

**COURSE SYLLABUS**  
Southeast Missouri State University

Department of Nursing Course No. NS625  
Title of Course: Advanced Pharmacology Revision X

I. Catalog Description and Credit Hours of Course:

Comprehensive study for the management of drug therapy in diverse populations.  
Meets requirements for prescription writing by nurse practitioners. (4)

II. Prerequisites : BSN or Instructor Consent

III. Purposes or Objectives of the Course:

- A. Describe the basic principles of pharmacokinetics and pharmacodynamics and how these principles might affect pharmacological therapeutics and issues related to special populations.
- B. Analyze the effects of patient parameters for example: age, gender, disease states, and lab results.
- C. Demonstrate an understanding of the etiology, pathogenesis, clinical manifestations, and complications of common disease states.
- D. Explain the mechanism of action, place in therapy, drug-drug interactions, laboratory values and adverse effects for various drugs.
- E. Select appropriate drug therapy for a particular disease state in terms of dosage, route of administration, frequency and duration of therapy.
- F. Describe factors influencing safe and effective prescriptive practices within the scope of advance practice nurses.

IV. Student Learning Outcomes

- A. In writing, apply knowledge of pharmacology and pharmacotherapeutics to patient case studies achieving a minimum grade of 75% on each.
- B. Demonstrate understanding of principles of pharmacology and pharmacotherapeutics (not limited to mechanism of action, major side effects, disease specific therapies, etc) by achieving a 75% or better on each of 3 tests during the semester.
- C. Complete an extensive overview of major pharmacological classes and show retention by achieving a minimum grade of 75% on the comprehensive final.

V. Student Expectations

- A. Regular class attendance (**please e-mail or text course instructor if you will not be in class**)
- B. Required reading assignments completed prior to class
- C. Class participation
- D. Satisfactory and timely completion of all quizzes, exams and case studies. These are to be done individually unless otherwise specified.
  - i. *Quizzes and case studies are due by the assigned time, NO EXCEPTIONS*

- ii. *If you are going to miss an exam for anything other than sickness or a death, you must have this excused prior to the test and are expected to take the test prior to the next class period.*
- E. Students are expected to comply with the expectations for civility, respect, and academic honesty as described in the current *Southeast Missouri State University Statement of Student Rights and Code of Student Conduct*, as well as all responsibilities described in the *MSN Handbook*.
  - 1. Academic Honesty: Students will be expected to abide by the University Policy for Academic Honesty regarding plagiarism and academic honesty. Refer to: <http://www.semo.edu/judaffairs/code.html>
  - 2. Civility: “Every student at Southeast is obligated at all times to assume responsibility for his/her actions, to respect constituted authority, to be truthful, and to respect the rights of others as well as to respect private and public property. In their academic activities, students are expected to maintain high standards of honesty and integrity and abide by the University’s *Policy on Academic Honesty*. Alleged violations of the *Code of Student Conduct* are adjudicated in accordance with the established procedures of the judicial system.” (From the preamble of the *Statement of Student Rights and Code of Student Conduct*, revised January 8, 2004, Southeast Missouri State University)
- F. Student with Disabilities Information: If a student has a special need addressed by the Americans with Disabilities Act (ADA) and requires materials in an alternative format, please notify the instructor at the beginning of the course. Reasonable efforts will be made to accommodate special needs. “Any student who believes that they may need an academic accommodation based on the impact of a disability should contact the instructor to arrange an appointment to discuss their individual needs. Instructors rely on Disability Support Services as a student with a disability will be encouraged to do so.” In other words, accommodations do not have to be given unless the disability is verified by Disability Services (573-651-5927). (Located on the Disability Services webpage)
- G. Incomplete MSN Coursework Time Limit Policy: Should a student receive an incomplete grade in this course, the course instructor will be responsible for determining the time period allotted for completion of course requirements. A written contract between the course instructor and student will indicate the reason for the incomplete, the work that must be completed, the deadline for completing the work, and signatures of both parties. A copy of the contract will be maintained by the instructor and the student and placed in the student's file.
- H. Questions, comments or requests regarding this course or program should be taken to your instructor. Unanswered questions or unresolved issues involving this class may be taken to Dr. Gloria Green, Department Chairperson
- I. Class Session Recording Restriction: The recording of any class session is prohibited except with expressed consent of the course instructor/presenter at the time of the recording.

VI. Course Content Outline:

- A. Basic Principles of Pharmacology (Pharmacokinetics, Pharmacodynamics, Drug Interactions, Drug Regulation, Development, Names and Information, Adverse Reactions) 4 hours

- B. Drug Therapy Across the Lifespan (Individual Variation in Drug Response, Drug Therapy in Pediatric Patients, Drug Therapy in Geriatric Patients, Drug Therapy in Pregnancy and Breastfeeding) 4 hours
- C. Pain Management (Non-Opioid Analgesics, Opioid Analgesics, Drugs for Headaches, Adjuvant Pain Therapy (Neuropathic Pain Control)) 4 hours
- D. Endocrine (Diabetes, Thyroid Disorders) 4 hours
- E. Central and Peripheral Nervous System (Alzheimer's Disease, Parkinson's Disease, Physiology of Central and Peripheral Nervous System, Introduction to Cholinergic and Adrenergic Drugs) 4 hours
- F. Cardiology (Hemodynamic, Hypertension, Dysrhythmic, Cholesterol, Anticoagulant, Antiplatelet, Thrombolytic, Heart Failure and Angina Medications) 8 hours
- G. GI Drugs (Drugs for Peptic Ulcer Disease, Laxatives and Antidiarrheals, Drugs for Nausea and Vomiting) 4 hours
- H. Pulmonology (Drugs for Asthma, COPD, Allergic Rhinitis, Cough and Cold, Tobacco Cessation) 8 hours
- I. Neurology (Antidepressants, Anti-Anxiety, ADHD, Antipsychotic, and Bipolar Medications) 4 hours
- J. Drugs for Bone and Joint Disorders 4 hours
- K. Infectious Disease (Antibiotics, Antifungals, Antiviral Medications, Immunizations) 8 hours
- L. Women's and Men's Health (Contraception (Estrogens, Progestins, Birth Control, Erectile Dysfunction, Benign Prostatic Hyperplasia) 4 hours

VII. Textbook(s) and/or Other Required Materials or Equipment:

- A. Lehne, R.A. (2012). *Pharmacology for nursing care* (8<sup>th</sup> ed.). St. Louis: Elsevier Saunders.
- B. Turkoski, B.B. (2013-2014). *Drug information handbook for advanced practice nursing* (14<sup>th</sup> ed.). Hudson, OH: Lexi-Comp. (Recommended, not required)
- C. Guidelines and articles as assigned.

VIII. Basis for Student Evaluation

- A. 10 quizzes/online discussion 5%
- B. 5 Case Studies (**group participation a must**) 40%
  - i. #1 and 5 in groups; #2-4 individually
  - ii. You will be given 5 case studies throughout the semester. You will be responsible for completing 3 of the case studies on your own. The class will be divided into groups for completion of the remaining 2 case studies. For the group case studies, each person in the group must contribute and each person in the group will receive the same grade for the case study. You will submit the study one time. You are responsible for keeping group members accountable. Each case has a series of questions to be answered. The cases are due by the assigned date and time. Consider using resources beyond those provided in class. Your answers should show

critical thinking required of a practitioner. No more than 5 pages per study; **material beyond the 5 pages will not be evaluated.** Everyone must complete the case on time. Late case studies lose 5 points per day (the time begins for any paper submitted after the assigned date/time due.)

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| C. 3 Examinations                       | 25%        |
| D. HESI Pharmacotherapeutics Assessment | 5%         |
| E. Final Exam ( <b>Comprehensive</b> )  | <u>25%</u> |
|   | 100%       |

**GRADING SCALE**

100-90% = A

89-80% = B

79-70% = C

69-0% = F

Approved Graduate Program Committee 8/21/13

Approved Total Faculty Department of Nursing 9/25/13

Approved HHS College Council 10/16/13

Approved Graduate Council 11/22/13