Courses listed within the catalogue are subject to change through normal academic channels. New courses and changes in existing course work are initiated by academic programs and approved by the appropriate academic officials and committees. Some courses are offered on an alternate schedule, and the College reserves the right to cancel or reschedule courses for enrollment, staffing, or other reasons. Credit hours are indicated in parentheses after the course title. A student who does not meet course prerequisites may petition the instructor for written permission to enter the course.

The first digit of the course number indicates the level of the course as follows:

- 7 Course open to doctoral students only
- 6 Course open to graduate students only
- 5 Course open to graduate students only; to others with permission of the instructor
Graduate Programs

Division of Arts and Design

- **Master of Arts in Landscape Studies**  
  see Landscape Studies courses, page 326
- **Master of Interior Architecture**  
  see Interior Architecture courses, page 316
- **Master of Landscape Architecture**  
  see Landscape Architecture courses, page 321
- **Master of Science in Interior Architecture**  
  see Interior Architecture courses, page 316

Division of Business and Entrepreneurship

- **Master of Business Administration**  
  see Business Administration courses, page 286
- **Master of Business Administration for Healthcare Professionals**,  
  see Business Administration courses, page 286

Division of Health Sciences

- **Transitional Doctor of Physical Therapy**  
  see Physical Therapy courses, page 335
- **Doctor of Physical Therapy**  
  see Physical Therapy courses, page 335
- **Master of Occupational Therapy**  
  see Occupational Therapy courses, page 330
- **Master of Physician Assistant Studies**  
  see Physician Assistant Studies courses, page 343

Division of Human Development

- **Master of Arts in Leadership and Organizational Transformation**  
  see Psychology courses, page 351
- **Master of Arts in Teaching**  
  see Education courses, page 292
- **Master of Science in Counseling Psychology**  
  see Psychology courses, page 349

Division of Writing, Literary, and Cultural Studies

- **Master of Fine Arts in Film and Digital Technology**  
  see Film and Digital Technology courses, page 314
- **Master of Fine Arts in Writing**  
  see English courses, page 307

Online (Offered through Continuing Education)

- **Master of Professional Writing**  
  see Professional Writing courses, page 347
Graduate Courses

Biology (BIO)

502 Human Gross Anatomy (6) Fall
An in-depth study of gross human anatomic structure, emphasizing the musculoskeletal and neuromuscular systems through study of head and neck, body wall, and upper and lower extremity structures. Clinical correlates examine normal movement and pathological processes. Prerequisite: permission of the instructor.

503 Human Anatomy (4) As needed
This course provides a basic understanding of human anatomy, with an emphasis on the osteology and muscles of the upper and lower limbs, including the back. It uses a combination of systems-based and region-specific instruction. Lectures are complimented by laboratory exercises based upon the A.D.A.M. computer program.

506 Principles of Neuroscience (4) Spring
A study of the structure and function of the human central and peripheral nervous system, including vascular components and special senses. The course emphasizes nervous system control of movement. Laboratory experience includes human nervous system material, brain sections, and anatomical models. Prerequisite: permission of the instructor.

508 Developmental Biology (5) Even springs
A study of the embryonic and post-embryonic development of animals, with special emphasis on humans. The morphogenesis, growth, and mechanisms of differentiation are stressed. Other topics include cancer, regeneration, cloning, hormones as mediators of development, and developmental genetics. Prerequisite: One 200-level biology course.

517 Genetics (3) Even falls
A study of the modern concepts of the gene. Lectures stress theory and experimental evidence relating to the structure of the gene, heritability of characteristics, and the behavior of genes in populations. Prerequisites: Biology 143 and 144; Chemistry 205, 215, or equivalent.

531 Advanced Principles of Cell and Molecular Biology (3) Even Springs
An advanced course for the junior or senior science major. Topics include genes and genomes, transcription, translation, the control of gene expression by prokar-yotes, and eukaryotes, DNA synthesis and repair, and cell signaling. Prerequisites: Biology 231 or equivalent.

532 Biostatistics (3) Fall
The study and application of biostatistics and probability distributions in biology, for students who already have a working knowledge of statistics and want to understand the place and application of biostatistical methods in science. Topics include hypothesis testing, analysis of variance for one and many variables, and linear and non-linear regression. Prerequisites: Mathematics 110 and 151, and Biology 144 or equivalent.

540 Biochemistry, Cell, and Molecular Biology Laboratory (2) Even Springs
An advanced laboratory course for junior or senior science majors who wish to gain theoretical and practical experience with the techniques and equipment commonly used in the fields of cellular biology, molecular biology, and biochemistry. Topics include PCR, electrophoresis, enzyme kinetics, aseptic cell and tissue culture, cell surface receptors, and molecular modeling. Five-hour laboratory with one-hour pre-
551 Bioinformatics (3) Spring
An introduction to computer-aided analysis of gene sequences and their relationships to DNA, RNA, and proteins. Topics include use of the computer for restriction mapping, primer selection, and database searches for homology discovery. In addition, students will be able to carry out analyses aimed at predicting the structure and evolution of macromolecules. Prerequisites: Biology 332 and Chemistry 205. Recommended prior course: Biology 517.

552 Computational Drug Design (3) As needed
Study of computational techniques of importance in contemporary drug design. Topics include molecular docking, ligand binding free energy calculations, de novo drug design, pharmacophore elucidation, quantitative structure-activity relations, and combinatorial library design. Prerequisites: A 300-level biology or chemistry course or permission of the instructor. Cross-listed as BIO 452 and CHM 452.

553 Special Topics in Biology (3) As needed
Lectures and/or laboratories in selected areas of contemporary biology, with a focus of recent research. Prerequisite: Graduate standing.

623 Methods of Biological Research (2)
Study of experimental design in biology, including hypothesis formulation, literature review and bibliography selection, experimental methods, budgeting, setting timetables, and consideration of legal and ethical issues. Students will prepare and defend a proposal for their thesis work.

698 Biology Thesis I (2) Spring
Research in an area of biology. This is the first of two courses that result in a thesis approved by a committee of three faculty members.

699 Biology Thesis II (3) Summer
Research in an area of biology. This is the second of two courses that result in a thesis approved by a committee of three faculty members. Prerequisite: Biology 698.

Business Administration

Master of Business Administration
The M.B.A. is unique in its focus on women as leaders as well as the value of diversity in business organizations. In small classes, students apply management concepts to diagnose and solve practical problems in a supportive and collaborative environment. The challenging and technologically relevant curriculum is taught by faculty whose business experience and academic credentials enliven the small interactive classes. Chatham’s long-standing commitment to educating women for leadership roles broadens the learning experience of all students. A central concept of all M.B.A. courses is to continually link theory and practice. The curriculum provides fundamental business skills in accounting, finance, marketing, economics, operations, computer and Internet technology, and business strategy. These skills are necessary to lead and manage in today’s rapidly evolving organizations and global marketplace. Courses such as Organizational Behavior, Management and Leadership, Managing a Diverse Workforce, and Human Resource Management explicitly address the organizational challenges, both subtle and obvious, that women and minorities encounter in the workplace. Electives provide the opportu-
nity for students to explore a variety of business topics in greater depth and to enrich their understanding of organizational complexity.

**Degree Requirements**

Students who have taken undergraduate business courses and received a B or better may be able to waive up to 12 credits of core course work. Proficiency in written and oral communications, college level math, and computer usage including word processing, spread sheets, databases and the Internet are required.

**14 courses, including:**

7 required core courses:

- ACT 510 Accounting Fundamentals (3)
- BUS 505 Organizational Behavior (3)
- BUS 510 Essentials of Management (3)
- BUS 512 Fundamentals of Finance (3)
- BUS 515 Statistical Research Methods for Business (3)
- BUS 517 Economic Analysis for Managerial Decisions (3)
- BUS 519 Marketing and Consumer Behavior (3)

5 advanced courses:

- ACT 550 Managerial Accounting (3)
- BUS 650 Foundations of Management and Leadership (3)
- BUS 651 Strategic Management (3)
- BUS 657 Management Information Systems (3)
- BUS 670 Business Ethics in a Global Context (3)

2 electives from the following:

- BUS 625 Human Resource Management (3)
- BUS 635 Managing a Diverse Workforce (3)
- BUS 658 Foundations of eCommerce (3)
- BUS 660 Seminar on Marketing Strategies (3)
- BUS 665 Issues in Operations Management (3)
- BUS 673 Legal Aspects of Business (3)

- BUS 674 Management of Nonprofit Organizations (3)
- BUS 675 Advanced Corporate Finance (3)
- BUS 676 Investments and Portfolio Management (3)
- BUS 677 Organization Training and Development
- BUS 678 Entrepreneurship (3)
- BUS 683 Special Topics in Management (3)
- BUS 693 Independent Study (3)
- BUS 694 Internship (3)
- BUS 696 Applied Research Project (3)

Appropriate courses from other graduate programs may be accepted as electives with an advisor’s permission.

**Master of Business Administration for Healthcare Professionals**

As practitioners in medicine, nursing, physical and occupational therapy, and other allied health professions move into management positions they increasingly realize that their professional education has not prepared them for their new managerial responsibilities. These include responsibility for leading people, developing programs, budgeting and other financial decision-making, information retrieval and analysis, human resource management, team development, marketing, and planning.

The M.B.A. for Healthcare Professionals provides these management skills as well as an important, and in some cases necessary, credential for upward mobility in the health care arena. In addition, this program will help to develop a better understanding of the larger health care environment and rapid changes taking place in the field.

This program is part of the Chatham Weekend College with classes offered on Saturdays in a seven-week format. Students may choose to take some required courses...
on weeknights in the traditional M.B.A. program to accelerate the program or to accommodate work schedules.

**Degree Requirements**
Students are expected to bring at least 2 years of work experience in a health care organization and some managerial experience. Proficiency in written and oral communications, college level math, and computer usage including word processing, spreadsheets, databases and the Internet are required.

**12 courses, including:**
- **ACT 510** Accounting Fundamentals (3)
- **BUS 505** Organizational Behavior (3)
- **BUS 512** Fundamentals of Finance (3)
- **BUS 515** Statistical Research Methods for Business (3)
- **BUS 517** Economic Analysis for Managerial Decisions (3)
- **BUS 519** Marketing and Consumer Behavior (3)
- **BUS 625** Human Resource Management (3)
- **BUS 642** Ethical and Legal Issues in Health Care (3)
- **BUS 645** Health Care Policy (3)
- **BUS 648** Current Issues in Health Care (3)
- **BUS 651** Strategic Management (3)
- **BUS 657** Management Information Systems (3)

**Accounting (ACT)**

**510 Accounting Fundamentals (3)**
An accelerated study of accounting and financial management issues and techniques to provide insight into the financial performance of organizations. The course is a comprehensive study of the preparation, interpretation, analysis, and use of accounting statements and financial information.

**550 Managerial Accounting (3)**
This course examines accounting information that is used in managerial decision making within the organization. Focus is on interpretation of financial statements, cost accounting, financial planning and analysis, the development of internal controls, and constructing budgets. Prerequisite: Accounting 510 or approved equivalent.

**Business (BUS)**

**505 Organizational Behavior (3)**
This course examines the broad area of human behavior in organizations. It explores the individual, group, and organizational levels of interaction. Topics include perception and attribution, communications, group dynamics, decision making, motivation and leadership, organizational power, politics and conflict, culture, and change. Particular attention is given to issues of diversity and how all these topics relate to women’s development as managers and leaders.

**510 Essentials of Management (3)**
This course provides students with an understanding of organizational systems and various theoretical and practical approaches for structuring and managing organizations. Case studies, readings, and experiential exercises are used that feature women and minorities managing the challenges of today’s fast-paced organizations.

**512 Fundamentals of Finance (3)**
This course examines the mechanics of wealth creation in a practical context. Topics include the time value of money, portfolio theory, money, and capital markets, financial statements analysis, tax structures, monetary and fiscal policy and economic performance, and the influence of events in the global economy.
515 Statistical Research Methods for Business (3)
This course examines the fundamentals of research and quantitative methodology with emphasis on the use of statistical analysis by business. Topics include statistical measures and distributions, application of probability to statistical inference, experimental design, hypothesis testing, linear correlation, and statistical quality control. Focus is on business applications of statistics using problems and case studies. Course uses computer-based statistical package for data analysis.

517 Economic Analysis for Managerial Decisions (3)
This introduction to economic analysis examines the major areas of study within microeconomics and macroeconomics and teaches students to apply the basic tools of economic analysis to policy and business decision making. Topics include supply and demand, production functions, cost, market structure, inflation, unemployment, and economic growth.

519 Marketing and Consumer Behavior (3)
This course examines marketing concepts and methods, including product, pricing, promotion, and distribution strategies. The course explores the nature and dynamics of consumer markets. Concepts and constructs are used to identify and measure market segments as a basis of market strategy.

625 Human Resource Management (3)
This course covers the primary functions of human resource management: recruitment and selection, training and development, employee/labor relations, and compensation and benefits. The effects of past and current HR practices on diverse groups and women's career development are considered, and effective strategies for career mobility are emphasized. Recent legislation, developments and technology, and current employment issues in HR are also addressed.

635 Managing a Diverse Workforce (3)
This course gives students the knowledge and skills to effectively champion a diverse workforce as well as respond to the challenges and opportunities posed by the presence of diversity in organizations. By combining theory with concrete competency development through readings, case studies, and experiential activities, students will learn to manage real-life diversity issues and understand the connection between multicultural diversity and organizational bottom-line success.

642 Ethical and Legal Issues in Health Care (3)
This course presents an overview of the ethical and legal issues that impact the delivery of health services. The basic principles of bioethics and the application of bioethical principles to patient care and services will be discussed along with instruction in the U.S. legal system and tort law. The focus will be on solving problems faced by health care providers and administrators using the legal and ethical principles learned.

645 Health Care Policy (3)
This course examines the health policies in the United States with comparisons to other countries. It uses a policy analysis framework to explore the formation, implementation, and outcomes of a wide variety of public policies relating to health, including the following: professional standards and liability, costs and coverage of medical care, drug regulation, organ donation, and epidemics.

648 Current Issues in Healthcare (3)
This course will explore current issues in healthcare, increasing awareness of the evolving changes in healthcare, along with the changes in healthcare oversight and
regulation. The effects of culture and diversity on the delivery and receiving of healthcare will also be examined.

650 Foundations of Management and Leadership (3)
This advanced seminar explores a varied selection of the rich literature concerning management and leadership that addresses the organizational challenges of the 21st century. Classic schools of thought, as well as new paradigms, receive critical evaluation. Case studies of successes and failures in management and leadership provide a basis for in-depth discussion. Various styles of effective leadership are examined with particular attention to female role models. Prerequisite: Business 505 or 510.

651 Strategic Management (3)
This course explores the systematic processes implicit in strategic planning, including definition of mission, environmental forecasting, analysis of risk, scenario construction, trend analysis, and formulation and implementation of strategy. Through analysis of cases drawn from diverse organizations, students develop approaches to corporate and nonprofit management at the top level. Prerequisites: management core and 12 credits of advanced required courses or permission of the program director.

657 Management Information Systems (3)
This course emphasizes the use of computer resources for managers. This includes discussion and hands-on use of online resources and databases, project management systems, decision support systems, and database management systems. Topics also include systems analysis and design, management of technical personnel and security, and ethics in management information systems.

658 Foundations of eCommerce (3)
The new economy is rapidly changing eCommerce from an optional competitive advantage to a sustained-value requirement. For managers to thrive they must understand what eCommerce is, how it works, and how to integrate it into traditional supply and delivery chains. Students are introduced to eThinking through a higher level look at the technology and business models that drive eCommerce today. The course will emphasize analyses of real companies using eCommerce applications to determine what approaches are and will be most effective for current business future plans and entrepreneurial aspirations.

660 Seminar on Marketing Strategies (3)
This course examines the concepts and processes for gaining competitive advantage in the marketplace. Students learn how to formulate marketing strategies, write marketing plans, understand the process of implementation, and develop marketing evaluation and control systems. Prerequisites: Business 519 and two other core courses, or permission of the program director.

665 Issues in Operations Management (3)
Operations management combines topics from accounting, industrial engineering, management science, and statistics. Topics include global issues that drive operations decisions, quality control, location and layout strategies, job design, supply chain management, scheduling, just-in-time (JIT) systems, decision trees and tables, and service operations. Prerequisite: Business 515 or permission of the program director.

670 Business Ethics in a Global Context (3)
This course provides an intellectual framework in which to consider the ways soci-
Graduate Programs

Students apply ethical decision tools to the numerous moral challenges confronting them in their professional careers with particular attention given to women and minorities in organizational life and the ethical dilemmas they may confront. The global context of ethical decision making is examined.

673 Legal Aspects of Business (3)
This course introduces business law and the legal system in preparation for dealing with legal business issues and attorneys. Topics include civil procedure, torts, strict liability, legal fees and case management, common law contracts, the Uniform Commercial Code, partnerships, corporate law, estates and trusts, secured transactions, third-party rights, property, insurance, securities law, and ethics.

674 Management of Nonprofit Organizations (3)
The nonprofit sector is a fast-growing part of the public domain. Students will get an overview of key areas of nonprofit management and how it compares to for-profit organizations. Students will examine processes and strategies that nonprofits have adopted from businesses and government entities, and how they can be adapted to fit the mission of the nonprofit organization.

675 Advanced Corporate Finance (3)
This course deepens an understanding of financial analysis tools and concepts. Students will learn how and when to use the financial-analytical tools required to make effective business and policy decision. Functional areas addressed are assessing financial health, planning financial performance, and interpretation of data and recommendations.

676 Investments and Portfolio Management (3)
This course will discuss and teach the tools to objectively evaluate investment, portfolio, and market risks. Through case studies, lectures, videos, readings, and exams, students will learn the basic concepts and applications in investment decision making. An exercise in which students invest a predetermined sum of imaginary capital to choose a portfolio of personal assets gives firsthand experience into the competitive and potentially speculative nature of investment and portfolio management.

677 Organizational Training and Development
This course teaches students about the process of improving individual performance in organizations. Topics include needs assessment, program design, implementation, evaluation, and related training and development topics. Emphasis is on both practical application of training and development concepts and presentation skills, training design, and implementation.

678 Entrepreneurship (3)
This course provides an understanding of the entrepreneurial process. It begins with a perspective of the entrepreneur and covers areas such as starting a venture, financing options, managing and growing the business and finally harvesting strategies. The student will integrate concepts from previous courses in management, finance, law, and marketing.

682, 683 Special Topics in Management (2, 3)
This course will address a different special topic in management each time it is offered. Topics will be chosen for their currency in the management arena and enable the student to be knowledgeable about cutting-edge issues, practices, and tech-
nologies. Prerequisite: waiver or completion of core courses or permission of the program director.

691, 692, 693 Independent Study (1, 2, 3)

694 Internship (3)
An internship provides valuable professional experience and an opportunity to gain insights and perspective on potential career choices in the field of management. Under the supervision of an experienced manager who provides coaching, feedback, and evaluation, students work a minimum of 120 hours over a term. The student keeps a journal and writes papers interpreting this experience in relationship to coursework and management literature. Prerequisites: management core. Pass/fail grading option only.

696 Applied Research Project (3)
Each student selects a specific problem, question, or topic and is guided in the process of planning and conducting a management-related research project. Students present a final written project paper and make an oral presentation of their findings and recommendations.

Communication (COM)

680 Integrative Project (3)

682, 683 Special Topics (2, 3)

691, 692, 693 Independent Study (1, 2, 3)

Education (EDU)

Master of Arts in Teaching
The Master of Arts in Teaching (M.A.T.) degree is designed for women and men planning careers in the teaching profession at the early childhood (N-3rd grade), elementary (K-6th grade), or secondary levels (7th-12th grade, in the areas of English, social studies, biology, chemistry, mathematics, and physics), and special education, and environmental education (K-12th grade). The program is based on the premise that successful teachers will need a strong liberal arts education, in-depth knowledge of a chosen discipline, and mastery of current educational theory, practice, and technology. Applicants’ transcripts will be reviewed to determine whether students have completed the academic requirements specified by the Pennsylvania Department of Education in the standards for the desired certification area. All undergraduate requirements for certification in a given area need to be completed before a student is fully accepted into the M.A.T. program.

The M.A.T. degree provides a curriculum differentiated to serve students with a wide range of academic and professional experiences, including those:
- who have no experience in the field of education, and are seeking both a master’s degree and certification in the Commonwealth of Pennsylvania;
- who are currently teaching in an independent or parochial school without certification and wish to become certified while earning a master’s degree

Students who are certified professionals currently teaching full or part time and are seeking a master’s degree are eligible for the M.S.Ed program.
The M.A.T. program in special education is available for students:

- seeking a master’s degree and certification in special education, or dual certification in special education and either elementary or secondary education;
- certified in elementary or secondary education, seeking additional certification in special education; or
- certified in special education, seeking a master’s degree.

Program of Study

Students with no academic or professional experience in the field of education who are seeking a master’s degree and either elementary or secondary certification must complete 45 credits, including:

- 33 credits in professional preparation and content-related courses
- 3 credits in field placement
- 9 credits in student teaching
- Successful completion of the NTE PRAXIS Pre-professional Test Battery in reading, writing, and mathematics prior to full admission to the program, and successful completion of all required Praxis examinations before certification applications can be forwarded to the State Department of Education Bureau of Teacher Preparation and Certification.

All students seeking Pennsylvania state certification must have the following: 6 credits in English, including 3 credits in composition or writing and 3 credits in English literature; and 6 credits in college-level mathematics prior to entering the program.

Those individuals with no academic or professional experience in the field of education who are seeking a master’s degree with dual certification in special education and either elementary or secondary education must complete 64 credits, including:

- 50 credits in professional preparation and content-related courses
- 5 credits in field placement
- 9 credits in student teaching
- Successful completion of the NTE PRAXIS Professional Test Battery in reading, writing, mathematics, and listening prior to full admission to the program, and successful completion of all required Praxis examinations before certification applications can be forwarded to the State Department of Education Bureau of Teacher Preparation and Certification.

Students who have experience in the field of education and are seeking a master’s degree and/or further certification should contact the program director or academic advisor for specific requirements of their programs of study.

For those students seeking special education certification, a minimum of four 40-hour field experiences (excluding student teaching) totaling approximately 160 hours is required. Additional field experiences are possible and encouraged. Field experiences are equivalent to one credit hour and, in most cases, involve classroom visitation one day per week for at least three hours per visit for the duration of the term. Placements will be based on the particular course or courses in which the student is enrolled. Students will document their experiences in a Special Education Field Experience Record Book. A completed Record Book is to be submitted to the Education Department prior to making application for certification in special education.

A certificate in the education of gifted and talented children is an 18-credit (six-course) graduate certificate, including four required courses and a choice of two additional elective courses. The Commonwealth of Pennsylvania does not currently offer instructional certification in this area.
A certificate in Directorship of Early Childhood Centers is a 24 credit (eight courses) graduate certificate including five required courses and a choice of additional electives. The Commonwealth of Pennsylvania does not currently offer instructional certification in this area.

**Degree Requirements – Early Childhood**

44 credits, including:
- EDU 502 Perspectives on Education (2)
- EDU 503 Children’s Literature and the Arts (3)
- EDU 524 Teaching in a Multicultural Setting (3)
- EDU 580 Field Placement: School Culture (1)
- EDU 581 Field Placement: Instructional Strategies (1)
- EDU 582 Field Placement: Learning Support/Inclusion (1)
- EDU 607 Child and Adolescent Development in the School Context (3)
- EDU 609 Communication Skills (3)
- EDU 613 Elementary School Curriculum (3)
- EDU 618 Instructional Computer Integration (3)
- EDU 632 Human Geography: Content and Methodology (3)
- EDU 634 Inclusion: Issues and Strategies (2)
- EDU 635 New Visions of Mathematics in the Elementary Classroom (2)
- EDU 636 New Visions of Science in the Elementary Classroom (2)
- EDU 637 Writing as Learning (3)
- EDU 693 Elementary Student Teaching (9)

**Degree Requirements – Elementary**

44 credits, including:
- EDU 502 Perspectives on Education (2)
- EDU 503 Children’s Literature, Media, and the Arts (3)
- EDU 524 Teaching in a Multicultural Setting (3)
- EDU 580 Field Placement: School Culture (1)
- EDU 581 Field Placement: Instructional Strategies (1)
- EDU 582 Field Placement: Learning Support/Inclusion (1)
- EDU 607 Child and Adolescent Development in the School Context (3)
- EDU 609 Communication Skills (3)
- EDU 613 Elementary School Curriculum (3)
- EDU 618 Instructional Computer Integration (3)
- EDU 632 Human Geography: Content and Methodology (3)
- EDU 634 Inclusion: Issues and Strategies (2)
- EDU 635 New Visions of Mathematics in the Elementary Classroom (2)
- EDU 636 New Visions of Science in the Elementary Classroom (2)
- EDU 637 Writing as Learning (3)
- EDU 693 Elementary Student Teaching (9)

**Degree Requirements – Secondary (biology, chemistry, English, mathematics, physics, or social studies):**

45 credits, including:
- EDU 502 Perspectives on Education (2)
- EDU 521 Secondary School Curriculum (2)
- EDU 524 Teaching in a Multicultural Setting (3)
- EDU 525 Tests and Measurements (3)
- EDU 526 Content Reading Instruction (3)
EDU 527 Teaching Methods in Secondary English (3) or
EDU 528 Teaching Methods in Secondary Social Studies or
EDU 529 Teaching Science in the Secondary School (3) or
EDU 530 Teaching Secondary School Mathematics (3)
EDU 580 School Culture Field Placement (1)
EDU 581 Field Placement: Instructional Strategies (1)
EDU 582 Field Placement: Learning Support/Inclusion (1)
EDU 607 Child and Adolescent Development in the School Context (3)
EDU 618 Instructional Computer Integration (3)
EDU 634 Inclusion: Issues and Strategies (2)
EDU 695 Secondary Student Teaching (9)

3 courses in content area of certification

**Degree Requirements – Special Education (for students who hold no other teaching certificate)**

64 credits, including:

EDU 502 Perspectives on Education (2)
EDU 506 Issues in Special Education (3)
EDU 524 Teaching in a Multicultural Setting (3)
EDU 582 Field Placement: Learning Support/Inclusion (1)
EDU 607 Child and Adolescent Development in the School Context (3)
EDU 609 Communication Skills (3)
EDU 613 Elementary School Curriculum (3)
EDU 618 Instructional Computer Integration (3)
EDU 629 School Law (3)
EDU 635 New Visions of Mathematics in the Elementary Classroom (2)
EDU 636 New Visions of Science in the Elementary Classroom (2)
EDU 651 Gifted Education (3)
EDU 652 Characteristics of Individuals with Physical and Neurological Disorders (2)
EDU 655 Assessment of Special Needs Students (3)
EDU 661 Curriculum and Instruction of Individuals with Mild Learning Needs (3)
EDU 664 Behavior Management in the Classroom (3)
EDU 668 Curriculum and Instruction of Individuals with Moderate to Severe Disabilities (3)
EDU 671 Collaboration (3)
EDU 673 Transition Planning and Adult Services (3)
EDU 683 Field Placement: Emotional Support (1)
EDU 684 Field Placement: Transition (1)
EDU 685 Field Placement: Multiple and Physical Exceptionalities (1)
EDU 686 Field Placement: Life Skills (1)
EDU 696 Student Teaching in Special Education (9)

**Degree Requirements – Special Education (for students who are seeking certification in both elementary and special education)**

67 credits, including:

EDU 502 Perspectives on Education (2)
EDU 503 Children’s Literature, Media, and the Arts (3)
EDU 506 Issues in Special Education (3)
EDU 524 Teaching in a Multicultural Setting (3)
EDU 582 Field Placement: Learning Support/Inclusion (1)
EDU 607 Child and Adolescent Development in the School Context (3)
EDU 609 Communication Skills (3)
EDU 613 Elementary Curriculum (3)
EDU 618 Instructional Computer Integration (3)
EDU 629 School Law (3)
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<td>EDU 637</td>
<td>Writing as Learning: Theory, Practice, and Pedagogy (3)</td>
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<td>EDU 651</td>
<td>Education of the Gifted (3)</td>
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<td>EDU 676</td>
<td>Field Placement: Life Skills (1)</td>
</tr>
<tr>
<td>EDU 683</td>
<td>Practicum in Special Education (9)</td>
</tr>
</tbody>
</table>

**Degree Requirements – Special Education (for students who already hold certification in elementary education)**

**48 credits, including:**

<table>
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<tr>
<th>Course Code</th>
<th>Course Title</th>
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<tbody>
<tr>
<td>EDU 506</td>
<td>Issues in Special Education (3)</td>
</tr>
<tr>
<td>EDU 582</td>
<td>Field Placement: Learning Support/Inclusion (1)</td>
</tr>
<tr>
<td>EDU 618</td>
<td>Instructional Computer Integration (3)</td>
</tr>
<tr>
<td>EDU 629</td>
<td>School Law (3)</td>
</tr>
<tr>
<td>EDU 635</td>
<td>New Visions of Mathematics in the Elementary Classroom (2)</td>
</tr>
<tr>
<td>EDU 636</td>
<td>New Visions in Science in the Elementary Classroom (2)</td>
</tr>
<tr>
<td>EDU 651</td>
<td>Education of the Gifted (3)</td>
</tr>
<tr>
<td>EDU 652</td>
<td>Characteristics of Individuals with Physical and Neurological Disorders (2)</td>
</tr>
<tr>
<td>EDU 655</td>
<td>Assessment of Special Needs Students (3)</td>
</tr>
<tr>
<td>EDU 661</td>
<td>Curriculum and Instruction of Individuals with Mild Learning Needs (3)</td>
</tr>
<tr>
<td>EDU 664</td>
<td>Behavior Management in the Classroom (3)</td>
</tr>
<tr>
<td>EDU 668</td>
<td>Curriculum and Instruction of Individuals with Moderate to Severe Disabilities (3)</td>
</tr>
<tr>
<td>EDU 671</td>
<td>Collaboration (3)</td>
</tr>
<tr>
<td>EDU 673</td>
<td>Transition Planning and Adult Services (3)</td>
</tr>
<tr>
<td>EDU 683</td>
<td>Field Placement: Emotional Support (1)</td>
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<tr>
<td>EDU 684</td>
<td>Field Placement: Transition (1)</td>
</tr>
<tr>
<td>EDU 685</td>
<td>Field Placement: Multiple and Physical Exceptionalities (1)</td>
</tr>
<tr>
<td>EDU 686</td>
<td>Field Placement: Life Skills (1)</td>
</tr>
</tbody>
</table>

**Graduate Certificate in Education for Gifted and Talented Children Requirements**

This certificate is an 18-credit gifted-education program offered by Chatham College. The State of Pennsylvania does not currently offer instructional certification in this area. Education of gifted and talented students is part of Special Education in Pennsylvania.

**6 courses, including:**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
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<tbody>
<tr>
<td>EDU 651</td>
<td>Education of the Gifted and Talented (3)</td>
</tr>
<tr>
<td>EDU 652</td>
<td>Gifted and Exceptional Children (3)</td>
</tr>
<tr>
<td>EDU 653</td>
<td>Models of Gifted Education: Curriculum (3)</td>
</tr>
<tr>
<td>EDU 654</td>
<td>Multicultural Gifted Education: Diverse Populations (3)</td>
</tr>
</tbody>
</table>
At least 6 credits from the following:
EDU 503 Children’s Literature, Media, and the Arts (3)
EDU 618 Computer Integration (3)
EDU 635 New Visions of Mathematics (2)
EDU 636 Visions of Science in the Elementary Classroom (2)
EDU 648 Special Topics: Environmental Education Experiences in the Schoolyard (3)

Other courses may be chosen as electives in consultation with an education program advisor.

School Counseling Certification Program: Elementary, Secondary, and Dual K-12
Chatham College offers Pennsylvania State Certification in Elementary, Secondary, and Dual (K-12) School Counseling. Students may pursue state certification through either the Master of Science in Counseling Psychology or the Master of Arts in Teaching programs. Students can also pursue Pennsylvania State Licensure as a Professional Counselor.

The School Counseling Program includes a conceptual base focused on the preparation of school counselors who are concerned with improving both the conditions for learning and helping each student to reach his or her fullest potential. This program supports equality of diversity and opportunity. Its primary goal is to provide the most comprehensive education in school counseling, so that our graduates may better meet the needs of students and the communities where they live.

Pennsylvania School Counseling Certification Requirements
All students seeking Pennsylvania state certification must have the following: 6 credits in English, including 3 credits in composition or writing and 3 credits in English literature; and 6 credits in college-level mathematics prior to entering the program.

54 credits, including:
EDU 506 Issues in Special Education (3)
EDU 607 Children and Adolescents: Developmental Issues (3)
EDU 623 Teaching Methods and Curriculum Development for School Counselors K-12 (3)
EDU 629 School Law (3)
EDU 671 Collaboration, Consultation, and Teamwork (3)
PSY 517 Culture and Identity (3)
PSY 555 Statistics and Research Design (3) for those students in the MSCP program or EDU 525 Tests and Measurements (3) for those students in the MAT program
PSY 584 Practicum in School Counseling (3)
PSY 594 Supervised School Internship I (3)
PSY 595 Supervised School Internship II (3)
PSY 623 Contemporary Issues in Counseling: Crisis/Addict. (3)
PSY 627 Vocational/Career Counseling (3)
PSY 642 Assessment (3)
PSY 662 Theories and Techniques of Counseling (3)
PSY 670 Foundations of School Counseling (3)
PSY 672 Group Counseling (3)
PSY 674 Introduction to Family Therapy (3)
PSY 676 Counseling Children and Adolescents (3)

Note: For dual certification, one internship will be in an elementary school setting and another in a high school setting.
Master of Science in Counseling Psychology and Pennsylvania State Licensure Requirements

60 credits
Students must complete all of the above courses for Pennsylvania School Counseling Certification and the following courses:

PSY 635  Concepts of Mental Health (3)
1 approved elective course (3)

502 Perspectives on Education (2)
This course examines the influences that have resulted in the unique role of the teacher and school in our society in the past as well as the present. Selected educational issues are analyzed, such as the characteristics and needs of exceptional children, the role of technology in education, and school-community relations. Students are required to complete a major research project that addresses a current educational issue. Prerequisite: M.A.T. student. Students must take Education 580 Field Placement: School Culture

503 Children's Literature and the Arts (3)
In this course students explore and develop in-depth knowledge of children’s literature and its integration into the early childhood or elementary curricula. Students are required to complete a major project using technology and the arts that demonstrates possession of a repertoire of methods and skills that can be used effectively in a classroom setting. Prerequisite or corequisite: Education 502.

506 Issues in Special Education (3)
This course presents a historical overview of special education as related to current perspectives and practices. In the course students become acquainted with the range of exceptionalities and consider the ethical and legal rights afforded exceptional students and their parents. Prerequisite: Education 502

515 Secondary School Curriculum (2)
Students investigate instructional planning and implementation as well as a range of behavior and classroom management techniques. Reading assignments in appropriate professional literature encourage students to develop a familiarity with the most effective teaching approaches. Motivation, evaluation of student achievement, and differentiation of instruction are considered.

516 Teaching Methods in Secondary English (3)
This course addresses the theory and philosophy of teaching language arts in middle and secondary schools. Classroom teaching strategies are explored and implemented in class presentation and in 70-12 public classrooms. Students plan instructional situations that clearly express the reading-writing connection that exists in effective language arts programs.

517 Teaching Methods in Secondary Social Studies (3)
This course intends to develop teaching/learning styles that research has shown is most effective for teaching social studies to adolescents. Contextual teaching, problem based learning and critical thinking are approached through instructional strategies that combine investigative classroom inquiry with both national and state content standards. Students learn to frame issues, help students research and analyze data and information and to construct meaning and understanding.

518 Teaching Science in the Secondary School (3)
Examination of current theory and practice for teaching science in secondary schools is explored in this course. Curriculum development, teaching strategies and methodologies and assessment issues are also addressed. Students examine research-based curricu-
lum and inquiry teaching and learning as best practices in science education.

519 Teaching Secondary School Mathematics (3)
A balance of theory and practice is explored in this course to help students become effective teachers of mathematics. Curriculum development, teaching strategies and methodologies and assessment issues are also addressed.

521 Secondary School Curriculum (2)
Students investigate instructional planning and implementation as well as a range of behavior and classroom management techniques. Reading assignments in appropriate professional literature encourage students to develop a familiarity with the most effective teaching approaches. Motivation, evaluation of student achievement, and differentiation of instruction are considered. Prerequisites: Education 502 and 607.

524 Teaching in a Multicultural Setting (3)
This course is designed to help future teachers understand the complexities of teaching in a culturally diverse classroom. Instruction provides the student with the knowledge and understanding needed to work effectively with students from various socioeconomic, religious, ethnic, and cultural groups. Students are offered instructional concepts and strategies to build effective multicultural learning communities. In addition to being required to participate in the annual multicultural event, the student must complete a major research project that reflects the instruction provided in the course and demonstrates the student's understanding of cultural diversity and how it can be addressed effectively in the classroom setting. Prerequisites: Education 502 and 607.

525 Tests and Measurements (3)
A study of the principles and major concepts of psychological and educational testing is the focus of this course. A brief review of statistical measures used in test reporting is integrated with classroom decision-making strategies. A systematic coverage of various types of tests in current use in educational settings is given. Special emphasis is placed on current standardized testing and using standardized results to inform teaching and learning. Prerequisites: Education 502, 521, and 607.

526 Content Reading Instruction (3)
This course is designed for secondary education certification students to help them teach secondary school students to read and communicate effectively in the subject area they plan to teach. The course demonstrates how reading strategies can be integrated with other language modes (listening, speaking, writing, and observing), thereby improving secondary school students’ comprehension in any subject area. Students are required to complete a major research paper or project in which they demonstrate their mastery of course content and ability to integrate the strategies they have learned into their instruction of the discipline in which they specialize. Prerequisites: Education 502 and 607.

527 Teaching Methods in Secondary English (3)
This course addresses the theory and philosophy of teaching language arts in middle and secondary schools. Classroom teaching strategies are explored and implemented in class presentations and in grade 7-12 public school classrooms. Students plan instructional situations that clearly express the reading-writing connection that exists in effective language arts programs. Prerequisite or corequisite: Education 521.
528 Teaching Methods in Secondary Social Studies (3)
This course intends to develop teaching/learning styles that research has shown are most effective for teaching social studies to adolescents. Contextual teaching, problem-based learning, and critical thinking are approached through instructional strategies that combine investigative classroom inquiry with both national and state content standards. Students learn to frame issues, to help students research and analyze data and information, and to construct meaning and understanding. Prerequisite or corequisite: Education 521.

529 Teaching Science in the Secondary School (3)
Examination of current theory and practice for teaching science in secondary schools is explored in this course. Curriculum development, teaching strategies and methodologies, and assessment issues are also addressed. Students examine research-based curriculum and inquiry teaching and learning as best practices in science education. Prerequisite or corequisite: Education 521.

530 Teaching Secondary School Mathematics (3)
A balance of theory and practice is explored in this course to help students become effective teachers of mathematics. Curriculum development, teaching strategies and methodologies, and assessment issues are also addressed. Prerequisite or corequisite: Education 521.

580 Field Placement: School Culture (1)
This field placement offers the student the opportunity to experience and assess the culture of a school. Daily interactions among teachers, students, administration, and support staff in a unique physical setting provide the pre-service teacher with a comprehensive overview of school life. This field placement should be taken with Education 502 Perspectives on Education.

581 Field Placement: Instructional Strategies (1)
Students assist classroom teachers in a variety of experiences such as tutoring, leading small group activities, creating bulletin boards, and evaluating student work. Maintaining a record of a variety of instructional strategies is a requirement of this field placement. Three lessons are taught and evaluated during this placement. This field placement should be taken with Education 613 Elementary Curriculum.

582 Field Placement: Learning Support/Inclusion (1)
Students work collaboratively with host teachers or supervisors to modify instruction for students placed in general education classrooms and resource rooms. Students employ a variety of instructional modification to enhance learning for the children.

591, 592, 593 Independent Study (1, 2, 3)

607 Child and Adolescent Development in the School Context (3)
Focusing on child development from the prenatal stage to age 12, this course emphasizes current and past research on the physical, cognitive, and social development of the child. Students examine the nature of adolescent development, implications of the cognitive and affective characteristics of adolescents in the selection of instructional methods and curricular materials, and structural and organizational features of typical high schools. Students complete a major research paper based on their understanding of the theoretical bases of the course and observation of children in classroom settings.

609 Communication Skills (3)
The interrelationships among listening, speaking, writing, and reading are investigated with a view toward emphasis on the
impact that classroom organization, patterns, materials, and approaches have on teacher effectiveness in teaching elementary and early childhood-aged students individually and in groups. Students are required to complete a major research paper or project in which they demonstrate knowledge of and skill in using teaching strategies that reinforce the theoretical considerations of the course. Prerequisite or corequisite: Education 502.

611 Early Childhood Curriculum (3)
Students explore the teaching of subject matter in fields such as mathematics, science, music, art, social studies, health, and physical education in an early childhood setting. Students experience the use of the computer as a teaching tool and are given instruction in the examination and evaluation of software for use in the environment. Students are required to complete a major research paper or project to demonstrate their knowledge of and skill in using the theories introduced in the course to develop a curriculum for use with children enrolled in an early childhood program. Prerequisites or corequisites: Education 502, 607, and 609.

613 Elementary School Curriculum and Management (3)
Students explore the teaching of subject matter other than reading in the context of the development of a variety of teaching styles, strategies, and structuring of learning situations for elementary school children. Students examine the use of the microcomputer and computer software for use in the classroom environment. Students are required to complete a major research paper or project to demonstrate their knowledge of and skill in using the theories introduced in the course and their ability to translate their knowledge and skill into effective instruction for children. Prerequisite: Permission of the instructor.

614 Designing Early Childhood Centers (2)
This course explores the connection between curriculum and physical environment. Major approaches and theories in early childhood curriculum are explored in terms of their cognitive, social, and physical dimensions. Emphasis is placed on the physical expression of early childhood learning theory. Issues of health and safety, including state and federal regulations are also explored. A field experience is part of this course.

618 Instructional Computer Integration (3)
This course is designed to help teachers developing competency integrating computer technology with the school curriculum. It provides a practical introduction to using computers to help students learn emerging instructional technologies. Special emphasis is on the processes and products available through computer technology and educational media. Students prepare an instructional unit integrating a variety of technologies and experiences with current curricula found in public schools. Prerequisite: permission of the instructor.

623 Teaching Methods and Curriculum Development for School Counselors K-12 (3)
School counseling students will learn developmental curriculum design, operational components of the school system, teaching strategies, and classroom management techniques to be applied from kindergarten to 12th grade levels. Students are required to read and report on individualized assignments in professional literature to encourage them to develop familiarity with the most effective teaching approaches in school counseling. Issues such as student motivation, evaluation of student achievement, the use of technology in teaching,
and group and individualized instruction are studied. Students are required to apply their knowledge of teaching in the classroom and to complete a major research paper or project related to effective instruction in school counseling. Students examine the use of the microcomputer and computer software for use in school counseling and the classroom environment.

629 School Law (3)
The focus of this course is to explore the interaction between law and educational practice and their continuing development under the press of changing societal demands. The tension between governmental controls and the exercise of individual rights is examined. The course provides educators with information and insights to enable them to address potential legal problems using sound judgment. Prerequisite: permission of the instructor

632 Human Geography: Content and Methodology (3)
This course provides pre-service teachers an awareness of the existential, ethical, intellectual, and practical reasons that all individuals need an understanding of geography. Pre-service teachers are given a conceptual framework to provide instruction in geography, a study of people, places, and the environment from a spatial perspective.

633 Early Interventions: Issues and Strategies (3)
This course explores the dynamics of interventions in the life of young children with exceptionalities. A team approach involving health care professionals, educators, social workers, and parents is employed to explore the multi-dimensional requirements of these young children. Prerequisites: Education 502, 607. Co-requisite: Education 582.

634 Inclusion: Issues and Strategies (2)
This course is a survey of practices of inclusion in education. It encompasses the historical precedents, underlying philosophy, educational theory, instructional strategies, and practical implications of its implementation. Students participate in a variety of learning experiences throughout the course. Journal readings are used as the basis for information and to identify trends in inclusionary practice. Collaborative learning provides adults with the opportunity to apply their experiences to the inclusion model. Parents, community agencies, and educators are involved in panel discussions demonstrating the dynamics of educating students in an inclusive setting. Students adapt instructional materials and examine behavior-management techniques needed in an inclusive setting.

635 New Visions of Mathematics in the Elementary Classroom (2)
This course is designed to examine and explore recent research developments related to national efforts to reform the teaching and learning of mathematics. Students explore the teaching of mathematics in grades K-6 within the context of child development and learning theory. Research-based curriculum projects are explored in terms of their ability to promote deep conceptual understanding in mathematics. Considerations involved in examining or developing assessment tasks, instruments, and frameworks are addressed in relation to the content taught. Emphasis also is placed on reviewing specific content topics in math to increase the student’s own competencies in these disciplines. Prerequisite: permission of the instructor.

636 New Visions of Science in the Elementary Classroom (2)
This course is designed to examine and explore recent research developments related to national efforts to reform the teaching and learning of science. Students
explore the teaching of science in grades K-6 within the context of child development and learning theory. Innovative science curriculum projects are evaluated by using the measures established by the National Educational Standards for Science. Considerations involved in examining or developing assessment tasks, instruments, and frameworks are addressed in relation to the content taught. Emphasis also is placed on reviewing specific content topics in science to increase the student’s own competencies in these disciplines. Prerequisite: permission of the instructor.

637 Writing as Learning: Theory, Practice, and Pedagogy (3)
This course introduces current theory, research, and practice in the field of writing pedagogy. The differences between processes, skills, and genre-based approaches to teaching writing over the past 25 years are examined. Topics include: the purposes of writing to various diverse communities, diverse conventions of writing, social/individual dimensions of writing, reading/writing workshop, assessment issues, role of technology, and implementation in classroom practice.

638 Research Methods in Education (3)
The purpose of this course is to help students gain a meaningful understanding of the central elements of educational research as it applies in the elementary classroom. The appropriate uses of qualitative and quantitative research are examined. The relationships among data, theory, and knowledge are applied.

640 Elementary Mathematics Teacher Leadership (3)
This course examines the Regional K-12 Mathematics Curriculum Framework, explores the Developing Mathematical ideas Curriculum through the major ideas of the base ten system. Additionally students learn about instructional strategies that will support students’ learning. Through a sharing of k-6 student work insight into their solution strategies is gained. Videotapes of mathematics classrooms are used to inform the discussion including identification of strategies a facilitator might employ to make sense of each other’s ideas.

641 Secondary Mathematics Teacher Leadership (3)
Students address leadership topics to aid in the building of learning communities within their school district using a variety of research-based tools. Exploration of Big Ideas in Mathematics using the Regional K-12 Mathematics Curriculum Framework focuses on how concepts are organized coherently to insure the cohesive implementation of PA academic standards across grade levels. Students analyze mathematical problems from a multiple perspectives using VCMPD cases of math classrooms.

642 Secondary Science Teacher Leadership (3)
Participants investigate the role and form of “Science as Inquiry” in content-strand specific instruction (Earth science, Life Science, and Physical Science). They also engage in the process of Analyzing Instructional Materials (AIM) to examine how the implementation of different challenging instructional materials develops deep conceptual understanding of essential learning as outlined by the regional Science Curriculum Framework.

646 Special Topics (1)

647 Special Topics (2)

648 Special Topics: Environmental Education Experiences in the Schoolyard (3)
In this course, students learn to apply skills and concepts of observation, recording, and
identification in the environmental setting of a schoolyard. Students conduct experiments and investigations to determine quality of air, water, and soil as well as studies of the biodiversity of the schoolyard and surrounding neighborhood.

651 Education of the Gifted (3)
This course compares the traditional and emerging paradigms for gifted education. Through a developmental approach students explore characteristics of gifted students, appropriate curriculum, materials, and classroom strategies. Latest results of research projects, identification techniques, and inclusion and individual educational plans are addressed. Prerequisite: permission of the instructor.

652 Characteristics of Individuals with Physical and Neurological Disorders (2)
Students investigate the nature and types of conditions classified as physical and neurological disorders. The impact of these disorders on day-to-day functioning of an individual and possible medical, psychological, and educational interventions also are investigated. Prerequisites: Education 506; corequisite: Education 686.

653 Models of Gifted Education: Curriculum (3)
Students examine various models of gifted education and best practices in gifted programs. Factors affecting the planning and implementation of programs for the gifted are explored. Students study the components of gifted programs and participate in a school-based special project for gifted children. Prerequisite: permission of the instructor.

654 Multicultural Gifted Education: Diverse Populations: Diverse Populations
Students will examine the characteristics and learning styles of special populations of gifted for the purpose of designing effective educational programs for this growing school population. Students will explore the goals of both multicultural and gifted education as they relate to assessment, curriculum design, and interventions that support the needs of the gifted.

655 Assessment of Special Needs Students (3)
Students investigate the assessment of individuals with mild to moderate disabling conditions. Topics include the fundamental principles of assessment tools and the social responsibility of professionals to exercise fairness and accuracy in the assessment process. Prerequisites: Education 506; corequisite: Education 686.

656 Dual Exceptionalities: Gifted Students with Disabilities (3)
In this course, the role of giftedness in dual exceptionalities is explored. New methods of assessing and identifying children who are both gifted and exceptional are discussed. Models of collaboration with the special education and curriculum experts, as well as parents and school personnel are developed to serve the needs of the children.

661 Curriculum and Instruction of Individuals with Mild Learning Needs (3)
This course focuses on the design and implementation of an individualized education program for a child with mild learning needs and the selection, design, and adaptation of curriculum and instructional techniques in the areas of reading, language arts, and mathematics. Attention also is given to the educational needs of the gifted student. Prerequisite: Education 506; corequisite: Education 686.
664 Behavior Management in the Classroom (3)
Students investigate the principles and systematic approaches used to identify and analyze problem management techniques, individual behavior and affective intervention strategies, and community-based support programs designed to address problem behaviors. Crisis intervention and conflict resolution are explored as strategies for confronting challenging behaviors. Prerequisites: Education 506 or 634; corequisite: Education 686.

668 Curriculum and Instruction of Individuals with Moderate to Severe Disabilities (3)
This course focuses on the design of a comprehensive educational program for the child with moderate to severe mental or physical disabilities. Students analyze the child’s cognitive, behavioral, and physical profile; review assessment techniques; and examine curriculum materials and instructional methods to determine the educational program most appropriate for the child. Attention also is given to the needs of the child with multiple disabilities. Prerequisites: Education 661; corequisite: Education 686.

670 Introduction to School Counseling (3)
The role of school counselors is explored in relation to counseling history, philosophy, and trends. Counseling within elementary and secondary school settings, consultation, and coordination are core components. Professional development, documentation, ethical, and legal standards are addressed. This course also focuses on the creation of instructional programs as part of a comprehensive K-12 school-counseling curriculum, including participation in multidisciplinary teams. Technology is explored as a resource for school counselors. Prerequisite: permission of the instructor.

671 Collaboration, Consultation, and Teamwork (3)
This course focuses on developing effective collaboration skills with members of the school community, as well as the community at large, to provide a realistic and integrated program for all children. Students engage in a variety of group activities that call for the need to analyze group dynamics and implement effective communication strategies. Prerequisite: Education 506 or 634.

673 Transition Planning and Adult Services (3)
This course focuses on the transition of special needs students from school to adult life. Students enrolled in the course address areas of education and training, competitive employment, and community living arrangements as options for the special needs student. Activities in the course include vocational assessment, job-site analysis, career counseling, exploration of adult services, and development of individual transition plans. Prerequisites: Education 661; corequisite: Education 686.

675 Special Topics in Learning Disabilities (3)
676 Seminar in Pervasive Developmental Disorders (3)
678 Practicum (3)
This course requires supervised field placement experience and is aimed at enhancing students’ abilities to offer design and media services to clients. Issues in contemporary media are examined in response to internship placements. Student is expected to produce portfolio quality work during this on-the-job experience.

683 Field Placement: Emotional Support (1)
This field placement experience familiarizes the student with instructional environ-
ments and strategies for addressing the needs of children with behavioral and/or emotional disorders. Students interact with children who present such issues. Particular attention is paid to the unique social, emotional, and behavioral needs of an individual child while examining the child’s individual education plan and daily routine. The field placement includes the development and/or implementation of a behavior management plan for a specific student in the observation site.

684 Field Placement: Transition (1)
In this field placement, the student spends at least five hours each in settings that provide vocational assessment, and involve community-based instruction, vocational training, and work placement of individuals with disabilities. Students interact with individuals who participate in each of the various sites. Particular attention is paid to the unique social, emotional, behavioral, and cognitive needs of these individuals while examining their individual transition plans and daily routines.

685 Field Placement: Multiple and Physical Exceptionalities (1)
This field placement experience familiarizes the student with instructional environments and strategies for addressing the needs of children with multiple disabilities and/or physical exceptionalities.

686 Field Placement: Life Skills (1)
Students work with their field placement host teacher to analyze invention strategies and community-based support for individuals with special needs.

687 Elementary Supervised Practicum (6)

688 Early Childhood Supervised Practicum (6)

689 Secondary Supervised Practicum (6)

690 Practicum in Special Education (6)
This course is designed for students who have completed a course in student teaching and wish to fulfill the requirements for the special education program as a second area of certification. Students enrolled in the course demonstrate their ability to plan for and deliver instruction to special needs students through the submission of unit and lesson plans and the presentation of a minimum of 15 lessons to classes in which special needs students are enrolled in regular education or resource rooms. The demonstration lessons are observed and critiqued by an experienced special education teacher and faculty member who holds teacher certification in special education.
Prerequisites or co requisites: Education 524, 668, 673, and permission of the education program chairperson.

691, 692 Special Topics (2, 3)

693 Early Childhood Student Teaching (9)
Students plan sequential observations and teach for 14 weeks at the early childhood level, preschool through grade three, under the guidance of an experienced teacher and a faculty member of the department of education. Students keep journals of their experiences as a means of self-evaluation and reflection and participate in conferences with their supervising teachers, principals, College supervisors, and course instructors, when appropriate. They meet in weekly seminars conducted by the education program.

694 Elementary Student Teaching (9)
Students plan sequential observations and teach at the elementary school level for 14 weeks under the guidance of an experienced teacher and faculty member of the education department. Students keep journals of their experiences as a means of self-evaluation and reflection and participate
in conferences with their supervising teachers, principals, College supervisors, and course instructors, when appropriate. They meet in weekly seminars conducted by the department of education.

695 Secondary Student Teaching (9)
Students plan sequential observations and teach on the secondary level for 14 weeks under the guidance of an experienced teacher and faculty member of the department of education. Students keep journals of their experiences as a means of self-evaluation and reflection and participate in conferences with their supervising teachers, principals, College supervisors, and course instructors, when appropriate. They meet in weekly seminars conducted by the education program.

696 Student Teaching in Special Education (9)
In this 14-week course, the student, under the guidance of an experienced classroom teacher, observes and then teaches classes on an incremental basis until the student assumes responsibility for teaching the full schedule of the cooperating teacher. Student self-evaluation and conferences with cooperating teachers, principal, College supervisor, and academic professors, when appropriate, are significant course experiences. The student keeps a journal, submits reports as required, and participates in weekly seminars conducted by the College supervisors. Prerequisites: Education 524 and permission of the education program chairperson.

English (ENG)

MFA in Writing
The Master of Fine Arts in Writing is a broad program of study (39 credit hours) designed to prepare students for careers as writers or other positions requiring similar professional skills, such as editing, publishing, and content development for the web; to enable students to improve their writing in more than one genre through interaction with our faculty and other writing students; and to become experienced critics of literary works. Our focus on travel writing, nature, and the environment provides students unique opportunities to explore the world and travel as part of their degree programs.

Most full-time students will be able to complete the program in two years. All students must complete the program within six years of entrance into the program.

In order to earn a Master of Fine Arts in Writing, candidates must:
- Take at least one Field Seminar. Students will travel with faculty members to parts of the United States and other countries, respond to the culture and natural world of another locale, and write about their experiences.
- Complete 39 credits of course work which includes six hours of Final Project.
- Write a Creative Thesis and pass a Final Examination (oral thesis defense).

Degree Requirements
Students who have not completed an undergraduate major in writing, or in English with a writing focus, may be required to take a basic core of 3 courses before registering for the advanced curriculum. Individual core courses may be waived at the discretion of the program director.
13 courses, including:
4 courses of writing workshops in primary genre. For example:
ENG 548 Writing Creative Nonfiction (3)
ENG 553 Writing Poetry (3)
ENG 554 Writing Prose Fiction (3)
ENG 556 Writing for Children (3)
Workshops change every semester and are repeatable for credit.
1 field seminar:
ENG 674 Field Seminar (3)
additional field seminar may be taken as a substitute for a single writing workshop.
1 writing workshop in secondary genre
1 course in craft, forms, and tradition appropriate to primary genre:
ENG 629 The Craft of Prose Fiction (3)
ENG 631 The Craft of Nonfiction (3)
ENG 632 The Craft of Poetry (3)
ENG 661 The Craft of Writing for Children (3)
4 additional content courses:
Most of the time these will be graduate English courses, but other course are acceptable with the permission of the program director. Craft courses (outside the primary genre) can count as content courses as well.
Students in the Writing for Children track are required to take the ENG 562 Children’s Literature as one of their content courses.
ENG 698 Final Project (3) or ENG 699 Final Project (6)

Dual Concentration
By taking two additional writing workshops in their secondary genre, students may attain their M.F.A. with a Dual Concentration. Thus, students choosing this option will take 12 credits in workshops for their primary genre and nine credits in workshops for the secondary genre. The Thesis Project for Dual Concentration Students may be composed of work in either genre or a combination of both. Students are also required to take the Craft Course in their secondary genre (this Craft Course will also count as a Content Course).

Certificate in the Teaching of Creative Writing
Students who wish to earn a Certificate in the Teaching of Creative Writing take an additional nine credits specifically in courses designed to study the pedagogy of Creative Writing. Students earning this certificate take related course work throughout the degree program aimed at increasing their knowledge and understanding of current theoretical and practical approaches to the teaching of creative writing. During the final semester, students teach in a field placement that they design and implement and study/practice the pedagogy of creative writing in a working classroom.

Requirements for Certificate in the Pedagogy of Creative Writing
ENG 511 Teaching Creative Writing
EDU 622 Teaching Methods for Secondary and Adult Levels or ENG 514 Readings in the Pedagogy of Creative Writing
ENG 678 Field Placement

511 Teaching Creative Writing
This course is designed with an interdisciplinary lens, viewing critical and literary theory with composition and creative writing pedagogy as an interwoven concentration. Students will begin by investigating the history of teaching creative writing to give us context to the discipline then explore various composition pedagogies to understand the range of approaches and construct a foundation for our teaching philosophies. Through investigating the history, theory and praxis, students will work to become aware of the assumptions we make about teaching writing and the
approaches we may take from an informed and balanced perspective.

514  Readings in the Pedagogy of Creative Writing

519  Frontier Women (3)
An impressive number of narratives, novels, diaries, and poems recording the responses of women to the American frontier have become available in recent years. By reading about these experiences, and examining differences in perception and conception based apparently on gender, students will better understand how the frontier functioned within American culture and what “cultural work” these texts accomplished.

522  American Exploration (3)
Focus on American fiction that records physical as well as metaphysical journeys; writers’ exploration of new territories such as the frontier West, Polynesian Isles, and South Pole; their imaginative discovery of new truths about nature, society, and self. Includes works by Poe, Cooper, Melville, Simms, Kirkland, and Chopin.

524  Rereading American Literature (3)
This course focuses on critical reexamination of classic American literary texts. Students explore current topics such as Realism, Regionalism, Romanticism, and Modernism, with special emphasis on problematic texts and pedagogic contexts. Students complete short essays, reviews of criticism, class presentations, teaching outlines or notes, and a substantial paper or project.

525  Love and Lies: The European Novel (3)
This course will cover the modern European novel through the thematic rubric of “love and lies.” The latter theme affords the opportunity to consider fiction not only as a medium of the literary genre of the novel, but also as a discourse of self-expression, self-creation, and, in the cases of some of our lying protagonists, self-destruction. Students will focus on characters’ constructions of “truth” and “lies” as these concepts are informed by characters’ emotional positions. At its most ambitious, this focus on the dynamic of intersubjectivity not only provides important insights into the literature we will read, but also enhances students’ understanding of the interpersonal connections that drive individuals’ worldviews and narratives. Pre-requisite: Sophomore standing or above.

527  Ethnicity and Place (3)
This course focuses on the connection between geographic places and cultural identities. Ethnic, regional, and linguistic markers help define writers’ distinctive voices, as in the cases of William Faulkner and August Wilson. Dislocation from the place of origination or from a writer’s heritage can also result in a creative tension, as in the works of Maxine Hong Kingston and Toni Morrison. Students will read a variety of texts that explore the borderlands between ethnicity and place.

530  Mark Twain and American Humor (3)
A study of selected works of Twain within the context of American literature and the traditional American humor.

534  Literature of Fact (3)
A study of selected nonfiction (e.g., essays, histories, biographies) designed to examine treatments of “fact” and to highlight differences in style among periods and writers. Selections compare 17th-, 18th-, and 19th-century works to contemporary pieces.

536  The Nature of Tragedy and Comedy (3)
An exploration of tragedy and comedy as contrasting literary modes, informing spir-
its, and world views. Subjects include several literary genres, graphic arts, music, and philosophical theories. Readings include works by Greek dramatists, Shakespeare, Cervantes, Milton, Conrad, Wilde, and Shaw as well as theoretical observations by Aristotle, Schiller, Nietzsche, Kreiger, Jaspers, Burke, Bergson, Meredith, and Arthur Miller.

538  Principles of Literary Criticism (3)
A course focusing on the historical development of the principles of literary criticism from classical origins to modern practice. Texts analyzed include passages and works by Plato, Aristotle, Horace, Longinus, Sidney, Pope, Johnson, Hazlitt, Brooks, and Frye.

540  Memoir (3)
Through close reading of memoirs – personal, family stories and those that are more political – we will take up such questions as: What is the relationship between memory and the imagination? Does the use of fiction sometimes provide a shield to get closer to truth? Is it also possible to hold invention at bay and stick entirely to fact? Is it desirable? What is the importance of bearing witness/remembering? What are its limitations/dangers? Students will look critically at texts and think about how these authors write memoir, and how they shape experience.

541  Writing Personal Legend (3)
This writing class will use as inspiration self-representation by contemporary women authors who have written on the scrim of legend, myth, and folklore. The telling of tales is central to community interaction; story has always been used as a way, direct and indirect, of making culturally specific meaning out of experience. As such it is a particularly dynamic record of encounters and influences both among and within groups. The focus of this class will be upon uses of new points of view and of speaking personae that revise earlier versions of the familiar and thus destabilize meaning through illusion of maintaining heirloom metaphor. Students will read archival, and contemporary material, and then select traditional and modern stories resonant of their private experience to generate original work.

542  American Multicultural Literature: Texts, Theory, Pedagogy (3)
Students explore the issues, debates, and politics of American literary multiculturalism; consider texts from non-European imaginative traditions (Native American, African-American, and Chicana/o) that challenge not only the canon of American literature but notions of the American and the literary; and devise strategies for incorporating such texts in courses on American multicultural literature.

543  Nature and Culture (3)
This course explores the issues of ecology and identity as part of the development of American literary culture. The development of an ecological imperative and the patterns of “nature” consciousness will be explored as they rise, grow and change. Questions of the relationship between nature and culture will be the main focus of the course including the developing ideology of ecology as a response to the growth of mechanical culture and the rapid loss of wilderness. Cross-listed as ENV 443/543.

546  Wilderness and Literature (3)
Through close reading of poetry and prose, students will explore the relationship between wilderness and literature – both representations of the natural world and what Stanley Kunitz calls “your wilderness...the untamed self that you pretend doesn’t exist, all that chaos locked behind the closet door, those memories yammering in the dark.” Writers examined include: Anne
Carson, Mark Doty, Kathleen Hill, and Virginia Woolf. *Cross-listed as ENV 346.*

547 Contemporary Environmental Fiction (3)
A study of environmental fiction ranging from Jack London’s *The Call of the Wild* to Margaret Atwood’s *Surfacing* and Jane Smiley’s *A Thousand Acres*, this course attends in specific to the representation of nature and environment in 20th-century novels and other cultural texts (e.g., *Bambi* or *The Emerald Forest*). Students will consider how such representations interrogate, critique, or reinforce contemporary constructions of the environment. Special attention will be given to questions of history, gender, and “what counts” (e.g., urban versus wilderness) as the environment.

548 Writing Creative Nonfiction (3)
An intensive workshop focusing on important subgenres of creative nonfiction, this course will explore themes of self and others as students move from writing memoir to autobiography, and from biography to the personal essay. How can students render their own experiences in creative and powerful ways? How can students capture the unique, inspiring, or emblematic experiences of others? Students will research, write, revise, and maintain a dialectical journal exploring the process and product of their writing, culminating in a final, polished project from one of the genres of creative nonfiction.

549 Exiles (3)
This course will examine the 20th-century condition of exile in relation to its different configurations, from European émigrés to postcolonial subjects to experiences of exile in the United States, to the relation of exile to Diaspora (African, Indian, and Jewish). Students will see how different patterns of movement define subjects variously as exiles, migrants, nomads and tourists. They will also approach the concept of exile from psychological, geographical, and cultural angles in order to understand the different uses of the term, its scope and its limitations.

552 Ecofeminist Literature (3)
This course brings together theoretical, nonfictional, and fictional approaches to the study of women and the environment. Students will examine how diverse ecofeminist writers problematize, resituate, and reclaim the woman/nature paradigm—a construct historically based in patriarchal culture. This course focuses particularly on how representations of women and environment (ranging from the traditional to the radical) can help students rethink and reimagine their relationship to the Earth.

553 Writing Poetry (3)
This course is designed to teach the techniques and practice of poetry writing through participation in a process of peer review and commentary, reading and discussions of selections of other poets and poems, and regular submissions of original creative compositions. The course is taught in a workshop format, with the emphasis placed on peer critique. Regular weekly writing assignments and peer critiques of the submitted writings are required of all class members. May be repeated for credit.

554 Writing Prose Fiction (3)
This course is designed to teach the techniques and practice of fiction writing through participation in a process of peer review and commentary, reading and discussions of selections of other writers and stories, and regular submissions of original creative compositions. The course is taught in a workshop format, with the emphasis placed on peer critique. Regular weekly writing assignments and peer critiques of the submitted writings are re-
required of all class members. May be repeated for credit.

555 Shakespeare: Plays, Practice, and Pedagogy (3)
Focused primarily on strategies for teaching Shakespeare, this course considers recent critical approaches to plays ranging from Romeo and Juliet, to Much Ado About Nothing and Henry V. In addition to close reading of the plays and studying the practices of the Elizabethan stage, students consider how best to bring current critical understandings of Shakespeare into the classroom. Recent films of the plays also will be viewed and discussed, with an eye toward classroom utility.

556 Writing for Children (3)
This course is designed to teach the techniques and practice of writing poetry and prose for children and adolescents through participation in a process of peer review and commentary, reading and discussions of selections of other writers and their work, and regular submissions of original creative compositions. The course is taught in a workshop format, with the emphasis placed on peer critique. Regular weekly writing assignments and peer critiques of the submitted writings are required of all class members. May be repeated for credit.

558 Contemporary Writers and the Art of Reading (3)
This course will explore the ways creative writers read literature. Students will read both critical and creative work, examining a given writer’s creative interests, theories, and practices. Emphasis will be on 20th-century writers from around the world. Prerequisite: English 534, or permission of the M.F.A. director.

562 Children’s Literature (3)
Designed to complement “Writing for Children and Adolescents,” this course surveys the best of children’s fiction and nonfiction, and encourages the student to examine issues of plot, story development, character, setting, and creative use of language. Prerequisite: English 243, 244, and 245, or permission of the program director.

563 Transcribing Lives (3)
Focused on developing personal histories into stories that entertain, inform, and inspire, students will write autobiographies and biographies for young audiences using solid research techniques and storytelling skills. Prerequisite: English 243, 244, and 245, or permission of the program director.

564 Early Modern Romance: Representations of Women (3)
This course looks primarily at medieval and Renaissance romances, asking how they do or do not challenge past or stereotypical notions of the feminine. Possible reading selections include Tristan and Isolde, Sir Gawain and the Green Knight, Le Morte d’Arthur, The Faerie Queene, and The Arcadia. The course ends by looking at The Mists of Avalon, a feminist rewriting of Arthurian romance.

568 Practicum: Journal Writing and Editing (3)

629 The Craft of Prose Fiction (3)
In this course, students engage the craft of writing fiction through the teaching of literature. This course is neither a survey course nor the equivalent of a handbook. Instead, it is an opportunity for students to experiment in both their thinking and writing. Writing assignments will vary, some creative and some critical, focusing on either the reading or theoretical issues raised in class. Students should be prepared to read intensively and consider the assigned readings, rather than their own writing, to be the center of this course.
631 The Craft of Nonfiction (3)
Students engage the craft of writing non-fiction through the teaching of literature and journalism. They address issues of style, point of view, narrative, and dramatic coherence, and pay careful attention to problems involving the assimilation of facts into the body of a piece, the treatment of memory data, the use of detail and scene-setting, and the relationship between fictional and poetic strategies and nonfiction writing. Writing assignments will vary, some creative and some critical, focusing on either the reading or theoretical issues raised in class. Students should be prepared to read intensively and to consider the assigned readings, rather than their own writing, to be the center of this course.

632 The Craft of Poetry (3)
In this course, students engage the craft of writing poetry through the teaching of literature and prosody. Through close readings of individual poems and contemporary essays on craft, theory, and the creative process, we consider both the fine points of writing poetry and the larger issues of writing as it relates to politics, publishing, influence, voice, personal and social responsibility, and ethics. Writing assignments will vary, some creative and some critical, focusing on either the reading or theoretical issues raised in class. Students should be prepared to read intensively and to consider the assigned readings, rather than their own writing, to be the center of this course.

661 The Craft of Writing for Children (3)
This course examines the basic principles that guide writers for children and adolescents, beginning with concept and picture books and extending into full-length works of fiction and nonfiction. Students will explore multiple genres and audiences in this writing-intensive course, and will be expected to produce written work that will enhance their understanding of publishable quality work. Prerequisite: acceptance into program or permission of program director.

674 Field Seminar
Focusing on aesthetic problems and the often conflicting relationship between nature, culture, and text, this course offers students an opportunity to engage a larger world and allow them to define their own learning processes by exploring the ways that human beings and their environment — political, social, and natural — constantly define and refine each other. These multi-genre courses are designed to push students outside the realm of their comfort and make them question their assumptions about themselves and the place of writing in the world. Students will read texts appropriate to the venue, create bibliographies, and explore in their words the weight and power of language when its meaning is defined by another landscape and/or culture. Travel locations and specific topics will vary. An additional fee applies to this course. May be repeated for credit.

678 Field Placement
During this course, taken in one of the final semesters of the M.F.A., students teach/study in a supervised field placement of their own design and practice the pedagogy of creative writing in a working classroom.

682, 683 Special Topics (2, 3)
691, 692, 693 Independent Study (1, 2, 3)
698 Final Manuscript (3)
699 Final Manuscript (6)
Environmental Studies (ENV)

525 Environmental Policy (3)
This course takes an interdisciplinary approach to the study of the theory and practice of environmental policies. The course focuses on the political and economic factors contributing to the success and failure of present environmental policies. Topics include the roles of government and the market in causing environmental problems, analysis of proposed means for resolving those problems, and the application of economic and political analyses to selected environmental issues. Cross-listed as POL 525.

543 Nature and Culture (3)
This course explores the issues of ecology and identity as part of the development of American literary culture. The development of an ecological imperative and the patterns of “nature” consciousness will be explored as they rise, grow and change. Questions of the relationship between nature and culture will be the main focus of the course including the developing ideology of ecology as a response to the growth of mechanical culture and the rapid loss of wilderness. Cross-listed as ENV 443 and ENG 743.

555 Environmental Education (3)
This course reviews the historical development of environmental education in the K-12 curriculum and the development of current standards in the environment and ecology. A range of teaching methods for effectively presenting the scientific and economic aspects of environmental concerns as well as integration of community resources and agencies are explored. Course work includes observations and participation in environmental experiences within public school classrooms.

Film and Digital Technology (FLM)

Master of Fine Arts in Film and Digital Technology
This MFA program is focused on advanced project work in a range of media production areas, principally film/video, DVD and the Web. It is designed to extend and develop students’ experience and knowledge in the field of media production and their understanding of creative and critical practice within the media industries.

Students in the MFA in Film and Digital Technology program are encouraged to explore the ways boundaries between previously separate forms of media production are blurring. Students will focus on developing their understanding of how emerging concepts such as interactivity, connectivity and convergence of emerging technologies such as DVD and interactive video are creating new creative possibilities, production processes and delivery systems for more traditional forms of media production, such as film and video.

The program is mainly project-based, with students working in small groups on a range of media productions. Students have the ability to customize their activities according to their interests and specializations. The program includes research components, where students are asked to place their production work in broader social, historical, cultural and theoretical contexts. Particular emphasis is placed on industry, and students who complete the MFA will have a high level of industry readiness, with a realistic and well-informed sense of the career possibilities in this rapidly changing area.
Degree Requirements
36 credits, including:
FLM 543 The Media Production Industry (3)
FLM 550 Media Project 1 (6)
FLM 650 Media Project 2 (6)
FLM 675 Media Project 3 (9)
FLM 563 Media Contexts 1 (3)
FLM 663 Media Contexts 2 (3)
FLM 571 eMerging Media 1 (3)
FLM 671 eMerging Media 2 (3)
Elective courses may be substituted for FLM 571 and FLM 671 with prior approval of the program director.

543 The Media Production Industry (3)
This course is offered in the final semester of the program and is designed to enhance the ability of graduates to establish themselves in the media production industry.

550 Media Project 1 (6)
Media Project 1 re-introduces graduate students to the technical practices of digital video production. Non-linear editing, foundations of alternative screenwriting, videography, sound production and other media-related processes are explored. The technical is studied in relation to its conceptual, theoretical, and practical application. At the completion of the course, candidates will have a short digital film finished from beginning processes to post-production techniques. Candidates are required to be collaborative, taking on various roles within each other’s projects.

563 Media Contexts 1 (3)
This course provides incoming graduate students with an overview of current theoretical concerns related to independent media, film production, and histories. Topics include identity and the place of the maker; genre and ideology; mass culture, popular culture, and the audience; work-
connections across decades by focusing on the recurring themes of language, futurism, simulation, hyper-reality, trans-nationality and information.

671 eMerging Media 2 (3)
This graduate course focuses on the technical through advanced study. Students will produce DVD, CD-Rom and other interactive projects—gaining an understanding of the emerging culture and historical antecedents of new media. Interactive and network technologies are explored from the perspective of media art making. New media works are screened, discussed and demonstrated.

675 Media Project 3 (9)
This final media project course is nine credits and counts as the graduate candidate’s masters thesis studio. The studio is self-directed. Candidates should enter the course with an already approved thesis topic and project. Technical demonstrations will correlate with student interest and project concerns. The student under the guidance of the class’ instructor and an outside advisor undertakes this final independent project. Projects should demonstrate the mastery of the themes, critical approaches and technical skills learned through the program’s coursework. Written, oral and production components are requirements for the successful completion of the master’s thesis. The final product is a portfolio quality document that is conceptually strong, well-produced and technically innovative.

History (HIS)

526 The Arab-Israeli Conflict (3)
This course examines the origins and issues of the conflict between the Arabs and Israelis over Palestine. Using extensive primary materials and some secondary sources, the arguments of all sides of the conflict are presented and evaluated. While the core conflict between Palestinians and Israelis is emphasized, the role of regional and world powers also is examined. Cross-listed as HIS 426.

539 Health, Medicine, and History: The American Experience (3)
This course traces the evolution of health and medicine from the Colonial period in American history to the present. Three major themes are considered: health levels and disease incidence, medical practice and practitioners, and attitudes and perceptions regarding illness and its treatment. Issues of particular relevance to women’s health are discussed. The influence of societal changes on each of these areas is analyzed. Prerequisite: History 102, one 200-level history course, or permission of the instructor. Cross-listed as HIS 439.

682, 683 Special Topics (2, 3)
This course addresses a variety of focused issues relevant to the study of history. Students may repeat enrollment in the course under different topics of instruction.

Interior Architecture (IAR)

Master of Interior Architecture
The Master of Interior Architecture is a first professional interior design program consisting of 72 semester credits. It is geared towards students with an undergraduate degree in a field other than interior design or architecture. The curriculum includes foundation courses in the arts, interior architecture courses, an internship, and a graduate tutorial. The Master of Interior Architecture prepares students for practice in an interior design or architecture firm.
Degree Requirements

20 courses (72 credits), including:

- ART 517 Drawing I (3)
- ART 500 2-D & 3-D Design (3)
- ART 550 History of Interior Architecture: Prehistory to the 20th Century (3)
- ART 557 20th and 21st Century Architecture (3)
- IAR 505 Environment and Behavior (3)
- IAR 510 Drafting & Graphics (3)
- IAR 515 Computer Design Technology (3)
- IAR 520 Interior Architecture I (3)
- IAR 525 Interior Architecture II (3)
- IAR 530 Color & Textiles (3)
- IAR 535 Materials & Assemblies (3)
- IAR 610 Advanced Computer Design Technology (3)
- IAR 615 Construction Documents (3)
- IAR 620 Interior Architecture III (6)
- IAR 625 Interior Architecture IV (6)
- IAR 630 Environmental Systems (3)
- IAR 635 Lighting & Acoustics (3)
- IAR 640 Internship (6)
- IAR 645 Professional Practice (3)
- IAR 650 Graduate Tutorial (6)

Master of Science in Interior Architecture

The Master of Science in Interior Architecture is a post professional degree, consisting of 30-42 credits, for students with a first professional degree in interior design or architecture. Students develop a specialization in interior design that can be applied in practice or serve as a foundation for a career in higher education or enrollment in a doctoral program.

Degree Requirements for students with a first professional degree in interior design

9 courses (30 credits), including:

- IAR 655 Graduate Research Methods (3)
- IAR 660 Statistics for Environment & Behavior (3) or BUS 515 Statistical Research Methods for Business (3)
- IAR 665 Special Topics (3)
- IAR 670 Supervised Teaching (3)
- IAR 680 Thesis (6)
- PWR 625 Business Writing (3)
- 3 electives from any program

Degree Requirements for students with a first professional degree in architecture

11 courses (42 credits), including:

- IAR 530 Color & Textiles (3)
- IAR 620 Interior Architecture III (6)
- IAR 625 Interior Architecture IV (6)
- IAR 655 Graduate Research Methods (3)
- IAR 660 Statistics for Environment & Behavior (3) or BUS 515 Statistical Research Methods for Business (3)
- IAR 665 Special Topics (3)
- IAR 680 Thesis (6)
- PWR 625 Business Writing (3)
- 3 electives from any program

ART 517 Drawing I (3)

Through various drawing media, this studio course explores the basic principles of creating a work of visual art, including figure studies from the model, studies from nature, and techniques of composition.

ART 500 2-D & 3-D Design (3)

This accelerated course provides an introduction to two dimensional design and addresses pattern, balance, scale, movement rhythm, proportion, and relationships of
figure to ground in various media. The course also introduces students to the basic elements of 3-D design. Students explore furniture and interior, sculptural, and architectural design through lectures, field trips, and a sequence of problem-solving exercises.

**ART 550 History of Interior Architecture: Prehistory to the 20th Century (3)**

This survey course examines world architecture from prehistoric times through the 20th century, including the built environment of Europe, the Middle East, Asia, and the Americas. Emphasis is placed on the role of interior spaces, furnishings, and art within architecture.

**ART 557 20th and 21st Century Architecture (3)**

This course explores the history of 20th and 21st century architecture through such topics as visionary architecture, women in architecture, film in architecture, and virtual and media architecture. Walking tours of Pittsburgh and field trips to key buildings are planned.

**IAR 505 Environment & Behavior (3)**

The designed environment influences and is influenced by human activity patterns and behavior. This course is an introduction to significant theories concerning the interaction of people and interior architecture. Emphasis is placed on shared human needs and differences based on age, culture, gender, and occupation.

**IAR 510 Drafting & Graphics (3)**

This course develops graphic literacy as a language and philosophy for observation, analysis, expression, and presentation of interior architecture. Students are introduced to a number of techniques and methods of drawing used by interior designers, including freehand drawing, use of colored pencils, markers, and mechanical drafting through various exercises. An understanding is developed of architectural scale, plans, elevations and sections. Additional work is spent on values, colors, palettes, and shadowing techniques that culminate in a final project. Cross listed as LAR 510.

**IAR 515 Computer Design Technology (3)**

Students learn the basic computer drafting and drawing skills associated with AutoCAD software. Projects include creating new work from scratch and working from existing files. An understanding of drawing layers, detailing, layout, and printing will be presented. Students are also introduced to Photoshop to build technical knowledge in image processing. Cross listed as LAR 513.

**IAR 520 Interior Architecture I (3)**

This studio addresses problem identification and problem solving in the context of small scale projects of modest scope. Emphasis is placed on human factors, space planning, spatial experience, scale, materials, furniture, fixtures, equipment, and color with respect to user needs. Prerequisite: Art 500.

**IAR 525 Interior Architecture II (3)**

This studio addresses problem identification and problem solving in the context of small scale projects of modest scope. Emphasis is placed on human factors, space planning, spatial experience, scale, materials, furniture, fixtures, equipment, and color with respect to user needs. Prerequisite: Interior Architecture 520.

**IAR 530 Color & Textiles (3)**

The first part of this course examines theories of color in relation to light and space. In the second part, key topics include the selection, specification, and application of textiles based on their properties and per-
formance criteria, sustainability, installation methods, maintenance requirements, and regulations and standards.

IAR 535  Materials & Assemblies (3)
Materials and finishes appropriate for interior architecture are addressed in this course. Emphasis is placed on sustainability characteristics, properties and performance criteria, installation and assembly methods, maintenance requirements, and estimation of material requirements.

IAR 610  Advanced Computer Design (3)
This advanced computer-aided design course focuses on complex three-dimensional modeling. Students are instructed to use specific software, such as Autodesk VIZ, Revit 6, and Lightscape. Graphic skills are also developed to help students communicate interior design schemes. Prerequisite: Interior Architecture 515.

IAR 615  Construction Documents (3)
Construction techniques are studied through the production of a set of construction documents. Issues addressed include the selection and assembly of materials, construction methods, detailing of interior finish systems and cabinetry, building codes, and accessibility. Prerequisites: Interior Architecture 510, 515, and 535.

IAR 620  Interior Architecture III (6)
This advanced studio addresses concept development, design development, and detailing of medium and large-scale projects. Emphasis is placed on program analysis, user needs, space planning, three dimensional spatial development, design language and composition, materials and assemblies, color, lighting, acoustics, environmental systems, and building codes and life safety. Prerequisites: Interior Architecture 515 and 525.

IAR 625  Interior Architecture IV (6)
This advanced studio addresses concept development, design development, and detailing of medium and large-scale projects. Emphasis is placed on program analysis, user needs, space planning, three dimensional spatial development, design language and composition, materials and assemblies, color, lighting, acoustics, environmental systems, and building codes and life safety. Prerequisites: Interior Architecture 610 and 620.

IAR 630  Environmental Systems (3)
This course provides an overview of environmental control systems including HVAC, plumbing, fire protection, power distribution, security, and data/voice telecommunication. Emphasis is placed on energy consumption and conservation, human comfort, and health and safety.

IAR 635  Lighting & Acoustics (3)
This course is an introduction to lighting and acoustics. Emphasis is placed on the psychology of lighting, visual comfort criteria, measurement and calculations, available technologies in lighting design, the selection of fixtures, and the application of computer aided lighting simulation tools. Principles of acoustics, acoustic properties of materials and building systems in relation to building structures, sound transmission between rooms, and design methods in room and building acoustics are also addressed.

IAR 640  Internship (6)
An internship experience provides students with a greater understanding of professional practice. With instructor approval, students work full-time in an office environment under the supervision of a practitioner.

IAR 645  Professional Practice (3)
In this course, students are introduced to the specialized services provided by the
professional interior designer. Emphasis is placed on office operations and personnel issues, marketing strategies, project management, contract documents, ethics, and the legal and financial aspects of professional practice.

IAR 650 Graduate Tutorial (6)
This course stresses evidence-based design. Students create a program for a project selected by the instructor using the latest research and literature available. The program serves as a foundation for the investigation of a design problem from concept generation through design development and detailing. Prerequisite: Interior Architecture 625.

IAR 655 Graduate Research Methods (3)
This graduate seminar is a review and analysis of published research in the disciplines of interior design and architecture. It introduces students to various methods for gathering information and conducting research related to the reciprocal interaction between humans and the environment. Emphasis is placed on the selection and utilization of data collection strategies and tools and the development of a research proposal.

IAR 660 Statistics for Environment & Behavior (3)
In this course, students are introduced to statistical analysis in relation to environmental design and human behavior. Emphasis is placed on descriptive statistics, significance tests, two-sample comparisons, regression, and correlation. Students use a computer-based statistical package for data analysis.

IAR 665 Special Topics in Interior Architecture (3)
Theory, research, and application are stressed in relation to interior architecture through various course topics. Special topics may include design and culture, design for special populations, design for specific building types, programming, post occupancy evaluation, and historic preservation.

IAR 670 Supervised Teaching (3)
Students have the opportunity to assist with a class in interior architecture under the supervision of a faculty member.

IAR 675 Independent Study (3)
In-depth investigation conducted independently by the student under the supervision of an instructor. This course may be taken to satisfy an elective requirement.

IAR 680 Thesis (6)
The thesis is independently taken by a student under the guidance of an instructor. The final product is a written thesis with original research or a creative design project that is supported by in-depth information gathering and written material.

Interdisciplinary Courses (IND)

500 Science and Society (3) Fall
A cross-disciplinary examination of current scientific research and technological developments that lead to ethical questions or political controversy, emphasizing current science and technology along with readings about making decisions on controversial subjects. May include: global warming, genetic engineering, human cloning, stem cell research, and nuclear energy. Prerequisite: one 200-level science course.
Landscape Architecture (LAR)

Master of Landscape Architecture Program

The curriculum for the Master of Landscape Architecture meets all the standards, skills, and outcomes of the Landscape Architecture Accreditation Board, with the value-added emphasis on environmental concerns. This curriculum is designed to meet all accreditation standards in order to produce license-eligible landscape architects.

Degree Requirements
24-25 courses (96 credits), including,
21 required courses:
LAR 510 Drafting and Graphics (3)
LAR 512 Graphic Communications (3)
LAR 513 Computer Design Technology (3)
LAR 514 Landscape Ecology (3)
LAR 516 Plant Identification: Trees and Shrubs (3)
LAR 518 Native Plants (3)
LAR 520 Prehistory of Landscape Architecture: 15th-18th Century (3)
LAR 521 North American Landscape History: 19th-21st Century (3)
LAR 541 Design Studio I: Foundations (6)
LAR 542 Design Studio II: Applications Methods (4)
LAR 570 Principles of Sustainability (3)
LAR 643 Design Studio III: Integrated Systems (6)
LAR 644 Design Studio IV: Community Based Design (6)
LAR 645 Design Studio V: Construction Documents in Design (4)
LAR 650 Construction I: Grading and Landforms (4)
LAR 651 Construction II: Materials and Methods (4)
LAR 656 Community Field Work: Site Internship (4)
LAR 660 Theory, Ethics, and Professional Practice (3)
LAR 680 Graduate Research Methods (3)
LAR 681 Internship or Study Abroad (6)
LAR 698 Final Project or Thesis (6)

3-4 elective courses (13 credits) from the following:
BIO 524 Field Botany (3)
BIO 525 Plant Development and Propagation (3)
ENV 525 Environmental Policy (3)
ENV 543 Nature and Culture (3)
LAR 526 Modern Landscape Architecture (3)
LAR 527 Historic Landscape Preservation (3)
LAR 532 Ornamental Horticulture (3)
LAR 534 Soil Science (3)
LAR 535 Disease and Pests (3)
LAR 645 Design Studio V: Construction Documents in Design (6)
LAR 646 Design Studio VI: Special Topics (6)
LAR 654 Construction III: Road Design and Sustainable Transportation (4)
LAR 655 Construction IV: Water in the Landscape (4)
LNS 521 Plants and Design I (3)
LNS 522 Plants and Design II (3)

510 Drafting and Graphics (3)
This studio develops graphic literacy as a language and philosophy for observation, analysis, expression, and presentation of landscape design. Students are introduced to a number of techniques and methods of drawing used by landscape architects, including, freehand drawing, use of colored pencils, markers, and mechanical drafting through various exercises. An understanding is developed of architectural and engineering scale, plans, elevations and sections. Additional work is spent on values, colors, palettes, and shadowing tech-
niques that culminate in a final studio project. Cross-listed as LNS 515.

512 Graphic Communications (3)
This course provides an introduction to the many tools available on the computer for communicating design ideas. Specific software is utilized to teach broad skills for design computing while developing graphic technical skills specific to the practice of landscape architecture through various exercises and projects. In addition, this class instills a critical attitude toward the use of digital technologies in the practice of landscape architecture today.

513 Computer Design Technology (3)
Students learn the basic computer drafting and drawing skills associated with AutoCAD software. Projects include creating new work from scratch and working from existing files. An understanding of drawing layers, detailing, layout, and printing will be presented. Cross-listed as LNS 518.

514 Landscape Ecology (3)
Introduces the study of how landscape structure affects the processes that determine the abundance and distribution of organisms. Students analyze spatial patterning as it relates to ecological systems and resource conservation. Students use quantitative and modeling tools to facilitate understanding of spatial processes, resource conservation, and ecosystem management.

516 Plant Identification: Trees and Shrubs (3)
This course introduces students to the concepts and skills needed to identify plants; make practical and scientific collections; and understand the ecological and evolutionary relationships between major plant families. Emphasis is placed on natives, focusing on their uses in the landscape with sustainable site design. This course includes field trips and class/laboratory work.

518 Native Plants (3)
Analysis of the flora of Western Pennsylvania and Allegheny County is the basis of this course. Students learn native plant identification and plant families. Students also learn to compare native to non-native species and discuss the medicinal, food, and horticultural uses of natives through field trips and in-class activities.

520 Prehistory of Landscape Architecture (3)
The landscape traditions of the Western and Eastern worlds are surveyed from antiquity to the present. This course explores the relationships between designed landscape forms within each culture, as well as, the political, social, philosophical, and artistic factors that could have determined and influenced the designed landscape. The course draws attention to the fundamental notion that landscape design is both an invention and cultural representation of landscape. Cross-listed as LNS 531.

521 North American Landscape History (3)
This course covers the historical development of the American residential and urban landscape from the 18th century to present. Special attention is given to Jefferson, Downing, Olmsted, Platt, Jensen, and other designers. Emphasis on how different perspectives on landscape and site design influence resource conservation and ecosystem management. An important component is the landscape of the Pittsburgh region as a comparative example of landscape design. A field trip to another urban center may be included in this course as well. Cross-listed as LNS 544.

526 Modern Landscape Architecture (3)
Examines the modern built landscapes as cultural products within the context of
modern American use. Underscores the relationship among landscape architecture theories and changing environments, resources and the urban fabric. Focus is on modern landscapes of the 1950s to present and why projects of modern day are being lost to progress.

527 Historic Landscape Preservation (3)
The development of the Historic American Landscape Survey for the National Park Service has brought the design of open space and the built landscape into the same venue as the Historic American Building Survey. In this course students will learn how to perform a HALS survey; cultural landscape analysis; research on historic landscapes both existing and destroyed; and understand how nature can provide us answers as to what may have been before. Cross-listed as LNS 549.

532 Ornamental Horticulture (3)
This course covers the identification, culture, use, care, and management of ornamental woody and herbaceous plants that can be used in designed landscapes. The course also covers the general issues of plant maintenance, use of fertilization, and management systems to create environmentally healthy horticultural practices. Maintenance topics include trimming, pruning, and transplantation. Cross-listed as LNS 553.

534 Soil Science (3)
Soils are studied as natural bodies, media for plant growth, and ecosystem components. Topics include soil morphology and characteristics, composition, formation, conservation, and soil erosion. Physical, chemical, and biological properties of soil are related to the production of plants, the functioning of hydrologic and nutrient cycles, and the protection of environmental quality.

535 Diseases and Pests (3)
This course introduces students to the common biotic and abiotic problems caused by diseases and pests in ornamental plants, as well as, basic concepts of the current techniques and beliefs on managing these problems. Students cover the general principles of plant problem diagnosis and identification of common disease and insect problems. Disease and pest management topics include the concepts of integrated pest management, vertebrate pest management, and pesticide use and safety.

541 Design Studio I: Foundations (6)
This is the first in a sequence of design studios focusing on concepts, skills, and methods of design. This course introduces the student to the basic vocabulary of theoretical design principles and their application to the natural environment. Development of three-dimensional spatial concepts in shapes, spatial relationships, scale, color, textures, and values within the context of sustainable landscape architecture. Cross-listed as LNS 511 (3 credits only).

542 Design Studio II: Applications Methods (4)
In this course, students learn to analyze, synthesize, and assimilate contextual and site-specific diagramming into the development and presentation of creative design solutions for specific landscape projects at different scales. These projects lead to an understanding of design problem definition, program development, and site analysis and inventory as essential elements in the design process. Emphasis is placed on site analysis, and site concept diagramming. These projects will lead to a spatial understanding of the design problems in the environmentally driven landscape. Prerequisite: Landscape Architecture 541. Cross-listed as LNS 512.
570 Principles of Sustainability (3)
Students develop skills and fluency in evaluating the interrelationships between humans and ecological systems. Focus is placed on decision-making approaches that satisfy environmental, economic, and ethical criteria. Practical alternatives are analyzed for more sustainable landscape construction, design, and maintenance. An experiential learning approach is used to develop facilities for assessing environmental issues. Cross-listed as ENV 443.

575 Field Ecology (3)
The goal of this course is to introduce the students to the principles of ecology in urban and rural environments. Considerations of ecology will range from the individual organism to communities and ecosystems, up to landscape level. Ecological consequences of human activities will be considered as well as the physical, ecological, and social environment of cities and towns, and how these spheres can possibly be integrated in studies of urban ecological systems. This class is structured as a field class. Most classes will be local field trips with possibly one or two out of town Saturday field trips. In the beginning of the term, there will be a series of short lectures to learn ecological concepts with extensive readings and discussion from the primary literature, including class discussion.

578 Wetlands Ecology (3)
This course provides a holistic understanding of wetlands through an examination of pattern and process. Towards the beginning of the semester, an all-day Saturday field trip to a wetland complex, possibly Pymatuning Marsh, will provide in-depth observation of wetland ecology, flora, and fauna. Students will be exposed to the ecology, hydrology, and aesthetics of both natural and constructed wetlands. In addition, wetland laws and protection will be identified. Through lectures, field trips, and other exercises, students will gain a greater awareness of the qualities of local and regional wetland environments along with an understanding of mankind’s role through history in altering them.

591, 592, 593 Independent Study (1, 2, 3)

643 Design Studio III: Integrated Systems (6)
This design studio concentrates on application of the concepts of skills and methods of design in a critical analysis of various environmental and human systems, both in built and natural environments with special emphasis on sustainable design. Students will learn to analyze, integrate, and assimilate both contextual and site-specific information in the development and presentation of creative design solutions for specific landscape projects. This course will involve field trips, design through synthesis, and possibly model building. Prerequisite: Landscape Architecture 542.

644 Design Studio IV: Community Based Design (6)
The focus of this studio is on community design of the public landscape with incorporation of environmental practices into the solution of the problem. The project will involve all that has been developed in the prior sequence of design studios. The project will focus on an actual site or sites located in western Pennsylvania. Prerequisite Landscape Architecture 643.

645 Design Studio V: Construction Documents in Design (4)
Students incorporate their design project from Landscape Architecture 643 or 644 into a final design and construction project. This project will allow the students to produce a set of construction documents appropriate for bidding. Sustainable site design, land use, and construction will be incorporated through layout, grading, con-
struction detailing, planting plans, and general ecosystem management. Prerequisites: Landscape Studies 643 and 644.

**646 Design Studio: Special Topics (6)**
Varying topics and applications in specific design applications that capture the essence of ecological design process.

**650 Construction I: Grading and Landforms (4)**
This is the first course in a series of construction courses. The focus is on the land as a shaped medium. This course applies concepts and principles of sustainable site planning, land manipulation, earthwork grading, and drainage patterns. An introduction is provided to site construction basics including slope analysis, cut/fill analysis, storm drainage patterns, road layout, pedestrian, and vehicular circulation. Some computer application may be applied. Special attention is paid to ecological land use planning, site remediation, and ecological restoration.

**651 Construction II: Materials (4)**
Focus is on landscape construction methods and materials from masonry to wood. Students will learn construction and detailing of walls, fences, planters, walks, stairs, and paving, focusing on environmentally friendly and sustainably harvested materials. Students produce construction drawings and specific site details for various project types relevant to construction. Field trips to construction sites are included.

**654 Construction III: Road Design and Sustainable Transportation (4)**
This course concentrates on road alignment, vehicular circulation, vertical and horizontal curves, as well as sustainable transportation options including public transit, bicycling, etc. The final project will produce a set of construction documents utilizing knowledge from previous two construction courses.

**655 Construction IV: Water in the Landscape (4)**
Focus on stormwater management using natural methods for water runoff of wetlands, wildlife drainage swales, permeable paving, storm water detention systems and sustainable water management systems.

**656 Community Field Work: Site Internship (4)**
Students will work in the Chatham College arboretum with the College grounds crew on maintenance and design of planting areas, including trees, shrubs, and site work. The emphasis will be on sustainable design, no spray methods, and ecological land use. A portion of this community field work can be applied at Fallingwater or in a local community gardening project.

**660 Theory, Ethics and Professional Practice (3)**
Examination of historical and contemporary modes of sustainable landscape architectural practice with emphasis on the social, cultural, and ideological issues that shape it. Particular emphasis is given to trends in the landscape architecture profession, environmental issues, and impact on future roles for the landscape architect. Topics include professional and environmental ethics; legal aspects of the profession; project management; and the professional’s relationship to the client and society. Contracts, cost estimates, and specifications are also covered.

**680 Graduate Research Methods (3)**
This graduate seminar introduces students to methods and techniques that have been developed through multidisciplinary research for literary and aesthetic expression in landscape architecture. It focuses on the contributions and limitations of different
approaches to the study of landscape in a range of disciplinary areas and the potential bibliographical and institutional resources, that are available to the student when drawing upon other disciplines to inform the interpretation, writing, and design of landscape architecture. Cross-listed as LNS 680.

681 Internship (6)
The student will have the opportunity to work in an office environment to better understand the workings and responsibilities involved with sustainable landscape architectural design.

698 Thesis or Project (3)
The master's project is the final independent project undertaken by the student under the guidance of an advisor. It involves original interpretive research and/or a creative design project demonstrating the mastery of the themes, ideas, and critical approaches learned through the program and include written and oral presentations of the project. The final product is a portfolio quality document that has academic conceptual rigor and an aesthetically strong presentation. A prerequisite for registration is a project proposal statement that must be approved by the faculty project advisor and the program director.

Landscape Studies (LNS)

Master of Arts in Landscape Studies
The Master of Arts in Landscape Studies (M.A.L.S.) provides preparation for professionals in the planning, design, conservation, care, and study of designed landscapes, which can range from small, intimate private gardens to larger public spaces. In this program students learn the skills required for engaging in creative and innovative landscape design processes that express society’s aesthetic, philosophical, and practical relationships with the land and nature. The curriculum draws upon other disciplines, including horticulture and ecology, visual arts, cultural and literary studies, philosophy, history, and geography, to contribute different perspectives on landscape. Emphasis across the curriculum is on providing motivated students with opportunities to develop an understanding of landscape issues and explore landscape ideologies and strategies that will enable them to practice as creative and responsible professionals.

Degree Requirements
15 courses, including:
5 courses of foundation study:
LNS 511 Foundation Design Studio: The Methods and Processes of Landscape Design (3)
LNS 512 Applied Design Studio: The Principles and Practice of Landscape Design (3)
LNS 515 Drafting and Graphic Representation (3)
LNS 521 Plants and Design I (3)
LNS 531 Survey of the History of Landscape Design (3)
6 courses of advanced study
LNS 522 Plants and Design II: Site Ecology and Ecological Design and Planning (3)
LNS 528 Theory and Ethics of Landscape Design (3)
LNS 544 North American Landscape Design History (3)
LNS 633 Advanced Design Studio (3)
LNS 680 Graduate Research Methods in Landscape Studies (3)
LNS 695 Master’s Project (3)
4 courses of electives, selected from:
BIO 524 Field Botany (3)
BIO 525 Plant Development (3)
LNS 518 Computer Technology in Landscape Design (3)
511 Foundation Design Studio: The Methods and Processes of Landscape Design (3)
This foundation studio provides an overview of the art and philosophy of landscape design. Students begin to learn the verbal and graphic vocabulary to articulate and conceptually express approaches to the landscape and its design. Students explore how landscape space and form is created and how it articulates meanings and functions. Studio exercises place an emphasis on learning how to generate design ideas and give aesthetic and functional form to these creative concepts. Cross-listed as LAR 541.

512 Applied Design Studio: The Principles and Practice of Landscape Design (3)
In this course students learn to analyze, synthesize, and assimilate contextual and site-specific information into the development and presentation of creative design solutions for specific landscape projects at different scales. These projects lead to an understanding of design problem definition, program development, and site analysis and inventory as essential elements in the design process. Prerequisite: Landscape Studies 511. Cross-listed as LAR 542.

515 Drafting and Graphic Representation (3)
This studio develops graphic literacy as a language and philosophy for observation, analysis, expression, and presentation of landscape design. Students are introduced to a number of techniques and methods of drawing used by landscape designers, including artistic, freehand drawing, and mechanical drafting through exercises that culminate in a final portfolio quality product. Cross-listed as LAR 510.

518 Computer Design Technology (3)
Students learn the basic computer drafting and drawing skills associated with AutoCAD software. Projects include both creating new work from scratch and existing files. An understanding of drawing layers, detailing, layout, and printing will be presented. Prerequisite: Landscape Studies 511, 512, and 515. Cross-listed as LAR 513.

521 Plants and Design I (3)
This course introduces students to the art of designing landscape spaces with plant material. This study of outdoor space concentrates on exploring landscape character as a product of the relationship of spaces that people observe and occupy to the plants and architectural masses that define these spaces. The course explores the abstract relationships of mass, height, distance, perception of texture, and color in plant groupings. Students learn to recognize woody plants for their structural and visual qualities, growing conditions, plant spacing, and growth rates to generate detailed planting plans. Prerequisite: Landscape Studies 515 or permission of the instructor.

522 Plants and Design II: Site Ecology and Ecological Design and Planning (3)
This studio introduces students to the concepts of ecological design and planning at a number of scales, from the regional to the urban and residential. They explore the systems approach to design, which is concerned with both site ecology and enhancement of
the site – the science and the art of ecological design. Through critical reflection, students are encouraged to go beyond mechanical and prescriptive responses to the site to arrive at solutions that harmonize aesthetic form and ecological functioning. Prerequisite: Landscape Studies 511 and 515 or permission of the instructor.

524 Plant Management (3)
This course covers the identification, culture, use, care, and management of ornamental woody and herbaceous plants that can be used in designed landscapes. The course also covers the general issues of plant maintenance, use of fertilization, and management systems to create environmentally healthy horticultural practices. Maintenance topics include trimming, pruning, and transplantation. Prerequisite: Landscape Studies 553 and 554 or permission of the instructor.

528 Theory and Ethics of Landscape Design (3)
This interdisciplinary course explores various aesthetic and ethical approaches that can guide design intent and form in landscape design. Cultural, social, and philosophical ideas that have, do, and can influence and define the aesthetics and ethics of art and design practice today are introduced, and emphasis is placed on developing critical thinking and a broad vocabulary of aesthetics.

531 Survey of the History of Landscape Design (3)
The landscape traditions of the Western and Eastern worlds are surveyed from antiquity to the present. The course explores the relationships between designed landscape forms within each culture and the political, social, philosophical, and artistic factors that could have determined and influenced the designed landscape. The course draws attention to the fundamental notion that landscape design is both an invention and cultural representation of landscape. Cross-listed as LAR 520.

544 North American Landscape Design History (3)
The course covers the historical development of the American residential and urban landscape from the 18th century to the present. An important component of the course is the use of the Pittsburgh region as the comparative example of the development of private and public space. A field trip to another urban center may be included in this course as well. Prerequisite: Landscape Studies 531. Cross-listed as LAR 521.

549 Historic Landscape Preservation (3)
The development of the Historic American Landscape Survey for the National Park Service has brought the design of open space and the built landscape into the same venue as the Historic American Building Survey. In this course students will learn how to perform a HALS survey; cultural landscape analysis; research on historic landscapes both existing and destroyed; and understand how nature can provide us answers as to what may have been before. Cross-listed as LAR 527.

551 Soil Science (3)
Study of soils as natural bodies, media for plant growth, and ecosystem components. Topics include soil morphology and characteristics, composition, formation, conservation, and soil erosion. Physical, chemical, and biological properties of soil are related to the production of plants, the functioning of hydrologic and nutrient cycles, and the protection of environmental quality. Cross-listed as ENV 451 and LAR 534.

553 Ornamental Horticulture I (3)
This course introduces students to plant biology and relates this science to its prac-
tical applications in horticulture. It develops a general understanding of the botanical concepts of plant structure, physiology, function, growth, reproduction, and evolutionary diversity, as well as introducing students to the horticultural concepts and practices of plant propagation, transplantation, care, and management of ornamental plants.

554 Ornamental Horticulture II (3)
This course covers the identification, culture, use, care, and management of ornamental woody and herbaceous plants that can be used in designed landscapes. Students learn how to identify a large plant palette and consider the aesthetics of form, color, texture, and seasonal changes for each plant. The course also covers the general issues of plant maintenance, fertilization use, and management systems to create environmentally healthy horticultural practices. Maintenance topics include trimming, pruning, and transplantation. Prerequisite: Landscape Studies 553 or permission of the instructor.

557 Diseases and Pests (3)
This course introduces students to the common biotic and abiotic problems caused by diseases and pests in ornamental plants as well as basic concepts of the current techniques and thinking on managing these problems. Students cover the general principles of plant problem diagnosis and identification of common disease and insect problems. Disease and pest management topics include the concepts of integrated pest management, vertebrate pest management, and pesticide use and safety. Prerequisite: Landscape Studies 553 or permission of the instructor. Cross-listed as ENV 457 and LAR 535.

573 Materials and Methods in Landscape Construction (3)
This course covers the basic materials used in landscape construction of architectural site features such as walls, fences, walks, stairs and paving, patios, and water features. Students produce construction drawings and specific site details for various project types relevant to small-scale site construction.

575 Landscape Grading and Drainage (3)
This course covers the fundamentals of site grading with relationship to spatial land design and to manipulation of landforms for pleasing results. Understanding the principles of surveying, in addition to the requirements of residential walks, driveways, and outdoor living spaces, will be addressed. Emphasis will be on creating a grading plan, understanding contours, spot elevations, and how to read site plans. Prerequisite: Landscape Studies 511, 512, 515, and 521.

591, 592, 593 Independent Study (1, 2, 3)

633 Advanced Design Studio (3)
Students apply the principles, methods, and processes of landscape design as addressed in the curriculum that have practical implications within the community. Students explore various multidisciplinary approaches and perspectives that generate innovative and clearly user-responsive solutions for the project site. Prerequisites: Landscape Studies 511, 512, 515, 521 and 522.

680 Graduate Research Methods in Landscape Studies (3)
This graduate seminar introduces students to some methods and techniques that have been developed through multidisciplinary research for literary and aesthetic expression in landscape studies. It focuses on the contributions and limitations of different approaches to the study of landscape in a range of disciplinary areas and the potential bibliographical and institutional re-
sources that are available to the student when drawing upon other disciplines to inform the interpretation, writing, and design of landscape. *Cross-listed as LAR 680.*

682, 683 Special Topics (2, 3)

695 Master's Project (3)
The master's project is the final independent project undertaken by the student under the guidance of an advisor. It involves original interpretive research and/or a creative design project demonstrating the mastery of the themes, ideas, and critical approaches learned through the program and includes written and oral presentations of the project. The final product is a portfolio quality document that has academic conceptual rigor and an aesthetically strong presentation. A prerequisite for registration is a project proposal statement that must be approved by the faculty project advisor and the program director.

**Modern Languages**

French and Francophone Studies courses (FRN)

548 Literature of the Francophone World (3)
An investigation of the writings, both theoretical and creative, of major French authors from outside mainland France. Primary emphasis on Francophone writers from Africa and the West Indies with additional works from Quebec, Belgium, Switzerland, and South East Asia. The specific concepts of “négritude” and “créolité” are discussed within the political, social, historical, and economic context.

580 Special Topics in Francophone Literature (3)
In-depth analysis and discussion of selected French and Francophone literature not covered in other advanced course offerings. Recent topics have included Women in French Literature; The French Court Theatre; Montaigne, Diderot Stendhal; French Poetry; and French Literary Criticism. Course may be repeated for credit. Prerequisite: French 204 or permission of the instructor.

Spanish and Hispanic Studies courses (SPN)

515 The Spanish American Short Story (3)
This course will explore the important genre of the short story in Spanish American literature from its beginnings to the present. It introduces students to the short story in the Latin American context during the 20th century and encourages discussion and composition about development of the genre, as well as the texts themselves. Students will focus on major authors such as Quiroga, Borges, Bombal, Cortazar, Donoso, Garcia Marquez, Castellanos, Rulfo, Arreola, and Ferre. Prerequisite: Spanish 204 or departmental placement. *Cross-listed as Spanish 415.*

Occupational Therapy (OTH)

All occupational therapy courses are limited to occupational therapy students unless permission is obtained from the instructor and the program director.

The goal of the Chatham College Master of Occupational Therapy (MOT) program is to educate competent occupational therapy practitioners to assist individuals of all ages to achieve maximum independence in daily life activities. Upon completion of this program, graduates are prepared to practice evidence based occupational therapy in a variety of healthcare and com-
munity settings, provided that they pass the national certification exam and obtain state licensure as needed.

The MOT program curriculum design is based upon self-directed, active, experiential, and didactic learning strategies. The curriculum focuses on professional development, critical thinking, and the evaluation and use of occupational therapy knowledge and research. Throughout the curriculum, students are active participants in proposing, conducting, and reporting group research projects. In addition, students learn to market occupational therapy services and are given opportunities to plan and implement occupational therapy programs in community settings.

Students must complete fieldwork training as part of the degree requirement. Fieldwork experiences, which are provided throughout the curriculum in a variety of settings and locations, are designed in collaboration with the student’s academic advisor and fieldwork coordinator. Occupational therapy students must complete the Level II Fieldwork within 20 months of completing their academic preparation.

Accreditation
The M.O.T. program is accredited by the Accreditation Council for Occupational Therapy Education (ACOTE) of the American Occupational Therapy Association (AOTA), 4720 Montgomery Lane, P.O. Box 31220, Bethesda, MD 20824-1220, 301-652-AOTA. Graduates of the program will be able to sit for the national certification examination for the occupational therapist, administered by the National Board for Certification in Occupational Therapy (NBCOT). After successful completion of this exam, the individual will be an Occupational Therapist Registered (OTR). Most states require licensure in order to practice. State licenses are usually based on the results of the NBCOT Certification Examination.

Master of Occupational Therapy

Degree Requirements
85 credits, including:
BIO 503  Human Gross Anatomy (4)
BIO 506  Principles of Neuroscience (4)

601 Foundations of Occupational Therapy (3)
This course addresses the concepts basic to the roles and functions of an occupational therapist. OT practice is reviewed from an historical perspective, followed by an examination of issues related to current and future practice. Clinical issues and personal/professional identity related to OT are explored as well as social, economic and political influences. Occupational Science, as a scientific basis for practice is introduced. Occupations throughout the lifespan and their implications for therapeutic intervention are examined. Methods of evaluation, including observation and interview, will be presented and practiced. The basics of documentation are illustrated and discussed.

603 Occupational Therapy in Physical Disabilities (3)
Effective occupational therapy for adults with physical dysfunction requires that the student identify relationships among specific trauma/disease processes (disease or disorder), performance component deficits (impairments), deficiencies in task performance (activity restrictions), and adjustments in occupational roles (participation restrictions) that may occur as a result. Students apply the occupational therapy process to meet the occupational needs of adults with specific physical dysfunction and the associated psychological impacts
through developing skills in the use of valid evaluation techniques, sound clinical assessment, and the selection and application of appropriate treatment modalities from an occupation-based perspective.

604 Occupational Therapy in Physical Disabilities Lab (1)
This lab course provides the student with the skills and practice of using, analyzing and reasoning about the various types of assessment and treatment modalities offered in Occupational Therapy 603. Occupational Therapy 604 provides the students with the opportunity for hands-on experiences in both the areas of assessment and treatment. These skills are further enhanced by the completion of assignments that are directly related to the lab content. Learned knowledge is evaluated via a comprehensive lab practical.

605 Occupational Therapy in Mental Health (3)
This course addresses the psychiatric, functional, and occupational symptomatology, progression, evaluation, management, and prognosis of major psychiatric conditions. Students analyze research and other literature relevant to occupational therapy mental health practice. Students also develop awareness of personal beliefs regarding persons with mental illness, attitudes associated with helping behaviors, and the social, economic, and political influences on the health-care environment.

610 Advanced Occupational Therapy Skills (1)
This course will expand the student’s clinical skills through additional knowledge and refinement of treatment procedures and techniques used in Occupational Therapy practice. The rationale behind the selection and application of procedures will be discussed in this skills lab. The students will then practice newly learned techniques with classmates to enhance technical abilities as well as to increase confidence in the selection and use of each procedure and technique. Objectives will be achieved through case studies, class discussion, active participation in the skills lab, and dialogue with instructors and classmates.

612 Professional Literature Skills (1)
This course emphasizes the importance of research to the occupational therapist’s professional enhancement. Students develop research consumer skills encompassing literature searches, critical analysis of research, common methodology and data analysis, clinical applications of research, and grant securing processes. Students are instructed within lecture and lab formats with written and oral assignments. Prerequisite: research methods or statistics course.

622 Occupational Therapy in Pediatrics (4)
This course addresses developmental and occupational tasks of children and adolescents. Students study a variety of pediatric diagnoses and frames of reference, and apply this knowledge to occupational therapy evaluation and intervention. The importance of context, family, and the socio-political environment on the developing child is explored. Students are exposed to a variety of pediatric service delivery models and practice settings.

623 Occupational Therapy in Gerontology (4)
This course examines the normal aging process with emphasis on functional performance, activity limitation, and performance restrictions of individuals from adulthood throughout the life span. Students review the assessment and treatment of clients, including prevention, remediation, and maintenance of wellness. Various practice areas (acute care, rehabilitation, transitional living, community-
based outpatient, long-term care, hospice, and home care) for the aged population are discussed.

624 Human Movement in Occupation (4)
Students integrate knowledge of normal human anatomy with the development and remediation of abnormal human movement, from an occupational therapist’s perspective. Principles of splinting, work hardening, physical agent modalities, and orthotics are also presented.

625 Human Movement in Occupation Laboratory (1)
Students employ skills in palpation, goniometry, manual muscle testing, sensibility testing, postural assessment, functional capacity evaluation, edema control, scar management, patient education, exercise, muscle balance restoration, body mechanics, physical agent modalities, hand assessment, and splinting. These skills are critical for treating abnormal human movement patterns resulting from or leading to disability and role loss.

626 Occupational Therapy Conceptual Models of Practice (2)
This course introduces students to the theoretical practice models that guide occupational therapy evaluation and intervention. Students engage in active learning opportunities designed to enable them to describe and implement the occupational therapy treatment process using selected models. Students research, analyze, and relate pertinent occupational therapy literature to models of practice.

628 Research Proposal Development (3)
This seminar course provides major emphasis on applying knowledge of the research process to the study of occupational therapy and is the primary course for the development of the research proposal. One major activity is the development of the written proposal, including an extensive review of the literature, appropriate research design, and methodology for the research project.

632 Environmental Interventions (2)
This course focuses on assistive technology principles and practice and the occupational therapist’s role on the assistive technology team. Emphasis is on exploring and critiquing technology resources, assessing environments, and applying information to evaluation and treatment. Students discuss and analyze the impact of environmental interventions on the consumer’s ability to engage in meaningful occupations.

635 Fieldwork I-A and Seminar (1)
This course provides students the opportunity to engage in clinical observations using guided assignments and discussion to bridge their didactic classroom knowledge with the occupational therapy process in clinical settings.

636 Fieldwork I-B and Seminar (1)
This course provides students the additional opportunities for engaging in clinical observations using guided assignments and discussion to bridge their didactic classroom knowledge with the occupational therapy process in clinical settings.

637 Functional Neuroscience (4)
This course uses a seminar format to reinforce and make relevant to the practice of occupational therapy content learned in Biology 506. Students broaden their knowledge and understanding of medical diagnoses and disorders involving the nervous system that may affect an individual’s ability to perform routine occupational tasks. Students begin to translate the physiological changes incurred secondary to these neurological diagnoses in order to develop a plan for assessment and inter-
vention. Students identify and analyze disease and disorder, impairments, activity limitations, and performance restrictions related to various neurological insults. Case-study analyses and presentation are used for clinical application.

641 Management of Neurological Conditions (3)
This course emphasizes preparatory, purposeful, and occupation-based intervention commonly used in occupational therapy practice. These practice interventions are based on neurophysiological, biomechanical, psychiatric, and rehabilitative concepts and approaches for the evaluation and management of occupational activity limitations and performance restrictions resulting from neurological insult. Students have lecture and lab opportunities to learn, apply, and practice evaluative and intervention methods for dysfunction consequent to various neurological conditions. Approaches presented include Rood, Brunnstrom, adult and pediatric Neurodevelopmental Treatment, Proprioceptive Neuromuscular Facilitation, Sensory Integration, and Motor Learning theories. Case analyses allow students to compare and contrast the various approaches presented in each module.

642 Management of Neurological Conditions Laboratory (1)
This course is held concurrent with Occupational Therapy 641. The course is taught in a seminar format that provides hands-on experience in practicing the multiple treatment principles learned in Occupational Therapy 641. Students practice techniques, analyze cases, and superimpose purposeful and occupation-based treatment after incorporating various neurophysiologically based techniques.

643 Applied Research Project (2)
Students implement the projects developed in Occupational Therapy 628. Pilot study groups collect and manage their data. Review article groups clarify unfamiliar background concepts and research methodology in reviewed research. Preliminary findings are presented at the end of the term.

644 Fieldwork I-C and Seminar (2)
In this capstone fieldwork I experience, students participate in a community fieldwork experience with emphasis on management skills, including advocacy and consulting. Students learn about community agencies, the needs of client populations, and the roles of occupational therapists in the community. Supervision and instruction are provided by faculty members and clinical facilitators. Students complete an organizational analysis, needs assessment, and program plan. Students then implement and evaluate the program, followed by a presentation of the program to agency personnel. Students engage in follow-up class discussions about their experiences and organize a presentation for students, faculty, and agency supervisors.

645 Management and Administration (3)
This course focuses on various aspects of occupational therapy management, including planning and evaluating programs, organizing, directing, communicating, and controlling. These concepts are discussed within the broader context of an evolving health-care system. Ethical issues related to occupational therapy management are explored.

646 Research Report (3)
In this final research course, students discuss results specific to their study/critique specified body of knowledge, draw conclusions, and make future recommendations. In becoming scholarly contributors to the profession, student groups are required to prepare final written reports, poster pre-
sentations, publication-ready manuscripts, and oral presentations to supporting clinical agencies.

660 Fieldwork II Seminar (1)
This seminar course provides students with the opportunity to synthesize information and strategies in preparation for Level II fieldwork. Students analyze topics related to effective communication and supervision. Career job search skills, including résumé writing and interviewing techniques, are integrated. Students develop organizational skills to fulfill national occupational therapy certification examination and state licensure applications.

662 Fieldwork Level II-A (12)
This first Level II-A fieldwork course includes a minimum of 12 weeks in a clinical setting that provides occupational therapy services across the life span to individuals in order to enhance occupational performance. Students are provided with experience in client assessment, planning, problem solving, and professionalism in hospital or community agencies, using a variety of service delivery models reflective of current occupational therapy practice. Students are supervised by one or more certified occupational therapists, each with a minimum of one year of occupational therapy experience. All fieldwork shall be completed within 20 months following completion of academic preparation.

665 Fieldwork Level II-B (12)
This final Level II-B fieldwork course includes a minimum of 12 weeks in a clinical setting that provides occupational therapy services to individuals across the life span in order to enhance their occupational performance. This course builds on the previous Level II-A Fieldwork course by expanding the variety of experiences across the life span and in different types of facilities. Students continue to learn client assessment and treatment techniques using a variety of service delivery models reflective of current occupational therapy practice. Students are supervised by one or more certified occupational therapists, each with a minimum of one year of occupational therapy experience. All fieldwork shall be completed within 20 months following completion of academic preparation.

682, 683 Special Topics (2, 3)
697, 698, 699 Independent Study (1, 2, 3)

Physical Therapy (PTH)
All physical therapy courses are limited to physical therapy students unless permission is obtained from the program director.

Chatham’s entry-level physical therapy program supports and enhances the College’s mission to educate its graduates to become leaders in their careers and to serve society. The program strives to educate competent physical therapists qualified to practice autonomously and within the interdisciplinary health care team in diverse health care settings. It seeks to advance the student’s knowledge and skills by promoting the value of evidence-based practice and encourages service to a variety of communities through active involvement in service-oriented programs. Through this unique program, Chatham seeks to provide an academic community in which all participants exhibit a commitment to excellence in clinical practice, service to the profession and larger community, and lifelong learning.

Designed to prepare graduates to serve as generalists, the curriculum stresses clinical decision making through the study of patient problems typically encountered in the clinical setting. Normal structure and func-
tion provide a basis for the study of disease processes and prevention, and the effect of pathology and impairments on function and quality of life. The modified problem-based learning (PBL) curriculum presents the clinical arts and science of physical therapy in an integrated manner organized around body systems.

**Doctor of Physical Therapy**
Chatham College offers a D.P.T. degree upon successful completion of seven terms of study. Candidates follow a sequence of courses that includes 36 weeks of clinical field placements.

**Degree Requirements**
103 credits, including:
- BIO 502 Human Gross Anatomy (6)
- BIO 506 Principles of Neuroscience (4)
- PTH 504 Physiology (3)
- PTH 700 Introduction to Clinical Skills (2)
- PTH 701 Foundations of Movement Science I (7)
- PTH 702 Foundations of Movement Science II (2)
- PTH 703 Management of Musculoskeletal System Dysfunction (12)
- PTH 707 Management of Cardiovascular and Pulmonary System Dysfunction (7)
- PTH 708 Management of Pediatric Neuromuscular System Dysfunctions (3)
- PTH 709 Management of Neuromuscular System Dysfunction (8)
- PTH 713 Management of Multi-System Dysfunction (3)
- PTH 722 Research I (3)
- PTH 724 Research II (3)
- PTH 726 Clinical Seminar (1)
- PTH 730 Clinical Experience I (6)
- PTH 733 Clinical Experience II (8)
- PTH 735 Clinical Experience III (10) or PTH 746 Clinical Experience IV (5) and
- PTH 737 Correlative Neuroscience (1)
- PTH 740 Principles of Practice I: Introduction to Physical Therapy Practice (2)
- PTH 741 Principles of Practice II: The Patient-Provider Relationship (2)
- PTH 742 Principles of Practice III: Ethics, Education, and System Dynamics (4)
- PTH 743 Principles of Practice IV: Integration of Psychological Issues and Social Responsibility (1)
- PTH 744 Principles of Practice V: Service Learning (1)
- PTH 745 Principles of Practice VI: Health Care Delivery Management Policy (3)
- PTH 748 Principles of Practice VII: The Art and Science of Physical Therapy Practice (1)

**Accreditation**
Chatham College’s Doctor of Physical Therapy degree program is accredited by the Commission on Accreditation in Physical Therapy Education of the American Physical Therapy Association (1111 North Fairfax Street, Alexandria, VA 22314, 703-684-2782).

**Transitional Doctor of Physical Therapy**
The transitional Doctor of Physical Therapy degree program provides practicing clinicians with excellent professional education to be autonomous practitioners. The transitional degree is an enhanced entry-level degree, not a research degree. It responds to the goal of the American Physical Therapy Association for all physical therapists to have professional doctoral degrees by 2020. The program is open to physical therapists holding a current license to practice physical therapy in the United States who have completed a bachelors or
masters degree and have a certificate of graduation from an accredited physical therapy program.

Students take five core courses and two elective courses.

**Core Courses**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Credits</th>
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<tbody>
<tr>
<td>PTH 760</td>
<td>Ethics, Leadership and Management</td>
<td>2</td>
</tr>
<tr>
<td>PTH 761</td>
<td>Differential Diagnosis in Physical Therapy</td>
<td>2</td>
</tr>
<tr>
<td>PTH 762</td>
<td>Exercise Prescription and Application for the Physical Therapist</td>
<td>2</td>
</tr>
<tr>
<td>PTH 763</td>
<td>Imaging and Pharmacology</td>
<td>2</td>
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<tr>
<td>PTH 764</td>
<td>Evidence-Based Practice</td>
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**Elective Courses**

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<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>PTH 765</td>
<td>Examination and Management of Common Pediatric Problems</td>
<td>2</td>
</tr>
<tr>
<td>PTH 772</td>
<td>Physical Examination and Treatment of the Musculoskeletal System Part I: Upper Quarter</td>
<td>2</td>
</tr>
<tr>
<td>PTH 773</td>
<td>Physical Examination and Treatment of the Musculoskeletal System Part II: Lower Quarter</td>
<td>2</td>
</tr>
<tr>
<td>PTH 775</td>
<td>Geriatric Rehabilitation – Principles of Practice</td>
<td>2</td>
</tr>
<tr>
<td>PTH 780</td>
<td>Advanced Clinical Internship</td>
<td>3</td>
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An advanced Clinical Internship is required of students with less than one year of clinical practice.

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700 *Introduction to Clinical Skills (2)*

This course provides an introduction to foundation physical therapy clinical skills with an emphasis on hands-on examination and intervention procedures. Principles relating to these foundation techniques will be introduced through lecture and laboratory experiences. The techniques will be applied in future courses in increasingly complex patient problems and diagnoses. Pass/fail grading only.

701 *Foundations of Movement Science (7)*

This course is an in-depth analysis of normal and abnormal human motion with an emphasis on biomechanics, gait, patterns of motion and mechanisms, which affect or limit movement. Principles of the physical therapy diagnostic process along with therapeutic techniques, procedures and modalities will be introduced. Laboratory experiences are included to enhance, integrate and apply these concepts. The course offers a problem-based approach to promote collaborative and student directed learning centered around specific patient cases to explore issues of pathology, impairment, and functional limitations. Students are required to search for relevant evidence in the medical literature throughout the course. Pass/fail grading only. Prerequisites: Biology 502 and Physical Therapy 504.

702 *Foundations of Movement Science II (2)*

This course includes advanced study of current theories of motor control, motor learning, motor development, and an introduction to pediatric assessment. This will include basic premises, clinical implications, and limitations of each model. The use of this information to guide the examination of children and adults with neuro-
muscular dysfunction is explored. Pass-fail grading only. Prerequisites: Biology 506 and Physical Therapy 701.

703 Management of Musculoskeletal Systems Dysfunction (12)
An integrated approach to the study of all relevant physiologic, anatomic, pathologic, medical, and therapeutic concepts related to musculoskeletal physical therapy practice throughout the lifespan. The course includes the physical therapy diagnostic process, including differential diagnosis, physical therapeutic interventions and patient care program development. The course presents classroom and laboratory experiences building from simple to complex problems to assist the student in developing the competencies necessary for practice as a generalist in physical therapy. Experiences related to psychological, social, cultural, economic, and vocational aspects of illness and disability are included. The course offers learning experiences presented using the problem-based, case-study approach, organized around the study of body systems, pathophysiology, and response to intervention. Students will be required to search for relevant evidence in the medical literature throughout the course. Pass/fail grading option only. Prerequisites: Physical Therapy 700, 701, and 703.

707 Management of Cardiovascular and Pulmonary Systems Dysfunction (7)
This course provides an integrated approach to the study of all relevant physiologic, anatomic, pathologic, medical, and therapeutic concepts related to entry-level cardiovascular and pulmonary physical therapy practice across the life span. The course includes the physical therapy clinical decision making in the context of physical therapy examination, evaluation, and patient care program development, intervention, and progression with an orientation toward the human oxygen transport system. The course uses classroom and laboratory experiences related to patient cases ranging from acute illness to chronically stable illness to wellness, illness prevention, to assist the student in developing the necessary competencies in cardiovascular and pulmonary physical therapy. Experiences include the psychosocial, cultural, economic, and vocational aspects of illness and disability. The course offers learning experiences presented using the problem-based, case-study approach, organized around the study of body systems, pathophysiology, and response to intervention. Students will be required to search for relevant evidence in the medical literature throughout the course. Pass/fail grading option only. Prerequisites: Physical Therapy 700 and 701, and Biology 502.

708 Management of Pediatric Neuromuscular System Dysfunction (3)
This problem-based course will provide in-depth information on the examination, evaluation and management of pediatric neuromuscular system dysfunction from birth through adolescence and young adulthood. Students will build upon concepts of normal development, motor control and motor learning to develop a theoretical framework for addressing the physical therapy needs of children. Prerequisites: Physical Therapy 702 and 707.

709 Management of Neuromuscular System Dysfunction (8)
This problem-based course will provide in-depth information on the evaluation and management of neuromuscular system dysfunction throughout the adult life span. Students will build upon concepts of normal development and movement control to gain a comprehensive understanding of movement dysfunction in patients with neurological disease. Emphasis will be placed upon a holistic view of the patient and family, critical thinking skills, and competent performance of examination.
and intervention approaches. Quantitative and qualitative methods of assessment will be discussed and practiced. Tutorial groups will promote collaborative and student-directed learning centered around specific patient cases to explore issues of pathology, impairment, functional limitations, and disabilities. Pass/fail grading only. Prerequisites: Physical Therapy 702, 703, 707.

713 Management of Multi-System Dysfunction (3)
This course emphasizes physical therapy management of complex patients with multi-system involvement and includes all relevant physiologic, anatomic, pathological, medical, and therapeutic information. Students will explore the interrelationship among multiple body systems with pathology across all age groups. Psychological, social, legal, cultural, economic, and vocational aspects of illness and disability are included. A related topic is wellness and health promotion in the “healthy” population. Pass/fail grading only. Prerequisites: Physical Therapy 703, 707, 709, and 713. Grading: Letter Grade.

722 Research I (3)
The purpose of this course is to offer students the opportunity to gain knowledge and skills that are essential to the critical evaluation of the medical literature and the application of research to the practice of physical therapy. Pass/fail grading option only. Prerequisites: Physical Therapy 700, 701, 702, 703, 709, 737, 740, 741, and 742.

724 Research II (3)
The purpose of this course is to offer students the opportunity to enhance their knowledge and skills that are essential to the critical evaluation of the medical literature, the application of research to the practice of physical therapy, and how to submit an abstract for publication. Pass/fail grading option only. Prerequisites: Physical Therapy 722.

726 Clinical Seminar (1)
This course allows students to enrich their knowledge and competency in patient management, literature search and analysis, and professional writing. Students select a clinical question based on a current patient or problem. They will then search the literature for relevant evidence, and generate a paper which details the search process, synthesizes the results, and answers the clinical question based on evidence. Prerequisites: Physical Therapy 703, 707, 709, and 713. Grading: Letter Grade.

730 Clinical Experience I (6)
A 10-week, full-time experience scheduled at the completion of study of the musculoskeletal system. Students will be placed in outpatient facilities or general hospitals with an expectation that students see primarily orthopedic patients. Pass/fail grading only. Prerequisites: Satisfactory completion of all previous academic requirements.

733 Clinical Experience II (8)
A 12-week, full-time experience scheduled at the completion of the neuromuscular and cardiopulmonary systems. Students will generally be placed in acute care rehabilitation, skilled nursing, or pediatric settings, subacute units, outpatient facilities seeing primarily neurologically impaired patients or with home health agencies. Pass/fail grading only. Prerequisites: Satisfactory completion of all previous academic requirements.

735 Clinical Experience III (10)
A 14-week, full-time experience completed at the conclusion of all clinical didactic and laboratory course work. The student is assigned to an area of academic need and/or interest. During this experience the student will continue to develop competency in his or her entry-level professional physical therapy skills. An alternative to this course is the combination of Physical Therapy 746
Clinical Experience IV (seven weeks) and Physical Therapy 747 Clinical Experience V (seven weeks). Pass/fail grading only. Prerequisites: Satisfactory completion of all previous academic requirements.

737 Correlative Neuroscience (1)
This course uses a seminar format to reinforce and make relevant to the practice of physical therapy content learned in Biology 506. The student identifies and analyzes functional problems related to neurological insult. Case study analysis and presentation are used for clinical application. Pass/fail grading only. Prerequisites: Physical Therapy 700 and Biology 502; corequisite: Biology 506 and Physical Therapy 701.

740 Principles of Practice I: Introduction to Physical Therapy Practice (2)
This course is an overview of the principles of physical therapy practice as they relate to clinical practice and education. Topics include professionalism, evidence-based practice, APTA, patient-provider relationship, and the dimensions of health. Pass/fail grading only.

741 Principles of Practice II: The Patient-Provider Relationship (2)
This course is an integrated review of the principles of physical therapy practice as they relate to the patient-practitioner relationship. Topics include professionalism, dynamics of the patient-practitioner relationship, the interdisciplinary health care team, documentation and the medical record, communication, patient interviewing, and patient-centered care. Pass/fail grading only. Prerequisites: Physical Therapy 740.

742 Principles of Practice III: Systems Dynamics, Ethics, and Education (4)
This course is an integrated review of the principles of physical therapy practice as they relate to systems dynamics, ethics, and education. Topics include physical therapy code of ethics, family dynamics, socioeconomic dynamics, cultural dynamics, race and gender, spirituality, societal values and mores, public and social health, medical and psychosocial aspects of chronic illness and disability, human behavior, health behavior, health education, teaching and learning, and community intervention. Service learning is integrated into the course as a means of creating a foundation for professional responsibility and care of the patient in terms of the societal context. Pass/fail grading only. Prerequisites: Physical Therapy 740 and 741.

743 Principles of Practice IV: Integration of Psychosocial Issues and Social Responsibility (1)
This course is an integrated synthesis of material learned in previous Principles of Practice courses with practical application into clinical education. The case report serves as the medium to synthesize knowledge of patient care into a framework that emphasizes the psychological domain. Students preliminarily explore the integration of social responsibility and professionalism via community-based service learning. Pass/fail grading only. Prerequisites: Physical Therapy 740, 741, and 742.

744 Principles of Practice V: Service Learning (1)
This course is a continuation of Principles of Practice IV, with completion of the service learning requirement via a reflective component as well as formal presentations. The course emphasizes social responsibility as a health care professional. Pass/fail grading only. Prerequisites: Physical Therapy 740, 741, 742, and 743.
745 Principles of Practice VI: Health Care Delivery, Management, and Policy (3)
Principles of Practice VI integrates the principles of health care delivery, management, and policy in the United States; delivery of physical therapy service; management, leadership, and mentoring; supervision and disciplinary procedures; risk management; strategic planning; budgeting; complementary and integrative therapies; job search strategies; role of the clinical instructor; and preparation for clinical education. Pass/fail grading only. Prerequisites: Physical Therapy 740, 741, 742, 743, and 744.

746 Clinical Experience IV (5)
A seven-week, full-time experience in combination with Physical Therapy 747 Clinical Experience V (seven weeks) completed at the conclusion of all clinical didactic and laboratory course work. The student is assigned an area of academic need and/or interest. During this experience the student will continue to develop competency in his or her entry-level professional physical therapy skills. An alternative to this course in combination with Physical Therapy 747 Clinical Experience V is Physical Therapy 735 Clinical Experience III (14 weeks). Pass/fail grading only. Prerequisites: Satisfactory completion of all previous academic requirements.

747 Clinical Experience V (5)
A seven-week, full-time experience in combination with Physical Therapy 746 Clinical Experience IV completed at the conclusion of all clinical didactic and laboratory course work. The student is assigned an area of academic need and/or interest. During this experience the student will continue to develop competency in his or her entry-level professional physical therapy skills. An alternative to this course in combination with Physical Therapy 746 Clinical Experience IV is Physical Therapy Clinical Experience III (14 weeks). Pass/fail grading option only. Prerequisites: Satisfactory completion of all previous academic requirements.

748 Principles of Practice VII: The Art and Science of Physical Therapy Practice (1)
This course provides the student with the opportunity to integrate learning from all previous Principles of Practice courses in summary form. Methods include a professional research platform presentation. Additional learning focus is on professionalism in Physical Therapy practice. Pass/fail grading only. Prerequisites: Physical Therapy 740, 741, 742, 743, 744, and 745.

760 Ethics, Leadership and Management (2)
The applied ethics portion of this course is an integrated review of the principles of ethics specific to physical therapy practice. Topics include: professionalism, moral reasoning, PT code of ethics, societal values and mores, conflict of interest, and ethical patient care.

The leadership and management portion of the course is an integrated review of the principles of leadership and management specific to physical therapy practices. Topics include: professionalism, strategic planning, supervision, quality assessment, marketing, principle-centered leadership, the fifth discipline, moral imperatives of leadership, and clinician as manager and leader.

761 Differential Diagnosis in Physical Therapy (2)
Introduces the experienced physical therapist to a differential diagnosis process using the essential components of the Guide to Physical Therapist Practice. Covers the fundamental concepts of using the evidence to determine the diagnostic utility of the various tests and measures employed
in physical therapy practice. Presents the signs and symptoms of common pathology and conditions of each of the major systems and specific regions of the body.

762 Exercise Prescription and Application for the Physical Therapist (2)
This course is designed to instruct physical therapists about the appropriate generation and application of exercise prescription for various pathologies, as well as a means of primary disease prevention and health enhancement.

763 Imaging and Pharmacology (2)
**Imaging Unit:** This unit will focus on the principles, procedures, and interpretation of diagnostic imaging techniques. Plain film radiography, myelograms, CT scans, MRI and nuclear medicine as they relate to the body systems (musculoskeletal, cardiovascular, gastrointestinal, and reproductive systems) and pathology. A case based approach will be used throughout the course.

**Pharmacology Unit:** This unit is a focused review of the physiologic basis of pain and the pharmacologic agents commonly used for pain management in patients with orthopedic conditions. Topics include: review of the mechanism of action, pharmacodynamics, pharmacokinetics, common adverse effects, drug interactions and clinical use of analgesics, anti-inflammatory agents, skeletal muscle relaxants, neuromuscular blocking agents and spasmolytics. Specific pharmacologic classes are reviewed and problem-based cases are used to demonstrate the therapeutic application of these medications in clinical practice and to illustrate the importance of understanding the pharmacologic basis of pain management to optimize physical therapy.

764 Evidence-Based Practice (2)
This course is designed to provide the experienced physical therapist with a systematic method to critically evaluate and integrate the results of current scientific literature into the clinical decision-making process of patient management. Students will participate in discussions and practical exercises to articulate clinical questions that can be answered through sources of scientific evidence. Strategies for searching medical databases, appraising, and evaluating sources of evidence will be presented. Sources of evidence on harm, prognosis, diagnosis, intervention/prevention, quality of life studies, and qualitative research will be evaluated for their relevance to clinical problems common to physical therapy practice. Instructional methods include platform lecture, interactive discussion, interactive group exercises, small discussion groups, independent study, and clinical case presentation.

765 Examination and Management of Common Pediatric Problems (2)
This course explores pediatric physical therapy examinations, evaluations, and interventions in ways that explicate the relationships and differences among culturally/linguistically unbiased and developmentally appropriate examinations; and family centered, culturally/linguistically unbiased, and developmentally appropriate intervention goals aimed at impairments, functional/activity limitations, and disabilities/participation restrictions. The utilization of assistive technology/adaptive equipment for children will be addressed.

772 Physical Examination and Treatment of the Musculoskeletal System Part I: Upper Quarter (2)
This course is an in-depth approach to the physical examination of the upper quarter utilizing a comprehensive baseline examination augmented by tests and measures with the highest diagnostic utility. This course will also focus on finding relevant impairments to be targeted with physical
therapy interventions. Special emphasis on applying treatment principles and techniques consistent with the evidence for benefit and best clinical practice is also covered.

773 Physical Examination and Treatment of the Musculoskeletal System Part II: Lower Quarter (2)
This course is an in-depth approach to the physical examination of the lower quarter utilizing a comprehensive baseline examination augmented by tests and measures with the highest diagnostic utility. This course will also focus on finding relevant impairments to be targeted with physical therapy interventions. Emphasis on applying treatment principles and techniques consistent with the evidence for benefit and best clinical practice is also covered.

775 Geriatric Rehabilitation – Principles of Practice (2)
This course is designed to prepare physical therapists to work effectively with the older adult in a variety of settings. Participants will learn the difference between “normal” aging and pathological changes commonly seen in the older adult. Students will be encouraged to explore the literature to find supporting evidence for therapeutic interventions. Learning experiences will be developed around case studies, small group discussions, and independent study.

780 Transitional DPT Advanced Clinical Internship (3)
A seven-week, full-time clinical experience assigned at facilities located throughout and beyond Western Pennsylvania. This experience provides the opportunity for recent graduates of an entry-level Physical Therapy program to participate in the development of advanced clinical skills, critical thinking, and ethical issues in orthopedic physical therapy and neurological, geriatric, and pediatric physical therapy. For students with less than one year of clinical practice at program completion.

**Physician Assistant Studies (PAS)**

All physician assistant studies courses are limited to physician assistant studies students, unless permission is obtained from the program director.

The goals of Chatham’s Master of Physician Assistant Studies (M.P.A.S.) program are to educate competent physician assistants to provide quality primary care and to serve local, national, and international communities through active involvement in service-oriented programs for under-served populations. Upon completion of this course of study, the student should be able to practice as a primary medical care provider in a safe, ethical, legal, and caring manner.

The M.P.A.S. curriculum uses a systems approach to problem-based learning, emphasizing the integration of basic sciences and clinical sciences throughout the program. Clinical medicine is introduced early, with correlation of anatomy, physiology, pathology, pathophysiology, pharmacology, genetics, history, physical examination skills, problem solving, and treatment plans. Classroom instruction is conducted through tutorials, seminars, and laboratories. Clinical instruction is held in various settings, including primary care, specialty care, and areas that serve the disadvantaged. International clinical experiences also are available. The goal of this instruction is for students to achieve mastery of all relevant material to prepare them to become competent primary care providers.

The M.P.A.S. program is competency-based, requiring all students to master the required material rather than attaining a GPA of 3.0 to graduate or remain in good
academic standing; therefore, the grading system used is pass (P) or fail (F). Any student receiving an F may remediate the coursework with the approval of the program director. If the course work is remediated successfully, the transcript will indicate both the F and P grades.

The student in the Physician Assistant Studies program is in good academic standing when the transcript contains only grades of pass (P), approved incomplete, or a successfully remediated fail (F). To graduate, students must be in good academic standing and have completed all courses with grades of P or successfully remediated F.

Accreditation
The M.P.A.S. program is accredited by the Accreditation Review Commission on Education for the Physician Assistant, Inc. (ARC-PA). Only graduates of an accredited program are permitted to sit for the certification examination, which is administered by the National Commission on Certification of Physician Assistants (NCCPA).

Master of Physician Assistant Studies

Degree Requirements
Completion of 85 credits in physician assistant studies courses.
All courses are pass/fail grading only.

600 Essentials for the Physician Assistant I (7)
A problem-oriented approach to primary care and non-primary care medicine. This course incorporates basic medical sciences (human anatomy, physiology, and pathophysiology) with medical diagnosis and treatment, pharmacotherapeutics, psychological assessment and management, communication of information about illness, maintenance of patients with chronic illness, and prevention of disability and disease through detection, education, and preventive treatment. Community and public health concepts include a model of public health, health-care delivery and payment systems, epidemiology, infectious disease control, community health assessment, and community health services. The course addresses the clinical problems encountered by the physician assistant and the professional role the physician assistant has in primary, surgical, and specialty care of adult, children, and geriatric populations.

601 Essentials for the Physician Assistant II (7)
A continuation of Physician Assistant Studies 600. Prerequisites: Physician Assistant Studies 600.

602 Clinical Application of Basic Sciences I (4)
An in-depth study of topics in gross human anatomy, physiology, and pathophysiology, supporting the instruction in Physician Assistant Studies 600: Essentials for the Physician Assistant I. Instruction will involve basic sciences with an emphasis on the clinical application of the material, utilizing a systems approach.

603 Clinical Application of Basic Sciences II (4)
An in-depth study of topics in gross human anatomy, physiology, and pathophysiology, supporting the instruction in Physician Assistant Studies 601: Essentials for the Physician Assistant II. Instruction will involve basic sciences with an emphasis on the clinical application of the material, utilizing a systems approach.

604 Critical Reading of the Literature I (1)
Students critically evaluate medical literature and resources used in Physician Asst-
tant Studies 600, including research design, data collection, and statistical analysis.

605 Critical Reading of the Literature II (1)
Students critically evaluate medical literature and resources used in Physician Assistant Studies 601, including research design, data collection, and statistical analysis. Prerequisite: Physician Assistant Studies 604.

606 Clinical Pharmacology I (2)
This clinically oriented course provides students with knowledge required for the safe and effective use of pharmaceutical agents in the diagnosis, prevention, and treatment of diseases through an understanding of pharmacokinetics and pharmacodynamics. Topics selected will support the body systems covered in Physician Assistant Studies 600.

607 Clinical Pharmacology II (2)
This clinically oriented course provides students with knowledge required for the safe and effective use of pharmaceutical agents in the diagnosis, prevention, and treatment of diseases through an understanding of pharmacokinetics and pharmacodynamics. Topics selected will support the body systems covered in Physician Assistant Studies 601: Essentials for the Physician Assistant.

609 Skills Integration and Application II (4)
Continuation of Physician Assistant Studies 608. Skills are related to learning issues covered in Physician Assistant Studies 601 and 603. Students demonstrate competence through practical evaluations, written documentation, and oral presentations. Prerequisite: Physician Assistant Studies 608.

610, 611 Introduction to Clinical Experiences I, II (1 each)
Introduces students to the clinical setting through observation of various clinical practices. Students become familiar with charting, clinical and office procedures, continuity of care, and professional communications and comportment.

620 Master's Project I (1)
Working in groups, students carry out a major project that contributes to their professional development. This involves identification of a problem or question, review of current knowledge or status of the problem or question, and planning materials and methods. Prerequisites: Physician Assistant Studies 604 and 605.

621 Master's Project II (1)
Continuation of Physician Assistant Studies 620. Students begin implementation and/or data collection. Prerequisite: Physician Assistant Studies 620.

622 Master's Project III (1)
Continuation of Physician Assistant Studies 621. Students finish implementation and/or data collection and begin analysis. Prerequisite: Physician Assistant Studies 621.

623 Master's Project IV (1)
Continuation of Physician Assistant Studies 622. Students complete analysis, summary, and discussion and present their projects. Prerequisite: Physician Assistant Studies 622.
625, 626, 627  Clinical Decision Making I, II, III (2 each)
Problem-oriented cases present the student with opportunities to use clinical reasoning to formulate differential diagnoses and emphasize development of treatment and care plans. These courses run concurrently with the clinical experiences I-IX.

628  Clinical Decision Making IV (1)
Problem-oriented cases present the student with opportunities to use clinical reasoning to formulate differential diagnoses and emphasize development of treatment and care plans. A portion of this course runs concurrently with the clinical experience X. Students complete summative program evaluations related to medical knowledge and clinical skills.

630  Topics in Clinical Medicine (4)
An intensive review in preparation for entering practice as a physician assistant. A series of special seminars and presentations, along with clinical skills review session, provide the student with a topical approach to medicine.

631  Healthcare Policy and Medical Ethics (2)
Students explore relevant health-care law and policy issues that impact the Physician Assistant profession and health-care delivery systems. Contemporary professional medical ethics issues are discussed and debated. Instruction is provided through classroom discussions, guest lectures, and small group problem-based learning.

640-649  Clinical Experiences I-X (3 each)
Clinical experiences are four- to five-week rotations spent full-time in the clinical setting. Students are assigned to complete at least two primary-care rotations. Rotations include, but are not limited to, family medicine, internal medicine, women’s health care, pediatrics, surgery, emergency medicine, psychiatry, and orthopedic surgery in hospital, extended care, and outpatient settings. Students spend a rotation providing primary care to an underserved population such as the homeless, public health-service sites, or international sites. This rotation emphasizes cultural sensitivity, understanding of health in relationship to the predominant culture, and the role of the health-care provider in the setting. Students also are assigned two elective clinical experiences in a primary or non-primary care setting such as cardiology, gastroenterology, otolaryngology, pulmonology, neurology, physical medicine and rehabilitation, pathology, radiology, pediatric specialties, or other experience as arranged with the clinical coordinator and program director.

682, 683  Special Topics (2,3)

691, 692, 693  Independent Study (1,2,3)

Political Science (POL)

507  Minority Groups and the Law (3)
An examination of the past and present impact of law and law enforcement on minorities in the United States. Differential treatment based on characteristics such as health, age, language, and race are examined in statutory, administrative, and judicial settings and in the context of issues such as employment and sentencing discrimination or the right of access to education and other public services.

519  European Integration (3)
The development of the European Union (EU) has been the significant political and economic force in post-war Europe. This course examines the historical conditions in which the EU was formed, the development and expansion of its institutions and policies, relationship with the U.S., and expansion into much of Eastern Europe.
525 Environmental Policy (3)
This course takes an interdisciplinary approach to the study of the theory and practice of environmental policies. The course focuses on the political and economic factors contributing to the success and failure of present environmental polices. Topics include the roles of government and the market in causing environmental problems, analysis of proposed means for resolving those problems, and the application of economic and political analyses to selected environmental issues.

545 Health Policy (3)
This course examines health policies in the United States with comparisons to other countries. It uses a policy analysis framework to explore the formation, implementation, and outcomes of a wide variety of public policies relating to health, including professional standards and liability, costs and coverage of medical care, drug regulation, organ donation, and epidemics. Prerequisites: an introductory course in Economics or Political Science, or permission of the instructor.

Professional Writing (PWR)

Master of Professional Writing
Because employers want people with strong communication skills, especially writing, Chatham’s Master of Professional Writing degree provides students with a program of study that leads to viable and in-demand career options. Students will explore the practice of writing in a variety of professional contexts, including technical writing, speech writing, business correspondence, writing for electronic media, journalism, and critical writing. Students may also incorporate courses that build on their abilities as creative writers while retaining a professional focus. The Professional Writing program is a one-year program with courses offered on-line through the School of Continuing Education.

Degree Requirements:
10 courses, including:
PWR 601 Introduction to Professional Writing (3)
PWR 699 Professional Writing Practicum (3)
8 courses from the following:
PWR 562 Writing for Digital Media (3)
PWR 605 Speech Writing (3)
PWR 616 Technical Writing and Editing (3)
PWR 625 Business Writing and Editing (3)
PWR 632 Science Writing (3)
PWR 641 Financial Writing and Editing (3)
PWR 653 Newspaper and Magazine Writing and Editing (3)
PWR 673 Web Design and Development I (3)
PWR 674 Web Design and Development II (3)

562 Writing for Digital Media (3)
This class will prepare students to enter these fields by teaching the strategies and skills needed to make compelling interactive experiences. Specifically, students will focus on developing their abilities to conceptualize, design, and create multimedia applications. Areas of focus will include: strategies for understanding and documenting audience needs and expectations; basics of effective user interface design; and typical process and artifacts involved with multimedia application development.

601 Introduction to Professional Writing (3)
This foundational course is designed as an introduction to professional writing genres, models, standards, and formats of the online Master of Professional Writing de-
The course features practical writing and editing experience in a collaborative work environment. This class will establish a basic level of writing skills among MPW students and will begin with the development, or enhancement, of students' skills in analysis, synthesis, summarizing, and expository writing. In the latter part of the course, students focus on the techniques that make professional writing flow and hold the reader’s interest. A workshop approach helps beginning writers learn to craft their work so that it reads smoothly and communicates effectively. Topics include creating leads that command interest, developing a story or idea without foundering, making graceful and unobtrusive transitions, enriching the theme, and perfecting the ruthless art of self-editing. Students write short essays and critique their own and published work.

605 Speech Writing (3)
This course gives students the confidence and skills to write speeches that will inform and captivate their audiences. With an interactive format taking students through a variety of techniques that will improve their writing skills, this course also offers the opportunity for specific skills to be learned, including grabbing your audience – writing great openings; how to structure your speeches; communicating technical information and facts; and writing a great finish.

616 Technical Writing and Editing (3)
This course teaches students how to prepare letter reports and technical reports about subjects that require technical explanations, diagrams, charts, and jargon understood by technical readers. In addition, this course teaches students how to present technical information to technical readers so they understand the concepts and can apply them in their work.

625 Business Writing and Editing (3)
This course teaches students the rhetorical principles and writing practices necessary for producing effective business letters, memos, reports, and collaborative projects in professional contexts. All sections are offered in networked computer classrooms to ensure that students taking the course are prepared for the writing environment of the 21st-century workplace. The course teaches the rhetorical principles that help students shape their business writing ethically, for multiple audiences, in a variety of professional situations.

632 Science Writing (3)
This course focuses on the practice of writing about science, environment, medicine, and technology for audiences ranging from the general public to scientists and engineers. It starts with basic science writing for lay audiences, emphasizing organization and clear writing techniques and also explores problems of conveying highly complex technical information to multiple audiences, factors that influence science communication to the public, and interactions between scientists and journalists.

641 Financial Writing and Editing (3)
This course is concerned with the communication of financial information in writing: How should financial professionals construct documents? What are the writing techniques needed to make the numbers tell their own story? Topics include genres of financial writing (reports, presentations, correspondence), successful writing strategies (audience analysis, grammar usage, information gathering), organizing information, and using tables and charts.

653 Newspaper and Magazine Writing and Editing (3)
This course explores how newspaper and magazine reporters approach writing stories for newspapers, magazines, and/or elec-
tronic media. The course focuses on developing necessary skills in journalism. Class time is devoted to such topics as interviewing, sourcing of stories, accuracy, fairness, voice and audience. Case studies examine professional ethics and the role of the journalist in framing public discourse. Finally, the course also explores the ways that on-line publishing is affecting what journalists write, how they write it, and how the public reads it.

673 Web Design and Development I (3)
This course will provide an introduction to the technical skills needed for designing online content and interactive multimedia. Current multimedia tools for use in creating web-based products will be taught with ample opportunity for practice. Students learn authoring tools and multimedia techniques while covering topics including non-text-based communication, integration of visuals, the animation of text and graphics, and digital video web-deployment.

674 Web Design and Development II (3)
A continuation of Web Design and Development I, this course will advance student knowledge and understanding of multimedia authoring tools.

699 Professional Writing Practicum (3)
This course must be taken as each student’s last course in the MPW program. This capstone course is a self-directed, guided independent practicum in which the student will produce a written project to the specifications of a “client” in one of the disciplinary areas of study. At the same time, students will have the opportunity to participate in a workshop-style program to in which they will analyze the editorial and communication interests of various consumers of writing services (corporate communication offices, magazines, online venues, etc.). The workshop will explore many areas of the business of being a writer and cover copyright and contracts, cover and query letters, standard business practices – and strategies for success.

Psychology (PSY)

Master of Science in Counseling Psychology
The Master of Science in Counseling Psychology (M.S.C.P.) prepares students for master’s-level positions in professions promoting the optimal development of individuals, families, groups, organizations, and communities. Graduates of the program will be ready for employment in agencies providing mental and physical health services, social services, and other education, professional, and business organizations. The psychology-based curriculum integrates theoretical foundations, experiential perspectives, and research methodologies with practice. In addition, students learn to assess persons in their familial and social contexts, design strategies for change, and evaluate the effectiveness of those interventions. Students are further encouraged to be mindful of the socio-cultural diversity of individuals, families, and groups.

Degree Requirements
17 courses, including:

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<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
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<tbody>
<tr>
<td>PSY 501</td>
<td>Foundations of Counseling Psychology (3)</td>
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<tr>
<td>PSY 503</td>
<td>Applied Biological Psychology (3)</td>
</tr>
<tr>
<td>PSY 513</td>
<td>Learning and Behavior (3)</td>
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<tr>
<td>PSY 517</td>
<td>Psychology of Culture and Identity (3)</td>
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<tr>
<td>PSY 529</td>
<td>Human Development Across the Life Span (3)</td>
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<tr>
<td>PSY 555</td>
<td>Statistics and Research Methods (3)</td>
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Graduate Programs

350 Psychology

PSY 627 Vocational/Career Counseling (3)
PSY 635 Concepts of Mental Health and Illness (3)
PSY 642 Assessment (3)
PSY 662 Theories and Techniques of Counseling (3)
PSY 672 Group Counseling (3)
PSY 674 Introduction to Family Therapy (3)
PSY 681 Professional Integration Seminar (3)
PSY 682 Practicum (3)
PSY 685 Supervised Internship I (3)
PSY 686 Supervised Internship II (3)
1 elective graduate psychology course

Concentration Requirements
Master’s degree in counseling psychology or closely related field is required for a concentration.
12 credits from one of the following concentrations:

Child, Adolescent, and Family Concentration
The Child, Adolescent, and Family concentration provides advanced graduate coursework in assessment, counseling, and community services related to working with children, adolescents, and families.

PSY 673 Family and Couples Counseling (3)
PSY 676 Counseling Children and Adolescents (3)
PSY 678 Developmental Psychopathology (3)
1 course from the following:
PSY 664 Interventions in Health Settings (3)
PSY 665 Addictions Counseling (3)
PSY 667 Stress (3)
PSY 668 Trauma and Recovery (3)
PSY 677 Grief Counseling (3)
PSY 687 Advanced Internship I (3)

Health and Holistic Counseling Concentration
This concentration offers a foundation in counseling within health systems and community health settings. Students may choose one or both of the tracks in the concentration, which includes holistic counseling and health psychology. The Holistic Counseling track approaches health and illness by acknowledging the interdependence of psychological, physical, social, and spiritual dimensions of the person. The Health Psychology track focuses on behavioral medicine, health problems, and addictive illnesses.

Health Psychology
PSY 663 Foundations of Health Psychology (3)
PSY 664 Interventions in Health Settings (3)
PSY 665 Addictions Counseling (3)
PSY 666 Theories of Holistic Counseling and Expressive Arts Therapies (3)
PSY 667 Stress (3)
PSY 668 Trauma and Recovery (3)
PSY 677 Grief Counseling (3)
1 advanced internship course.

Holistic Counseling
PSY 663 Foundations of Health Psychology (3)
PSY 666 Theories of Holistic Counseling and Expressive Arts Therapies (3)
2 courses from the following:
PSY 665  Addictions Counseling (3)
PSY 667  Stress (3)
PSY 668  Trauma and Recovery (3)
PSY 677  Grief Counseling (3)
1 advanced internship course.

Organization and Supervision
Concentration
The Organization and Supervision concentration is designed to provide specialization for students interested in pursuing or advancing a career in human resources, Employee Assistance Programs (EAPs), training, supervision, and other managerial positions. This concentration is a collaboration between the Master of Business Administration program and the Counseling Psychology program.

PSY 601  Foundations of Organizational and Community Psychology (3) or
PSY 633  Organizational Behavior (3)
PSY 603  Systems Theories, Leadership, and Change (3) or
PSY 638  Foundations of Management and Leadership (3)
PSY 643  Human Resources Management (3)
1 courses from the following:
BUS 510  Essentials of Management (3)
BUS 635  Managing Diversity in the Workplace (3)
BUS 673  Legal Aspects of Business (3)
BUS 674  Management of Nonprofit Organizations (3)
BUS 678  Entrepreneurship (3)
PSY 606  Group Process and Facilitation (3)
PSY 687  Advanced Internship (3)

Master of Arts in Leadership and Organizational Transformation
The Master of Arts in Leadership and Organizational Transformation is an interdisciplinary master’s program that draws from diverse fields within and outside psychology, including organizational and community psychology, sociology, anthropology, management, organizational development, social work, education, community development and leadership studies. The program prepares Master’s level practitioners to work in a variety of roles such as facilitators, coaches, leaders, coordinators, evaluators, researchers and consultants in diverse organizations and communities. Graduates will be able to work in nonprofit and for profit organizations, human services settings, community organizations and as independent consultants.

The MA in Leadership and Organizational Transformation degree requires 36 credit-hours, including a final project or internship that can be done at the place of employment or in another setting. All students in the degree program complete a core curriculum consisting of 27 credits. In addition to the core, students must choose a concentration consisting of 3 courses (9 credits) in either wellness or transformative leadership.

Requirements
27 credits:
PSY 601  Foundations of Organizational and Community Psychology (3)
PSY 603  Systems Theories, Leadership and Change (3) or
BUS 505  Organizational Behavior (3)
PSY 606  Group process and Facilitation (3)
PSY 609  Foundations of Qualitative Research/Program Evaluation (3)
PSY 617 The Psychology of Culture and Identity (3)
BUS 635 Managing Diversity in the Workplace (3)
PSY 623 Principles of Consultation (3)
PSY 629 Human Development Across the Lifespan (3)
PSY 589 Internship (3) or
PSY 693 Independent Study (3)
Wellness Concentration (9 credits):
3 courses from the following:
PSY 625 Principles of Coaching for Leaders (3)
PSY 663 Foundations of Health Psychology (3)
PSY 666 Theories of Holistic Counseling and Expressive Arts Therapy (3)
PSY 667 Stress: Somatic and Contemplative Approaches (3)
PSY 669 Foundations of Expressive Arts Therapy (3)
PSY 677 Grief Counseling (3)
Other courses may be approved in advance by the program director.

Transformative Leadership Concentration (9 credits):
3 courses from the following:
BUS 674 Management of Nonprofit Organizations (3)
PSY 625 Principles of Coaching for Leaders (3)
PSY 629 Principles of Community Organizing, Advocacy, and Activism (3)
PSY 638 Management and Leadership (3)
PSY 667 Stress: Somatic and Contemplative Approaches (3)
Other courses may be approved in advance by the program director.

School Counseling Certification Program: Elementary, Secondary, and Dual K-12
Chatham College offers Pennsylvania State Certification in Elementary, Secondary, or Dual (K-12) School Counseling. Students may pursue state certification through either the Master of Science in Counseling Psychology or the Master of Arts in Teaching programs. Students can also pursue Pennsylvania State Licensure as a Professional Counselor.

The School Counseling Program includes a conceptual base focused on the preparation of school counselors who are concerned with improving both the conditions for learning, as well as helping each student to reach his or her fullest potential. This program supports equality of diversity and opportunity. Its primary goal is to provide the most comprehensive education in school counseling so that our graduates may better meet the needs of students and the communities in which they live.

Pennsylvania School Counseling Certification Requirements
54 credits, including:
EDU 506 Issues in Special Education (3)
EDU 607 Children and Adolescents: Developmental Issues (3)
EDU 623 Teaching Methods & Curriculum Development for School Counselors K-12 (3)
EDU 629 School Law (3)
EDU 671 Collaboration, Consultation and Teamwork (3)
PSY 517 Culture and Identity (3) or
EDU 524 Teaching in a Multicultural Setting (3)
PSY 555 Statistics and Research Design (3) or
EDU 525 Tests and Measurements (3)
PSY 584 Practicum in School Counseling (3)
PSY 594 Supervised School Counseling Internship I (3)
PSY 595 Supervised School Counseling Internship II (3)
PSY 623 Contemporary Issues in Counseling: Crisis and Addiction (3)
PSY 627 Vocational/Career Counseling (3)
PSY 642 Assessment (3)
PSY 662 Theories and Techniques of Counseling (3)
PSY 670 Foundations of School Counseling (3)
PSY 672 Group Counseling (3)
PSY 674 Introduction to Family Therapy (3)
PSY 676 Counseling Children and Adolescents (3)

Note: For dual certification, one internship will be in an elementary school setting and one internship will be in a high school setting.

Master of Science in Counseling Psychology and Pennsylvania State Licensure Requirements

60 credits
Students must complete all of the above courses for Pennsylvania School Counseling Certification and the following courses:
PSY 635 Concepts of Mental Health (3)
1 approved elective course (3)

501 Foundations of Counseling Psychology (3)
This course is designed to be an introduction and overview of the field of counseling psychology. The course will cover the historical, theoretical, and practical aspects of the field. In addition, students will be introduced to the American Psychological Association Publication Manual, library resources such as PsycInfo and other online databases commonly used by counseling psychology students and professionals.

In addition to lectures and discussion, this course will provide hands-on demonstration and practice with library resources and the appropriate use of the APA style manual.

503 Applied Biological Psychology (3)
This course addresses the biological aspects of human psychology. The biological basis of neurological deficits and mental disorders are emphasized. A particular focus of this class is the use psychotropic medications for treating mental illnesses. Topics include stress and health, mental disorders such as depression, anxiety and schizophrenia, and contemporary issues in biological psychology and health issues.

513 Learning and Behavior (3)
Addresses concepts of instrumental and classical conditioning. Identifies concepts relevant to behavior formation and maintenance. Recognizes application of conditioning techniques to counseling sessions. Reviews research data on learning techniques. Addresses affective and cognitive elements of learning theories. Emphasizes ways to improve clients’ self-change abilities.

515 Human Sexuality (3)
This course draws from current research to examine biological, psychological, and social aspects of sexuality. In addition, issues relating to sexuality for parents and educational and counseling professionals will be addressed.

517 Psychology of Culture and Identity (3)
This course addresses various influencing factors of culture and identity, as well as the impact in and on counseling and therapeutic relationships. Sociopolitical, socioeconomic, familial, and psychological aspects of diversity, identity, and culture are examined through readings, seminars, and experiential exercises. Issues include cultural perspectives on change, support,
development, communication, and the nature of individuality, family, and community. Students challenge underlying assumptions, expand functional perspectives, and develop effective skills to work with diverse populations in counseling. Prerequisite: graduate status.

529 Human Development Across the Life Span (3)
This course explores cognitive, social, emotional, and physiological development throughout the life span. While including concentration on the major theoretical approaches to life span development, an equally significant focus will be on practical application of material. Prerequisite: graduate status.

555 Statistics and Research Methods (3)
This course provides a basic review of descriptive and inferential statistics and how these techniques are used with research methods appropriate for counseling psychology. Students will become proficient in computer analysis of data sets, designing and evaluating research designs and techniques, and having the skills to understand primary research in counseling literature. Prerequisites: acceptance into the M.S.C.P. program, undergraduate statistics course.

584 Practicum in School Counseling (3)
This is an entry-level fieldwork course in which students obtain supervised counseling experience. The practicum requires 120 placement hours with 40 hours of direct contact. Students in the School Counseling concentration will work directly with elementary or secondary school students, parents, and teachers under the supervision of a certified school counselor. All practicum students will obtain experience interviewing students and conducting sessions in both group and individual format. This course also requires attendance at a weekly seminar on campus. Pass/fail grading option only.

589 Internship (3)
This individualized internship is designed as a 20-hour a week experience in an organization focusing on the application of theory, skills and approaches learned in the Master’s program and in alignment with the career and personal goals of the student. An integrative research/reflective or research paper is part of this course.

594 Supervised School Counseling Internship I (3)
This course builds on the practicum in school counseling. It requires a minimum of 300 hours of supervised field experience, of which at least 120 hours must be in direct service. The primary emphasis will be in the integration of counseling theory and practice in the school setting. Interns in the school counseling concentration program will work in a school placement under the supervision of a certified professional school counselor. Interns will work directly with students, parents, and teachers to provide counseling and services. This course also requires attendance at a weekly seminar on campus. This seminar includes presentations that focus on case conceptualization and processing of the internship experience.

595 Supervised School Counseling Internship II (3)
This course is more advanced and builds upon the first supervised internship experience. It requires a minimum of 300 hours of supervised field experience, of which at least 120 hours must be in direct service. Interns in the school counseling concentration program will work in a school placement under the supervision of a certified professional school counselor. Interns will work directly with students, parents, and
teachers to provide counseling and services. This course also requires attendance at a weekly seminar on campus. Formal case presentations will be required. This course culminates in the completion of the graduate portfolio.

601 Foundations of Organizational and Community Psychology (3)
This course is an introduction to the basic concepts, theories and research areas in the fields of Community and Organizational Psychology. The primary focus will be in understanding the application of theoretical perspective and research methodology to common issues in communities and organizations. In addition, cultural and ecological perspectives in community and organizational psychology will be covered.

603 Systems Theories, Leadership and Change (3)
This course is an introduction to systems theories and their application to organizations, communities and families. Ecological models and open systems approaches will be covered. A particular focus will be on issues of change at the macro level and possible interventions when working within complex human systems. Furthermore, an examination of the role of leadership in systems change will be included.

606 Group Process and Facilitation (3)
This course provides a foundation on the major concepts and theories in group dynamics, interpersonal relations and group facilitation. Primary focus will be on communication patterns, power dynamics, understanding hierarchical and non-hierarchical ways of functioning, leadership, social theories of change, personal, group and community change and the role of resistance in change. The course integrates conceptual knowledge, reflection and personal, experience-based learning.

609 Foundations of Qualitative Research/Program Evaluation (3)
This course is designed to instruct students in current theories and methods employed by qualitative and quantitative researchers, and to introduce students to approaches used to systematically evaluate programs that operate in organizational and community psychology contexts. The course will focus primarily on qualitative research methods and their application in program evaluation activities. Topics covered in the course include: the history and paradigms of qualitative and quantitative research; key concepts and constructs that guide qualitative and program evaluation research; approaches to designing and planning qualitative studies and evaluation proposals; selection of data sources and data collection methods; analyzing and interpreting study outcomes, enhancing utilization of study outcomes; and relevant ethical and political issues.

621 Advanced Seminar in Diversity Issues (3)
This course is aimed at furthering the multicultural competency of counselors. Initial topics include the core competencies, multicultural ethics, and the cultural bases of behavior. The second part of the course focuses on the counseling process, including appraisal, techniques, and applications in other counseling-related settings. Prerequisite: graduate status.

623 Contemporary Issues in Counseling: Crisis and Addiction (3)
This course will examine critical issues in today's schools and communities. It will be divided into three primary topics with which counselors must be familiar. These topics include effective crisis intervention, conflict resolution strategies, critical incident stress debriefing, and the identification and treatment of addictions and substance abuse. This course will also look
at the use of current technology regarding these issues in community and school counseling.

624 Principles of Consultation (3)
This skill-building course provides substantive insight into the consulting profession through training consisting of presentations, discussion and skills practice. Participants will study and practice the skills required at each phase of the consultation process, including client contact, contracting, diagnosis, intervention, feedback, follow-up, relationship and team building, and service delivery. Participants will gain insight into their own professional strengths, weaknesses, and styles. They will acquire a clearer understanding of the concept of “organization”, will learn more about organizations as open systems, and will begin to see themselves as consultants and diagnosticians. Prerequisites: Psychology 601 or 603.

625 Principles of Coaching for Leaders (3)
This course is an introduction to concepts, skills, and theories in leadership coaching using the Situational Leadership Model. The course will cover topics such as the three levels of listening and how to ask powerful questions. The course is designed to provide the skills necessary for those interested in becoming coaches for managers, supervisors, and leaders in a variety of organizations and environments. In addition, the students will learn how to help managers develop plans of action to increase productivity in the workplace.

627 Vocational/Career Counseling (3)
Explores the issues involved in the lifelong process of vocational development: self-awareness, career awareness and assessment, career decision making and planning, and career implementation. Prepares counselors to assist a variety of people in all stages of career development. Examines the theories and assessment tools used in career counseling.

629 Principles of Community Organizing, Advocacy, and Activism (3)
This course is designed to introduce students to a variety of principles and skills needed to pursue activism and advocacy in community settings and within community organizations. The course will focus on how individual and collective actions that focus on specific issues are effective ways of bringing about social change. Understanding the role, history and effectiveness of activism and advocacy and its emphasis in direct action in support of or opposition to one side of a controversial issue will be covered.

633 Organizational Behavior (3)
This course examines the broad area of human behavior in organizations. It explores the individual, group, and organizational levels of interaction. Topics include perception and attribution, communications, group dynamics, decision making, motivation and leadership, organizational power, politics and conflict, and culture and change. Through the use of cases, experiential exercises, and readings, students will confront problems and challenges found in the real world. Prerequisite: acceptance into program or permission of the instructor.

635 Concepts of Mental Health and Illness (3)
The course provides an overview of essential concepts of mental health and its development and of the etiologies of psychopathology. It is intended to help students understand healthy adjustment from a culturally sensitive perspective and recognize the complex biological and environmental contributors to mental illness.
638 Management and Leadership (3)
This advanced management course explores a varied selection of the rich literature concerning management and leadership that attempts to address the organizational challenges of the 21st century. Classic schools of thought, as well as new paradigms, receive critical evaluation. This course is conducted as a seminar, with students undertaking substantial responsibility for leading discussions and reporting on individually selected readings.

642 Assessment (3)
Covers the essential ingredients in conducting psychological assessments. Students will learn the importance of integrating information from various sources when formulating hypotheses and diagnostic impressions and when developing treatment plans. Included in the course are discussions about interviewing strategies, mental status examinations, psychophysiological strategies, and psychological tests as they relate to various diagnostic groupings. Students will also learn about program evaluation.

643 Human Resources Management (3)
This course covers the primary functions of human resource management: recruitment and selection, training and development, employee/labor relations, compensation and benefits. The effects of past and current HR practices on diverse groups and women's career development are considered. Effective strategies for career mobility are emphasized.

662 Theories and Techniques of Counseling (3)
Our theoretical and personal assumptions about people and their motives influence our approach to clients, our assessment of their strengths and weaknesses, the type of therapeutic goals we set, and how we intervene clinically. Consequently, developing a strong, useful, theoretical viewpoint is critical to clinical practice and coordination of care with other practitioners. In addition, treatment is rapidly moving toward a theory of differential treatment in which the approach is carefully suited to the needs of a given client. A solid understanding of theoretical approaches is critical to this work. Prerequisite: graduate status.

663 Foundations of Health Psychology (3)
This course will provide students with an advanced view of the psychological processes that influence physical health, examine current cultural attitudes and beliefs about health and illness, and introduce students to health care evaluation methods. Students delve into the mind-body connection in some depth, drawing on current medical and philosophical perspectives. This course will also introduce students to the current health care system (i.e., managed care) and its relative impact on “consumers.” Alternative healing methods will also be discussed. While discussing stress, and the embodiment of psychological processes, students will also talk about professional burnout and ways to combat it.

664 Interventions in Health Settings (3)
This course will focus on the diverse interventions used by counselors in health settings, including an initial overview of assessment techniques, individual and group counseling approaches, and consultation. Cognitive behavioral techniques as well as a range of behavioral medicine approaches will be covered. This course is designed for students who are interested in the health psychology track and who are planning to work within a traditional health setting.
665  Addictions Counseling (3)
This course addresses the “many faces of addiction” – chemical dependency, eating disorders, sexual addiction, the chemically dependent offender, as well as women’s issues in addiction. Vulnerability factors of “nature versus nurture” targeting the question of addiction in personality is discussed. Traditional as well as alternative treatment models are highlighted with guest speakers presenting various experiences. The challenges inherent in treatment with “resistant” clients and variants of their mind set as exemplified in social, physical, psychological, and spiritual aspects of existence in an addictive state are covered. Multicultural aspects of addiction are highlighted.

666  Theories of Holistic Counseling and Expressive Arts Therapies (3)
This course is an advanced theory course for students who are interested in more integrative and holistic approaches in counseling and psychology. A focus on holistic perspectives will help students gain knowledge regarding expressive therapeutic interventions. This course will define holistic theories as those that integrate spirituality, meaning, symbolic, narrative, and somatic approaches in their perspectives and applications. Examples include: Jungian, transpersonal, humanistic, existential, and integrative approaches.

667  Stress: Somatic and Contemplative Approaches (3)
This course looks at stress as a physiological, psychological, and social phenomenon. In addition, it develops a beginning understanding of the mind-body question raised by philosophers and scientists. It also examines the psychosomatic theory of disease and the mechanism that links stress and illness. The primary focus is on helping the student develop beginning skills in particular techniques and approaches used for the management of stress such as relaxation, yoga, nutrition, exercise, meditation, and music.

668  Trauma and Recovery (3)
This course is designed as an introduction to the field of psychological trauma. Through lecture, video, literature, and clinical case discussion the course will provide the student with the historical development of trauma as a clinical entity and offer an overview of various theories and strategies for treating trauma. Emphasis will be on the applications and tools for effectively considering how to treat individuals who have trauma symptoms and experiences; as well as, engaging the student in the art of helping the client create their healing story. The course will also challenge students to notice and work with their own reactions to clients who present these issues.

669  Foundations of Expressive Arts Therapy (3)
This class explores the use of various expressive art modalities as a means to access client process and activate change through therapeutic application in counseling. The course presents a blend of clinical and theoretical approaches, including Eastern traditions, Jungian psychology, and other sources. Students will gain experiential understanding of the creative process as a vehicle for understanding and cultivating self-awareness. The class is structured as a community of participants engaging in and studying the expression of self through creative imagination, music, art, movement, and drama. Students will be involved in expressive modalities and writing, as well as discussion of ideas based on readings and experiences.

670  Foundations of School Counseling (3)
The role of school counselors is explored in relation to counseling history, philosophy,
Graduate Programs

and trends. Counseling within elementary and secondary school settings, consultation, and coordination are core components. Professional development, documentation, ethical, and legal standards are addressed. This course also focuses on the creation of instructional programs as part of a comprehensive K-12 school counseling curriculum, including participation in multidisciplinary teams. Technology is explored as a resource for school counselors.

672 Group Counseling (3)
A study of the theory and practice of group experience from the perspectives of a member and observer. Explores the basic elements of group dynamics. Focuses on interpersonal styles as they affect or hinder group functioning, role identity, and leadership style. Studies traditional and innovative theories of group therapy. Examines the practice of group counseling and intervention skills in organizations.

673 Family and Couples Counseling (3)
This is an advanced course which covers philosophies and techniques associated with several major theories of family therapy. The emphasis in the course is on practical application of the theories. Case presentations will be used.

674 Foundations of Family Therapy (3)
This course will explore the evaluation and treatment of psychological symptoms from the perspective of the family. The history and evolution of the family movement will be presented and multiple family therapy modalities introduced. Murray Bowen’s Family Systems Theory will be emphasized. The form and function as well as symptoms and potential changes in the family will be explored through case studies. The broader focus of systems theory will be the point of entry and agent for understanding transformations within the family.

676 Counseling Children and Adolescents (3)
In this course, students explore a variety of issues and concepts related to helping children and adolescents with social and/or emotional problems. The following topics are addressed: significant differences between children/adolescents and adults; theories of normal child development and temperament; and ways of differentiating between “normal growing pains” and significant psychological problems. In addition, ways of conceptualizing problems and effective interventions used are presented. The child/adolescent is understood as a full human being and as being part of a variety systems such as the family and school.

677 Grief Counseling (3)
This course is designed to introduce students to the techniques, strategies, and treatment modalities necessary for counseling professionals planning to work with adults, children, and families dealing with bereavement. The class will focus on the psychological, somatic, cultural, and spiritual aspects of grief and loss. Interventions, community resources, and diverse religious and cultural practices will be covered as well.

678 Developmental Psychopathology (3)
This course covers child/adolescent psychopathology and psychological assessment of children and adolescents. Specific topics include the following: diagnostic and assessment issues specific to children and adolescents; psychological and developmental disorders specific to children and adolescents; test and other methods used in conducting assessments of children and adolescents; and related social and cultural issues.
681 Professional Integration Seminar (3)
This course explores ethical conceptualization, analysis, and practices of applied and counseling psychologists. Addresses the ethical standards of the American Psychological Association and the American Counseling Association. Presents the history of applied psychology and developing mental health counseling movement. Discusses certification, licensure, and regulatory practices.

682 Practicum (3)
An entry-level fieldwork course in which students obtain supervised counseling experience. They work directly under the supervision of a qualified licensed professional and obtain experience interviewing clients and conducting sessions in group and individual formats.

685 Supervised Internship I (3)
A supervised field placement experience focusing on integration of theory and practice. Requires a minimum of 300 hours of supervised field experience, of which at least 120 hours must be in direct service. Also requires attendance at a weekly seminar on campus. Seminar involves presentations focusing predominantly on assessment, diagnosis, and case conceptualization. Pass/fail grading only.

686 Supervised Internship II (3)
This course is aimed at enhancing students’ abilities to effectively offer mental health treatment and services to clients. Issues in contemporary counseling psychology and treatment planning are examined in depth. Formal case presentations will also be required. This course culminates in the completion of the graduate portfolio. Pass/fail grading only.

687 Advanced Internship I (2)
An advanced supervised field placement experience. Requires at least 200 hours supervised field experience, with at least 80 hours in direct service. Requires attendance at weekly on-campus seminar involving case presentations. Students in this course may also supervise students taking Supervised Internship I and/or Supervised Internship II.

688 Advanced Internship II (2)
This course expands upon skills developed in previous counseling internships. Students complete 200 hours at their internships, working under supervision of a full-time mental health professional, and meet weekly on campus to discuss cases and topics of interest. A minimum of 80 hours must involve direct client contact.

682, 683 Special Topics (2, 3)

691, 692, 693 Independent Study (1, 2, 3)

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