

GMPA - PHYSICIAN ASSISTANT (GMPA)

GMPA 6001 Human Anatomy (4 Credits)

Instruction in significant aspects of human anatomy with respect to PA practice. Lecture instruction as well as dissection in cadaver lab are methods used to convey material. Clinical application of anatomic structure and function are emphasized.

GMPA 6104 Psychiatry (2 Credits)

An overview of psychiatric concepts and an introductory approach to the evaluation of patients with mental and behavioral problems. Includes the various psychiatric syndromes, in terms of causal factors, clinical presentation, diagnosis, treatment and prognosis. The impact that psychological problems have on the total health care of the patient will be emphasized.

GMPA 6105 Professional Seminar I (2 Credits)

Prepares students with tools to address comprehensive sociologic issues related to healthcare needs of diverse populations, respectful accommodation of beliefs related to healthcare, and enhanced communication skills to establish connection and trust. Diversity topics in this course in relation to compassionate healthcare include ethnicity/race, religion/spirituality, social determinants of health (socioeconomic status, education, neighborhood and physical environment, employment, and social support networks, as well as access to health care). A standardized patient event of breaking bad news to patients combines topic knowledge, patient communication, and empathy skills. This course will also be a platform to explore the historical development of the Physician Assistant profession, and our role in the healthcare system. Additionally, introductory ethical concerns related to graduate studies will be disseminated, including topics such as intellectual honesty, academic integrity, professional conduct, and essential study skills.

GMPA 6106 Electrocardiography (2 Credits)

Introduction to analysis of the electrocardiogram. The course will review cardiac electrophysiology and indications for ECG testing. Students will learn how to perform a 12 lead ECG as well as how to analyze an ECG for rate, rhythm, axis, intervals, cardiac hypertrophy and ischemia/infarction.

GMPA 6107 Pathophysiology (3 Credits)

Building upon the foundation provided in GMPA6111/PAFY4111, this course provides an in-depth study of the pathophysiologic changes which occur in the body in response to disease and injury. The course discusses how pathologic changes noted at both the cellular and organ system levels alter homeostasis. Correlation to the clinical aspect of disease is emphasized.

GMPA 6111 Human Physiology (3 Credits)

An in-depth exploration of the physiologic aspects of homeostasis at both the cellular and organ system levels. Topics include the cell, musculoskeletal, cardiac, pulmonary, digestive, renal, endocrine, and reproductive systems. Open to physician assistant majors only.

GMPA 6113 Neuroscience (3 Credits)

Covers the basic structure, organization, and function of the central nervous system (CNS). Lectures and laboratories focus on understanding localization of function within specific structures and pathways of the brain and spinal cord, and typical syndromes associated with vascular accidents, trauma or diseases of the various parts of the CNS.

GMPA 6114 Pharmacology I (2 Credits)

Develops skills related to the principles of pharmacology as they pertain to therapeutic agents, prescription, and non-prescription medications. The pharmacology and therapeutic properties of commonly prescribed medications will be a focus of the pharmacology courses. Discussion will include the principal mechanisms of action of major classes of therapeutic agents, understanding of pharmacokinetics and pharmacodynamics, indications, side effects, contraindications, drug interactions, monitoring, and clinical use. Students will complete modules of the Medication-Assisted Treatment Training Program in this course.

GMPA 6115 Pharmacology II (2 Credits)

Building on Pharmacology I, develops skills related to the principles of pharmacology as they pertain to therapeutic agents, prescription, and non-prescription medications. Discussion will include the principal mechanisms of action of the major classes of therapeutic agents, understanding of pharmacokinetics and pharmacodynamics, indications, side effects, contraindications, drug interactions, monitoring, and clinical use. Students will complete modules of the Medication-Assisted Treatment Training Program in this course.

Prerequisites: GMPA 6114 with a minimum grade of C

GMPA 6203 Intro Clinical Medicine I (4 Credits)

Introduction to comprehensive principles of medical history taking and hands-on physical examination techniques, systematically organized emphasizing anatomic and physiologic exam proficiencies and proper utilization of medical equipment. Foundations of medical documentation are established. Psychosocial and behavioral elements and the effective relationship between the PA, other health professionals and the patient are explored. Exercises with standardized patients introduce students to real-life medical scenarios.

GMPA 6205 Intro to Clinical Medicine II (4 Credits)

Building upon Introduction to Clinical Medicine I, this course refines the foundational skills of comprehensive systematic medical history taking and physical exam, cultivating competencies in problem-focused analysis and critical thinking techniques. Clinical case scenarios, team-based learning activities, standardized patient experiences and evolution of advanced documentation proficiencies establish familiarity with signs and symptoms of medical diagnoses, allowing for evidence-based differential diagnoses formulation. Emphasis is placed on interpersonal communication skills, empathy and trust-building in patient care.

GMPA 6206 Electrocardiography (1 Credit)

GMPA 6207 Diagnostic Imaging (1 Credit)

GMPA 6208 Laboratory Diagnostics (2 Credits)

Introduction to laboratory diagnostic testing. The course will review indications for testing, normal results, and common pathologic findings discovered in testing blood, urine, stool, cerebrospinal fluid, synovial fluid and other body fluids. Students will have the opportunity to practice laboratory procedures including phlebotomy, urinalysis and guaiac testing for occult blood.

GMPA 6209 Diagnostic Imaging (2 Credits)

Introduction to diagnostic imaging. Following an introduction to different imaging modalities and their indications, the course will progress through an organ-system based review of normal radiographic anatomy and pathologic findings.

GMPA 6212 Finance in Health Care (3 Credits)

GMPA 6305 Professional Seminar 2 (2 Credits)

Develops skills needed for success in research focusing on an introduction to evidence based medicine. Instruction will be provided on how to write a PICO question as well as how to search the medical literature.

GMPA 7305 Professional Seminar 3 (2 Credits)

Builds on concepts introduced in Professional Seminar 1 to prepare students with tools to address comprehensive sociologic issues related to healthcare needs of diverse populations, ethical and respectful accommodation of beliefs related to healthcare, and enhanced communication skills to establish connection and trust. Diversity topics in this course in relation to compassionate healthcare include topics of human sexuality involving gender identity, sexual orientation and practices, disability status and identification of special health care needs. There will be an overview of substance abuse disorders and medical/sociologic impact. Violence prevention and identification from intimate partner violence, child and elderly abuse will be examined. Issues are addressed regarding death, dying and loss and the provider's role in these processes. There will also be an overview of addressing emotional needs of patients with chronic illnesses. A community service project that began in Professional Seminar 1 will be fine-tuned and executed. Course concludes with information regarding upcoming clinical rotations including professionalism and general guidelines for the clinical phase of the program.

GMPA 7312 Fundamentals Clinical Medicine (8 Credits)

Provides a comprehensive systems-based overview of various disease entities in preparation for clinical rotations. Students will gain in-depth knowledge of the etiology, clinical presentation, differential diagnosis, diagnostic and therapeutic approach to diseases processes. The specialties of internal medicine, surgery, pediatrics, and obstetrics and gynecology are addressed among others.

GMPA 7314 Intro Clinical Medicine III (4 Credits)

Utilizes clinical case scenarios, problem-focused medical history taking and physical exam proficiency, and appropriately applied diagnostic studies to establish clear differential diagnoses, definitive clinical assessment and medical management plans. Plans include extensive detail of clinical therapeutics, additional diagnostics, recognition of specialist referrals, elaborate patient education and follow-up. Teaching strategies encourage evidence-based critical thinking with group research and presentations of medical conditions, interactive hand-on clinical scenarios with classmates, standardized patients and simulation, and enhancement of fine-tuned documentation skills with peer review. Clinical procedural skills are practiced in laboratory sessions.

GMPA 7404 Research Methods I (2 Credits)

Provides an overview of research for PAs and introduces fundamental skills required for research in the health professions. Students will further their understanding of how to search the medical literature. By the end of the Research sequence of courses, students will complete a Research project, a Quality Improvement Project or a Case Study. In some cases, students may join an ongoing project. Student projects/cases studies may be started during the Research Methods I course and will continue in Research Methods II and Research Methods III. If applicable, IRB application(s) may be initiated during Research Methods I.

GMPA 7405 Professional Seminar 4 (2 Credits)

An organ-systems based review course culminating in formative assessments of knowledge base. This course will also review coding and billing, public health systems, quality improvement, risk management, cost-effective care, and HIPAA.

GMPA 7500 Professional Seminar I (2 Credits)**GMPA 7501 Professional Seminar II (2 Credits)****GMPA 7502 Professional Seminar III (2 Credits)****GMPA 8000 Internal Medicine Rotation (4 Credits)**

Required supervised clinical practice experience in internal medicine.

GMPA 8001 Surgery Rotation (4 Credits)

Required supervised clinical practice experience in surgery.

GMPA 8002 Pediatrics Rotation (4 Credits)**GMPA 8003 Obstetrics and Gyn Rotation (2 Credits)**

Required supervised clinical practice experience in obstetrics and gynecology.

GMPA 8004 Behavioral/MentalHlth Rotation (2 Credits)

Required supervised clinical practice experience in behavioral and mental health.

GMPA 8005 Outpatient Medicine I Rotation (2 Credits)

Required supervised clinical practice experience in outpatient medicine.

GMPA 8006 Outpatient Medicine 2 Rotation (2 Credits)

Required supervised clinical practice experience in outpatient medicine.

GMPA 8007 Family Medicine (2 Credits)

Required supervised clinical practice experience in family medicine.

GMPA 8008 Geriatrics Rotation (2 Credits)**GMPA 8009 Emergency Medicine Rotation (2 Credits)**

Required supervised clinical practice experience in emergency medicine.

GMPA 8010 Elective Rotation 1 (2 Credits)

Required elective supervised clinical practice experiences.

GMPA 8011 Elective Rotation 2 (2 Credits)

Required elective supervised clinical practice experiences.

GMPA 8012 Elective Rotation 3 (2 Credits)

Additional elective supervised clinical practice experience.

GMPA 8013 Elective Rotation 4 (2 Credits)

Additional elective supervised clinical practice experience.

GMPA 8014 Elective Rotation 5 (2 Credits)

Additional elective supervised clinical practice experience.

GMPA 8015 Underserved Population Hlthcre (2 Credits)

Clinical experience providing an overview of underserved population healthcare. The course explores medical and social issues which foster cultural agility relative to underrepresented communities both internationally and locally. Following the completion of required preparatory coursework, students rotate in a domestic or international medically underserved environment. Course content encourages critical introspection and exploration of contributions students can provide to enhance underserved population health initiatives.

GMPA 8016 Pediatrics Rotation (2 Credits)

Required supervised clinical practice experience in pediatrics.

GMPA 8503 Biostatistics (3 Credits)**GMPA 8505 Biostatistics (2 Credits)****GMPA 8509 Research Methods II (1 Credit)**

This course will continue to develop the fundamental skills required for research in the health professions. Methods of data collection and analysis will be explored.

GMPA 8510 Biostatistics (2 Credits)

Introduction to statistical research methods in health science as applied to study of distribution of disease in human population. The course is intended to develop students' competencies in the application of the statistical techniques used to explore, describe, and analyze information for research or evaluation purposes. Topics include hypotheses testing, t-tests, analysis of variance, linear correlation and regression, nonparametric tests, and power analysis. An introduction to statistical software is included.

GMPA 8512 Research Methods III (2 Credits)**GMPA 8515 Professional Seminar 5 (2 Credits)**

An ongoing organ-system based review course, also addresses patient safety, prevention of medical errors, quality improvement and risk management.

GMPA 8603 Health Care Policy (2 Credits)

An overview of the health care industry and policies with information regarding the various topics related to the US health care delivery system. The impact that health care policy and managed care has on the total health of a patient will be discussed. The course is given in the Spring semester of the third professional year so that the student can incorporate clinical skills with an analytic perspective on those issues that drive the current health care system.

GMPA 8604 Biomedical Ethics (2 Credits)

The application of human and professional values, judgments and choices to selective ethical dilemmas that arise in practice. Emphasis will be placed upon various traditional and contemporary approaches to normative ethics within decision making models applicable to resolving professional dilemmas in the delivery of health care. Open to physician assistant majors only or permission by department chair.

GMPA 8605 Epidemiology (2 Credits)

An introduction to the basic epidemiologic strategies and thinking. Epidemiologic sophistication fosters a questioning attitude; without it, medical practices may be introduced and accepted even though they lack adequate support from well-controlled studies. Students will be exposed to the variations that characterize acute/infectious and chronic disease epidemiology. Implications for primary care practitioners will be emphasized.

GMPA 8615 Professional Seminar 6 (2 Credits)

An ongoing organ-system based review course. The course also prepares students for the transition to practice by covering PA practice statutes, credentialing, contract negotiation and malpractice. The course culminates in summative assessments of clinical knowledge, skills and professionalism.

GMPA 8700 Phys Asst-UMDNJ Sum II (0 Credits)**GMPA 8701 Phys Asst-UMDNJ Fall II (0 Credits)****GMPA 8999 Independent Study (1 Credit)**

Independent study provided under the supervision of a faculty member to foster student understanding and experience in alignment with MS – Physician Assistant program goals. Subject matter and meeting hours will be arranged on an individual basis. Departmental permission is required.