



PAS 671-678 Clinical Rotations I - VIII
3 Credits Each Academic Year 2012-2013

Faculty:	Office:	Office Hours:	Phone:	E-mail:
Elizabeth Cappelletti, RPA-C	SCA 305	By appt	445-4701	cappellem@lemoyne.edu
Edward Wolfe, RPA-C	SCA 303B	By appt.	445-4135	wolfeeg@lemoyne.edu

Library Resources:

- Textbooks, reference books, journals, online electronic databases.

Other Resources:

- ***Blackboard:** Please check the course site for new announcements, and other course communication.
- Practicing physician assistants, physicians, allied health care providers and laboratory teaching aids.

Learning Strategies:

Active participation and observation at the clinical site, as well as independent reading, assignments given by preceptor and participation during call back day.

Professional Behavior:

Student behaviors:

- Demonstrate a sensitive attitude to the emotional, social and ethnic background of patients and family members
- Demonstrate a professional attitude and behaviors.
- Appropriately document patient encounters.
- Demonstrate self-directed learning by identifying and resolving learning issues.
- Demonstrate a professional relationship with other members of the healthcare team in daily activities.
- Demonstrate initiative and willingness to work.
- Recognize limitations and seek help from supervising preceptors and appropriate reference materials.

Course Requirements:

- The student is expected to follow the preceptor's schedule. If the preceptor works less than 40 hours, notify the program immediately.
- It is understood that the student will be expected to attend lectures and complete

readings as directed by the preceptor.

- The student is responsible for self-directed learning by identifying and resolving learning issues.
- The student is expected to follow the basic principles of patient care that are fundamental to the specialty.
- In emergency situations the student will participate in the management of the patient under direct supervision of the preceptor and as appropriate to the student's level of expertise.
- In acute (non-life threatening) situations, the student will formulate a focused history and physical examination AND:
 - Formulate tentative diagnostic, therapeutic and disposition plans
 - Present the case to the preceptor in the appropriate format
 - Implement the patient care plans as approved and directed by the preceptor
 - Record the pertinent information regarding assessment and care in the patient's medical record
- Complete and submit Typhon logging by 11:59am every Monday for the previous week. Failure to do so will result in the inability to log the patients as the system will be locked. This may result in failure of the rotation. **Students that are unable to meet the deadline must communicate this in advance to the Clinical Coordinator(s) for an extension or else it will be considered late. Extensions will be considered on a case by case basis and based upon rotation, previous logging.** See rubric for additional details.
- Complete and submit calendar by 11:59 am every Monday for the previous week indicating actual hours worked, **including missed days CIRCLED on the calendar.** Must be signed by preceptor. Falsification of hours may result in failure of the rotation. **Submit all make up time on a SEPARATE blank calendar, indicating the date and hours of the time made up, as well as the date you were out. Include signature of preceptor.**
- The student is to submit 2 notes by the third Friday at 5pm and 2 notes in the cbd folder, due at time time of the eore. A variety of patient encounters should be submitted, and should represent patients seen during the course of the rotation. Failure to submit a variety of notes will result in a "0" for the duplicate type of note.
- The student must complete and submit the site survival and site evaluation forms (EASI) and submit the printed forms in the cbd folder, due at the time of the eore. Failure to do so will result in an "I" until completed.
- The student is to complete the assigned Kaplan modules for each rotation as outlined on BB. Summaries for each of the 6 weeks are due in the CBD folder at the time of the eore.
- The student is to prepare for an end of rotation exam or focus group presentation as required.
- The student is required to initiate a mid-rotation email to the Clinical Coordinator(s) by **the 3rd Friday of a 6-week rotation at 5pm and the 2nd Friday of a 3 week rotation by 5 pm. The mid-rotation evaluation form must be submitted via Blackboard by the 3rd Friday at 5pm of a 6 week rotation. No mid-rotation evaluation form is required for split rotations. See rubric for additional details.**
- The student must submit a preceptor agreement form by 5pm on first Friday of each rotation block, including split rotations. Failure to do so will result in an "incomplete"

until received.

- The student is expected to communicate with the program regularly by checking campus email *no less frequently than every 24 hours*. If student does not have access, they are expected to *notify the clinical coordinator* so that another means of communication can be established.

Grading and Grading Criteria:

Course grades will be entered as Pass/Fail based on the grading rubric and a scale of 65-110 points. Students earning less than 65 points will fail. Those with 65-110 will pass.

Grades will be issued by the registrar as 'Pass,' 'Fail.'

Within the department, students will be issued grades as follows:

Pass-65-80
High Pass-81-96
Pass with Honors-97-110
Fail-64 or less

Completion and submission of all components are required before a final grade will be issued to the student. * The final grade is calculated based on:

- Professionalism
- Absences/Make up hours
- Clinical Hours and Calendar
- Typhon Logging
- 4 Clinical Write Ups---20 points
- Mid-Evaluation-Student/Preceptor
- Final Evaluation-Preceptor ~30 points
- End-of-rotation examination (EORE) /Focus Group Presentation---60 points
- Completion of appropriate section in Kaplan as documented on Blackboard

*See rubric for additional details

Professional Behavior:

Any evidence of documented unprofessional behavior may lead to failure of this course. At a minimum, the first episode of unprofessional behavior will result in referral to the Promotions Committee (PC) and placement on probation or failure of the course. A second episode of unprofessional behavior will result in referral to the Promotions Committee and failure of the course. Students are directed to the Professional and Technical Standards in the Physician Assistant Student Manual for further "policies and procedures" regarding professional behavior.

Course Procedures & Policies:

- Attendance: The student is expected to follow the preceptor's schedule, including weekends, call and holidays (no less than 40 hours/week). An email notification must be sent to the 'PAS' the morning of the absence and a phone call must be

made to the preceptor notifying them of unanticipated absences or lateness Any anticipated absence must be approved in writing by the Clinical Coordinator no less than one week prior to the event. Failure to submit this form on time will result in denial of request. Absences will be approved on a case by case basis and will be based on rotation, academic and professional standing, and previous attendance record. All absences must be made up, regardless of reason.

- All absences must be made up during the rotation it occurred. An “incomplete” will be issued until all missed time is made up. See rubric for additional details.
- *I am available to all students at all times*, unless otherwise instructed. I may be reached by my cell phone in the case of emergency at 315-727-1155.

Course Schedule:

Reading and other assignments may be given by the clinical team with whom you work. It is expected that you give the same attention and focus to those assignments as you would to any other assignment. This may include but is not limited to nightly reading assignments, written papers, presentations. Otherwise, assignments for this course are out lined above.

Special Challenges:

In coordination with the Academic Support Center (ASC), reasonable accommodations are provided for qualified students with disabilities. Please register with the ASC office for disability verification and determination of reasonable accommodations. You can either stop by the ASC (Library, 1st floor) or call (445-4118-voice or 445-4104-TDD) to make an appointment with the ASC staff. Please meet with us to review your accommodation form and discuss your needs as warranted.

Observance of Religious Holidays:

Please see the Le Moyne College Handbook for the college’s policy on the observance of religious holidays.

Academic Standards:

Students are expected to observe at all times the highest ethical standards as members of the academic community. Any form of dishonesty makes a student liable to severe sanctions, including expulsion from the college. For details, see the “Academic Standards” section of the College Catalog.

Women's Health

Resources:

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
 - Current Obstetrics and Gynecology Diagnosis and Treatment by DeCherney and Nathan
 - Hacker & Moore's Essentials of Obstetrics and Gynecology
- MDConsult.

Recommended Textbooks:

- William's Obstetrics

Course Description:

The Obstetrics and Gynecology rotation is intended to provide the student with supervised experiential training in the assessment and management of commonly encountered obstetrical and gynecological problems. Emphasis will be placed on the approach to patients presenting with conditions and problems commonly encountered in the Primary Care and specialty setting.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, self-assessment, clinical reasoning, and professional behavior and team skills.

Upon completion of the rotation, the student will be able to:

- Obtain and document an appropriate gynecologic or obstetrical history utilizing all available information sources (ie: patient, family, community).
- Perform and document the following (as appropriate to rotation site):
 - An appropriate gynecologic examination, including breast examination
 - Appropriate obstetrical examination
 - Labor and delivery admission progress
 - Vaginal delivery of newborn
 - Caesarean delivery of newborn
 - Postpartum rounds
- Describe the following conditions or diseases, including risk factors, pathophysiology, diagnosis, treatment, follow-up and complications:
 - Disorders of the breast
 - Menstrual disorders
 - Disorders of the cervix
 - Disorders of the uterus
 - Benign lesions of the vulva, vagina and cervix
 - Vulvar neoplasia
 - Ovarian disorders
 - Sexually transmitted diseases
 - Infertility
 - Sexual dysfunction
 - Genital and reproductive anomalies

- Pelvic relaxation and urinary problems
- Urinary tract infection
- Pregnancy-induced conditions
- Complicated/abnormal pregnancies
- Postpartum considerations
- Interpret diagnostic tests including laboratory results and imaging studies.
- Generate and implement appropriate gynecologic and obstetric (antepartum and postpartum) management plans, including screening, treatment, follow-up and patient education.
- Discuss the appropriate use of medications for gynecologic and obstetrical patients including such issues as indications, contraindications, interactions, complications, dosage, metabolism, excretion and mutagenicity.
- Properly select, perform and document tests, procedures and imaging under the supervision of the preceptor, such as the following:
 - Office procedures
 - Obstetric procedures
 - Surgical procedures
- Special considerations:
 - Discuss the use of contraceptive methods, including indications, contraindications, efficacy, advantages/disadvantages, safety, mutagenicity, patient education, cost and cultural/religious issues (ie; abstinence, natural family planning)
 - Define and discuss the use of screening and diagnostic instruments used in obstetrics, paying particular attention to indications, timing, normal and abnormal findings and maternal risk factors (ie;ultrasound, one hour post-prandial glucose tolerance test (GTT), maternal serum alpha fetal protein (AFP))
 - Discuss the indications for, correct use and administration of obstetric pharmacologic therapies (ie: RhoGam, Magnesium sulfate)
 - Discuss and provide rationale for the components of routine prenatal care
 - Discuss and describe normal embryonic/fetal development
 - Discuss and describe any ethnic, religious or cultural issues that impact the care of a patient in this setting
 - Discuss and describe public health issues related to women's health ie:
 - Immunizations (HBV, VZV, rubella, Td)
 - Health screening/preventative counseling
 - Genetic Counseling
 - Risk taking behaviors (substance abuse, STD's)
 - Cultural influences
 - Socioeconomic environment
 - Nutrition
 - Spousal abuse

Behavioral Medicine

Resources:

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
- MDConsult

Recommended Textbooks:

- Behavioral Science in Medicine by Barbara Fadem
- Essentials of Clinical Geriatrics by Kane, Ouslander, Abrass

Course Description

The Behavioral Medicine rotation is intended to provide the student with supervised experiential training in the assessment and management of both the psychiatric patient and an institutionalized geriatric patient. Emphasis will be placed on the approach to patients presenting with commonly encountered conditions and problems. Students will be educated in the relevant data collection and management of psychiatric and functional geriatric conditions.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, self-assessment, clinical reasoning, and professional behavior and team skills.

Upon completion of the rotation, the student will be able to:

- Obtain and document an appropriate psychiatric/geriatric history utilizing all available information sources, e.g. patient, family, friends and community.
Perform and document an appropriate physical and psychiatric/geriatric examination.
- Describe the following common psychiatric/geriatric problems, including pathophysiology, diagnosis, treatment and follow-up:
 - Dementias
 - Mental disorders due to general medical condition
 - Substance-related disorders
 - Schizophrenia
 - Other psychotic disorders (e.g. schizophreniform, schizoaffective, and delusional disorders)
 - Mood disorders
 - Anxiety disorders
 - Somatoform disorders
 - Factitious disorders
 - Sexual and gender identity disorders
 - Eating disorders
 - Sleep disorders
 - Personality disorders
 - Suicide
 - Geriatric assessment (e.g. functional assessment, environmental assessment, pain assessment, nutritional assessment)
 - Instability, Immobility, Falls

- End-of-Life Issues
- Interpret diagnostic tests, including laboratory results, imaging studies, and electrophysiologic studies.
- Generate and implement an appropriate management plan, including treatment, follow-up plans and patient education and counseling.
- Discuss the appropriate use of medications in the psychiatric/geriatric patient related to such issues as dosage, indications, contraindications, interactions, complications, metabolism, excretion, and mutagenicity.
- Properly select and perform any testing or procedures under the supervision of the preceptor.
- Special considerations:
 - Describe and discuss human development throughout the life cycle.
 - Describe and discuss various theories of human behavior as related to patient care.
 - Describe and discuss the assessment and management of psychiatric emergencies (e.g. suicide, acute psychosis, drug overdose, violent behavior).
 - Discuss conflicting ethical principles related to the care of the psychiatric/geriatric patient.
 - Discuss the legal process and implications of committing a patient to a psychiatric hospital/long-term care facility.
 - Describe and discuss public health issues related to psychiatry/geriatrics, such as:
 - Epidemiology of mental health problems
 - Mental health problems of the homeless
 - Access to care
 - Rural vs. urban location
 - Cultural influences
 - Socioeconomic environment
 - Risk-taking behaviors (e.g. substance abuse, seatbelt and helmet use)
 - Spouse/child/elder abuse
 - Epidemiology of adolescent suicide
 - Geriatric considerations and aging of the population
- Describe and discuss any ethnic, religious, or cultural issues that impact the care of a patient in this setting.

Emergency Medicine

Resources:

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
 - Emergency Medicine - A Comprehensive Study Guide, Companion Handbook by Tintinalli
- MD Consult.

Course Description:

The Emergency Medicine rotation is intended to provide the student with supervised experiential training in the assessment and management of both minor and major types of problems commonly encountered in an emergency department setting. Emphasis will be placed on the approach to patients presenting with conditions and problems commonly encountered in an emergency department. Students will be educated in the relevant data collection and management of acute and life-threatening conditions.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, self-assessment, clinical reasoning, and professional behavior and team skills.

Upon completion of the rotation, the student will be able to:

- Obtain and document an appropriate problem-focused emergency history utilizing all available information sources, e.g. patient, family, community.
- Perform and document an appropriate problem-focused yet thorough physical examination.
- Describe the following common emergency problems, including pathophysiology, diagnosis, treatment and follow-up:
 - Cardiovascular collapse
 - Shock
 - Respiratory distress/failure
 - Drowning
 - Aspiration of foreign body
 - Swallowed foreign body
 - Anaphylaxis and transfusion reactions
 - Altered mental status
 - Poisoning
 - Drug Abuse
 - Cold injuries
 - Heat injuries
 - Venoms, bites, and stings
 - Burns
 - Traumatic injuries
 - Hemorrhage and epistaxis
 - Pneumothorax

- Lacerations
 - Foreign body
 - Corneal burn or abrasion
 - Increased intracranial pressure and head trauma
 - Seizures
 - Acute abdominal pain
 - Vaginal discharge
- Interpret diagnostic tests, including laboratory results, imaging studies, and electrophysiologic studies.
 - Generate and implement an appropriate management plan, including treatment, follow-up plans and patient education and counseling.
 - Discuss the appropriate use of medications in the emergency department related to such issues as dosage, indications, contraindications, interactions, complications, metabolism, excretion, and mutagenicity.
 - Become familiar with the indications for appropriate IV fluid orders for emergency and acute situations.
 - Properly perform any emergency procedures under the supervision of the preceptor (e.g. intravenous cannulation, phlebotomy, nasogastric tube, foley catheter, splinting/casting, dressings, wound care and suturing, CPR, endotracheal intubation)
 - Special considerations:
 - Describe and discuss the assessment and management of the following:
 - Airway management
 - Major trauma
 - Chest pain
 - Abdominal pain
 - Respiratory distress
 - Altered level of consciousness
 - Shock
 - Describe and discuss public health issues related to emergency medicine, e.g.:
 - Injury prevention
 - Spouse/child/elder abuse
 - Aging of the population
 - Epidemiology of injuries
 - Risk-taking behaviors
 - Cultural influences
 - Socioeconomic environment
 - Nutrition
 - Describe and discuss any ethnic, religious, or cultural issues that impact the care of a patient in this setting.

General Surgery

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
- Essentials of General Surgery by Lawrence
- Principles of Primary Wound Management, A Guide to the Fundamentals by Mortiere
- Cope's Early Diagnosis of the Acute Abdomen
- MDConsult

Course Description:

The General Surgery rotation is intended to provide the student with supervised experiential training in assessment and management of the patient presenting with a surgical problem. This rotation will familiarize the student with operating room techniques, various surgical procedures, pre- and post-op patient management, health services and personnel affiliated with surgery, and education of the surgical patient.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, self-assessment, clinical reasoning, and professional behavior and team skills.

Upon completion of the rotation, the student will be able to:

- Obtain and document an appropriate surgical history utilizing all available information sources, e.g. patient, family, community.
- Perform and document appropriate physical examinations for pre-operative screening and post-operative follow-up.
- Describe the following common surgical problems, including pathophysiology, diagnosis, treatment, indications and contraindications for surgery, and follow-up:
 - Infectious disease considerations (e.g. wound infection, dehiscence, sepsis, abscess)
 - Dermatologic problems (e.g. wound healing, lipomas, sebaceous cysts, neoplastic skin lesions)
 - Thyroid disorders
 - Parathyroid disorders
 - Pulmonary disorders
 - Esophageal disorders
 - Stomach disorders
 - Small intestine disorders
 - Appendicitis
 - Colorectal disorders
 - Liver disorders
 - Biliary disorders
 - Pancreatic disorders
 - Splenic disorder/indications for therapeutic splenectomy
 - Hernias
 - Vascular disorders (e.g. pulmonary embolism, deep vein thrombosis, phlebitis, AV fistula, abdominal aortic aneurysm, thoracic aortic aneurysm, aortic dissection,

femoral aneurysm, pseudoaneurysm, peripheral arterial occlusive disease, thoracic outlet syndrome, arterial trauma)

- Interpret diagnostic tests, including laboratory results, imaging studies, and electrophysiologic studies.
- Generate and implement an appropriate management plan, including treatment, follow-up plans and patient education and counseling.
- Discuss the appropriate use of medications in the surgical patient related to such issues as dosage, indications, contraindications, interactions, complications, metabolism, excretion, and mutagenicity.
 - Pain Management
 - Perioperative antibiotic usage
 - Chemotherapy
 - Inpatient considerations (e.g. sleep medications, anti-emetics, laxatives)
- Properly perform/assist and document any surgical procedures under the supervision of the preceptor.
 - Office/hospital (non-operating room) procedures
 - Wound care
 - Nasogastric intubation
 - Venipuncture/Arterial Blood Gas sampling
 - Line and tube insertion/removal
 - General operating room procedures (e.g. scrub, gown, glove -open and closed, position patient, prep, maintain sterile technique, tie knots, suture/staple, apply dressings, properly transfer patient to and from O.R. table, hold retractors)
 - Dermatologic procedures (e.g. excision of cysts, incision and drainage, skin grafting/skin flaps)
 - Thyroidectomy
 - Parathyroidectomy
 - Thoracic procedures
 - Esophagectomy/esophagoscopy
 - Stomach/small bowel procedures
 - Appendectomy - open and laparoscopic
 - Biliary surgery
 - Colo-rectal procedures
- Special considerations:
 - Identify and appropriately utilize surgical instruments
 - Discuss the importance of sterile technique in the surgical setting
 - Describe and discuss public health issues related to surgery (e.g. socioeconomic, geographic, racial and ethnic factors in the delivery of surgical services, changes in patterns of inpatient vs. outpatient surgery, distribution of newer technologies such as laser and laparoscopic surgery, cultural attitudes toward surgery, nutritional risk factors for surgical problems, risk-taking behaviors)
 - Identify and manage problems common to peri-operative management of the surgical patient such as DVT/ PE prophylaxis, infection, mobility and ambulation, blood conservation and replacement

- Instruct patients regarding appropriate wound care, activities, and lifestyle changes post-operatively
- Given any cancer patient, utilize data to document TNM staging
- Discuss pediatric intraoperative considerations (e.g. cardiopulmonary, renal, hepatic, endocrine, metabolic, nutritional)
- Describe and discuss any ethnic, religious, or cultural issues that impact the care of a patient in this setting.

Pediatrics

Resources:

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
- MDConsult
- Current Pediatric Diagnosis & Treatment by Hay et. al.,
- Harriet Lane Handbook

Course Description:

The Pediatrics rotation is intended to provide the student with supervised experiential training in the assessment and management of the infant, child, or adolescent presenting with an acute or chronic problem, or for routine well child care. Emphasis will be placed on the approach to patients with conditions and problems commonly encountered in a primary care setting. The student will be given the opportunity to interact with patients and in most instances, will be also interact with additional family members.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, self-assessment, clinical reasoning, and professional behavior and team skills.

Upon completion of the rotation, students will be able to:

- Obtain and document an appropriate pediatric history utilizing all available information sources, e.g. patient, family, community.
- Perform and document an appropriate pediatric examination.
- Describe the following common pediatric problems, including pathophysiology, diagnosis, treatment and follow-up:
 - Management of newborn problems
 - Birth Trauma
 - Respiratory disorders (e.g. respiratory distress syndrome, transient tachypnea of the newborn, apnea of prematurity)
 - Metabolic problems (e.g. hypothermia, hypoglycemia, hyperglycemia, hypocalcemia, hypernatremia, hypocalcemia, hyperbilirubinemia, fetal alcohol syndrome)
 - Neonatal infections Sudden infant death syndrome
 - Congenital abnormalities (e.g. congenital heart disease, GI/GU defects, congenital eye defects, neurological defects, musculoskeletal defects)
 - Common feeding and gastrointestinal problems
 - Hematological Problems
 - Failure to Thrive
 - Developmental Problems
 - Behavioral Problems
 - Learning Disorders
 - Mental Retardation

- Childhood infections (e.g. ENT infections, respiratory infections, viral infections, enteric infections, skin infections)
- Childhood tumors
- Orthopedic Problems
- Adolescent problems (e.g. delayed sexual maturation, precocious puberty, anabolic steroid abuse, eating disorders, depression)
- Interpret diagnostic tests, including laboratory results, imaging studies, and electrophysiologic studies.
- Generate and implement an appropriate management plan, including treatment, follow-up plans and patient education and counseling.
- Discuss the appropriate use of medications in the pediatric population related to such issues as dosage, indications, contraindications, interactions, complications, metabolism, excretion, and mutagenicity.
- Properly performs any pediatric procedures under the supervision of the preceptor.
- Special considerations:
 - Describe and discuss normal and abnormal growth and development.
 - Discuss adolescent pregnancy and contraception
 - Describe and discuss public health issues related to pediatrics, e.g.:
 - Immunizations
 - Health screenings
 - Genetic/birth defect issues
 - Caretaker/day care/school issues
 - Child abuse
 - Poisonings
 - Risk-taking behaviors
 - Cultural influences
 - Socioeconomic environment
 - Nutrition
 - Describe and discuss any ethnic, religious, or cultural issues that impact the care of a patient in this setting.

Primary Care

Resources:

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
- Current Medical Diagnosis and Treatment by Tierney, McPhee and Papadakis.
- Harrison's
- The Washinton Manual
- MDConsult

Course Description:

The Primary Care rotation is intended to provide the student with supervised experiential training in dealing with common problems generally encountered in a family practice setting. Emphasis will be placed on the approach to patients with conditions and problems commonly encountered in a primary care setting. The student will be given the opportunity to interact with patients and in many instances, will be also interact with additional family members.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, selfassessment, clinical reasoning, and professional behavior and team skills.

Upon completion of the rotation, the student will be able to:

- Obtain and document an appropriate history utilizing all available information sources, e.g. patient, family, community.
- Perform and document an appropriate examination.
- Describe the following common primary care problems, including pathophysiology, diagnosis, treatment and follow-up:
 - Infectious disease problems (e.g. bacterial, viral, fungal, protozoan diseases)
 - Dermatologic problems (e.g. bacterial diseases, fungal diseases, viral diseases, drug reactions, common exanthems, diseases of the hair, scalp and nails, skin cancers)
 - Immunologic/Allergic problems (e.g. urticaria, allergic rhinitis, immunodeficiency syndromes, connective tissue diseases, autoimmune diseases)
 - Hematologic/Oncologic problems (e.g. anemias, leukemias, lymphomas, bleeding disorders, platelet disorders, thrombotic disorders)
 - Ear, nose, and throat problems (e.g. otitis media, otitis externa, vertigo, hearing loss, impacted cerumen, foreign bodies of nose/ear, acute and chronic sinusitis, chronic and allergic rhinitis, acute pharyngitis, tonsillitis)
 - Eye problems (e.g. glaucoma, cataract, conjunctivitis, blepharitis, retinal detachment, foreign body, diabetic retinopathy, hypertensive retinopathy)
 - Endocrine and metabolic problems (e.g. diabetes mellitus, hypoglycemia, hyper- and hypothyroidism, benign and malignant thyroid tumors, osteoporosis, hypercholesterolemia, malnutrition, obesity, vitamin deficiencies and excess, electrolyte disorders, acid-base disorders)
 - Cardiovascular problems (e.g. hypertension, congestive heart failure, pulmonary edema, acute myocardial infarction, coronary artery disease, valvular heart disease,

- endocarditis, pericarditis, cardiomyopathies, aortic aneurysm/dissection, atherosclerosis/arteriosclerosis, peripheral vascular disease, deep venous thrombosis)
 - Respiratory problems (e.g. influenza, pneumonia, acute bronchitis, COPD, chronic bronchitis, emphysema, asthma, tuberculosis, sarcoidosis, pulmonary embolism, pleurisy, effusion, pneumothorax, respiratory distress syndrome, pneumoconioses, malignant neoplasms)
 - Gastrointestinal problems (e.g. esophageal reflux, peptic ulcer disease, enteric infections, irritable bowel syndrome, appendicitis, inflammatory bowel disease, intestinal obstruction, diverticula, constipation, hemorrhoids, anal fissure, anal/rectal abscess, pilonidal cyst, cholecystitis, hepatitis, cirrhosis, pancreatitis, hernias, malabsorptive syndromes, malignant tumors of the digestive system)
 - Renal and urologic problems (e.g. acute renal failure, chronic renal failure, glomerulonephritis, interstitial nephritis, urinary tract infections such as cystitis/urethritis/pyelonephritis, renal artery stenosis, nephrolithiasis, benign and malignant tumors of the urinary tract)
 - Reproductive problems (e.g. routine gynecologic examination, endometriosis, abnormal bleeding, male and female infertility, impotence, testicular torsion, breast/cervical/ovarian/uterine/vulvar/testicular/ prostatic benign and malignant tumors)
 - Musculoskeletal problems (e.g. joint pain, joint effusion, osteoporosis, developmental/inherited bone disorders, temporomandibular joint problems, kyphosis/scoliosis, spondylosis, ruptured intervertebral disc, tendonitis, bursitis, sprains/strains, fractures, dislocations, tendon ruptures/avulsions/lacerations, benign and malignant bone and muscle tumors)
 - Neurologic problems (e.g. cranial nerve disorders, Bell's palsy, epilepsy, stroke, TIA, subarachnoid hemorrhage, meningitis, abscess, encephalitis, multiple sclerosis, Parkinson's disease, Alzheimer's disease, dementia, amyotrophic lateral sclerosis, Guillain-Barre syndrome, myasthenia gravis, benign and malignant tumors)
 - Psychiatric problems (e.g. psychoses, anxiety/mood disorders, personality disorders, eating disorders, substance abuse, domestic violence, bereavement, crises adjustment)
- Interpret diagnostic tests, including laboratory results, imaging studies, and electrophysiologic studies.
- Generate and implement an appropriate management plan, including treatment, follow-up plans and patient education and counseling.
- Discuss the appropriate use of medications related to such issues as dosage, indications, contraindications, interactions, complications, metabolism, excretion, and mutagenicity.
- Properly performs any procedures under the supervision of the preceptor (e.g. IV, ABG, foley catheter, dressing change, Pap smear, various cultures, urinalysis)
- Special considerations:
 - Describe and discuss routine health maintenance.
 - Describe and discuss public health issues, e.g.:
 - Adult immunizations
 - Health screenings
 - Domestic violence/abuse

- Risk-taking behaviors (e.g. substance abuse, seatbelt and helmet use)
- Cultural influences
- Socioeconomic environment
- Nutrition
- Aging of the population
- Chronic disease vs. acute disease
- Describe and discuss any ethnic, religious, or cultural issues that impact the care of a patient in this setting.

Internal Medicine

Resources:

Required Textbooks:

- All first-year textbooks required in Clinical Medicine I, II, and III.
- Current Medical Diagnosis and Treatment by Tierney, McPhee and Papadakis.
- Harrison's/Cecile's
- The Washinton Manual
- MDConsult

Course Description:

The student will learn to apply basic medical knowledge to the evaluation of problems encountered in an ambulatory internal medicine setting. An enhanced understanding of how common medical disorders are evaluated and managed is accomplished by practice in the identification of problems, the appropriate collection of data, and the development of a management plan for each problem.

General Learning Goals:

- Expose the student to a wide range of common adult medical problems seen in an ambulatory setting, including cardio- respiratory, endocrine, gastrointestinal, genitourinary, neuromuscular, skin, blood, infectious, and neoplastic disorders
- Enhance the student's understanding of the interventions appropriate for the management of common medical problems, including the indications, availability, reliability, limitations, and possible adverse effects of these therapeutic options
- Enhance the opportunity for supervised student interaction with both acutely-ill and chronically-ill patients
- Improve the student's understanding of the indications for and limitations of various diagnostic procedures commonly used in the evaluation of medical problems

Understand the basic indications, value, limitations and risks of the following tests:

- o ECG
- o CXR
- o Plain films of the abdomen
- o CT
- o MRI
- o Echocardiography
- o Thallium scanning
- o Stress testing
- o Cardiac catheterization
- o Pulmonary function testing
- o Esophagogastroduodenoscopy
- o ERCP

- o Flexible sigmoidoscopy and colonoscopy
- Understand the components of the preoperative evaluation
- Know the indications, contraindications, and immunization schedule for adults

Upon completion of the rotation, the student will be able to:

- Understand and describe the prevalence, pathophysiology, common presentation, risk factors, evaluation and management, and possible sequelae of the following common disorders:
 - o Infectious disease problems (e.g. bacterial, viral, fungal, protozoan diseases)
 - o Dermatologic problems (e.g. bacterial diseases, fungal diseases, viral diseases, drug reactions, common exanthems, diseases of the hair, scalp and nails, skin cancers)
 - o Immunologic/Allergic problems (e.g. urticaria, allergic rhinitis, immunodeficiency syndromes, connective tissue diseases, autoimmune diseases)
 - o Hematologic/Oncologic problems (e.g. anemias, leukemias, lymphomas, bleeding disorders, platelet disorders, thrombotic disorders)
 - o Ear, nose, and throat problems (e.g. otitis media, otitis externa, vertigo, hearing loss, impacted cerumen, foreign bodies of nose/ear, acute and chronic sinusitis, chronic and allergic rhinitis, acute pharyngitis, tonsillitis)
 - o Eye problems (e.g. glaucoma, cataract, conjunctivitis, blepharitis, retinal detachment, foreign body, diabetic retinopathy, hypertensive retinopathy)
 - o Endocrine and metabolic problems (e.g. diabetes mellitus, hypoglycemia, hyper- and hypothyroidism, benign and malignant thyroid tumors, osteoporosis, hypercholesterolemia, malnutrition, obesity, vitamin deficiencies and excess, electrolyte disorders, acid-base disorders)
 - o Cardiovascular problems (e.g. hypertension, congestive heart failure, pulmonary edema, acute myocardial infarction, coronary artery disease, valvular heart disease, endocarditis, pericarditis, cardiomyopathies, aortic aneurysm/dissection, atherosclerosis/arteriosclerosis, peripheral vascular disease, deep venous thrombosis)
 - o Respiratory problems (e.g. influenza, pneumonia, acute bronchitis, COPD, chronic bronchitis, emphysema, asthma, tuberculosis, sarcoidosis, pulmonary embolism, pleurisy, effusion, pneumothorax, respiratory distress syndrome, pneumoconioses, malignant neoplasms)
 - o Gastrointestinal problems (e.g. esophageal reflux, peptic ulcer disease, enteric infections, irritable bowel syndrome, appendicitis, inflammatory bowel disease, intestinal obstruction, diverticula, constipation, hemorrhoids, anal fissure, anal/rectal abscess, pilonidal cyst, cholecystitis, hepatitis, cirrhosis, pancreatitis, hernias, malabsorptive syndromes, malignant tumors of the digestive system)
 - o Renal and urologic problems (e.g. acute renal failure, chronic renal failure, glomerulonephritis, interstitial nephritis, urinary tract infections such as cystitis/urethritis/pyelonephritis, renal artery stenosis, nephrolithiasis, benign and malignant tumors of the urinary tract)
 - o Reproductive problems (e.g. routine gynecologic examination, endometriosis, abnormal bleeding, male and female infertility, impotence, testicular torsion,

- breast/cervical/ovarian/uterine/vulvar/testicular/ prostatic benign and malignant tumors)
- Musculoskeletal problems (e.g. joint pain, joint effusion, osteoporosis, developmental/inherited bone disorders, temporalmandibular joint problems, kyphosis/scoliosis, spondylosis, ruptured intervertebral disc, tendonitis, bursitis, sprains/strains, fractures, dislocations, tendon ruptures/avulsions/lacerations, benign and malignant bone and muscle tumors)
 - Neurologic problems (e.g. cranial nerve disorders, Bell's palsy, epilepsy, stroke, TIA, subarachnoid hemorrhage, meningitis, abscess, encephalitis, multiple sclerosis, Parkinson's disease, Alzheimer's disease, dementia, amyotrophic lateral sclerosis, Guillain-Barre syndrome, myasthenia gravis, benign and malignant tumors)
 - Psychiatric problems (e.g. psychoses, anxiety/mood disorders, personality disorders, eating disorders, substance abuse, domestic violence, bereavement, crises adjustment)

Elective and Medicine Rotation

Resources:

Required Textbooks:

- All first year textbooks required in Clinical Medicine I, II and III.
- MDConsult.

General Learning Goals:

The student will demonstrate attainment of a strong knowledge base, clinical skills, self-directed learning, self-assessment, clinical reasoning, and professional behavior and team skills. Upon completion of the rotation, the student will be able to:

- Obtain and document an appropriate history relevant to the elective/medicine service, utilizing all available information sources, e.g. patient, family, community.
- Perform and document appropriate physical examinations for the elective/medicine setting.
- List and describe the following common problems in this elective/medicine area, including pathophysiology, diagnosis, treatment, and follow-up.
- Interpret diagnostic tests, including laboratory results, imaging studies, and electrophysiologic studies.
- Generate and implement an appropriate management plan, including treatment, follow-up plans and patient education and counseling.
- Discuss the appropriate use of medication related to such issues as dosage, indications, contraindications, interactions, complications, metabolism, excretion, and mutagenicity.
- Properly perform/assist and document any procedures under the supervision of the preceptor.
- Special considerations:
 - Identify and appropriately utilize any special instruments.
 - Describe and discuss public health issues related to this elective/medicine rotation.

