Advanced Ordinary Differential Equations	4
MTH 555	Complex Analysis	4
SYS 520	Signal and Linear Systems Analysis	4
EE 533	Random Signals and Processes	4

Required courses (12 to 16 credits)

Students are required to select at least three courses from:

SYS 520	Signal and Linear Systems Analysis	4
SYS 630	Optimal Control Theory	4
SYS 631	Estimation and Control Theory	4
SYS 674	Digital Control Systems	4

Depth areas (8 to 16 credits)

A student is required to take at least two courses from one of the following depth areas. Students may take more than one depth area. (*Depth area courses are listed at the end of this section.*)

- Advanced Control Systems
- Robotic Systems
- Intelligent Systems
- Dynamic Systems
- Nonlinear Systems
- Microprocessor Control Systems
- Optimization of Systems

Electives** (0 to 8 credits)

Additional credits may be taken from the following electives or the student may select the M.S. thesis option described below:

SYS	Any course with level 500 and above	
CSE	512, 513, 516, 545, 550*, 571	
EE	525, 533, 567, 570*, 572*, 585*, 625, 537, 638, 683	
ME	521, 569, 572*, 574*	
PHY	562	
With approval:		
SYS	594, 595, 690, 691, 795	
TOTAL CREDITS:		32

2. Industrial and Systems Engineering Option

(A proposal for a Master of Science in industrial and systems engineering degree program will be presented to Graduate Council during the 2005-2006 academic year.)

Theory courses: (4 to 8 credits)

APM 563	Applied Mathematics: Discrete Methods I	4
MOR 554	Mathematical Programming	4
SYS 510	Systems Optimization and Design	4
ISE 517	Probability and its Engineering Applications	4

Required courses (12 to 16 credits)

Students are required to select at least three courses from:

ISE 583*	Production Systems	4
ISE 585*	Statistical Quality Control	4
ISE 587	Foundations of Systems Engineering	4
ISE 684	Computer Integrated Manufacturing Systems	4

Depth areas (4 to 16 credits)

A student is required to take at least two of the depth area courses listed below. If a student takes all four of the required courses listed above, then they only have to take at least one course from this depth area list.

(*Depth area courses are listed at the end of this section.*)

ISE 512	Artificial Intelligence in Manufacturing	4
ISE 569	Computer Simulation in Manufacturing	4
ISE 577	Concurrent Engineering	4
ISE 581	Lean Principles and Application	4
ISE 580	E-Commerce and ERP	4
ISE 664	Advanced Computer-aided Design	4
ISE 680	Engineering Decision Analysis	4
ME 572	Material Properties and Processes	4
ME 574	Manufacturing Processes	4

Electives (0 to 8 credits)**

Additional credits may be taken from the following electives or the student may select the M.S. thesis option (see listing below).

ISE 422	Robotic Systems	4
ISE 484	Flexible Manufacturing Systems	4
ISE	Any course level 500 or above	
CSE, EE, ME, SYS	Any course level 500 or above (Satisfaction of the prerequisites for any course in this list will depend upon the engineering discipline of the student's B.S. degree.)	
With approval:		
ISE	594, 595, 690, 691, 795	
TOTAL CREDITS:	32	

3. Robotics Systems Engineering Option

Theory courses: (4 to 8 credits)

APM 541	Mathematical Analysis for Engineers I	4
APM 542	Mathematical Analysis for Engineers II	4
APM 553	Advanced Ordinary Differential Equations	4
APM 565	Differential Geometry	4
SYS 510	Systems Optimization and Design	4
SYS 520	Signal and Linear Systems Analysis	4

Required courses (12 to 16 credits)

Students are required to select at least three courses from:

SYS 520	Signal and Linear System Analysis	4
SYS 575*	Automotive Mechatronics I	4
SYS 623	Dynamics and Control of Robot Manipulators	4
SYS 632	Analysis of Nonlinear Control Systems	4

Depth areas (8 to 16 credits)

A student is required to take at least two courses from one of the following depth areas:

(*Depth area courses are listed at the end of this section.*)

- Computer Systems
- Dynamic Systems
- Intelligent Systems
- Linear Control Systems
- Microprocessor Control Systems
- Nonlinear Systems
- Optimization of Systems

Electives (0 to 8 credits)**

Additional credits may be taken from the following electives or the student may select the M.S. thesis option (see listing below).

SYS	Any course with level 500 and above	
CSE	512, 513, 516, 545, 550*, 571	
EE	527, 533, 567, 570*, 572*, 585*, 625, 537, 638, 683	
ME	521, 569, 572*, 574*	
PHY	562	
With approval:		
SYS	594, 595, 690, 691, 795	
TOTAL CREDITS:	32	

4. Systems Modeling and Computer Simulation Option

Theory courses (4 to 8 credits)

APM 541	Mathematical Analysis for Engineers I	4
APM 542	Mathematical Analysis for Engineers II	(each)
APM 553	Advanced Ordinary Differential Equations	4
APM 565	Differential Geometry	4
SYS 510	Systems Optimization and Design	4
ISE 517	Probability and Its Engineering Applications	4
SYS 520	Signal and Linear Systems Analysis	4

Required courses (12 to 16 credits)

Students are required to select at least three courses from:

SYS 520	Signal and Linear Systems Analysis	4
SYS 563*	Foundation of Computer-aided Design	4
SYS 569*	Computer Simulation in Engineering	4
or		
ISE 569*	Computer Simulation in Engineering	4
ISE 587*	Foundations of Systems Engineering	4

Depth areas (8 to 16 credits)

A student is required to take at least two courses from one of the following depth areas.

(*Depth area courses are listed at the end of this section.*)

- Dynamic Systems
- Industrial Systems
- Linear Systems
- Manufacturing Systems
- Mechanical Systems
- Modeling of Manufacturing Systems
- Nonlinear Systems
- Optimization of Systems
- Robotic Systems
- Stochastic Systems

Electives (0 to 8 credits)**

Additional credits may be taken from the following electives or the student may select the M.S. thesis option

ISE	Any course with level 500 and above
SYS	Any course with level 500 and above
CSE	513, 516, 545, 550*, 571
EE	527, 533, 567, 570*, 572*, 585*, 625, 537, 638, 683
ME	521, 569, 572*, 574*
PHY	562
With approval:	
SYS	594, 595, 690, 691, 795
TOTAL CREDITS:	32

5. General Systems Engineering Option**Mathematics (4 to 8 credits)**

APM 541	Mathematical Analysis for Engineers I and II	4 (each)
APM 553	Advanced Ordinary Differential Equations	4
APM 563	Applied Mathematics: Discrete Models I	4
APM 565	Differential Geometry	4
MOR 554	Mathematical Programming	4
MTH 555	Complex Analysis	4

Required courses (12 to 16 credits)

Students are required to select at least three courses from:

SYS 510	Systems Optimization and Design	4
SYS 569*	Computer Simulation in Engineering	4
Or		
ISE 569*	Computer Simulation in Engineering	4
SYS 587*	Foundations of Systems Engineering	4
SYS 680	Engineering Decision Analysis	4

Depth areas (8 to 16 credits)

A student is required to take at least two courses from one of the following depth areas.

(*Depth area courses are listed at the end of this section.*)

- Computer Systems
- Dynamic Systems
- Electrical Systems
- Industrial Systems
- Intelligent Systems
- Linear Control Systems
- Manufacturing Process Systems
- Manufacturing Systems
- Mechanical Systems
- Modeling of Manufacturing Systems
- Nonlinear Systems
- Optimization of Systems
- Robotic Systems
- Stochastic Systems

Electives (0 to 8 credits)**

Additional credits may be taken from the following electives or the student may select the M.S. thesis option.

ISE	Any course with level 500 and above
SYS	Any course with level 500 and above
CSE	513, 516, 545, 550*, 565, 571
EE	525, 533, 567, 570*, 572*, 585*, 625, 537, 638, 683
ME	521, 569, 572*, 574*
PHY	562
With approval:	
SYS	594, 595, 690, 691, 795
TOTAL CREDITS:	32

Systems Engineering Depth Areas

The student must select at least two courses from one of the following depth areas associated with their option, above.

Advanced Control Systems:	SYS 632, SYS 635, SYS 735
Computer Systems:	SYS 563*, EE 567, EE 570*, EE 572*, EE 585*
Dynamic Systems:	SYS 520, SYS 575*, SYS 675, EE 525, ME 521
Electrical Systems:	EE 525, EE 570*, EE 572*, EE 585*, EE 537, EE 638, EE 683
Intelligent Systems:	SYS 635, SYS 735, ISE 512*, CSE 516*
Linear Control Systems:	SYS 433, SYS 520, SYS 575*, SYS 630, SYS 675
Mechanical Systems:	ISE 422 or EE 422, SYS 575*, SYS 623, SYS 675, ME 521
Microprocessor Control Systems:	SYS 674, EE 525, EE 570*, EE 572*
Nonlinear Systems:	SYS 510, SYS 623, SYS 632, SYS 635
Optimization of Systems:	SYS 510, SYS 630, SYS 631, CSE 513
Robotic Systems:	ISE 422 or EE 422, SYS 575*, SYS 623, SYS 675, EE 525
Stochastic Systems:	ISE 517, SYS 585*, SYS 631, EE 533

*These courses are cross-listed as advanced undergraduate and graduate courses. If completed as a 400-level course or equivalent as part of a baccalaureate degree, the course may be used to offset graduate program requirements. However, credit will not then be awarded and must be earned by completion of an approved substitute course.

**Other electives that are appropriate to the student's plan of study require prior approval of the faculty adviser and department chair.

Thesis option

Students electing a thesis option must accumulate a minimum of 8 credits of SYS 691 or ISE 691, depending on the systems engineering option selected. Successful completion and defense of a thesis is a prerequisite for earning thesis credits. All theses must conform to university standards (see "Master's thesis/doctoral dissertation" in the Policies and Procedures section of this catalog).

■ Master of Science Degrees in

- Computer Science and Engineering**
- Embedded Systems**
- Information Systems Engineering**
- Software Engineering**

The Master of Science programs in computer science and engineering, embedded systems, information systems engineering, and software engineering are designed to prepare students for significant computer-related careers in business and industry and simultaneously for further graduate study. The Master of Science program in computer science and engineering offers a natural continuation of studies for students who have received a baccalaureate in computer engineering or computer science. Similarly, the Master of Science program in software engineering offers a natural continuation of studies for students who have received a baccalaureate degree in computer science. It is designed to enhance the skills of students already engaged in software engineering careers in business and industry. Consequently, the students concentrate almost exclusively on mastering and applying the theories and methodologies of software engineering with a high level of skill. The advanced level prerequisite courses CSE 0505-0508 afford an opportunity for students with strong academic or professional records in related fields to prepare for graduate studies in the above graduate programs in minimal time.

The Master of Science program in information systems engineering is primarily aimed at individuals who want to focus on building or managing information systems. It strives to provide a more practice-oriented course setting. The Master of Science program in embedded systems is a specialized program with focus on gaining specialized knowledge related to the design and development of embedded systems.

Admission requirements

- B.S. in Computer Science (CS) or Computer Engineering (CE). Applicants from other disciplines would be considered after successfully completing appropriate prerequisite courses.
- Grade point average of 3.00 or better
- Official GRE scores are required of applicants having the qualifying degree from an institution not regionally accredited
- Official TOEFL scores are required of graduates of programs taught in a language other than English.

Additionally, the applicants seeking admission in Software Engineering should have two years of software development experience.

Computer Science and Engineering requirements

A total of 32 credits of graduate coursework are required which must satisfy the core, depth and breadth requirements as given below.

- Core requirement: Must complete three courses from common core. One of the courses must be from theory core consisting of CSE 510, CSE 561, APM 577 and APM 581. (12 credits)
- Depth requirement: Must complete master's thesis or two courses, one of which must be at 600/700 level, from one of the specialty groups. (8 credits)
- Breadth requirement: Must complete one course each from at least two specialty groups (other than the depth group). (8 credit hours)
- Elective: Select any CSE course numbered 510 and above. (4 credits)

Total: 32 credits

Software Engineering requirements

A total of 32 credits of graduate coursework are required which must satisfy the core and depth requirements as given below.

- Core requirement: Must complete CSE 510, CSE 539 and CSE 522 from the common core. Students having the knowledge equivalent to these courses may substitute other courses from the common core. (12 credit hours)
- Breadth requirement: Must do a course from one of the non-software engineering specialty groups. (4 credit hours)
- Depth requirement: Must complete remaining courses from the software engineering group, which could include 8 credits of thesis (CSE 691). (16 credit hours)

Total: 32 credits

Embedded Systems requirements

- Core requirement: Must complete CSE 547, CSE 550 and CSE 564 from the common core. (12 credits)
- Breadth requirement: Must do a course from one of the non-embedded system specialty groups. (4 credits)
- Depth requirement: Must complete remaining courses from the embedded system group, which could include 8 credits of thesis (CSE 691). (16 credits)

Total: 32 credits

Information Systems requirements

- Core requirement: Must complete CSE 547 or CSE 550, CSE 545 and CSE 551 from the common core. (12 credits)
- Breadth requirement: Must do a course from one of the non-information systems engineering specialty groups. (4 credits)
- Depth requirement: Must complete remaining courses from the information systems engineering group, which could include 8 credits of thesis (CSE 691). (16 credits)

Total: 32 credits

500- to 700-level courses

The following is the complete list of 500- to 700-level courses offered by the department. The prerequisite courses do not give any graduate credit. These are meant for students lacking sufficient background in computer science and engineering. Please consult the degree requirements to see how best to choose courses for your program of study.

Note: Courses listed under miscellaneous do not form a specialty group.

Prerequisite courses

CSE 0505	Object Oriented Computing I	4
CSE 0506	Object Oriented Computing II	4
CSE 0507	Design and Analysis of Algorithms	4
CSE 0508	Computer Hardware Design	4

Core courses

CSE 510	Fundamentals of SE Modeling	4
CSE 522	Object Oriented Analysis and Design	4
CSE 535	Topics in Programming Languages	4
CSE 539	Software Engineering	4
CSE 545	Database Systems I	4
CSE 547	Computer Communications	4
CSE 550	Operating Systems	4
CSE 551	Web Design and Applications	4
CSE 561	Advanced Data Structures and Algorithms	4
CSE 564	Computer Organization and Architecture	4

Speciality Group Courses

Networking and Systems Group

CSE 549	Multimedia and Networks	4
CSE 647	Advanced Computer Communications	4
CSE 650	Distributed Systems	4
CSE 664	Parallel and Distributed Processing	4
CSE 666	Real-time Computer Systems	4

Embedded Systems Group

CSE 570	Microprocessor-based System Design	4
CSE 571	Design of Embedded Software Computer Systems	4
CSE 666	Real-time Computer Systems	4
CSE 670	Embedded Systems Design Using FPGAs	4
CSE 671	DSP in Embedded Systems	4
CSE 672	Hardware/Software Co-Design in Embedded Systems	4

Information System Engineering Group

CSE 542	Rapid Prototyping and Component Software	4
CSE 581	Data Mining and Knowledge Discovery	4
CSE 582	Information Retrieval	4
CSE 583	E-Commerce and ERP	4
CSE 645	Database Systems II	4
CSE 681	Information Security	4

Software Engineering Group

CSE 521	Software Requirements Engineering	4
CSE 537	Systematic Software Development	4
CSE 538	Software Verification and Testing	4
CSE 540	Software Quality Assurance	4
CSE 541	Software Project Planning and Management	4
CSE 639	Software Maintenance and Reuse	4
CSE 640	Software Architecture	4

Intelligent Computing Group

CSE 512	Artificial Intelligence in Manufacturing	4
CSE 513	Soft Computing	4
CSE 516	Artificial Intelligence	4
CSE 517	Agent-Based Systems	4
CSE 555	Computer Graphics I	4
CSE 556	Computer Graphics II	4
CSE 616	Applied Pattern Recognition	4
CSE 618	Visual Computing	4
CSE 718	Advanced Visual Computing	4

Miscellaneous

CSE 594	Independent Study	2 to 4
CSE 595	Special Topics	2 to 4
CSE 690	Graduate Computer Science and Engineering Project	2 to 4
CSE 691	Master's Thesis Research	2 to 8
CSE 794	Independent Study	2 to 4
CSE 795	Special Topics	2 to 4

Thesis option

Students electing this option must accumulate a minimum of 8 credits of CSE 691. Successful completion and defense of a thesis is a prerequisite for earning these credits. All theses must conform to university standards (see "Master's thesis/doctoral dissertation" in the Policies and Procedures section of this catalog).

■ Master of Science in Engineering Management

The Master of Science program in engineering management is offered by the School of Engineering and Computer Science in cooperation with the School of Business Administration. Intended for students with a bachelor's degree in engineering or computer science, the program has as its goal the provision of the tools and skills necessary for making sound management decisions in industry and business while retaining one's commitment to a specialized field of endeavor. Applicants with a computer science background may be required to take remedial courses in engineering.

To be awarded the Master of Science degree in engineering management the student must:

1. Successfully complete a minimum of 42-43 credits of graduate level work as specified below.
2. Earn a grade point average of at least 3.00 in courses applied toward the degree.
3. Satisfy all requirements concerning "Academic Progress." See under the General Regulations for Master's Degree Programs in the School of Engineering and Computer Science section of this catalog.

Theory courses (select 4 credits)

MOR 554	Mathematical Programming	4
STA 501	Statistical Methods in Research and Production	4
STA 503	Design and Analysis of Industrial Experiments	4
ISE 517	Probability and Its Engineering Applications	4

Required core (select 12 credits)

SYS 510	Systems Optimization and Design	4
ISE 569*	Computer Simulation in Manufacturing	4
ISE 585*	Statistical Quality Control	4
ISE 680	Engineering Decision Analysis	4
ISE 684	Computer-Integrated Manufacturing Systems	4

Group A (select 8 credits)

Choose two 500- and/or 600-level courses, in one discipline only, from SYS, EE, ME or CSE (excluding CSE 0505, 0506, 0507, and 0508)

Group B (select 15 credits)

ACC 511	Financial Accounting	3
ECN 521	Economics for Managers	3
FIN 533	Financial Management	3
MIS 524	Enterprise Information Systems	3
MKT 560	Marketing Management	3
ORG 530	Organizational Behavior	3
POM 521	Operations Management	3

Group C (select 3 to 4 credits)**

ACC 512	Managerial Accounting Systems	3
MGT 550	Legal Environment of Business	3
MIS 525	Business Process Innovation and Management	3
ORG 631	Human Resources Management	3
CSE 545*	Database Systems	4
ISE 581	Lean Principles and Applications	4
ISE 583*	Production Systems	4
ISE 587	Foundations of Systems Engineering	4

TOTAL CREDITS: **42-43**

* These courses are cross-listed as advanced undergraduate and graduate courses. If completed as a 400-level course or equivalent as part of baccalaureate degree, the course may be used to offset graduation program requirements. However, credit will not then be awarded and must be earned by completion of an approved substitute course.

** Some of the courses in this group may serve as prerequisites for above courses.

SCHOOL OF HEALTH SCIENCES

363 Hannah Hall • (248) 370-3562 • Fax (248) 370-4227
<http://www.acs.oakland.edu/shs/programs/programs.htm>

Dean

Kenneth R. Hightower

Assistant dean

Ronald M. Mattei

General information

The School of Health Sciences offers degree and graduate certificate programs in health and medically-related fields. Master of Science degrees are offered in exercise science and physical therapy. An entry-level doctor of physical therapy degree (DPT) and a post-professional doctor of science in physical therapy degree (DScPT) for those who are already licensed physical therapists are also offered. Four non-degree graduate certificate programs are offered through the exercise science program, including graduate certificates in clinical exercise science, complementary medicine and wellness, corporate and worksite wellness and exercise science. Non-degree graduate certificates in orthopedic manual physical therapy, pediatric rehabilitation, orthopedics, teaching and learning for rehabilitation professionals and neurological rehabilitation are offered through the physical therapy program to physical therapists, occupational therapists and other rehabilitation professionals who have acquired clinical experience following their entry-level professional preparation. Finally, a number of graduate-level courses are offered through the school's program in occupational safety and health for students who wish to enroll on a non-degree basis or who may be able to apply these courses as electives to a graduate degree in a related field.

Continuing professional education is offered by the School of Health Sciences in order to meet the educational needs of health science professionals. Specialized contract programs are also provided to meet the unique professional staff development needs of employers in the health care setting, business and industry, government and other settings. Programs are individually tailored to meet the specific workplace needs of professionals and employers. Programs and courses are offered either for university credit or noncredit. When noncredit programs and courses are offered they carry the nationally recognized Continuing Education Unit (CEU).

Admission to any program offered by the School of Health Sciences may be considered on a competitive basis if the balance between applicants and available instructional resources requires such action to maintain the academic integrity of the program.

■ Exercise Science Program

<http://www.acs.oakland.edu/shs/programs/exs/index.htm>

Director:

Brian R. Goslin

Professor emeritus:

Alfred W. Stransky, Ph.D., Florida State University

Professor:

Robert W. Jarski, Ph.D., University of Iowa

Associate professors:

Brian R. Goslin, Ph.D., Rhodes University (South Africa)
 Charles R.C. Marks, Ph.D., University of Michigan

Clinical professors:

Barry A. Franklin, Ph.D., Pennsylvania State University
 Murray B. Levin, M.D., Wayne State University
 Steven J. Keteyian, Ph.D., Wayne State University
 Augustine L. Perrotta, D.O., Chicago College of Osteopathic Medicine

Clinical associate professors:

John F. Kazmierski, D.O., College of Osteopathic Medicine and Surgery, Des Moines, Iowa
 Creagh E. Milford, D.O., Chicago College of Osteopathic Medicine
 Rajendra Prasad, M.D., Prince of Wales Medical College (India)

Clinical assistant professors:

Patricia Brooks, M.D., Michigan State University
 Roger Byrd, D.O., Chicago College of Osteopathic Medicine
 Jeffrey H. Declaire, M.D., University of Michigan
 Mario J. C. DeMeireles, M.D., University of Michigan
 Albert A. DePolo, Jr., D.O., Philadelphia College of Osteopathic Medicine
 Scott W. Eathorn, M.D., Wayne State University
 Johnathon Ehrman, Ph.D., Ohio State University
 Roland Gerhard, D.O., Chicago College of Osteopathic Medicine
 William E. Hill, M.D., Howard University
 Victoria Kimler, Ph.D., Wayne State University
 Andrew J. Madak, D.O., Michigan State University
 Chandra S. Reddy, M.D., Osmania Medical College (India)
 Hans J. Stein, M.D., Wayne State University

Adjunct assistant professor:

Jack T. Wilson, Ph.D., University of Northern Colorado

Clinical instructors:

Mary Ann Cukr, M.S., Oakland University
 Nancy S. Kennedy, M.S., Oakland University
 Sheldon D. Levine, M.S.A., Central Michigan University

■ Master of Science in Exercise Science

This interdisciplinary program emphasizes the role of exercise in health improvement and in the primary and secondary prevention of chronic degenerative disease. The curriculum addresses the inter-relationships among life-style, health and physical activity and optimization of human performance. Clinical experience is gained through cooperating internship sites. Graduates of the program are prepared for professional positions such as: cardiac stress testing specialists, exercise specialists in medical settings, sport scientists, and directors of adult fitness programs, cardiac rehabilitation programs, and health maintenance/health improvement programs in corporate, industrial and educational settings.

Full-time students complete the degree in 18 to 24 months. Part-time students usually require 3 to 4 years, depending on the number of credits taken per year. All courses are available in the evening and several are offered in a concentrated weekend "executive style" format.

Admission

An applicant for admission to the Master of Science in exercise science program should have: (a) a bachelor's degree from a regionally accredited school with an undergraduate cumulative grade point average of 3.00 or above, (b) a strong background in basic and applied health sciences, and (c) completed the following prerequisite courses: human anatomy, physiology, exercise physiology, kinesiology (human motion analysis), statistics, first aid and 4 semester hours of health enhancement (or physical education activity/theory).

While not required, additional coursework in biochemistry, organic chemistry and mathematics through precalculus is highly recommended.

Applicants who are deficient in no more than two prerequisite courses can be considered for conditional admission status. Such applicants will be required to complete all prerequisite courses before conditional status is removed. Applicants with an undergraduate GPA less than 3.00 with the appropriate academic background and strong letters of recommendation may be considered for conditional admission. Students who qualify for this status must complete a minimum of 16 hours of graduate-level work with a GPA of 3.00 or above before conditional status is removed.

Admission to this program is competitive. All application materials should be submitted prior to the deadline published in the Admission Schedule in the catalog.

Thesis research or comprehensive examination option

Candidates for the Master of Science degree must choose either to carry out an independent research project culminating with the completion of a master's thesis, or to conduct in-depth study in a number of approved areas, followed by a comprehensive examination covering these areas.

Students who choose the thesis option select an adviser, who serves as the thesis committee chair, and two committee members agreed upon by the student and chair. A thesis proposal is presented orally and in writing to the committee for approval. Research topics usually consist of experimental studies in the areas of biomechanics, cardiac rehabilitation, exercise physiology, measurement and evaluation, performance assessment, physical rehabilitation and studies of life-style behavior. The thesis is presented and defended by the candidate at a meeting open to all interested faculty members. All thesis requirements must adhere to university format standards and deadlines (see "Master's thesis and doctoral dissertation" in the Policies and Procedures section of this catalog).

The comprehensive examination option is designed to provide those students who do not wish to conduct thesis research an opportunity for in-depth study in several areas. Under this option, students, with their adviser's approval, select a minimum of three topics. Extensive reading lists for each topic are compiled from recommendations submitted by three or more faculty members who have expertise in the area. A comprehensive examination, consisting of selected questions for each topic area, is given in order to determine if the candidate has the in-depth knowledge expected of a master's degree candidate. The comprehensive examination can be arranged to be given in three parts, covering each of the topics studied.

Exercise science internship

The internship component of this program provides an opportunity for students to gain first-hand experience in the practice of exercise science. Internship placements will be the responsibility of the program and will include public and private health care settings and corporate and community wellness settings.

At least one internship shall be taken at a health promotion/disease prevention facility. Students are expected to satisfy this requirement by completing one internship at Botsford Center for Health Improvement, Mount Clemens General Hospital non-invasive cardiology, or Henry Ford Heart and Vascular Institute. Students entering the program with significant previous clinical experience, comparable to the internship experiences offered through this program, may be exempted from one or both internship courses (EXS 601 and 602) by following the Graduate Petition of Exception procedure (see "Petition of Exception" in the Policies and Procedures section of this catalog).

Code of Ethics

Along with scholarly preparation in the appropriate academic disciplines, high levels of ethical conduct are considered essential for those who are involved in health care. Students are expected to comply with the principles of the Code of Ethics and Professional Conduct of the American College of Sports Medicine. Violations will be brought before the faculty and could result in dismissal from the program.

Degree requirements

The average candidate entering the fall or winter semester will spend two full-time academic years to successfully complete this graduate program, which requires:

1. Completion of a minimum of 36 approved credits with a GPA of 3.00 or better. Credit toward the degree will not be given for courses with grades under 2.5.
2. Completion of the core courses: EXS 500, 520, 525, 530, 540, 601 and 602. Students will select six hours of elective course work, approved by their advisers, either from department offerings (400 level or above) or from advanced course work (300 level or above) in such areas as biology, chemistry, computer science, engineering, health science or psychology.
3. Completion of a research requirement involving a master's thesis or comprehensive examination. The research requirement involves the completion of a minimum of 6 credits in EXS 670.

■ Graduate Certificate in Clinical Exercise Science

The Graduate Certificate in Clinical Exercise Science is designed to offer advanced, graduate-level courses in exercise science to individuals wishing to prepare for the rigors of clinical exercise science practice.

Admission

An applicant for admission to this certificate program should have: a) a bachelor's degree from a regionally accredited institution with an undergraduate cumulative GPA of 3.00 or above; b) a strong background in basic sciences and applied health sciences; and c) completed the following prerequisite courses: human anatomy, human physiology, exercise physiology, kinesiology (human motion analysis), statistics, first aid, and 4 semester hours of health enhancement (or physical education activity/theory). It is strongly recommended that applicants have suitable work experience in the field of exercise science.

An applicant who is deficient in no more than one prerequisite course can be considered for conditional admission status. Such an applicant will be required to complete the prerequisite course before conditional status is removed. Applicants with an undergraduate GPA less than 3.00 with the appropriate academic background and strong letters of recommendation may be considered for conditional admission. Students who qualify for this status must complete a minimum of 8 credits of graduate coursework achieving a GPA of 3.00 or above in each course before conditional status is removed.

Requirements for the certificate

A candidate entering the fall or winter semester will spend one full-time academic year to successfully complete the certificate program, which requires:

1. Completion of the core courses: HS 501 and EXS 520, 525, 530, 540 and 625 with a GPA of 3.00 or better. Credit toward the certificate will not be given for courses with grades under 2.5.

2. Credit granted for successful completion of a course toward an undergraduate degree program may not be repeated for a graduate certificate. In such an instance, an equal number of program-approved graduate credits will be required.

■ Graduate Certificate in Complementary Medicine and Wellness

The Graduate Certificate in Complementary Medicine and Wellness is a course of study emphasizing patient/client counseling, and education about health promotion, disease prevention, wellness and complementary therapies. Goals include helping patients/clients achieve a level of well-being that reaches beyond merely the absence of disease. Participants will learn to optimize the patient/client-practitioner relationship while promoting health across the identified wellness dimensions: physical, psychological, environmental, spiritual and social. Recent trends in health care delivery have challenged practitioners and educators to integrate alternative approaches that are complementary into traditional practice, and to teach methods for evaluating their safety and effectiveness.

It is intended that candidates will use the certificate to enhance or further their own professional practice, current licensure or formal education. The program augments the background of professionals in disciplines such as exercise science, counseling, physical therapy, medicine, physician assistant, nursing, dietetics, social work, psychology, education and theology. The program is offered as a full-time or part-time course of study accommodating the needs of working professionals. The certificate is awarded following completion of the specified 16 credit hours of study.

Admission

Applicants should hold a bachelor's degree with an undergraduate cumulative GPA of 3.00 or above from a regionally accredited institution. Applicants who have less than a 3.00 cumulative GPA may be considered for conditional admission status. Applicants are required to submit: 1) a completed Application for Admission to Graduate Study and the program's supplemental admissions form, 2) a two-page prospectus describing how the applicant intends to integrate or use the certificate program in practice or for furthering education, 3) an elective or directed study plan for HS 693 and 4) two satisfactory letters of recommendation from professionals qualified to comment on the applicant.

Requirements for the certificate

The graduate certificate program consists of 16 credits of coursework: HS/CNS 651 or HS 451, HS/CNS 652, EXS 535, CNS 653, HS 630 and HS 693 or elective. The program must be completed with a GPA of 3.00 or better. Credit toward the certificate will not be given for courses with a grade under 2.5.

■ Graduate Certificate in Corporate and Worksite Wellness

The Graduate Certificate in Corporate and Worksite Wellness is designed to offer advanced graduate courses to prepare exercise science practitioners for the demands of careers in corporate and worksite wellness.

Admission

Same as admission criteria for the Graduate Certificate in Clinical Exercise Science.

Requirements for the certificate

A candidate entering the fall or winter semester will spend one full-time academic year to successfully complete the certificate program, which requires:

1. Completion of the core courses HS 501 and EXS 520, 525, 530 and 565. Students will select two credit hours of elective course work from EXS 500, 505, 510, 521, 540, 545, 560, 580, 605, 610, 615, 620, 625, 630, 635 or 693. A GPA of 3.00 or better must be obtained. Credit toward the certificate will not be given for courses with grades under 2.5.
2. Credit granted for successful completion of a course toward an undergraduate degree program may not be repeated for a graduate certificate. In such an instance, an equal number of program-approved graduate credits will be required.

■ Graduate Certificate in Exercise Science

The Graduate Certificate in Exercise Science is designed to offer a logical, coherent, yet flexible program of study that will meet the needs of a select group of graduate students seeking to improve their skills in specialized areas of exercise science, such as ergonomics, human performance analysis, sports science and health promotion.

Admission

Same as admission criteria for the Graduate Certificate in Clinical Exercise Science

Requirements for the certificate

A candidate entering the fall or winter semester will spend one full-time academic year to successfully complete the certificate program, which requires:

1. Completion of the core courses EXS 520, 525, 530 and either HS 501 or EXS 500, plus four credit hours of elective course work from EXS 500, 505, 510, 521, 540, 545, 560, 580, 605, 610, 615, 620, 625, 630, 635 or 693. A GPA of 3.00 or better must be obtained. Credit toward the certificate will not be given for courses with grades under 2.5.
2. Credit granted for successful completion of a course toward an undergraduate degree program may not be repeated for a graduate certificate. In such an instance, an equal number of program-approved graduate credits will be required.

■ Physical Therapy Program

<http://www.oakland.edu/SHS/PT>

Director:

Kristine A. Thompson

Assistant professors:

Douglas S. Creighton, DPT, University of Augustine
Kathleen M. Galloway, D.Sc., Rocky Mountain University
Melodie Kondratek, DSPT., Oakland University
John R. Krauss, M.S., Oakland University
Cathy A. Larson, Ph.D., University of Michigan

Special instructors:

Christine Stiller, Ph.D., Michigan State University
Kristine A. Thompson, Ph.D., Michigan State University

Adjunct instructors:

R. Elizabeth Black, M.S., McMaster University (Canada)
Susan E. Saliga, M.H.S., University of Indianapolis

Consulting professors:

Olaf Evjenth, Orthopedic Institute (Oslo, Norway)
Beth Marcoux, Ph.D., University of Michigan

Clinical assistant professors:

Pamela A. Lemerand, Ph.D., University of Michigan
Gretchen D. Reeves, Ph.D., University of Michigan
Bjorn W. Svendsen, D.H.Sc., Loma Linda University

Consulting assistant professor:

Lasse Erik Thue, School of Physical Therapy of Berlin

Senior clinical instructors:

David Gilboe, B.S., Wayne State University
Martha Schiller, M.S., Central Michigan University
David A. Tomsich, M.S., University of Kentucky

Clinical instructors:

Sara Arena, M.S., Oakland University
Henry D. Boutros, M.Ed., Wayne State University
Pamela S. Knickerbocker, M.S., Oakland University
Gregory Kopp, M.P.T., Oakland University
Kathleen Jakubiak Kovacek, B.S., Wayne State University
Peter R. Kovacek, M.S.A, Central Michigan University
Jeffrey Placzek, M.D., Wayne State University
Frederick D. Pociask, Ph.D., Wayne State University
Marilyn J. Raymond, Ph.D., University of Michigan
Helene M. Rosen, B.S., University of Michigan
Janet Siedel, M.P.T., Oakland University
Angela C. Strong, B.S., Spelman College
Jody L. Tomasic, M.S., Oakland University
Chris Wilson, M.P.T., Oakland University
Kenneth M. Woodward, C.P.O.

Degree programs

Doctor of Physical Therapy
Doctor of Science in Physical Therapy

Graduate certificate programs

Orthopedic Physical Therapy
Orthopedic Manual Physical Therapy
Pediatric Rehabilitation
Neurological Rehabilitation
Teaching and Learning for Rehabilitation Professionals

■ Doctor of Physical Therapy (DPT)

Director

Kristine A. Thompson

Description

The Doctor of Physical Therapy is an entry-level graduate program, which prepares individuals for licensure and entry into the physical therapy profession. As a graduate program, it includes advanced theoretical, clinical practice, and research courses and experiences to prepare graduates to function in a variety of settings in physical therapy.

Physical therapy is concerned with the prevention and treatment of acute and chronic conditions that cause disorders of movement. In order to provide appropriate treatment, physical therapists evaluate the musculoskeletal, neuromuscular, cardiopulmonary and associated systems, calling on the basic sciences and behavioral sciences in the interpretation of this evaluation. Patient programs are then developed to resolve movement dysfunctions. Physical therapists work in concert with all members of the health care team through a variety of referral relationships.

The Doctor of Physical Therapy at Oakland University is designed to prepare clinicians with the evaluation and examination skills necessary to make physical therapy differential diagnoses of movement related impairments affecting the neuromusculoskeletal system. In addition, this degree will prepare graduates to provide effective care in the areas of prevention, screening, rehabilitation and community reintegration for their clients. Finally, graduates will be able to interpret and conduct clinical research needed to demonstrate the reliability and validity of physical therapy evaluation tools and to determine the effectiveness of physical therapy interventions.

The program is accredited by the Commission on Accreditation in Physical Therapy Education.

Admission terms and deadlines

Students are admitted in the fall semester only. Applications are accepted for early-decision by October 15 and regular decision by January 15 for the following fall semester.

Admission requirements

Students must have completed a baccalaureate degree prior to admission to the program. The following minimum prerequisites will also be required:

Prerequisite Required	# of Courses	Lab
Biology	1	x
Chemistry	2	x
Physics	2	x
Anatomy	1	
Physiology	1	
Exercise Physiology	1	
Statistics	1	
Psychology	1	
Developmental Psychology	1	
Math through pre-calculus	1	

- a. Students will be considered for admission if they will be completing their baccalaureate degree and all prerequisite courses prior to the start of the program.
- b. An overall cumulative GPA of 3.00 or above is required. Applicants must have received a minimum grade of 2.0 in all prerequisite courses.
- c. Foreign-educated students must meet all university requirements for proficiency in English. In addition, they will be required to demonstrate an educational-level equivalent to a BS degree in the United States.
- d. All students will take the Graduate Record Examination (GRE).
- e. Additional requirements include computer literacy, satisfactory letters of recommendation, personal statement, and proof of successful completion of first aid and CPR.

An applicant who is completing a baccalaureate and/or prerequisite courses can be considered for conditional admission status. Such an applicant will be required to complete the prerequisite courses before conditional status is removed. Applicants with an undergraduate GPA less than 3.00 with the appropriate academic background and strong letters of recommendation may be considered for conditional admission. Students who qualify for this status must complete the first semester of graduate coursework achieving a grade point of 3.0 or above in each course before the conditional status is removed.

Application requirements

The application materials and steps to be completed are:

1. Application for Admission to Graduate Study and application fee.
2. Supplemental Application for the Doctor of Physical Therapy program including a personal statement as described in the supplemental application.
3. Official transcripts of all previous undergraduate and graduate level academic work.
4. Two Recommendation for Graduate Admission forms.

5. Official scores for the Graduate Record of Examination (GRE).
6. Official scores for the Test of English as a Foreign Language (TOEFL) from applicants who are graduates of programs taught in a language other than English.

Academic advising

Students who are considering applying to the DPT program may contact the academic adviser for the School of Health Sciences. Upon acceptance to the program students are assigned a faculty adviser.

Degree requirements

Students admitted to the DPT program are required to attend a full-time program of prescribed coursework. A new class of students begins this program each fall semester. A minimum of 122-130 semester hours of credit are required for the degree, consisting of the following courses: HS 501 and HS 531, PT 514, 515, 516, 517, 519, 531, 540, 551, 552, 556, 597, 627, 628, 630, 640, 641, 635, 651, 652, 653, 655, 660, 661, 681, 682, 698, 728, 732, 734, 735, 742, 743, 751, 755, 762, 783, 784, 799. With approval from the program director, students may graduate with fewer than 130 credits if they have completed an equivalent pharmacology and/or pathology course prior to entry into the professional program.

Grade point policy

The grading policy for graduate students at Oakland University (see the Policies and Procedures section of this catalog) will be followed for students in the DPT program. In addition, a 3.00 GPA for all coursework taken is required for graduation and no grade below 2.0 may be applied toward this degree. The Physical Therapy Promotion and Honors Committee will monitor student progress throughout the program. Students whose GPA falls below 3.00 shall be subject to probation and will be informed of their probationary status, including the grounds for the decision. Students receiving a GPA of less than 3.00 more than once are subject to suspension or dismissal from the program. Dismissal by Graduate Study and Lifelong Learning is based on a recommendation from the Physical Therapy Promotion and Honors Committee. Students should consult the section of this catalog dealing with appeal procedures concerning academic dismissals.

Code of Ethics

Ethical conduct is critical to a profession. Students are required to abide by the Physical Therapy Code of Ethics and Guide to Professional Conduct, published by the American Physical Therapy Association. Violations will be reviewed by the Physical Therapy Promotion and Honors Committee and could result in suspension or dismissal from the program.

■ Master of Science in Physical Therapy (MSPT)

Coordinator

Kristine A. Thompson

Description

This degree is designed to provide practicing physical therapists with advanced knowledge in theoretical and clinical aspects of the profession. The clinical curriculum addresses orthopedic, pediatric and adult neurological aspects of physical therapy while the theoretical curriculum focuses on biomechanics and motor learning. Optional clinical experiences, in a residency format, are gained through cooperating internship sites for some specialty areas. Graduates of the program are prepared for autonomous specialty practice within their area of study.

Students can elect to complete specific subsets of courses leading to a graduate certificate in orthopedic manual physical therapy, a graduate certificate in pediatric rehabilitation, graduate certificate in orthopedic physical therapy, graduate certificate in neurological rehabilitation, or a graduate certificate in teaching and learning.

Admission requirements

Applicants should hold a bachelor's degree or entry-level master's degree in physical therapy from a regionally accredited institution with a cumulative GPA of 3.00 or above. Two years of clinical experience is strongly recommended.

Applicants with an undergraduate GPA less than 3.00 with the appropriate academic background and strong letters of recommendation may be considered for conditional admission. Students who qualify for this status must complete a minimum of 8 credits of graduate coursework achieving a grade point of 3.00 or above in each course before conditional status is removed.

Application requirements

The application materials and steps to complete are:

1. Application for Admission to Graduate Study and application fee.
2. Curriculum vitae and personal statement describing career experiences and goals.
3. Official transcripts of all previous undergraduate and graduate level academic work.
4. Two Recommendation for Graduate Admission forms.
5. Official scores for the Graduate Record Examination (GRE).
6. Official scores from the Test of English as a Foreign Language (TOEFL) from applicants who are graduate of programs taught in a language other than English.
7. International students must meet the application requirements for International student described by Graduate Admissions.
8. Proof of licensure or eligibility for licensure in the State of Michigan. Licensure is required to participate in clinical and/or residency program courses.

Admission terms and deadlines

Students are admitted in the fall semester only. Applications will be accepted until August 1 for the following fall semester.

Degree requirements

1. Completion of a minimum of 36 credits with a GPA of 3.00 or better. Credit toward the degree will not be given for courses with grades under 2.0.
2. Completion of the core courses: PT 502, 550, 590, 631, 677, PT 536 or PT 611 and PT 570 or EXS 525.
3. Completion of thirteen or more credits of electives as approved by the student's faculty adviser. Elective options include: PT 500, 503, 507, 509, 510, 511, 520, 523, 525, 536, 537, 538, 539, 540, 598, 601, 602, 603, 611, 695 and other adviser-approved courses.
4. Completion of the research projects or comprehensive examination. The research option requires the completion of a minimum of 4 credits in PT 690. The comprehensive examination option requires the completion of a minimum of 4 credits in PT 650.

Research or comprehensive examination option

Candidates for the Master of Science degree must choose either to carry out an independent research project or to conduct in-depth study in a number of approved areas, followed by a comprehensive examination covering these areas.

Students who choose the research option select an adviser who serves as the committee chair, and two committee members agreed upon by the student and chair. A research proposal is presented orally and in writing to the committee for approval. The findings will be presented and defended by the candidate at the meeting open to the university community, including their research committee. The final paper must be submitted in designated format.

The comprehensive examination option is designed to provide those students who do not wish to conduct thesis research an opportunity for in-depth study in several areas. Under this option, student, with their adviser's approval, select a minimum of three topics. Extensive reading lists for each topic are compiled from recommendations submitted by three or more faculty members who have expertise in the areas. A written examination, consisting of selected questions for each topic area, is given in order to determine if the candidate has the in-depth knowledge expected of a master's degree candidate. The written exam can be arranged to be given in three parts, covering each of the topics studied. This is followed by the oral examination covering all three topics.

MSPT research report submission requirements

One copy of the approved MSPT research report must be delivered to Graduate Study and Lifelong Learning by the date listed on the Schedule of Classes for the term in which the student expects to graduate. The research report must be graded prior to submission. Submission requirements are provided on the Graduate Study and Lifelong Learning webpage.

Time limits

If more than six years have passed since the student has been admitted to the MSPT program, and all requirements (including an approved research report) have not been completed, the student must petition the program coordinator and Graduate Study and Lifelong Learning for an extension. Students who are deemed inactive may be dropped from the program, although they may petition for reinstatement.

Academic advising

Upon acceptance into the program students are assigned a faculty adviser who will assist the student in developing a plan of study.

■ Graduate Certificate in Orthopedic Manual Physical Therapy (OMPT)

Coordinator

John R. Krauss

Description

The Graduate Certificate in Orthopedic Manual Physical Therapy is designed to offer advanced, graduate-level courses in orthopedics to physical therapists interested in developing clinical specialty skills. This educational program provides advanced theoretical and clinical training, emphasizing differential diagnosis and manual therapy procedures.

The certificate program is offered as a part-time course of study accommodating the needs of working professionals. Students enrolled in the program will participate in 17 credits of coursework including orthopedic theory, techniques and clinical internship training. The length of study for this part-time program is three years, with courses being offered primarily on a weekend and evening basis. The clinical internship training entails 440 hours of supervised clinical training at an approved clinical site. All of the required courses that comprise this certificate can be applied to the Master of Science in physical therapy degree.

Admission requirements

To be eligible for admission to this program, individuals must hold an entry-level physical therapy degree (i.e., Bachelor of Science or Master of Physical Therapy) from an APTA accredited program, or its equivalent, and be licensed as a physical therapist in the state of Michigan. Two years of clinical experience is highly recommended. Class size is limited due to the nature and sequencing of the manual therapy technique courses. A new group of students is accepted every fall.

Admissions terms and deadlines

Students are admitted in the fall semester only. Applications will be accepted until August 1 for the following fall semester.

Application requirements

1. Application for Admission to Graduate Study and application fee.
2. Professional vitae or resume and one page narrative goal statement outlining academic and professional goals.
3. Official transcripts of all previous undergraduate and graduate level academic work and proof of degree.
4. Two Recommendation for Graduate Admissions forms or two letters of reference.
5. Official scores for the Test of English as a Foreign Language (TOEFL) and GRE from applicants who are graduates of programs taught in a language other than English.
6. International students must meet the application requirements described by Graduate Admissions.
7. Proof of licensure or eligibility for licensure in the State of Michigan.

Fees

Special course fees are assessed for the manual therapy theory and technique classes (PT 510, 511, 520) required for the certificate.

Requirements for the certificate

To fulfill the certificate requirements the student must complete, with at least a 2.0 grade in each course and an overall GPA of 3.00, a program consisting of PT 510, 511, 520, 601, 602, 611 and 677.

■ Graduate Certificate in Pediatric Rehabilitation

Coordinator:

Christine Stiller

Description

The graduate certificate in pediatric rehabilitation is designed to offer advanced, graduate-level courses in pediatrics to physical therapists and occupational therapists interested in developing clinical specialty skills. The certificate program is offered as a part-time course of study accommodating the needs of working professionals. Students enrolled in the program will participate in 17 credits of coursework including advanced theoretical and clinical training, emphasizing clinical decision-making, case management skills, and therapeutic procedures. A clinical internship will entail supervised clinical training at an approved clinical site. For physical therapists, all of the required courses that comprise this certificate can be applied to the Master of Science in physical therapy degree or the Doctor of Science in Physical Therapy degree.

Admission requirements

To be eligible for admission to this program, individuals must hold an entry-level physical therapy or occupational therapy degree from an APTA or AOTA accredited program or its equivalency, and must be a licensed physical therapist or a registered occupational therapist, or eligible for licensure or registration, respectively. Two years of clinical experience in pediatrics is highly recommended.

Admission terms and deadlines

Students may be admitted for the fall or winter semester. Applications will be accepted until August 1 for the following fall semester and until December 1 for the following winter semester.

Application requirements

1. Application for Admission to Graduate Study and application fee
2. Professional vitae or resume and one page narrative goal statement outlining academic and professional goals
3. Official transcripts of all previous undergraduate and graduate level academic work and proof of degree
4. Two Recommendation for Graduate Admissions forms or two letters of reference
5. Official scores for the Test of English as a Foreign Language (TOEFL) and GRE from applicants who are graduates of programs taught in a language other than English
6. International students must meet the application requirement described by Graduate Admissions
7. Proof of licensure or registration or eligibility for licensure or registration in the State of Michigan.

Requirements for the certificate

To fulfill the certificate requirements the student must complete, with at least a 2.0 grade in each course and an overall GPA of 3.00, a program consisting of PT 500, PT502, PT 507, PT 525, and PT 536.

■ Graduate Certificate in Teaching and Learning for Rehabilitation Professionals

Coordinator:

Christine Stiller

Description

The Graduate Certificate in Teaching and Learning for Rehabilitation Professionals is designed to provide an in-depth understanding of the theoretical background of the principles of teaching and learning used in all aspects of rehabilitation. In addition, it will provide students with advanced skill in teaching methodology and the development of educational materials. Students will complete a teaching practicum under the guidance of full-time faculty in the physical therapy program. All of the required courses that comprise the certificate can be applied by physical therapists to the post-professional MSPT degree or the DScPT.

Admission requirements

To be eligible for admission to this program, individuals must hold an entry-level degree in a rehabilitation of other health profession, and must be licensed, registered or certified in their respective discipline (or eligible for such). Two years of clinical experience is highly recommended. All other admissions requirements for graduate application as determined by Graduate Admissions must also be met.

Admission terms and deadlines

Students may be admitted for the fall or winter semester. Applications will be accepted until August 1 for the following fall semester and until December 1 for the following winter semester.

Application requirements

1. Application for Admission to Graduate Study and application fee
2. Professional vitae or resume and one page narrative goal statement outlining academic and professional goals
3. Official transcripts of all previous undergraduate and graduate level academic work and proof of degree
4. Two Recommendation for Graduate Admissions forms or two letters of reference
5. Official scores for the Test of English as a Foreign Language (TOEFL) and GRE from applicants who are graduates of programs taught in a language other than English
6. International students must meet the application requirement described by Graduate Admissions
7. Proof of licensure, registration or certification or eligibility for licensure, registration or certification in the State of Michigan.

Requirements for the certificate

To fulfill the certificate requirements the student must complete with at least a 2.0 grade in each course and an overall GPA of 3.00, a program consisting of PT 502, PT 810, PT 592, PT 593 and PT 594.

■ Graduate Certificate in Orthopedics

Coordinator:

John R. Krauss

Description

The Graduate Certificate in Orthopedics is designed to give licensed physical therapists and final year DPT students advanced patient management skills with a broader area of focus than the current OMPT program. The Graduate Certificate in Orthopedics will offer additional flexibility and another point of entry for individuals interested in pursuing graduate education at Oakland University. Course work in this program may be applied toward the post entry-level Doctor of Science (DScPT) or the Masters of Science (MS), (and provide a pathway of specialization for DPT students in their last year of entry-level education.)

Admission requirements

To be eligible for admission to this program, individuals must hold an entry-level degree in physical therapy and be licensed (or eligible for licensure) in physical therapy. Two years of clinical experience is highly recommended. All other admission requirements for graduate application as determined by Graduate Admissions must also be met.

Admission terms and deadlines

Students are admitted in the fall semester only. Applications will be accepted until August 1 for the following fall semester.

Application requirements

1. Application for Admission to Graduate Study and application fee
2. Professional vitae or resume and one page narrative goal statement outlining academic and professional goals
3. Official transcripts of all previous undergraduate and graduate level academic work and proof of degree
4. Two Recommendation for Graduate Admissions forms or two letters of reference
5. Official scores for the Test of English as a Foreign Language (TOEFL) and GRE from applicants who are graduates of programs taught in a language other than English
6. International students must meet the application requirement described by Graduate Admissions
7. Proof of licensure or registration or eligibility for licensure or registration in the State of Michigan.

Fees

Special course fees are assessed for the manual therapy theory and technique classes (PT 510, 511) required for the certificate.

Requirements for the certificate

To fulfill the certificate requirements the student must complete, with at least a 2.0 grade in each course and an overall GPA of 3.00, a program consisting of PT 502, PT 510, PT 511, PT 601, PT 611, PT 677 and 3 credits of electives, PT 503, PT 523, or PT 695 or other adviser approved courses.

4. Two Recommendation for Graduate Admissions forms or two letters of reference
5. Official scores for the Test of English as a Foreign Language (TOEFL) and GRE from applicants who are graduates of programs taught in a language other than English
6. International students must meet the application requirement described by Graduate Admissions
7. Proof of licensure or registration, or eligibility for licensure or registration, in the State of Michigan.

■ Graduate Certificate in Neurological Rehabilitation (GCNR)

Coordinator

Cathy Larson

Description

The Graduate Certificate in Neurological Rehabilitation is designed to provide advanced theoretical and clinical training for physical and occupational therapists interested in specializing in the areas of neurorehabilitation and geriatrics. The GCNR will allow practicing therapists to take graduate level courses aimed at developing the specialty skills of a master clinician in treating those individuals with a neurological injury such a stroke, multiple sclerosis, traumatic brain injury and Parkinson's disease. Physical therapists may apply the 17 GCNR credits towards completion of the post-professional DScPT degree or the post-professional MSPT degree. Occupational therapists who gain specialization in neurological rehabilitation, however, are not eligible for the DScPT.

Admission requirements

To be eligible for admission to this program, individuals must hold an entry-level degree in physical therapy and occupational therapy and be licensed or registered in their respective disciplines (or eligible for such). Two years of clinical experience is highly recommended. All other admission requirements for graduate application as determined by Graduate Admissions must also be met.

Admission terms and deadlines

Students are admitted in the fall semester only. Applications will be accepted until August 1 for the following fall semester.

Application requirements

1. Application for Admission to Graduate Study and application fee
2. Professional vitae or resume and one page narrative goal statement outlining academic and professional goals
3. Official transcripts of all previous undergraduate and graduate level academic work and proof of degree

Requirements for the certificate

To fulfill the certificate requirements the student must complete, with at least a 2.0 grade in each course and an overall GPA of 3.00, a program consisting of PT 502, PT 536, PT 537, PT 538, and PT 539.

■ Doctor of Science in Physical Therapy (DScPT)

Coordinator:

Kristine A. Thompson

Description

The post-professional DScPT is designed for physical therapists who received an entry-level bachelor's or master's degree in physical therapy and are interested in obtaining an advanced clinical doctorate.

Admission terms and deadlines

Students are admitted in the fall semester only. Applicants will be accepted until August 1 for the following fall semester.

Application requirements

The application materials and steps to be completed are:

1. Application for Admission to Graduate Study and application fee
2. Professional vitae or resume and one page narrative goals statement outlining academic and professional goals
3. Official transcripts of all previous undergraduate and graduate level academic work and proof of degree
4. Two Recommendation for Graduate Admissions forms or two letters of reference
5. Official scores for the Test of English as a Foreign Language (TOEFL) and GRE
6. International students must meet the application requirements described by Graduate Admissions
7. Proof of licensure or eligibility for licensure in the State of Michigan.

Admissions requirements

Applicants for the DScPT must:

- a. Be licensed or eligible for licensure as a physical therapist in the State of Michigan
- b. Have completed a US equivalent BS/MPT or MSPT degree
- c. Have completed the GRE
- d. Meet Oakland University requirements for English proficiency

Applicants with an undergraduate GPA less than 3.00 with the appropriate academic background and strong letters of recommendation may be considered for conditional admission. Students who qualify for this course status must complete a minimum of 8 credits of graduate coursework achieving a grade point of 3.0 or above in each course before conditional status is removed.

Degree requirements

This degree will require completion of 75 credits beyond a BS degree with up to 36 credits that can be earned from a qualified master's degree counting toward the DScPT degree. The transfer credit policy outlined in the graduate catalog will be followed. Per this policy, students may be allowed to transfer up to 9 semester hour credits. Students will be required to take the professional core courses and select a physical therapy concentration (this can include a certificate, an advanced research practicum or an approved set of related coursework for a total of 15-51 credits). All students will develop a plan of study that outlines course work and plan for degree completion. The student's adviser must approve this plan of study. All students will complete an individual research project under the direction of a committee chaired by physical therapy faculty.

Professional core courses (24 credits)

PT 502	Understanding Evidence-based Clinical Practice	2
PT 800	Professional Seminar	4
PT 810	Application of Educational Principles in Physical Therapy	4
PT 900	Advanced Scientific Inquiry I	4
PT 901	Analysis of Clinical Data	2
PT 950	Research Practicum	8
		24

Physical Therapy concentration (15-51 credits)

All students must develop a concentration that may include a certificate, a research concentration and/or a set of related coursework. Students must apply for and be accepted into certificate programs. See requirements for certificate programs.

One 17-credit certificate in:

Orthopedics

Orthopedic Manual Physical Therapy

Pediatric Rehabilitation

Neurological Rehabilitation

Teaching and Learning for Rehabilitation Professionals

Graduate Certificate in Clinical Exercise Science (18 credits)

Graduate Certificate in Complementary Medicine and Wellness

Graduate Certificate in Exercise Science*

Graduate Certificate in Corporate Worksite Wellness*

Research Concentration: This would include a combination of research courses and projects worth a total of 17 credits in an area of their clinical interest.**

Related Coursework: May include non-physical therapy related coursework that supports or complements the student's plan of study.**

* Must complete the appropriate prerequisites.

** Plan of study must be approved by the student's adviser.

Time limits

If more than six years have passed since the student has been admitted to the DScPT program, and all requirements (including an approved research report) have not been completed, the student must petition the program coordinator and Graduate Study and Lifelong Learning for an extension. Students who are deemed inactive may be dropped from the program, although they may petition for reinstatement.

DScPT research report submission requirements

One copy of the approved DScPT research report must be delivered to Graduate Study and Lifelong Learning by the date listed in the Schedule of Classes for the term in which the student expects to graduate. The research report must be graded prior to submission. Submission requirements are provided on the Graduate Study and Lifelong Learning web page.

SCHOOL OF NURSING

428 O'Dowd Hall • (248) 370-4253 • Fax (248) 370-4279 •
<http://www2.oakland.edu/nursing/>

Dean:

Linda S. Thompson Adams

Associate dean:

Diane M. Norris

Assistant dean:

Sherry F. Abernathy
 Pamela A. Marin

Administrative project coordinator:

Amy R. Johnson

Nursing laboratory manager:

Patricia T. Ketcham

Professors emeriti:

Justine J. Speer, Ph.D., R.N., University of Minnesota
 Diane R. Wilson, Ph.D., R.N., Michigan State University
 Carol S. Zenas, Ph.D., R.N., University of Michigan

Professors:

Anahid Kulwicki, D.N.S., R.N., Indiana University
 F. Darlene Schott-Baer, Ph.D., R.N., Wayne State University
 Linda S. Thompson Adams, Dr.PH., R.N., FAAN, Johns Hopkins University

Associate professors:

Frances C. Jackson, Ph.D., R.N., Wayne State University
 Suha Kridli, Ph.D., R.N., University of Missouri, Columbia
 Mary E. Mittelstaedt, Ph.D., R.N., Michigan State University
 Gary Moore, Ph.D., R.N., Wayne State University
 Sarah E. Newton, Ph.D., R.N., University of Michigan

Assistant professors:

Karen Dunn, Ph.D., R.N., Wayne State University
 Wanda Gibson-Scipio, M.S.N., R.N.C., F.N.P., Michigan State University
 Barbara Harrison, Ph.D., R.N., University of Michigan
 Judith K. Hovey, Ph.D., R.N., Michigan State University
 Morris A. Magnan, Ph.D., R.N., Wayne State University
 Anne M. Mitchell, Ph.D., R.N., Wayne State University
 Diane M. Norris, Ph.D., R.N., University of Michigan
 Barbara B. Penprase, Ph.D., R.N., Wayne State University
 Cheryl K. Riley-Doucet, Ph.D., R.N., Wayne State University
 Laureen H. Smith, Ph.D., R.N., University of Michigan

Full-time adjunct instructor:

Carrie L. Motyka, M.S.N., R.N., A.N.P., University of Michigan

Adjunct assistant professor:

Karen Zaglaniczny, Ph.D., CRNA, FAAN, Wayne State University

Adjunct instructor:

Lisa Ann Mileto, M.S., CRNA, Mercy College of Detroit

Clinical education coordinators:

Colleen Beauchamp, M.S., CRNA, RPh, Wayne State University
 Palemonita Jones, M.S.N., CRNA, Oakland University
 Laura Rodgers, M.S.N., CRNA, Oakland University
 John Roebuck, M.S.N., CRNA, Oakland University

Visiting instructors:

Todd Ambrosia, Ph.D., R.N., Clayton College
 Claudia Grobbel, M.S.N., R.N., Oakland University
 Margaret Harris, Ph.D., R.N., Wayne State University
 John Nagelhout, Ph.D., CRNA, Wayne State University
 Laura Pittiglio, M.S.N., R.N., Wayne State University
 Susan L. Saltzman, N.D., R.N., Rush University
 Ann Whall, Ph.D., R.N., Wayne State University

Board of Visitors

The Board of Visitors for the School of Nursing is composed of community leaders in the metropolitan Detroit area. The Board assists the School of Nursing in developing its goals, objectives and curricular design, as well as clinical and research programs that meet the rapidly changing requirements of the health care field. Board members consult on such matters as facilities, equipment requirements, special topics and long-range planning.

Board Members

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 DaimlerChrysler Corporation
 Maggie Allesee, Counselor, Bloomfield Hills, Michigan
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Nancy Susick, Assistant Hospital Director, Beaumont Hospital, Troy
Pete Swiecicki, BBDO, Detroit

Kathleen Van Wagoner, Chief Nurse Executive, Crittenton Hospital Medical Center

Christine Zambricki, Administrative Director and CNO, William Beaumont Hospital, Royal Oak

■ Master of Science in Nursing

The School of Nursing graduate degree program prepares professional nurses for advanced nursing practice, leadership in the nursing profession and future doctoral study. Five tracks are offered: Adult Acute Care Clinical Nurse Specialist, Adult/Gerontological Nurse Practitioner, Family Nurse Practitioner, Nurse Anesthesia and Nursing Education. The master's program is accredited by the Commission on Collegiate Nursing Education. In addition, the Nurse Anesthesia program is accredited by the Council on Accreditation of Nurse Anesthesia Educational Programs.

Graduate program objectives

In keeping with the philosophy of the School of Nursing, master's degree graduates achieve the following outcome competencies:

1. Incorporate concepts and theories from nursing and related disciplines into advanced nursing practice
2. Provide advanced nursing care in a variety of settings in accordance with the American Nurses Association (ANA) Scope and Standards of Advanced Practice Registered Nursing and appropriate subspecialty standards
3. Exemplify in practice the American Nurses Association Standards of Professional Performance as detailed in the Scope and Standards of Advanced Practice Registered Nursing as well as other appropriate advanced standards of care.

Adult Acute Care Clinical Nurse Specialist

The plan of study for the Adult Acute Care Clinical Nurse Specialist (CNS) program prepares the advanced practice nurse for the role of clinical nurse specialist in acute care. The curriculum focuses on preparing advanced practice nurses to apply nursing theory, principles of advanced nursing practice and the research process in designing systems of care for adults in hospital based settings. Graduates of the Adult Acute Care Clinical Nurse Specialist (CNS) program are eligible for certification as a Clinical Nurse Specialist in Medical-Surgical Nursing through the American Nurses Credentialing Center.

Adult/Gerontological Nurse Practitioner

The plan of study for the Adult/Gerontological Nurse Practitioner (Adult/GNP) program prepares the advanced practice nurse as a primary care provider for adult, older adult and frail elder clients in a variety of settings. The curriculum focuses on culturally sensitive care, incorporating health promotion and management of acute and chronic health problems. The graduate is prepared to apply nursing theory, principles of advanced practice nursing and the research process in the design and delivery of primary care. Knowledge for advanced nursing practice is synthesized from concepts in nursing as well as the biological and social sciences. Graduates of the Adult/GNP program are prepared to take an Adult Nurse Practitioner national certification examination and/or a Gerontological Nurse Practitioner national certification examination.

Family Nurse Practitioner

The plan of study for the Family Nurse Practitioner (FNP) program prepares the advanced practice nurse as a primary care provider for clients across ages in a variety of settings. The curriculum focuses on culturally sensitive care, incorporating health promotion and management of acute and chronic health problems. The graduate is prepared to apply nursing theory, principles of advanced practice nursing and the research process in the design and delivery of primary care. Knowledge for advanced nursing practice is synthesized from concepts in nursing, as well as the biological and social sciences. Graduates of the Family Nurse Practitioner program are prepared to take a Family Nurse Practitioner national certification examination.

Nurse Anesthesia

The plan of study for the Nurse Anesthesia (NA) program prepares nurses as specialists in anesthesia care. Nursing courses and clinical internships provide the opportunity for students to gain experience in nurse anesthesia practice in all specialty areas. Students study physiology, pathophysiology, pharmacology and anatomy in cognate courses. The graduate applies nursing theory, principles of nurse anesthesia practice and research in the delivery of anesthesia care. After 28 months of full-time study, nurse anesthesia graduates are prepared to take the certification examination offered by the Council of Certification of Nurse Anesthetists leading to the designation CRNA.

Nursing Education

The Master of Science in Nursing Education (NE) program prepares nurses to teach in an academic setting by focusing on curriculum and instruction, program and course design, development, and evaluation. Students study learning styles, teaching methods, and evaluation strategies. A field experience, which will occur in an academic setting, provides students with the opportunity to apply these skills in actual classroom and clinical environments under the guidance of expert School of Nursing faculty. Graduates of the Nursing Education program are prepared to teach in both classroom and clinical settings.

Admission

Applicants for admission to the Master of Science in Nursing program must have completed a Bachelor of Science degree in Nursing with an undergraduate cumulative grade point average of 3.00 or above from an institution accredited by the National League for Nursing or the Commission on Collegiate Nursing Education. Applicants must be able to demonstrate the competencies underpinning the ANA Standards of Care and Standards of Professional Performance, show satisfactory achievement on the Graduate Record Examination (GRE) (for applicants with undergraduate GPA's of 3.50 or above, the GRE is not required), and be eligible for a current Registered Nurse license in the state of Michigan. Applicants should have at least one year prior clinical experience and must have completed an undergraduate physical assessment course.

The admission process begins with application for admission to graduate study at Oakland University, Graduate Admissions, 160 North Foundation Hall, (248) 370-3167. Concurrently, the applicant is advised to schedule an appointment with an academic adviser of the School of Nursing (248) 370-4253.

Admission to the programs is selective. Preference is given to applicants evaluated as best qualified to undertake the program of study. Regular admission to the program will be considered when the following materials have been received by the University:

1. An application for Admission to Graduate Study and application fee
2. Official transcripts of all graduate and undergraduate course work
3. Two recommendations from professionals who are able to attest to the applicant's ability (nurse anesthesia program applicants must have one recommendation from their current nurse manager, and
4. Official Graduate Record Examination (GRE) results for those applicants whose undergraduate GPA's are less than 3.50. If GRE results are necessary but not available, the applicant may be admitted under Special Graduate Status pending test scores.

Applicants are required to submit a supplemental application and a 500 to 1,000 word professional goals statement. The goals statement should focus on recent clinical experience, how a master's degree will enhance professional development, and career goals after completion of the program. The goals statement will be evaluated on content and appropriate use of grammar, spelling and rhetoric. Individual interviews with faculty are required for Adult Acute Care Clinical Nurse Specialist, Adult/gerontological Nurse Practitioner, Family Nurse Practitioner, and Nursing Education applicants. Applications for admission are accepted at any time for these MSN programs.

Applications for the Nurse Anesthesia program must also have grades of 3.0 or above in each required science course in their undergraduate nursing programs. A minimum of one year of critical care experience as an RN is required during which time the applicant has functioned as an independent decision maker, demonstrated advanced psychomotor skills and used and interpreted advanced monitoring techniques. Also required for admission to the nurse anesthesia program is proof of BLS and ACLS certification. Applicants will attend an interview and a brief quiz about critical care nursing.

Nurse Anesthesia applications are accepted anytime, but the final deadline is September 1 for the class that begins full-time study the following fall semester.

Advising

Students are responsible for requirements and policies stated in the School of Nursing Graduate Student Handbook and each course's syllabus. Every student admitted to the MSN program is assigned both an academic adviser and a faculty adviser who has teaching responsibilities in the graduate program. These advisers are available to discuss coursework, plans of study, concerns regarding progression in the program and student career goals.

Academic progress

Students are required to follow the University policies and procedures for graduate students, as described in the Oakland University graduate catalog. In addition to the University requirements, specific School of Nursing policies and procedures are outlined in the School of Nursing Graduate Handbook.

Students are expected to earn a grade of 3.0 or above in each course in the MSN program. In courses graded satisfactory/unsatisfactory (S/U), students are expected to earn a course grade of satisfactory. Students who are not making satisfactory progress in the program may be placed on probation with conditions imposed for retention in the program or may be recommended for dismissal from the program.

Degree requirements

The Adult Acute Care Clinical Nurse Specialist, Adult/Gerontological and Family Nurse Practitioner tracks are 43 credits, 47 credits and 47 credits, respectively, including 630 clinical practice hours each. These programs of study allow full-time students to complete the requirements in two academic years. Part-time students may complete the program in three to six academic years. The Nursing Education program is 36-37 credits, which includes 210 clinical practice hours and also can be completed in two years.

The program of study for Nurse Anesthesia is 55 credits and requires 28 months of full-time study, commencing in September. Extensive time is required in the clinical setting, beginning with 16 hours a week the first term and concluding with 40 or more hours a week during the final internship. Clinical requirements by the accrediting body require a minimum of 550 cases, in all specialty areas, with at least 800 hours of anesthesia time.

Components of the MSN curriculum

Foundation courses

Foundation courses address critical content needed by all graduate nursing students. These courses include content on nursing theory, diversity, research, ethics, health policy and roles of advanced practice nursing. A total of 15 credits are required in the foundation courses.

Clinical core courses

The clinical core courses provide graduate students with advanced clinical knowledge and skills in pharmacology, assessment, anatomy and physiology, pathophysiology and advanced nursing interventions.

Specialty courses

The specialty courses are comprised of didactic and clinical courses that prepare students for the advanced practice specialties of Adult Acute Care Clinical Nurse Specialist, Family or Adult/Gerontological Nurse Practitioner, Nurse Anesthetist, or Nursing Education. The specialty courses build upon nursing

School of Nursing

knowledge and skills learned at the undergraduate level and during foundation and clinical core courses.

Adult Acute Care Clinical Nurse Specialist Program

Foundation courses

NRS 500	Theoretical Foundations of Advanced Nursing Practice	3
NRS 521	Diversity and Social Issues	2
NRS 531	Research in Advanced Nursing Practice	3
NRS 610	Health Policy and Finance	3
NRS 643	Professional Role Development and Ethics	3
NRS 687	Graduate Research: Project	1
		15

Clinical core courses

NRS 611	Pathophysiology in Advanced Nursing	3
NRS 613	Advanced Health Assessment	4
NRS 616	Advanced Nursing Interventions	2
NRS 648	Pharmacology for Advanced Practice	4
		13

Specialty courses

NRS 658	Adult Nursing: Episodic Care	5
NRS 659	Adult Nursing: Chronic Care	5
NRS 660	Adult Nursing: Rehabilitation and Gerontology	5
		15
	Total:	43

Adult/Gerontological Nurse Practitioner Program

Foundation courses

NRS 500	Theoretical Foundations of Advanced Nursing Practice	3
NRS 521	Diversity and Social Issues	2
NRS 531	Research in Advanced Nursing Practice	3
NRS 610	Health Policy and Finance	3
NRS 643	Professional Role Development and Ethics	3
NRS 687	Graduate Research: Project	1
		15

Clinical core courses

NRS 611	Pathophysiology in Advanced Nursing	3
NRS 613	Advanced Health Assessment	4
NRS 616	Advanced Nursing Interventions	2
NRS 648	Pharmacology for Advanced Practice	4
		13

Specialty courses

NRS 598	Holistic Perspectives on Aging	2
NRS 631	Health Promotion Across the Lifespan	2
NRS 638	Advanced Nursing Care of Adults and Older Adults I	5
NRS 639	Advanced Nursing Care of Adults and Older Adults II	5
NRS 641	Advanced Nursing Care of Frail Elders	5
		19
	Total:	47

Family Nurse Practitioner Program

Foundation courses

NRS 500	Theoretical Foundations of Advanced Nursing Practice	3
NRS 521	Diversity and Social Issues	2
NRS 531	Research in Advanced Nursing Practice	3
NRS 610	Health Policy and Finance	3
NRS 643	Professional Role Development and Ethics	3
NRS 687	Graduate Research: Project	1
		15

Clinical core courses

NRS 611	Pathophysiology in Advanced Nursing	3
NRS 613	Advanced Health Assessment	4
NRS 616	Advanced Nursing Interventions	2
NRS 648	Pharmacology for Advanced Practice	4
		13

Specialty courses

NRS 620	Pediatric Pathophysiology	2
NRS 631	Health Promotion Across the Lifespan	2
NRS 638	Nursing Care of Adults and Older Adults I	5
NRS 639	Nursing Care of Adults and Older Adults II	5
NRS 646	Nursing Care of Pediatric Population	5
		19
	Total:	47

Nurse Anesthesia Program**Foundation courses**

NRS 500	Theoretical Foundations of Advanced Nursing Practice	3
NRS 521	Diversity and Social Issues	2
NRS 531	Research in Advanced Nursing Practice	3
NRS 610	Health Policy and Finance	3
NRS 643	Professional Role Development and Ethics	3
NRS 687	Graduate Research: Project	1
		15

Clinical core courses

NRS 605	Pharmacology for Nurse Anesthesia Practice I	3
NRS 651	Pharmacology for Nurse Anesthesia Practice II	3
NRS 652	Pharmacology for Nurse Anesthesia Practice III	3
BIO 501	Physiology and Pathophysiology I	3
BIO 502	Physiology and Pathophysiology II	3
BIO 503	Gross Anatomical Dissection	3
		18

Specialty courses

NRS 607	Introduction to Nurse Anesthesia Practice and Clinical Internship I	3
NRS 615	Nurse Anesthesia Practice I	4
NRS 617	Nurse Anesthesia Clinical Internship II	1
NRS 618	Biophysics for Nurse Anesthesia	2
NRS 625	Nurse Anesthesia Practice II	4
NRS 627	Nurse Anesthesia Clinical Internship III	1
NRS 635	Regional Anesthesia and Pain Management	3
NRS 637	Nurse Anesthesia Clinical Internship IV	1
NRS 647	Nurse Anesthesia Clinical Internship V	1
NRS 657	Nurse Anesthesia Clinical Internship VI	1
NRS 667	Nurse Anesthesia Clinical Internship VII	1
		22
	Total:	55

Nursing Education Program**Foundation courses**

NRS 500	Theoretical Foundations of Advanced Nursing Practice	3
NRS 521	Diversity and Social Issues	2
NRS 531	Research in Advanced Nursing Practice	3
NRS 610	Health Policy and Finance	3
NRS 643	Professional Role Development and Ethics	3
NRS 687	Graduate Research: Project	1
		15

Clinical core courses

NRS 616	Advanced Nursing Interventions	2
Select one course from the following:		
NRS 611	Pathophysiology in Advanced Nursing	3
NRS 613	Advanced Health Assessment	4
NRS 648	Pharmacology for Advanced Practice	4

5-6

Specialty courses

NRS 632	Curriculum and Instruction in Nursing Education	4
NRS 634	Evaluation in Nursing Education	4
NRS 636	Field Experience in Nursing Education	4
Elective	Elective	4
		16
Total		36-37

■ RN/MSN Degree Completion Sequence

The RN/MSN program is for diploma or associate degree prepared registered nurses who wish to follow an accelerated plan of study for the Master of Science in Nursing in Adult Acute Care Clinical Nurse Specialist, Family Nurse Practitioner or Nursing Education. Students who wish to enter one of these programs must first be admitted to the RN/BSN program. Upon successful completion of the BSN program, the student will transition into the MSN program, have 3 credits completed in the MSN degree and have 5 credits waived at the MSN level. By successfully completing the GRE and maintaining a 3.0 GPA, the student will progress to the MSN program. Refer to the Oakland University Undergraduate Catalog for details.

■ Post-Master's Certificate Programs

The School of Nursing offers three Post-Master's Certificate programs: Adult/Gerontological Nurse Practitioner, Family Nurse Practitioner and Nurse Anesthesia. These programs are designed to provide students who have a Master of Science in Nursing degree with additional coursework in a specific area of nursing.

Post-Master's Certificate: Adult/Gerontological Nurse Practitioner

The plan of study for the Post-Master's Adult/Gerontological Nurse Practitioner (Adult/GNP) program prepares the advanced practice nurse as a primary care provider for adult, older adult and frail elder clients in a variety of settings. The curriculum focuses on culturally sensitive care, incorporating health promotion and management of acute and chronic health problems. The graduate is prepared to apply nursing theory, principles and advanced practice nursing and the research process in the design and delivery of primary care. Knowledge for advanced nursing practice is synthesized from concepts in nursing, as well as the biological and social sciences. Graduates of the Adult/GNP program are prepared to take an Adult Nurse Practitioner national certification examination and/or Gerontological Nurse Practitioner national certification examination.

Admission

Post-Master's Certificate applicants must have a master's degree in nursing from an accredited institution (see admission standards for MSN programs). Students must meet the same admission requirements as those students entering the Adult/GNP program. Two recommendations are required, including at least one from a faculty member familiar with the student's graduate work. Evidence of a graduate-level pathophysiology course must also be submitted. The GRE requirement is waived.

Plan of study

NRS 598	Holistic Perspectives on Aging	2
NRS 631	Health Promotion Across the Lifespan	2
NRS 638	Advanced Nursing Care of Adults and Older Adults I	5
NRS 639	Advanced Nursing Care of Adults and Older Adults II	5
NRS 641	Advanced Nursing Care of Frail Elders	5
		19

There are 19 to 32 credits required in the post-master's specialization. All students are required to complete NRS 598, 631, 638, 639, and 641 for a total of 19 credits.

Additional credits are required for students who have not completed coursework in the following courses:

NRS 613	Advanced Health Assessment	4
NRS 616	Advanced Nursing Interventions	2
NRS 643	Professional Role Development & Ethics	3
NRS 648	Pharmacology for Advanced Practice	4

Post-Master's Certificate: Family Nurse Practitioner

The Post-Master's Family Nurse Practitioner Certificate is a graduate program that prepares the advanced practice nurse as a primary care provider for clients across a variety of settings. The goals and focus of this certificate program are the same as the Family Nurse Practitioner master's program. Upon completion of the certification program, the advanced practice nurse is prepared to take a Family Nurse Practitioner national certification examination.

Admission

Post-Master's Certificate applicants must have a master's degree in nursing from an accredited institution (see admission standards for MSN programs). Students must meet the same admission requirements as those students entering the FNP- MSN program. Two letters of recommendation are required, including at least one from a faculty member familiar with the student's graduate work. Evidence of a graduate-level pathophysiology course must also be submitted. The GRE requirement is waived.

Plan of study

NRS 616	Advanced Nursing Interventions	2
NRS 631	Health Promotion Across the Lifespan	2
NRS 638	Advanced Nursing Care of Adults and Older Adults I	5
NRS 639	Advanced Nursing Care of Adults and Older Adults II	5
NRS 646	Advanced Nursing Care of Pediatric Population	5

There are 19 to 32 credits required in the post-master's specialization. All students are required to complete NRS 616, 631, 638, 639, 646 for 19 credits.

NRS 613	Advanced Health Assessment	4
NRS 620	Pediatric Pathophysiology	2
NRS 643	Professional Role Development and Ethics	3
NRS 648	Pharmacology for Advanced Practice	4

Post-Master's Certificate: Nurse Anesthesia

The Post-Master's Certificate in Nurse Anesthesia is a graduate program of full-time study that prepares nurses as specialists in anesthesia care. Clinical core and specialty courses, including clinical internships, are the same as the MSN nurse anesthesia program. Upon completion of the 40-credit, 28-month post-master's certificate program, the nurse is prepared to take the certification exam offered by the Council of Certification of Nurse Anesthetists leading to the designation CRNA.

Admission

Post-Master's Certificate applicants must have a master's degree in nursing from an accredited institution (see admission standards for MSN programs). Students must meet the same admission requirements, process and deadlines as those students entering the MSN Nurse Anesthesia program. The requirement for the GRE is waived.

Plan of study

Clinical core courses

NRS 605	Pharmacology for NA Practice I	3
NRS 651	Pharmacology for Nurse Anesthesia Practice II	3
NRS 652	Pharmacology for Nurse Anesthesia Practice III	3
BIO 501	Physiology and Pathophysiology I	3
BIO 502	Physiology and Pathophysiology II	3
BIO 503	Gross Anatomical Dissection	3
		18

Specialty courses

NRS 607	Introduction to Nurse Anesthesia Practice and Clinical Internship I	3
NRS 615	Nurse Anesthesia Practice II	4
NRS 617	Nurse Anesthesia Clinical Internship II	1
NRS 618	Biophysics for Nurse Anesthesia	2
NRS 625	Nurse Anesthesia Practice III	4
NRS 627	Nurse Anesthesia Clinical Internship III	1
NRS 635	Regional Anesthesia and Pain Management	3
NRS 637	Nurse Anesthesia Clinical Internship IV	1
NRS 647	Nurse Anesthesia Clinical Internship V	1
NRS 657	Nurse Anesthesia Clinical Internship VI	1
NRS 667	Nurse Anesthesia Clinical Internship VII	1
		22
Total		40

■ Graduate Certificate in Nursing Education

This 15-credit certificate program prepares nurses for teaching positions in higher education and staff development. The program emphasizes instruction in curriculum, program and course design, development and evaluation. A field experience, which may occur in either an academic or service setting, provides students with the opportunity to apply these skills in actual classroom and clinical environments under the guidance of expert School of Nursing faculty. Content focuses on learning styles, teaching methods and evaluation strategies.

Admission

Students must meet the same admission requirements, process, and deadlines as those entering the MSN program.

Plan of study

NRS 632	Curriculum and Instruction in Nursing Education	4
NRS 634	Evaluation in Nursing Education	4
NRS 636	Field Experience in Nursing Education	3
Elective	Elective	4
	Total	15

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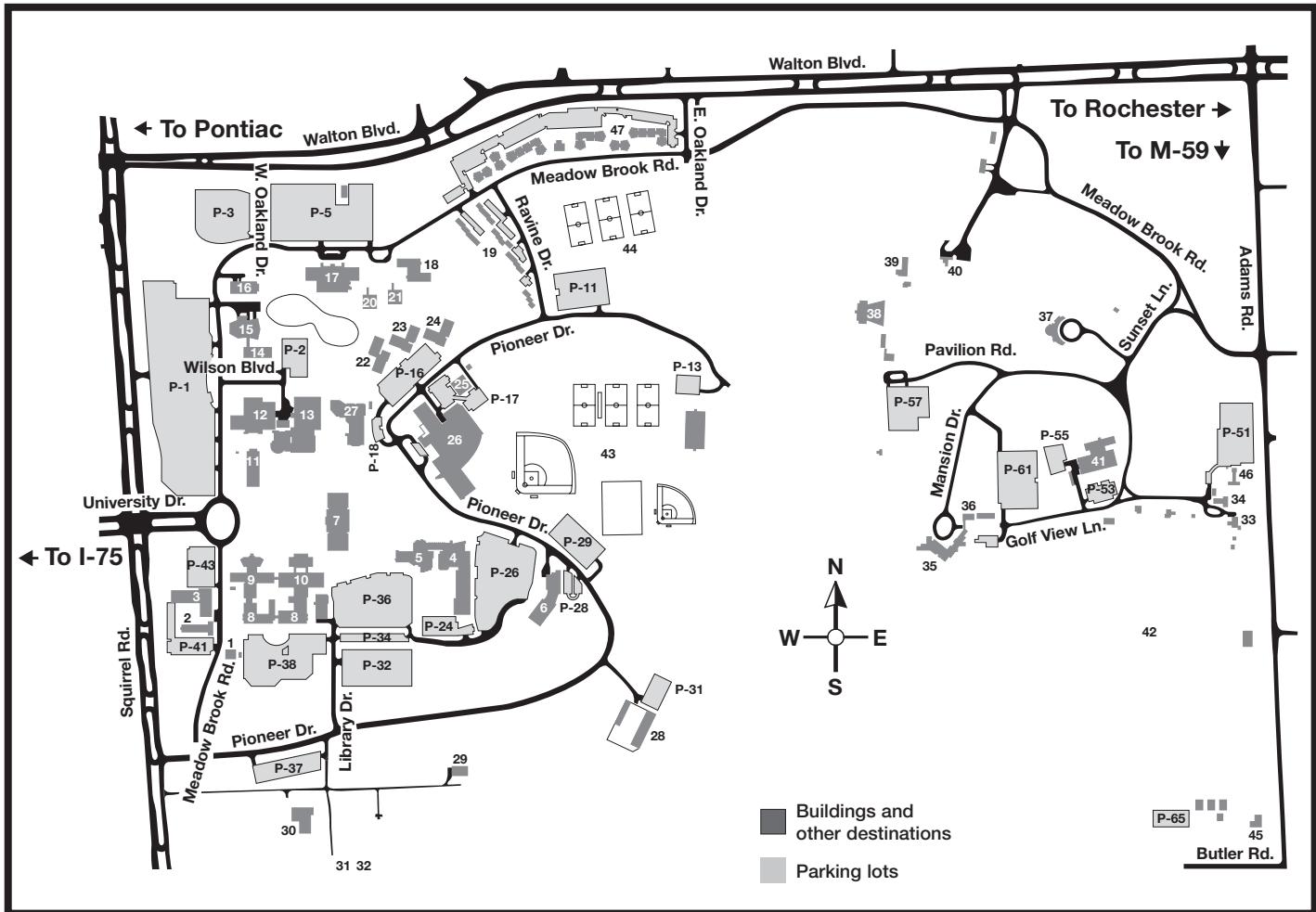
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Oakland University



1. Facilities Management	FM	15. Meadow Brook Theatre	MBT	31. Kettering Magnetics Lab*	KML
2. Belgian Barn		Meadow Brook Art Gallery	MBAG	32. Observatory*	
3. Police and Support Services Building	PSS	16. Graham Health Center	GHC	33. Golf Course Clubhouse and Pro Shop	
4. Varner Hall Recital Hall Studio Theatre	VAR	17. Vandenberg Hall	VBH	34. John Dodge House	JDH
5. Elliott Hall	EH	18. Hamlin Hall	HAM	35. Meadow Brook Hall	MBH
6. Pawley Hall Lowry Early Childhood Education Center	PH	19. George T. Matthews Apartments		36. Carriage House	
7. Kresge Library	KL	20. Hill House	HIL	37. Sunset Terrace	SST
8. Science and Engineering Building	SEB	21. Van Wagoner House	VWH	38. Baldwin Pavilion	BP
9. Hannah Hall of Science	HHS	22. Fitzgerald House	FTZ	39. Trumbull Terrace	
10. Dodge Hall of Engineering	DHE	23. Anibal House	ANI	40. Meadow Brook Music Festival Ticket Office	
11. South Foundation Hall	SFH	24. Pryale House	PRY	41. Shotwell-Gustafson Pavilion	
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		28. Buildings and Grounds Maintenance		45. Varner House	VAH
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		30. Electrical Substation		47. University Student Apartments	USA

* Off Map



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