

Renal Disorders

Spring 2018 6 Credits

Course Purpose:

PHA 5593 is one in a series of eight courses which are organized by body system. PHA5593 introduces the student to patient care concepts, patient assessment, pharmacokinetics, pharmacodynamics, therapeutics, and therapeutic drug monitoring for patients with cardiac disorders. The learning activities emphasized during this course include gathering and processing information, identifying and prioritizing problems, planning and effecting therapeutic interventions, patient communication and counseling, and communicating with health care providers.

This post-baccalaureate working professional course is designed to introduce the practicing pharmacist to the concepts of patient care by requiring the student to provide services to actual patients as they learn. All the biomedical, pharmaceutical, social, and clinical sciences are fully integrated in the reading assignments and patient case presentations for the purpose of providing the student the opportunity to function as he/she would after graduation, but under faculty supervision.

Course Faculty and Office Hours

Course Coordinator:

Lori Wazny, Pharm.D.
Clinical Assistant Professor
UF College of Pharmacy
Email: Ldwazny@ufl.edu

Co-coordinator:

Sue Markowsky, Pharm.D.
Clinical Associate Professor
UF College of Pharmacy
Email: smarkowsky@cop.ufl.edu

Please see **Appendix A** for contact information of faculty and staff involved in this course and the WPPD program. Bios of the expert speakers for this course are also included in Appendix A. Each student is assigned to a facilitator and will receive an email from the facilitator at the beginning of the course. This email will provide the facilitator's email address and phone number.

Place and Time of Class Sessions

Lectures are prerecorded and posted on the course website and are available on Canvas Learning system. Lectures may be viewed at the student's individualized timeline prior to completing assignments and active learning sessions. Regional students will attend three 7-8 hour live sessions. The sessions will occur on designated Saturdays listed on WPPD calendar. Remote students will attend one weekend

session (12-15 contact hours) and weekly Adobe Connect sessions. The time of the sessions will vary based on group assignment.

Relation of Course to WPPD Program Outcomes:

This course prepares the Pharm.D. student to accomplish the following abilities and the related Student Learning Outcomes (SLOs) upon graduation:

Domain 1 – Foundational Knowledge

1.1. *Learner (Learner)* - Develop, integrate, and apply knowledge from the foundational disciplines (i.e., pharmaceutical, social/behavioral/administrative, and clinical sciences) to evaluate the scientific literature, explain drug action, assess and solve therapeutic problems, and advance population health and patient-centered care.

Domain 2 – Essentials for Practice and Care

2.1. *Patient-centered care (Caregiver)* - Provide patient-centered care as the medication expert (collect and interpret evidence, prioritize patient needs, formulate assessments and recommendations, implement, monitor and adjust plans, and document activities).

2.2. *Medication use systems management (Manager)* - Manage patient healthcare needs using human, financial, technological, and physical resources to optimize the safety and efficacy of medication use systems.

2.3. *Health and wellness (Promoter)* - Design prevention, intervention, and educational strategies for individuals and communities to manage chronic disease and improve health and wellness.

2.4. *Population-based care (Provider)* - Discuss how population-based care influences patient-centered care and influences the development of practice guidelines and evidence-based best practices.

Domain 3 - Approach to Practice and Care

3.1. *Problem Solving (Problem Solver)* – Identify and assess problems; explore and prioritize potential strategies; and design, implement, and evaluate the most viable solution.

3.2. *Educator (Educator)* – Educate all audiences by determining the most effective and enduring ways to impart information and assess understanding.

3.3. *Patient Advocacy (Advocate)* - Assure that patients' best interests are represented.

3.4. *Interprofessional collaboration (Collaborator)* – Actively participate and engage as a healthcare team member by demonstrating mutual respect, understanding, and values to meet patient care needs.

3.5. *Social & Cultural Sensitivity (Includer)* - Recognize social determinants of health in order to diminish disparities and inequities in access to quality care.

3.6. *Communication (Communicator)* – Effectively communicate verbally and nonverbally when interacting with an individual, group, or organization.

Domain 4 – Personal and Professional Development

4.1. *Self-awareness (Self-aware)* – Examine and reflect on personal knowledge, skills, abilities, attitudes, beliefs, biases, motivation, and emotions that could enhance or limit personal and professional growth.

4.2. *Leadership (Leader)* - Demonstrate responsibility for creating and achieving shared goals, regardless of position.

4.3. *Innovation and Entrepreneurship (Innovator)* - Engage in innovative activities by using creative thinking to envision better ways of accomplishing professional goals.

4.4. *Professionalism (Professional)* - Exhibit behaviors and values (e.g., UF PHARMD CORES) that are consistent with the trust given to the profession by patients, other healthcare providers, and society.

- a. Interpret subjective and objective data.
- b. Identify medication-related problems (identify and/or prevent drug-related problems such as inappropriate indication, therapeutic duplication, drug-disease, drug-drug interactions, incorrect drug dosage or duration of treatment, drug-allergy interactions, and clinical abuse or misuse of drugs).
- c. Develop a specific and complete care plan. This plan includes a comprehensive list of the patient's medication-related problems and for each problem, a specific plan for resolving the problem. This plan includes detailed information about what medications need to be added or discontinued and if a medication is to be added, the product that should be dispensed, the dosage, route, times of administration, duration of therapy, parameters to monitor for efficacy and toxicity, and patient counseling plans.
- d. Outline a monitoring plan for monitoring drug efficacy and toxicity.
- e. Support the care plan and decisions with evidence-based literature.

Course Objectives

Upon completion of this course, the student will be able to:

1. Given a patient with a Renal disorder, demonstrate the ability to:
 - a. Interpret subjective and objective data
 - b. Identify medication-related problems (identify and/or prevent drug-related problems such as inappropriate indication, therapeutic duplication, drug-disease, drug-drug interactions, incorrect drug dosage or duration of treatment, drug-allergy interactions, and clinical abuse or misuse of drugs.)
 - c. Develop a specific and complete care plan. This plan includes a comprehensive list of the patient's medication-related problems and for each problem, a specific plan for resolving the problem. This plan includes detailed information about what medications need to be added or discontinued and if a medication is to be added, the product that should be dispensed, the dosage, route, times of administration, duration of therapy, parameters to monitor for efficacy and toxicity, and patient counseling plans.
 - d. Outline a monitoring plan for monitoring drug efficacy and toxicity.

- e. Support the care plan and decisions with evidence-based literature.
2. Implement, monitor, evaluate, and adjust pharmaceutical care plans with accuracy and timeliness.
 - a. Prepare a written SOAP note.
 - b. Demonstrate the ability to establish for a patient the “therapeutic goals” or endpoints that indicate the patient’s medication problem is either resolved, cured, or managed.
 - c. The student must then demonstrate the ability to monitor the patient over time and assess when the endpoints are achieved. If the patient is not achieving the desired endpoints, the student must demonstrate the ability to modify the therapeutic plan or endpoints so that the patient’s quality of life is optimized.
3. Prepare and deliver educational programs to pharmacists/peers that promote appropriate use of medications by applying pharmacy knowledge and using effective communication skills.
 - a. Present a patient summary with confidence and in an organized format that includes only pertinent information. (Example: brief patient summary during rounds or when proposing recommendations to a care provider.)
 - b. Give a formal case presentation that includes presentation of patient data, development of a comprehensive care plan, a summary of literature pertinent to the medication-related problems, and an oral defense of recommendations.
 - c. Demonstrate effective verbal communications to staff, patients and healthcare team members.
 - i. Prepare a accurate, concise, and organized written patient care plan.
4. Identify, report and analyze drug induced diseases that are encountered in renal patients.
5. Recommend how to manage a patient who has health literacy issues. Practice patient counseling using the teach-back method.
6. Communicate with another health care professional about the appropriateness of a patient's pharmacotherapy with clarity and accuracy (drug, dosing, dosage forms, routes of administration, delivery systems).
7. Work with individuals of other professions to maintain a climate of mutual respect and shared values.
8. For the Renal disorders emphasized during this course:
 - a. Explain anatomical, physiological, and pathophysiological conditions ameliorated by pharmacotherapy.
 - b. Describe the epidemiology of the following disorders:
 - c. Describe the clinical presentation and clinical manifestations.
 - d. Discuss the pharmacologic and non-pharmacological interventions that are recommended.
 - e. Critically evaluate new advances in biotechnology, pharmacotherapy, or systems of care and effectively utilize this new knowledge for patient care improvement.
 - f. Review common drug-drug interactions and their etiology.
 - g. Outline the major elements of currently accepted standard of care guidelines.
9. Implement rational pharmacotherapy based on a mastery of sciences:
 - a. BIOMEDICAL (anatomy, physiology, pathophysiology, infectious disease, oncology, and immunology),
 - b. PHARMACEUTICAL (medicinal chemistry, biopharmaceutics, pharmacodynamics, and pharmacokinetics),

- c. CLINICAL (therapeutics, therapeutic drug monitoring, toxicology, nutrition, and drug information),
 - d. PHARMACEUTICAL CARE (patient interviewing techniques, chart review and data gathering, identifying interventions, establishing interventions and monitoring strategies, and communication skills with health care providers).
10. Given a patient/practice problem or case related to a renal disorder, solve the medication-related problems using clinical reasoning skills.
 11. Demonstrate the ability to use the learning tools in the eLearning system to accomplish learning objectives and prepare for class session.
 12. Use informatics tools when determining drug dosing for patients with decreased renal function.
 13. Critically evaluate scientific and professional literature to assure that appropriate statistical tests and experimental design have been used in studies relating to drug safety and efficacy.
 14. Give a care presentation that requires evaluation of literature to support recommendations.
 15. Demonstrate professional behaviors expected of a pharmacist.

Pre-Requisite Knowledge and Skills

The student must be in good academic standing with the Working Professional Doctor of Pharmacy Program, having successfully completed the Foundations course. Students should have a baccalaureate degree from an ACPE-accredited college of pharmacy that included therapeutics and pharmacokinetics. The student must also be licensed and in good standing with their respective Board of Pharmacy.

Course Structure & Outline

This course is offered in a blended learning format that utilizes a combination of face-to-face classroom instruction, on-line learning, and hands-on experiential activities. To meet the standards for course credit assignment this six-credit course requires a minimum of 96 hours of classroom instruction or the equivalent. Since the face-to-face classroom instruction is less than 96 hours, a number of alternative instructional activities comprise the remainder of the equivalent content and serve to fulfill the curricular equivalency standard. Using a combination of live classroom instruction and alternative methods of instruction ensures that the requirements for course credit assignment are fulfilled. Please see **Appendix B** for the breakdown of instructional hours. Here are the course structures used in the Pharm.D. program:

- a) Multiple self-directed learning activities are required (e.g., videos, readings, web-based learning) and at selected intervals students come to class for a face-to-face learning session (e.g., case discussions, case presentations, literature reviews, problem set discussions),
- b) Class sessions are face-to-face or 'live' sessions via online classrooms,
- c) Self-directed pre-requisite learning activities must be completed prior to and after 'live' class sessions, and
- d) Learning activities completed in the actual practice setting

Acquisition of knowledge and skills are assessed using a combination of exams, presentations, and assignments. Course participation in Adobe Connect sessions (remote), discussion board activities, and attendance at a live session are also assessed. The course is divided into three units and there are

learning modules within each unit. An outline of the course module topic is listed in Table 1. The corresponding module activities are posted in the Resources section, E-learning website (see Quicksan).

Table 1. Unit and module topics.

Unit	Module	Faculty Member	Assessment
A0	Course Introduction (Orientation)	Dr. Lori Wazny	
A1	Fluids & Electrolyte Disorders	Dr Stacy Voils	Exam A
A2	Acid Base Disorders	Dr. Stacy Voils	Exam A
A3	Kaplan-Meier Curves, Hazard Ratios & Composite Endpoints	Dr. Clarissa Borst	Exam A
A4	Renal Anatomy/Physiology	YouTube Video	Exam A
B1	Chronic Kidney Disease	Dr. Lori Dupree	Exam B
B2	Acute Kidney Injury	Dr. Lori Dupree	Exam B
B3	Drug Induced Kidney Disease	Dr. Lori Dupree	Exam B
B4	Kidney Transplant	Dr. Lindsay Bowman Anger	Exam B
C1	Urinary Tract Infections	Dr. Lisa Vandervoort	Exam C
C2	Management of Complicated UTIs	Dr. Ken Klinker	Exam C
C3	BPH & Overactive Bladder	Dr. Katie Vogel Anderson	Exam C
C4	Erectile Dysfunction	Dr. Katie Vogel Anderson	Exam C
C5	Prostate Cancer	Dr. Paul Furler	Exam C
C6	Mock Patient Case (Hemodialysis Drug Dosing)	Dr. Lori Wazny	

Textbooks

The following textbooks will be used throughout your course of study in the WPPD program. No other textbooks will be required. Textbooks can be purchased via various internet sites; however, make sure you buy the latest editions.

1. **DiPiro et al.** Pharmacotherapy: A Pathophysiological Approach, 2017, 10th ed.
 - a. This text is available via the UF library/ AccessPharmacy database. Although you can use the online version for study, most students find it essential to purchase a hardcopy of the Pharmacotherapy Text. Online access to the Pharmacotherapy text may not be available during exams.
 - b. (Caution: Old editions are sold on the internet and should not be purchased. Watch carefully what edition you purchase. A Pharmacotherapy Handbook is also available with the current edition. This handbook is a useful reference in daily practice but should not be purchased in lieu of the text listed above.)
2. **Schwinghammer et al.** Pharmacotherapy Casebook: A Patient Focused Approach, 2017, 10th ed. This text is available via the UF library/AccessPharmacy database.
3. **Abate MA, Blommel ML.** Remington Education: Drug Information and Literature Evaluation, 2013, 1st Ed, Pharmaceutical Press. ISBN-10: 0857110667 ISBN-13: 978-0857110667.
4. **Lee, Mary.** Basic Skills in Interpreting Laboratory Data, American Society of Health Systems Pharmacists, 2013, 5th ed.
5. **Murphy J.** Clinical Pharmacokinetics, American Society of Health Systems Pharmacists, 2017, 6th ed. ISBN: 978-1-58528-537-2,

Instructors may require additional readings such as clinical guidelines, review articles, book chapters, or websites. They may also provide additional resources to supplement the lecture material. Required or recommended readings will be listed under assignments and responsibilities on the course schedule. Required readings not available via the textbooks above or Access Pharmacy (via online Health Sciences Library Databases) will be posted under the resources tab on the course website.

Active Learning Requirements

Active learning requires students to actively participate in synchronous learning activities and complete assignments that require either application of what is learned from lectures or independent study. During this course, active learning will occur with the activities listed below. See the Course Quicksan detailed in **Appendix C** for specific expectations required to accomplish this active learning:

1. Active participation in small group classes including “live” sessions (regional and remote students) and Adobe Connect sessions (remote students).
2. Completion of self-directed learning modules which include: a) videos, b) readings, c) assignments that require application of module knowledge, and d) online self-assessment questions.
3. Asynchronous communications and discussions with course coordinators, small group members, and/or guest lecturers via discussion boards and email.
4. Completion of the following class presentations: a) individual patient case and b) CPI / Capstone progress update.
5. Completion of homework and assignments required for workshop preparation. See the weekly planner for Units A, B, and C homework assignments and timelines posted in Resources E-learning website (remote or regional model).

Feedback to Students

Facilitators will provide written feedback on all assignments via the eLearning system. In general, written feedback can be expected within one week of assignment submission. Facilitators will also provide students with timely verbal feedback on in-class presentations and performance. In addition, students may schedule an appointment with the facilitator and/or course coordinator if they wish to obtain more detailed feedback.

Student Evaluation & Grading

Evaluation Methods

Individual case presentation/SOAP note *	12.5%
Journal Club (3% Evaluation Submission; 9.5% JC Assessment)	12.5%
Health Literacy Workshop	3%
Mock Patient Case	3%
CPI / Capstone Progress Reports	3%
Class participation	6%
<ul style="list-style-type: none"> • 2% per unit (Units A, B, C) : Includes attendance, participation, 	

homework, communication (e.g., email), professionalism

Exam A (Unit A)	20%
Exam B (Unit B)	20%
Exam C (Unit C)	20%

- *Note: Students must pass the Case Presentation as a requirement to pass the course. Remediation for a failed case(s) (less than 70%) will include re-submitting the case to the facilitator and may also include presenting the revised case to the group. The final score for the remediated case presentation grade will be limited to the original score. To successfully pass the course, the student must achieve a grade $\geq 70\%$ on the remediation assignment. All remediation must be completed by the deadline established by the course coordinator. Otherwise, a grade of E will be assigned. **No more than 2 case remediations will be permitted during the eight WPPD body system courses.**
- Points will be deducted for SOAP notes that do not meet the minimum criteria (passing scores are required). See the evaluation forms for Case Presentations and SOAP notes (see Student Presentations page).
- Note. Students must obtain at least a 70% (combined) average on the EXAMS and a 70% overall course grade as requirements to pass the course. Students do not have to score a 70% on each exam; only the average of the three exams needs to be at least 70%. The requirement to achieve a score of at least 70% has been established to assure all students have achieved the course learning objectives with minimum competency.
- **Please visit the following URL so you clearly understand the UF grading policies:**
<https://catalog.ufl.edu/ugrad/current/regulations/info/grades.aspx>

Grading Scale

A 96.5 – 100	A- 93.5 – 96.49
B+ 90.5– 93.49	B 86.5 – 90.49
B- 83.5 – 86.49	C+ 80.5 – 83.49
C 78.5 – 80.49	C- 76.5 – 78.49
D+ 74.5 – 76.49	D 71.5 – 74.49
D- 69.5 – 71.49	E <69.5

Rounding of grades: Final grades in Canvas will be rounded to the 2nd decimal place. If the decimal is X.495 or higher, Canvas will round the grade to X.50. The above scale depicts this policy and grades are determined accordingly. Grade assignment is made using this policy and ***no exceptions*** will be made in situations where a student’s grade is “close.”

Class Attendance Policy

CLASS ATTENDANCE IS MANDATORY AT THE “LIVE” EXPERIENTIAL SESSIONS (including regional and remote sessions). A form (“Request to miss part or all of a session”) must be completed by the student if they cannot attend part or all of a session. The form is posted on the E learning System. This form must be approved by the student’s facilitator and the course coordinator. Email completed form to

facilitator and course coordinator. Students are responsible for taking any exams missed via ProctorU. **NOTE:** Attendance for the remote weekend is MANDATORY. If missed, students will be required to travel to makeup a 'live' session during one of the three regional on-site sessions. No more than 2 adobe connect sessions may be missed by remote students. Makeup sessions may be arranged in advance by emailing the course coordinator and facilitator at least 72 hours prior to the scheduled class.

Exam Policy

There are two components to the Working Professional Pharm.D. courses; the experiential component and the didactic component. Competence in both areas is critical to being a successful Doctor of Pharmacy. Because these components are integrated within each course, a mechanism to document an acceptable level of understanding in each area is vital. As such, students must not only demonstrate competence in the course overall, but also in each component of the course in order to pass the course.

Examination Schedule

This course has three examinations.* Students must obtain at least a 70% (combined) average on the EXAMS and, AND a 70% overall in coursework in order to pass the course. The student DOES NOT have to score a 70% on each exam, only the average of the three exams needs to be at least 70%.

Exam A (Unit A)

Regional Sites	Feb 10, 2018	8:30 AM-10:30 AM
Remote Sites	Feb 10, 2018	via ProctorU (8 am-12 noon EST start times)

Exam B (Unit B)

Regional Sites	Mar 10, 2018	8:30 AM-10:30 AM
Remote Sites	Mar 10, 2018	via ProctorU (8 am-12 noon EST start times)

Exam C (Unit C)

Regional Sites	Apr 7, 2018	8:30-10:30AM
Remote Sites	Apr 7, 2018	via ProctorU (8 am-12 noon EST start times)

*All exams are open book.

Proctored Exam Details

For detailed exam instructions, please see E Learning for the tab titled "Proctored Online Exams". Students should printout the documents within this folder prior to each online proctored exam. The documents include important contact information, online exam instructions, and exam rules. All exams will be proctored.

You must NOT obtain the exam at any other time than instructed unless prearranged with the course coordinator and your facilitator. The Academic Honesty Policy will apply to this exam process and students not complying with the instructions with regards to time and location are subject to disciplinary action.

In the rare event that the online exam malfunctions and the exam is administered by an alternate method, the deadlines will be enforced and the following point deductions will be made for exams turned in late:

- | | |
|------------------|---------------|
| ❖ 5-15 minutes | 5% deduction |
| ❖ 16-30 minutes | 7% deduction |
| ❖ 31-60 minutes | 10% deduction |
| ❖ 61-120 minutes | 20% deduction |
| ❖ >121 minutes | 30% deduction |

Exam Format

All examinations will be mostly in case study format so that an evaluation of the student is made not just on his/her ability to recall facts, but more importantly, the ability to apply information to improve, monitor, and evaluate pharmaceutical patient care outcomes.

Exam Posting

Exam Grades will be posted to E learning by the facilitator as soon as permissible. Students will be notified of grade posting by the facilitator. Exams will be returned in the next session for regional model students. Final exams for regional model students will be returned at the next class session.

Exam Review

Students have 1 week from the date of posting the exam grade on E learning to request a copy of the graded exam. The student has 1 week from the time of receipt of the exam to request clarifications. Facilitators will review and provide judgment on the requested clarifications.

Exam Challenges

In the event that the student is not satisfied with the facilitator's judgment, a written appeal can be made. The student has 1 week from the time of receipt of judgment to appeal. Appeals are sent to the facilitator who will forward to the course coordinator. Written appeals must include the following: The question number, an evidence-based rationale for why the student feels their response is accurate, literature citations. The exam will be regraded, in full, by a third party. The grader will assess the supporting data when grading the appealed portions of the exam. Note: the score of a fully regraded exam may increase, decrease, or stay the same. The regraded score will be considered final.

Exam Rescheduling

Examinations may be changed from the scheduled dates provided that the change does not conflict with any University of Florida or College of Pharmacy policies. Examination date changes proposed by the students as a group require the unanimous approval of the students and faculty involved.

Make-up Exam Policy

Make-up examinations will only be administered under the most EXTREME circumstances and only if the student has an excused absence. Contact your facilitator for more information.

Policy on Old Quizzes and Assignments

Course coordinators are not required to provide copies of old exams or assignments.

Assignment Deadlines

Assignment deadlines and the course schedule are outlined in Appendix C (Quick Scan). The weekly planners for Units A, B, and C are posted in e-Learning for regional and remote models. Use the weekly planner to keep on track during the course.

*****Assignments Require “Independent Work”**

During the semester you will have homework and presentation assignments. These assignments must be your independent work, meaning that you did not share your answers with another student or collaborate in answering the questions. The faculty monitor closely for similarities among student answers to these assignments. If there is evidence suggesting that your assignment is not “independent work,” your facilitator and course coordinators will forward your case to the University and request an academic dishonesty investigation.

You are strongly encouraged to schedule your time in advance of deadlines so that you have extra time in case of illness or emergency.

Students who encounter difficulties meeting any deadline should to immediately email/call their facilitator and discuss options available for success. Please remember, as noted above with most assignments there are **no options** for extending an assignment deadline. If the facilitator cannot be reached, the student may contact the course coordinators by email for assistance in communicating with the facilitator.

Important Assignment Rules:

1. “Homework” this semester will include questions posted online to prepare for the experiential sessions (see E-Learning Resources). Students are required to complete the assignments prior to each session. The student’s work will be checked by the facilitator prior to beginning the session. Students who do not complete the material prior to the session will receive an incomplete. Students who submit late will receive a 10 percent reduction on the associated Unit Participation score (See participation rubric for the homework category).
2. All students (Remote and Regional) must submit case presentations 72 hours prior to their scheduled presentation. Do not use the UF webmail to submit cases, as it is not a secure method of sending patient information. To submit cases, go to Assignments and submit the case presentation materials (including the faculty supporting data handout merged within the same attachment). See Foundations Module titled “Case Presentations” for more information regarding case presentation format. Documents for case presentation format can also be located within E Learning for “WPPD Resources” (see Resources folder - “Case Presentation Information”).
3. In order to pass the course, it is mandatory that the student pass the case presentation. Remediation for a failed case(s) (less than 70%) will include re-submitting and presenting the revised case to a remediation facilitator. The final score for the remediated case presentation grade will be limited to the original score. However, the student may pass the course if the remediated case grade is ≥ 70 and an overall passing course letter grade is achieved. No more than 2 case remediations will be permitted during the eight WPPD body system courses.
4. Presentation assignments will receive a “Turn-It-In” score within 24 hours of submission to the Individual Case assignment link. More specific instructions can be found on the E Learning website. A printed copy of the case presentation should be provided to the facilitator during “live” class sessions.

General College of Pharmacy Course Policies

The College of Pharmacy has a website that lists course policies that are common to all courses. This website covers the following:

1. University Grading Policies
2. Academic Integrity Policy
3. How to request learning accommodations
4. Faculty and course evaluations
5. Student expectations in class
6. Discussion board policy
7. Email communications
8. Religious holidays
9. Counseling & student health
10. How to access services for student success

Please see the following URL for this information:

<http://www.cop.ufl.edu/wp-content/uploads/dept/studaff/policies/General%20COP%20Course%20Policies.pdf>

Complaints

Should you have any complaints with your experience in this course please contact your course coordinator. If unresolved, contact the COP Senior Associate Dean-Professional Affairs. For unresolved issues, see: <http://www.distancelearning.ufl.edu/student-complaints> to submit a complaint.

Appendix A: Directions for Contacting Faculty & Course Faculty List

PHA 5593 Course Coordinator: Lori Wazny, Pharm.D.; E-mail: Ldwazny@ufl.edu

Co-coordinator: Sue Markowsky, Pharm.D.; E-mail: smarkowsky@cop.ufl.edu

Dean, College of Pharmacy

Julie Johnson, Pharm.D.
Dean, College of Pharmacy
University of Florida

Director, WPPD

Sven Normann, Pharm.D., DBAT
Assistant Dean, Clinical Associate Professor
Pharmacotherapy & Translational Research
UF College of Pharmacy, Gainesville, Florida
E-mail: normann@cop.ufl.edu

Regional Director - Regional Sites, WPPD

Douglas F. Covey, Pharm.D., FCCP, CDE, MHA
Clinical Associate Professor, Pharmacotherapy & Translational Research
UF College of Pharmacy, Gainesville, Florida
Clinical Pharmacy Specialist – Ambulatory Care James A. Haley Veterans Hospital, Tampa, Florida
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Regional Director – Remote Sites, Capstone Programs, WPPD

Susan J. Markowsky, Pharm.D.
Clinical Associate Professor, Pharmacotherapy & Translational Research
UF College of Pharmacy, Gainesville, Florida
E-mail: smarkowsky@cop.ufl.edu

Director – Student and Academic Affairs, WPPD

Gregory Zuest, PhD, MESS, ATC/L, CSCS
WPPD Program / UF College of Pharmacy, Gainesville, Florida
E-mail: zuest@cop.ufl.edu

Associate Dean for Curriculum and Assessment

Diane E. Beck, Pharm.D.
Professor, Pharmacotherapy and Translational Research
UF College of Pharmacy, Gainesville, Florida
E-mail: beck@cop.ufl.edu

CPA Coordinators - Clinical Practice Assessments (CPAs), WPPD*

See PE Courses for CPA Coordinator contact information.

Off Site Admissions Center - Program Manager

Off Site Admissions Center, Orlando, Florida

Schedule An Appointment By Pasting this URL into your Internet Browser:

https://www.vcita.com/v/rengam/online_scheduling?staff_id=d7a2e4006d76da8f#/schedule

E-mail: R.Engram@distancelearning.cop.ufl.edu 1-866-226-7228 (x5032)

Program Assistant, WPPD

Tracie Cooper

UF College of Pharmacy, Gainesville, Florida

E-mail: tracie@cop.ufl.edu

Whom Do You Contact?

Course Coordinator will address:

- Course specific issues (e.g., course content, assignments, grades, and exams)
- Any exceptions made for student emergencies affecting course participation or completion

Facilitators will address: _____ [@ufl.edu](#).

- Regional/remote group meetings or calls
- Initial student questions
- Homework, Assignments
- Clinical Practice Assessments (CPAs)
- Clinical Practice Improvement (CPI)
- Capstone Paper Requirement

WPPD Office will address:

- Faculty and program evaluation
 - Course and transfer credit
 - Facilitators and student/facilitator assignments and relationships
 - Student Records
 - Tuition
 - Affiliation Agreements
 - Pharmacademic issues
- Please contact Jackie Lavinder for all WPPD program questions (that are not course-related)
E-mail: lavinder@cop.ufl.edu

Off Site Admissions Center - Program Manager will address:

- Registration
 - Course manual and material
- Please contact Off Site Admissions Center at: REngam@embanetcompass.com

College of Pharmacy Educational Technologies Office will address:

Technical support related to e-Learning sites, myCOP, Adobe Connect, Big Blue Button (BBB), educational videos, mobile learning technologies and other course-related items supported by the COP Educational Technologies Office.

- Telephone: (352) 273-6290
- Office Hours: Monday through Friday - 8:00 am to 5:00 pm
- E-mail: edu-help@ahc.ufl.edu
- Website: <http://it.cop.ufl.edu>
- Related website: <http://my.cop.ufl.edu>

Note: When contacting the College of Pharmacy Educational Technologies Support Office staff, we suggest e-mailing your request to our edu-help@ahc.ufl.edu address. This address is monitored by multiple staff and will likely result in the fastest support response. When reporting technical issues, please include the course name and location within the course where you are experiencing a problem. For example: "PHA1234, Resources, Module 1, video title.

UF Computing Help Desk will address:

Technical difficulties related to the e-Learning System, Gatorlink accounts, UF e-mail, ISIS, myUFL and other centralized UF systems.

- Website: <http://www.helpdesk.ufl.edu/>
- E-mail: helpdesk@ufl.edu
- Help Wiki: <https://wiki.helpdesk.ufl.edu/>
- Telephone: (352) 392-4357

Note: If one of your e-Learning course links does not appear for you on the first day of class, please contact Dr. Zuest for assistance.

Greg Zuest; Email: zuest@cop.ufl.edu

Course Faculty

Clarissa Borst, Pharm.D., BCPS

Dr. Borst earned her PharmD from Purdue University in 1997; she then completed an ASHP accredited Pharmacy Practice residency at Rush-Presbyterian-St. Luke's Medical Center in Chicago, Illinois. She is currently the Managing Editor of Clinical Pharmacology (Gold Standard, Tampa, FL), an on-line drug information reference. She has held various other positions including Assistant Clinical Professor at Midwestern University (Downers Grove, IL) where she focused on precepting students in the areas of outpatient anticoagulation, diabetes, hypertension, and hyperlipidemia management, Manager of the Anticoagulation Unit at Evanston-Northwestern Hospital (Glenview, IL), and Drug Information Specialist at Rush University Medical Center (Chicago, IL) and Ingalls Hospital (Harvey, IL). Dr. Borst has been a facilitator with the WPPD program since 2000; she also co-coordinates the Foundations course in the WPPD program. Her interest and experience in statistics stems from her current role at Gold Standard where frequent interpretation of the literature is required. She is a recipient of the Outstanding Faculty Award for the WPPD program.

Lyndsey J. Bowman, PharmD, BCPS

Dr. Bowman received her Bachelor of Science and Doctor of Pharmacy degrees from St. Louis College of Pharmacy. She then went on to complete an ASHP-accredited PGY1 Pharmacy Practice Residency and PGY2 Critical Care Specialty Residency at the Medical University of South Carolina in Charleston, SC. Upon completion of residency training, she joined the team of transplant specialists as an abdominal organ transplant pharmacotherapy specialist at Barnes-Jewish Hospital (BJH) in St. Louis, MO. During her time at BJH, Dr. Bowman served as the Residency Program Director for the PGY2 Solid Organ Transplant Residency Program and the clinical supervisor of the transplant pharmacists. After 8 years at BJH, she joined the transplant clinical pharmacy group at Tampa General Hospital. In her current role, she has successfully established a new clinical pharmacy service and presence on the transplant nephrology team. As a clinical researcher, Dr. Bowman also contributes to medical literature through active publication in peer-reviewed journals and

book chapters. Her research interests include viral infections, induction immunosuppression, alterations in maintenance immunosuppression regimens, and outcomes research in kidney and liver transplantation. Dr. Bowman's professional service activities include active membership in the American Society of Transplantation, the AST Transplant Pharmacy Community of Practice as a member of the Executive Committee, and the American College of Clinical Pharmacists through active involvement in several work groups within the IMTR PRN.

Lori H. Dupree, Pharm.D., BCPS

Dr. Dupree received her Pharm.D. from the McWhorter School of Pharmacy at Samford University. Her postdoctoral training includes Pharmacy Practice and Internal Medicine residencies. Since completing her training, Dr. Dupree worked as a Clinical Pharmacist at Columbus Regional Medical Center where she served as Assistant Clinical Professor at Auburn University, the University of Georgia, and Mercer University. In 2003, she became a Clinical Inpatient Practitioner of Family Medicine at Shands Jacksonville (now UF Health Jacksonville) and then started working with the Internal Medicine service in 2006. Dr. Dupree began her affiliation with the University of Florida in 2004 as a Courtesy Clinical Assistant Professor and rotation preceptor. She accepted a full-time faculty appointment in July 2013. Since her full-time faculty appointment, Dr. Dupree has continued to work as a Clinical Inpatient Practitioner in Internal Medicine once a week at UF Health Jacksonville where she works directly in patient care, continues to develop interprofessional relationships, and works with APPE students and pharmacy residents on rotation.

Paul Furler, Pharm.D.

Paul Furler, Pharm.D. is an Oncology Clinical Pharmacist within the BayCare Health System located in Clearwater, FL. He received his Pharm.D. from Temple University School of Pharmacy. He then completed a PGY-1 pharmacy practice residency at Lancaster General Health in Lancaster, Pennsylvania, and a PGY-2 oncology specialty residency at UF Health Shands Hospital. Dr. Furler's clinical interests include outpatient oncology, symptom management, and the affordability of cancer care.

Kenneth Klinker, Pharm.D.

Kenneth Klinker, Pharm.D., joined the UF College of Pharmacy in August 2015. A graduate of the University of Maryland, he completed his residency training at UF Health Shands Hospital in internal medicine. Following completion of his residency training, he spent five years providing care to critically ill patients in the Medical Intensive Care Unit at UF Health Shands and in 2003 transitioned to infectious diseases in order to participate in the development of an Antimicrobial Management Program. Currently, he is a clinical associate professor at the UF College of Pharmacy, and a pharmacy specialist in infectious diseases at UF Health Shands Hospital. He is an active member of the Antimicrobial Management Team and assists in the development of ID pharmacists through the Infectious Diseases Residency Program at UF Health Shands Hospital. Dr. Klinker is active in the Society of Infectious Diseases and serves on the Political Advocacy Committee. Additionally, he is a past president of the North Central Florida Society of Health Systems Pharmacists, or NCFSHP, and served as a board of director for the Florida Society of Health Systems Pharmacists.

Susan J. Markowsky, Pharm.D. (Co-course Coordinator)

Dr. Markowsky is a Regional Director for the Working Professional PharmD program (WPPD) at University of Florida. She coordinates the Remote sites and the Pharmaceutical Care Writing programs for WPPD. Sue Markowsky received the Doctor of Pharmacy degree from the University of Kentucky, after first obtaining the B.S. Pharmacy degree from the State University of New York at Buffalo. She completed an ASHP Residency at Erie County Medical Center in Buffalo, New York. Dr. Markowsky also completed an ASHP Critical Care Fellowship at Truman Medical Center in Kansas City, Missouri.

Lisa Vandervoort, Pharm.D.

Dr. Vandervoort received her Doctor of Pharmacy degree from the University of Florida College of Pharmacy in 1995 and completed a Pharmacy Practice Residency at Shands Hospital at the University of Florida in 1996. She spent 10 years as the Clinical Specialist in Infectious Disease/Internal Medicine at Orlando Regional Medical Center. For the past 10 years

Dr. Vandervoort has been at the University of Florida both at the Orlando Campus and with the WPPD program. Her primary interests include student development, pharmacokinetics, infectious disease and internal medicine.

Katherine Vogel Anderson, Pharm.D., BCACP

Dr. Anderson earned her Bachelor of Science degree in biochemistry, with a minor in math, from the Florida State University in 1999. In 2003, Dr. Vogel Anderson graduated with her doctorate of pharmacy degree from the University Of Florida College Of Pharmacy. Following this, she completed a primary care pharmacy residency at the Malcom Randall Veterans Affairs Medical Center in Gainesville. After her residency, Dr. Vogel Anderson worked as a clinical pharmacy specialist at the same VA, in both the pharmacotherapy and geriatric primary care clinics. In 2010, Dr. Vogel Anderson joined the UF COP faculty. In addition to her teaching responsibilities, Dr. Vogel Anderson practices at UF Health Internal Medicine, where she manages a pharmacotherapy service and directs an ASHP-accredited PGY-1 pharmacy residency program,. She has a joint faculty appointment in the UF College of Medicine. In 2009, Dr. Vogel Anderson and her husband, Dr. Shawn Anderson, established the Vogel/Anderson Exceptional Leader Scholarship for third-year pharmacy students. When she is not working, Katie enjoys traveling, spending time with family and friends, and spoiling her dogs, Teddie Roosevelt and Johnnie Adams.

Stacy Voils, Pharm.D., M.S., BCPS, FCCM, FCCP

After his graduation from the University of Kentucky College of Pharmacy, Dr. Voils worked briefly as a clinical pharmacist. He then completed a PGY-1 Pharmacy Practice residency at the VA Medical Center in Lexington, Kentucky followed by a PGY-2 residency specializing in critical care at the Virginia Commonwealth University Health System (VCUHS) in Richmond, Virginia. Before joining the University of Florida, Dr. Voils worked as a Clinical Pharmacy Specialist in Neurosurgery and Cardiothoracic Surgery at the VCUHS, Medical College of Virginia campus. He held an appointment as Clinical Assistant Professor at the Virginia Commonwealth University School of Pharmacy.

Lori Wazny, Pharm.D., EPPH (Renal Course Coordinator)

Dr. Wazny completed her BSc(Pharm) from the University of Manitoba, Canada; Pharm.D. from the University of Minnesota; and Fellowship in Internal Medicine (Nephrology) from Virginia Commonwealth University. She is currently an Extended Practice Pharmacist with the Renal Health Clinics of the Manitoba Renal Program in Winnipeg, Canada. She has published over 70 research and review articles, abstracts, and book chapters in the field of nephrology including the CKD chapter in the *Pharmacotherapy* textbook. Dr. Wazny has been involved in the WPPD program since 2001 in various roles including: Detroit site facilitator; Foundations Course facilitator; expert presenter on renal and anemia topics; and this is her 6th session as Course Coordinator for 5593 Renal Disorders. She is currently Chair of the Canadian Society of Hospital Pharmacists Foundation, a charitable organization that raises funds for hospital pharmacist research grants, leadership scholarships and educational grants.

Appendix B.

Instructional Method	Curricular Equivalency (hours)
In-class instruction (3 live sessions – 7.5 hours each)	22.5
Instructional videos (14 one-hour videos)	14
Discussion board (minimum 3X/week, ½ hr. each)	24
CPI or capstone project (one hour per week)	16
Mock Patient Cases (2 this semester)	8 (minimum) 16 (max)
Journal club (one this semester)	5 (minimum) 8 (max)
Individual Case presentation (one per semester)	2 (minimum) 6 (max)
Self-assessments (two this semester)	2 (minimum) 10 (max)
Other assignments (see quick scan)	5 8 (max)

Total (96 hours needed to meet threshold for 6 credits) 98.5 (min) 124.5 (max)

To comply with the standards, students should expect to spend a minimum of 7.5 hours per live session.
The length of the sessions must not be shortened.