College of Pharmacy

Doctor of Pharmacy (PharmD)

2013/2014 Catalog
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College of Pharmacy

Doctor of Pharmacy Program

Accreditation

The College of Pharmacy is accredited by the Accreditation Council for Pharmacy Education (ACPE) located at 135 S. LaSalle Street, Suite 4100, Chicago, Illinois 60603-4810. Phone: (312) 664-3575; Fax: (312) 664-4652 web: www.acpe-accredit.org

Vision

Educating innovative pharmacy leaders for tomorrow.

Mission

Educating future pharmacy professionals to serve the health care needs of society and improve the quality of patient care through science, caring and humanism.

The Degree

The Doctor of Pharmacy (PharmD) degree is awarded in recognition of the highest level of professional education in pharmacy in the United States. To earn the PharmD degree, student pharmacists complete four years of professional study following a minimum of two years of pre-professional education at an accredited college or university.

Student pharmacists who complete this program are eligible to take state and national pharmacy licensing examinations provided they have satisfied other licensure requirements such as 1500 hours of internship experience. After passing this examination, graduates are licensed to perform all the duties and responsibilities of a practicing pharmacist.

The Doctor of Pharmacy Curriculum

To obtain the PharmD degree you will complete a curriculum made up of four components: (1) the didactic curriculum, (2) experiential education curriculum, (3) the interprofessional curriculum, and (4) the professionalism curriculum.

The Didactic Curriculum Component

In the core didactic component of the program, you will learn about biological systems and about drugs and their effect on the body. You will take courses in areas such as therapeutics, health care administration, pharmacology, immunology, pharmaceutics, pharmacogenomics and pharmacokinetics and learn how to apply this knowledge to pharmacy practice. Your studies will include communication skills, patient counseling, pharmacy practice laws and regulations, health care systems, physical assessment and evaluation of the medical literature.

The Experiential Education Curriculum Component

The pharmacy practice experiential education curriculum begins with the Introductory Pharmacy Practice Experiential (IPPE-1) courses (PHRM 5998 and 5999), which run throughout the first year of study. Each of the first year clerkship courses, one in the Fall Term (IPPE-1A) and one in the Spring Term (IPPE-1B), run for 4 weeks (4 days/week, 160 experiential hours, 2 credit hours each) that expose the student to community pharmacy practice in two different settings. Every student will complete both courses by the end of their first year.
The second year IPPE course (PHRM 6999; IPPE-2) is scheduled during the summer between the second and third years. It consists of a 4-week (5 days/week, 40 hrs./week) clerkship (160 experiential hours, 4 credit hours) that exposes student pharmacists to institutional pharmacy practice.

In several different patient-centered training sessions, particularly during the third and fourth years, you will be given an opportunity to put into practice what you have learned in the classroom. Under the supervision of a clinical pharmacist faculty member, you will assess and counsel patients and monitor their drug therapies. You will spend a total of 36 weeks in these training sessions, called advanced pharmacy practice experiences (APPE). Such pharmacy practice experiences will take place in hospitals as well as in clinics, community pharmacies and other settings where pharmacists practice.

After the APPE is completed, student pharmacists undergo the 16-week Advanced Elective (AE). This is a 4-month rotation/research experience that allows student pharmacists to develop more skills and insight in a specific practice area. By November of the student’s last year, individuals should identify an area of professional interest in which they wish to practice. The 16-week AE program is designed to provide a capstone experience in the student pharmacist’s chosen area of interest (e.g., administration, various clinical settings, pediatrics, infectious disease, internal medicine, cardiology, renal, oncology, ICU, ambulatory care, community practice, compounding, pharmacoconomics, managed care, psychiatry, teaching, pharmaceutical industry, pharmacy informatics, etc.).

The clinical training component comprises 76 credit hours, which is 42% of the total curricular requirements.

**The Interprofessional Curriculum Component**

Student pharmacists in their first and second professional years are required to participate in a series of Interprofessional Education (IPE) courses. These courses prepare health professions students to practice health care services through a team approach. The IPE courses instill non-technical competencies including communication, collaborative practice, and scope of practice. Working in small interprofessional teams, student pharmacists apply these competencies as they jointly explore cases or activities presenting common clinical scenarios or conditions with other health professions students. These cases and activities integrate elements common to all professions, including ethical, behavior, social and psychological issues.

**The Professionalism Curriculum Component**

The College of Pharmacy values professionalism and expects all graduates to acquire and maintain the highest level of professional attitudes and behaviors. To promulgate this belief, student must participate in at least five professional activities during an academic year. These activities may be selected from five categories: (1) professional education, (2) patient care service, (3) legislative advocacy, (4) professional service and leadership, and (5) healthcare related community service and philanthropy.

**Personal Competencies for Admission and Matriculation**

Candidates for the Doctor of Pharmacy program must have the intellectual, emotional and physical abilities, with or without accommodations, to acquire the knowledge, technical and clinical skills needed to successfully complete the curriculum in order to pursue a career in pharmacy practice. Reasonable accommodations for persons with disabilities will be considered on an individual basis, but a candidate must be able to perform in an independent manner.
The College of Pharmacy has determined that those who are chronically impaired by alcohol or have a history of substance abuse do not meet the personal competencies required for admission and matriculation.

The practice of pharmacy requires the performance of specific functions that fall into five broad skills categories:

**Observation Skills**
Candidates must be able to observe lectures, demonstrations and experiments in all types of settings. A candidate must be able to observe a patient’s condition and elicit information using appropriate physical assessment techniques in order to evaluate, recommend, and initiate therapy. Pharmacy practice requires the ability to visually interpret prescription and medication orders and accurately distinguish one produce from another.

**Communication Skills**
Candidates must be able to communicate effectively in both academic and health care settings. This requires the ability to understand, write and speak fluent English. The candidate must also be able to recognize nonverbal communication cues.

**Motor Skills**
Candidates must possess both fine and gross motor skills necessary to fulfill all types of medication orders, to utilize diagnostic equipment for patient assessment, and to deliver or administer patient therapies. Patient therapies include, but are not limited to, immunizations and cardiopulmonary resuscitation. Candidates must be able to use pharmacy equipment, technologies and computer-based information systems. Candidates must have sufficient physical stamina to complete the rigorous didactic, laboratory, and clinical experiences, which consist of long periods of sitting, standing or moving.

**Interpretative, Conceptual and Quantitative Skills**
Candidates must be able to utilize learning techniques that will allow mastery of the pharmacy curriculum when delivered through a variety of modalities including didactic instruction, group-based learning, independent learning, projects, reports, experiential training, and computer assisted learning. Candidates must demonstrate a fundamental and continuing ability to use analytical reasoning independently and in collaboration with others to assimilate knowledge, solve problems and explain health care situations. The candidate must be able to use information to develop appropriate drug therapy and monitoring plans in a reasonable amount of time.
Behavioral and Social Skills

Candidates must possess the emotional health required for full utilization of their intellectual abilities, the exercise of good judgment, and the prompt completion of all academic and patient care responsibilities. The candidate must demonstrate professional and ethical demeanor appropriate to his/her educational level and the ability to work in an interprofessional environment. Candidates must also be able to adapt to changes, function in the face of uncertainty, display flexibility and be able to ensure prompt and safe completion of all responsibilities. Compassion, integrity, interpersonal skills, motivation and concern for others are humanistic qualities that will be assessed during the admissions process.

The Doctor of Pharmacy program, along with all other programs at Western University of Health Sciences, shares a commitment to develop creative ways of opening the PharmD curriculum to competitive, qualified individuals with disabilities. In doing so, however, the PharmD degree program must maintain the integrity of its curriculum and preserve those elements deemed essential to educating candidates to become effective pharmacists.

Ability-Based Outcomes

The faculty of the College has defined a set of minimal, concise, program-level ability-based outcomes (ABOs) for the Doctor of Pharmacy Program at Western University of Health Sciences. Graduates from our Doctor of Pharmacy Program are expected to be able to provide pharmaceutical care at the level of an entry-level pharmacist. As such, these ABOs are developed for generalist, entry-level pharmacists who are able to deliver high quality pharmaceutical care.

The ABOs were developed with consideration of the mission of the College of Pharmacy: “Educating future pharmacy professionals to serve the health care needs of society and improve the quality of patient care through science, caring and humanism.”

ABOs define the knowledge, skills and attitudes that student pharmacists must develop in order to practice competent pharmaceutical care. They provide the minimal set of abilities that a student should master during his/her education and training within our Program. These ABOs are consistent with current accreditation standards and other professional standards, guidelines and codes. They provide the basis upon which the Doctor of Pharmacy curriculum and student competency will be assessed.

The ABOs are categorized into 5 domains as follows:

- **Domain I**: Establish a Professional Identity and Ethical Behavior
- **Domain II**: Provide Patient-Specific and Population-Based Pharmaceutical Care
- **Domain III**: Apply Scientific Foundations to Pharmacy Practice
- **Domain IV**: Communicate and Educate Effectively
- **Domain V**: Manage Information Systems and Pharmacy Practice

Each domain has been further developed to provide specific ABOs in each area.

Graduates of our Program should be able to perform the following specific ABOs upon earning a Doctor of Pharmacy degree from Western University of Health Sciences:
**Domain I: Establish Professional Identity and Ethical Behavior**

1. Act with honesty and integrity and at all times abide by the profession’s code of ethics.
2. Practice in a humanistic manner, demonstrating compassion, understanding and empathy.
4. Demonstrate professional, interpersonal and leadership skills.
5. Apply ethical principles when dealing with dilemmas that arise in the pharmacy practice setting.
6. Apply legal requirements in the practice of pharmacy.
7. Advocate on behalf of the patient’s best interest.
8. Actively participate in the pharmacy community through involvement in professional organizations and societies.
9. Demonstrate a personal commitment to social responsibility and service.
10. Demonstrate commitment to professional competence through maintenance of a professional portfolio, continuous professional development and life-long learning.

**Domain II: Provide Patient-Specific and Population-Based Pharmaceutical Care**

1. Develop a professional, caring and covenantal relationship with the patient.
2. Gather, assess and interpret patient information from the patient, the patient’s care-givers, and the medical record.
3. Identify, prevent and resolve actual and potential patient-specific drug therapy problems.
4. Design, implement, monitor, evaluate, and modify patient-specific, outcomes-based pharmaceutical care plans in cooperation with patients and other health care providers and in accordance with established, evidence-based standards of practice.
5. Provide consultation to patients on self-care, including the use of monitoring and diagnostic devices and non-prescription products.
6. Plan and perform ongoing patient evaluations, including patient assessment procedures and diagnostic tests in accordance with scope of practice, to identify and implement changes in the pharmaceutical care plan.
7. Administer medications, including biologicals, in keeping with the current scope of practice.
8. Refer patients to other health care providers when appropriate.
9. Identify, manage and report any unexpected adverse drug reactions to the prescriber and comply with any adverse drug reaction reporting programs.

10. Ensure that pharmaceutical care is provided in the context of patient-specific cultural, economic and quality of life factors, while balancing individual, health care system and societal needs.

11. Identify health needs of populations and develop strategies to improve the access to medications and health services.

12. Work collaboratively with other health professions to promote health improvement, wellness, and disease prevention for, patients, communities, and at-risk populations.

Domain III: Apply Scientific Foundations to Pharmacy Practice

1. Utilize current and emerging knowledge in molecular, biomedical and pharmaceutical sciences to improve drug therapy outcomes.

2. Based on pharmacological and biological principles, predict positive and negative medication actions for the purpose of identifying drug therapy problems and developing monitoring plans.

3. Compound safe and effective prescriptions (sterile and non-sterile) in conformity with all applicable federal and state laws and regulations based on knowledge of chemical and biopharmaceutical principles.


5. Accurately perform pharmaceutical calculations appropriate to the practice setting.

6. Relate knowledge of drug discovery, development and approval processes to the introduction of new drugs into clinical practice.

Domain IV: Communicate and Educate Effectively

1. Demonstrate compassion and cultural competency when interacting with others.

2. Demonstrate effective patient interviewing and counseling techniques.

3. Select and demonstrate effective and appropriate written, verbal and nonverbal communication skills in diverse settings and situations when collaborating with patients, care-givers and other members of an inter-professional health care team.

4. Develop and communicate an education plan for patients, including safe and appropriate use of medications, devices and adherence aids in order to promote adherence to pharmaceutical care plans and to improve outcomes.

5. Document significant observations of patient-pharmacist interactions in the patient care record, including: patient assessment, recommendations, education, care plans, and other planned or implemented actions.
6. Use communication and information technology effectively and appropriately.

**Domain V: Manage Information Systems and Pharmacy Practice**

1. Identify, retrieve, critically evaluate, interpret, synthesize, and manage professional, lay, and scientific literature from current, reliable sources of information, in a systematic, evidence-based manner.

2. Organize and provide drug information in a manner suitable for the recipient.

3. Develop a drug monograph suitable for presentation to a Pharmacy and Therapeutics Committee.

4. Design and conduct a medication use evaluation.

5. Select appropriate medication products based on pharmacoeconomic principles and policies, drug utilization data, and reimbursement issues within a health care system.

6. Collaborate with other health professionals in developing treatment guidelines and algorithms.

7. Develop, implement and assess disease prevention, health promotion and educational programs.

8. Establish a collaborative practice agreement with a physician.

9. Provide medication therapy management (or disease state management) services for patients with chronic health problems, such as: diabetes, hypertension, lipid disorders, asthma/COPD, heart failure, thrombosis, osteoporosis, smoking cessation, obesity, nutrition, pain.

10. Evaluate the medication safety provisions in any pharmacy practice setting to minimize medication discrepancies and errors, and establish a medication safety quality improvement program in accordance with the requirements of state and federal laws, regulations and accreditation standards.

11. Accurately and safely prepare, dispense and administer medications according to state and federal laws and regulations.

12. Recognize, prevent and address patterns of inappropriate drug use, including drug diversion.

13. Interpret policies of individual pharmacy benefit plans to resolve routine third-party prescription billing issues.

14. Demonstrate project management skills including project design, implementation and control.

15. Manage systems for acquisition, storage, preparation, and dispensing of medications and supervise technical personnel (technicians, assistants and clerks) who may be involved in such processes, according to accepted standards and regulations.

16. Apply management principles related to financial, inventory and resource management.
Admissions Policies and Procedures

Admission to the College of Pharmacy is on a highly competitive basis. Each year we receive many more applications than we can accommodate in our program. At WesternU, we retain smaller class sizes, offering you a closer relationship with your faculty and fellow student pharmacists. The College of Pharmacy is looking for individuals who add to the diversity of our student body, have excellent communication skills, demonstrate compassion, are dependable, exhibit dedication and determination, and display good judgment.

Application Requirements

The College of Pharmacy Admissions Committee will consider applicants with a minimum of two years of college (60 academic semester hours or 90 quarter hours) of pre-pharmacy study at an accredited college or university. The minimum cumulative pre-pharmacy and science grade point average requirement is 2.75. Grades of "C-" in any of the prerequisite courses are not accepted. Prerequisite courses are subject to review each year.

Candidates who have received a baccalaureate degree or higher will be considered more favorably than applicants who have fulfilled only minimum requirements. For the latest information, you should consult our web site at http://prospective.westernu.edu/pharmacy-pharmd/welcome-13/.

Applicants with Foreign Coursework

Applicants who wish to use coursework completed outside the United States must submit their transcripts for evaluation to a Western University of Health Sciences Approved Service at the candidate’s expense. A course-by-course evaluation is required and all coursework must be designated as undergraduate, graduate or professional. Western University only honors evaluations from one of the above services. The official evaluation must be included with the supplemental application packet.

International Students

International students and any other applicants who are not U.S. citizens and who are living in the U.S. should be prepared to provide proof of legal U.S. residency at the time of interview. Proof of legal U.S. residency is required prior to any offer of acceptance. For more detailed information, please visit our web page for International Students.
**Prerequisite Courses**

<table>
<thead>
<tr>
<th>Prerequisites</th>
<th>Duration</th>
</tr>
</thead>
<tbody>
<tr>
<td>College English</td>
<td>1 Semester</td>
</tr>
<tr>
<td>English Composition</td>
<td>1 Semester</td>
</tr>
<tr>
<td>Speech Communication</td>
<td>1 Semester</td>
</tr>
<tr>
<td>General Chemistry (w/ Lab)</td>
<td>2 Semesters</td>
</tr>
<tr>
<td>Organic Chemistry (w/ Lab)</td>
<td>2 Semesters</td>
</tr>
<tr>
<td>Human Anatomy</td>
<td>1 Semester</td>
</tr>
<tr>
<td>Human Physiology</td>
<td>1 Semester</td>
</tr>
<tr>
<td>Microbiology (Medical Microbiology is preferred)</td>
<td>1 Semester</td>
</tr>
<tr>
<td>Biochemistry *</td>
<td>2 Semesters</td>
</tr>
<tr>
<td>Calculus</td>
<td>1 Semester</td>
</tr>
<tr>
<td>Electives **</td>
<td>2 Semesters</td>
</tr>
</tbody>
</table>

* One semester each of Biochemistry and Molecular Biology may be substituted for Biochemistry prerequisite; lab is optional.

** Electives must be met from two of the three following areas: public speaking/debate, social sciences, or economics. No two electives can be taken from the same department.

- All advanced placement (AP) credit test scores that were previously accepted by the applicant’s undergraduate institution are acceptable.

- All prerequisite courses taken and AP credit test scores must be complete no more than ten years prior to the planned date of matriculation.

- Introductory level courses in the sciences are not accepted.

- If anatomy and physiology are combined, a minimum of five (5) semester units is acceptable. Anatomy and physiology must be taken from the anatomy, physiology, A&P, biology or zoology departments.

- We do not accept substitutions or waive any of the prerequisite courses.

- English as a Second Language (ESL) courses are not accepted for the English requirement. English courses must be taken from the English department.

- All prerequisite course work in progress must be completed no later than the spring semester or quarter immediately preceding matriculation.
• Summer session courses taken immediately prior to matriculation at WesternU are not accepted.

• Transfer of Credit, CLEP or Credit for Experiential learning is not recognized by the program.

**Standardized Examinations**

• Pharmacy College Admissions Test (PCAT) is not required.

• Test of English as a Foreign Language (TOEFL)

TOEFL is required for all applicants submitting course work from foreign schools. A minimum score of 213 for the Computer Based test or 79 for the Internet Based TOEFL (IBT) test must be submitted by March 1 prior to matriculation. TOEFL scores are valid for two years. For more information regarding the TOEFL test, please visit their website at [http://www.ets.org/toefl](http://www.ets.org/toefl).

**Exception:** The TOEFL exam will be waived for permanent and temporary residents of the United States who have completed the English and Speech prerequisites of the College from an accredited institution in the United States.

English courses taken from foreign countries whose native language is English will be accepted (e.g., Canada, Australia, Great Britain, New Zealand and the British West Indies).

**Recommendations**

Three letters of recommendation are required as part of the admissions application. Recommendation forms are available via PharmCAS (see below). The recommendations should state the nature and extent to which the recommender knows you and should elaborate on the applicant's attributes and abilities including communication skills, ethics, interpersonal skills, and motivation toward the profession.

**Application Procedures and Deadlines**

The Pharmacy College Application Services (PharmCAS) is the centralized application service for WesternU's College of Pharmacy. PharmCAS offers a web-based application service that allows applicants to use a single application and one set of materials to apply to multiple PharmD programs.

WesternU’s application deadline to apply to PharmCAS is **November 1**. Application materials must be complete and submitted to PharmCAS by the deadline. It can take approximately 4-5 weeks for PharmCAS to process application materials and forward them to Western University. To apply to PharmCAS, or to request an application, visit their website at [http://www.pharmcas.org](http://www.pharmcas.org).

In addition to the PharmCAS application, WesternU requires applicants to submit a supplemental application with three recommendation evaluation forms (provided by WesternU) and an application fee of $65.00. All application materials can be located on our website at [http://prospective.westernu.edu/pharmacy-pharmd/apply-13/](http://prospective.westernu.edu/pharmacy-pharmd/apply-13/). The supplemental application packet is due **November 1**. Applicants who do not submit all application materials by the deadline may not be eligible to continue in the admissions process. The minimum required GPA for consideration is 2.75 (overall) and 2.75 (sciences). A final evaluation will be completed upon receipt of your PharmCAS and
supplemental application. WesternU is not responsible for delays in mail delivery. We strongly encourage you to apply early.

Faculty in the College of Pharmacy will screen each applicant's admissions file to determine whether or not an applicant will be granted an on-campus interview. Candidates selected for an on-campus interview will be required to participate in an assessment of written and verbal communication skills. Interview sessions are conducted during the weekends (Saturdays) and, only under special circumstances, during the weekday. Decisions of the Admissions Committee regarding the admission of applicants to the Doctor of Pharmacy program are final.

Students admitted to the College of Pharmacy are required to pay a $500.00 enrollment deposit. Upon enrollment, this deposit is applied toward the tuition for the academic year. Persons who fail to enroll forfeit the entire deposit.

Transfers from Other Schools

Due to the unique nature of the curriculum, it is the general policy of the College of Pharmacy not to allow student transfers from other pharmacy programs.

International Post-Baccalaureate PharmD (IPBP) Track

Description of the IPBP Program

The WesternU College of Pharmacy offers a unique opportunity for American and/or foreign trained pharmacists with a bachelor’s degree (B.S. or equivalent) who wish to progress to the Doctor of Pharmacy (PharmD) degree. Applicants are admitted with advanced standing into the second year of our traditional PharmD curriculum, thereby by-passing the first year. The Doctor of Pharmacy degree awarded to the student in the international program is the same as those awarded to our students in the traditional PharmD program. Please refer to the PharmD section of the catalog for additional information on academic and student conduct policies and procedures.

Application Procedure

1. Original Admission Application Form (completed and signed).

2. Application Deadline: All application materials must be received or postmarked by October 1, for admission in the following academic year.

3. Application Processing Fee: Non-refundable application fee for $65 payable to Western University of Health Sciences.

4. Resume/Curriculum Vitae: Please provide a current resume or curriculum vitae, if available.

5. Bachelor of Science (or equivalent) in Pharmacy: Please provide a copy of your degree certificate and enclose it with your application.

6. Official Transcripts: Submit official transcripts from all schools attended in the United States and/or a valuation of your credentials from each college or university attended in a foreign country. Please see the list of foreign credentials evaluation services. Transcript evaluation must come directly from the evaluation service. Photocopies are not acceptable. The minimum GPA requirement for admission into the program is 2.5 on a 4.0 scale.
7. Personal Questionnaire: Please complete the questionnaire and enclose with your application. The questionnaire can be downloaded from the IPBP website.

8. TOEFL (Test of English as a Foreign Language): TOEFL, including essay, is required for all applicants submitting course work from foreign schools, and for all permanent or temporary residents of the United States. Exception: The TOEFL exam will be waived for students who have graduated with a confirmed baccalaureate or higher degree from a United States institution. A minimum score of 213 for the Computer Based test, 550 for the Paper Based test or 79 for the new Internet Based TOEFL test must be submitted by June of the year of matriculation. TOEFL scores are valid for two (2) years. TOEFL scores will not be waived for pending baccalaureate and/or higher degrees or pending naturalization appointments. Official scores must be sent directly from the Education Testing Services (ETS). Photocopies are not acceptable. For more information regarding the TOEFL test, please visit their website at http://www.toefl.org.

9. FPGEE (Foreign Pharmacy Graduate Equivalency Examination): FPGEE scores are not required for entry into the IPBP program.

10. Internal Assessment (IA): The Internal Assessment (IA) exam is mandatory for consideration of admission into the program. The exam scores are valid for one (1) year. Fee Information for IA Testing: The following fee structure will apply to all applicants (a) US $250 for online access to the IPBP study guide; (b) US $250 for IPBP exam. All checks must be payable to Western University of Health Sciences. Single payments of $500 are not accepted (see FAQ section on the University website for more information).

11. References: Three satisfactory recommendations (forms provided) from qualified individuals (not related to you) capable of evaluating your overall personality, professional enthusiasm and integrity. Each recommendation must be submitted in a sealed envelope that is signed over the seal by the recommender.

12. Verification of Employment (Optional): Letter(s) from current employer(s) verifying employment status. If self-employed, provide supporting documentation.

IA/Interview Guidelines
Upon successful completion of the above requirements, candidates may be invited for an interview session on or off-campus, based on satisfactory preliminary file evaluation. The IA examination will be conducted on the same day as the interview.

IA Examination
This exam serves as an entrance exam for admissions into the IPBP program. Scores from the test play a significant role in the overall admissions process (for more information visit our website at http://www.westernu.edu/xp/edu/howtoapply/ipbp_general.xml).

Oral Communication Skills
These skills will be evaluated during a personal interview session conducted by members of the admissions committee. Each interview session will be approximately 30 minutes in duration. The purpose of this exercise will be to determine your command of the English language as well as interpersonal skills.
Written Communication Skills

All candidates will be required to take a written essay test wherein a topic of general interest will be presented. Time allowed for this activity is approximately 45 minutes. The purpose of this exercise will be to assess your overall ability and effectiveness in reading, writing and comprehension of the English language.

Course Waiver Policy

Students accepted to the International Post-Baccalaureate PharmD program (IPBP) may be granted course waivers for all first year coursework in the PharmD program. The maximum number of credit hours that will be waived is 40 credit hours. Only credit hours relevant to the bachelor’s degree in pharmacy granted by the applicant’s institution may be used to waive first year PharmD course requirements.

Registration

All PharmD/IPBP students are required to register by the registration deadlines specified by the University Registrar. Registration dates are posted at: http://www.westernu.edu/registrar-online-information. Failure to register by the deadline may be grounds for administrative withdrawal. All students registering after the posted deadline will be assessed a $30.00 per business day late fee.

Full tuition and fees and all prior debts must be paid in full on or by posted deadlines each academic year. Matriculation is subject to the satisfactory completion of all academic requirements and payment of all outstanding debts to the University. The receipt of a final transcript(s) from all colleges/universities attended and a physical examination with documentation of required immunizations prior to registration are additional requirements for incoming students. Also, all students must show proof of current health insurance coverage by the deadlines provided by the University Registrar. This coverage must be maintained or in effect throughout the academic year. If there is no proof of current coverage, students will be automatically enrolled in the school sponsored insurance plan.

Attendance at Orientation is mandatory for all incoming first-year students.

Full-time/Part-Time Status

All students enrolled in at least one class/rotation are considered full-time students.

Time Limits

The Doctor of Pharmacy program is designed to be completed in four (4) years of full-time study. The requirements for the degree must be fulfilled within 6 years from the date of matriculation to the program.

Computer Technology

The College of Pharmacy requires that each enrolled student pharmacist have a notebook or laptop computer during class, after class hours and while on rotations. Laptop specifications can be found at: http://www.westernu.edu/bin/computing/laptop-requirements-COMP-CPM-CDM-Pharm-AH-GCBS-MSNE.pdf.

The College of Pharmacy also requires that first, second and third year student pharmacists have a classroom responder, approved by the College, which is to be purchased from the University Bookstore. Individual responders must be registered to only one (1) student. Classroom responders are electronic devices that will be used to enhance interactive learning in classrooms. The device will enable faculty to gauge student understanding of concepts, introduce more innovative teaching and assessment
methods, improve student involvement in learning, and facilitate classroom learning to become more dynamic. The responders will also be used to administer and score assessments. Therefore, student pharmacists are also required to bring responders to each class.

**Tuition and Fees**

In estimating costs for one academic year of study at WesternU's College of Pharmacy, you should include tuition and fees, laptop computer and printer, books and supplies, room and board, and other miscellaneous expenses. By action of the Board of Trustees, Doctor of Pharmacy tuition and fees for the 2013-2014 academic year (subject to change) are as follows:

<table>
<thead>
<tr>
<th>Amount</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>$45,810.00</td>
<td>Annual Tuition</td>
</tr>
<tr>
<td>$40.00</td>
<td>Student Body Fee</td>
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**Other Fees and Expenses**

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<thead>
<tr>
<th>Amount</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>$250.00</td>
<td>Remediation Examination Fee</td>
</tr>
<tr>
<td>$30.00</td>
<td>Registration Late Fee (per business day)</td>
</tr>
<tr>
<td>$350.00</td>
<td>Graduation Fee</td>
</tr>
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<td>$470.00</td>
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<tr>
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<tr>
<td>TBD</td>
<td>Breakage Fee (Replacement Cost)</td>
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**Financial Assistance**

All PharmD/IPBP students are eligible to apply for need-based financial aid provided they meet established criteria. For information, please write to the Financial Aid Office, Western University of Health Sciences, 309 E. Second Street, Pomona, California 91766-1854

**Academic Requirements**

Continued enrollment, program participation, and graduation are subject to satisfactory completion of all academic requirements and payment of all outstanding debts to the university. Attendance at orientations, White Coat activities, and commencement activities is mandatory for all students.

**Academic Advisement**

Students are assigned a faculty advisor which provides students the opportunity to develop sustained, individual advisement on academic and professional levels. Students may request a change of advisor, if needed, through the office of the Assistant Dean for Student Affairs (or his/her designee).

**Course Participation and Attendance**

Students are expected to be in class Monday-Friday from 8 am to 3 pm, unless the block schedule notes otherwise.

Students are required to participate in all assessed activities (assignments, exams, etc.). When a student must be absent, he/she must contact the Course Facilitator prior to the missed class. If unable to reach the Facilitator, the student must leave a voice-mail message, an e-mail message, or a message
with a staff support person or the Assistant Dean of Student Affairs that includes a contact telephone number.

WesternU publishes an annual list of federal holidays observed by the University. A student who requests time off for days other than those observed by WesternU must do so by completing the “Excused Absence” form and submitting it to the Course Facilitator a minimum of 5 school days before the start of the course in which the holiday falls. If the request is approved by the Course Facilitator, the student is responsible for any work missed on the date(s) absent. All assignments must be completed by the scheduled time. However, if the student fails to notify the Course Facilitator in the time frame noted above, the absence will be considered an unexcused absence, and no remediation will be permitted. The WesternU holiday schedule does not apply to students on Introductory Pharmacy Practice Experience – 2, Advanced Pharmacy Practice Experiences and on off-campus Advanced Electives. Students will follow the rotation site schedule on Introductory Pharmacy Practice Experience – 2, Advanced Pharmacy Practice Experiences and on Advanced Electives.

When a student misses an assessed course activity, or when a student must be absent from class for up to 3 days, accommodations for excused absences may be made. At the discretion of the course facilitator, an absence may be excused for students participating in approved professional development activities, in situations involving illness, or in other emergencies. Documentation of the reason(s) for the absence must be provided to the course facilitator upon return to class. A copy of this documentation will be forwarded to the Assistant Dean of Student Affairs for inclusion in the student’s file. The course facilitator/faculty will determine how the missed materials will be completed. If emergencies arise that require a student to miss more than one assessed course activity or more than 3 days of the class, the student may be required to retake the course.

The course facilitator is responsible for determining whether accommodations can be made. The course facilitator’s decision is final.

Examples of situations when accommodating absences may not be possible include (but are not limited to) the following:

1. **Missed team assignments:** An individual student may not be able to individually demonstrate mastery of course material without completing the assignment within the context of a team.

2. **Missed assessments of clinical skills:** An individual student may not be able to individually demonstrate mastery of clinical skills without the specific circumstances arranged within the course.

This policy also applies to students on IPPE/APPE/AE. These students are also governed by policies contained in the individual IPPE course syllabi or the *Syllabus of Advanced Pharmacy Practice Experiences* and by rotation-specific requirements.

**Independent Study**

Because of the unique and intensive nature of the College of Pharmacy’s curriculum, the collaborative teaching and learning processes among team members, and the sequencing of key courses, the Faculty does not believe that independent learning of core coursework meets the goals of the Doctor of Pharmacy program. In special cases, e.g. involving illness, reasonable accommodations
will be made to permit the student to continue in his/her course of study if possible. Additionally, the collaborative learning process among team members is a critical element of the curriculum. Students accepted into the program must understand that their grades require successful collaboration with team members. Independent study of courses in the core curriculum in the College of Pharmacy is not permitted either in summer or during the academic year.

Research Activities

Students in the College of Pharmacy are encouraged to participate in research under the direction of faculty advisor(s). Students with appropriate interests and academic preparation may participate in research as part of the elective program.

Pharmacy Intern License Requirement

All students are required to be licensed interns with the California State Board of Pharmacy during all phases of the experiential program (IPPE, APPE and AE). First year students are required to file a copy of their intern license application with the Assistant Dean of Student Affairs by the first Monday in October of their first year in the PharmD program. Students unable to obtain a valid pharmacy intern license by the deadline will not be permitted to begin any clinical practice experience. **Students found not eligible for an intern license by the State Board of Pharmacy will be dismissed from the PharmD program.** The California State Board of Pharmacy is a body independent of the College of Pharmacy. The College of Pharmacy assumes no liability for decisions made by the Board regarding the status of a student’s intern license. The Board of Pharmacy requires the College to inform them when a student is placed on academic suspension. The student should contact the CA State Board of Pharmacy directly for further information.

Student Performance Committee

The College of Pharmacy Student Performance Committee is charged with the following responsibilities: (a) to periodically review the academic achievement and comprehensive evidence of progress of all students who are pursuing the PharmD degree (particular attention will be given to students in academic difficulty as their grades are made available to the Committee by the Registrar and/or the Associate Dean for Academic and Student Affairs); and (b) to receive reports from the College Dean regarding any student whose professional or personal conduct is deemed unsatisfactory. Appropriate professional and personal conduct is defined by the University’s and College’s codes of professional conduct (refer to Standards for Professional Conduct below).

Academic Progression in the Didactic Curriculum

The Student Performance Committee will review each student’s progress at the end of each academic term. Students must complete all courses in a subordinate year of the program before they can progress to the next year in the program. In addition, students must complete all didactic courses successfully before they will be allowed to start the Advanced Pharmacy Practice Experience portion of the curriculum.

Eligibility to Participate in Advanced Pharmacy Practice Experiences (APPEs)

Students may not start an APPE until the Student Performance Committee has been notified that all courses have been successfully completed. The Student Performance Committee will ensure that students are academically eligible to begin APPEs. Students with less than a 2.75 cumulative GPA following the third year didactic term cannot begin the APPE portion of the curriculum and will automatically be placed on academic suspension (see “Academic Suspension,” below).
Progression to the Fourth Professional Year

Students must have completed at least two rotations successfully in their P3 year to progress to the fourth year of the program. As a general rule, no “off rotations” will be given during the first two APPEs. Exceptions to this policy will be considered on a case-by-case basis.

Graduation

A student will be recommended for the Doctor of Pharmacy degree if the student meets the following:

a. Is not on probation or suspension and has completed all prescribed academic and clinical requirements with a cumulative grade point average of or above 2.75 and has no outstanding grade of “I,” “NCR,” or “U”.

b. Has demonstrated no serious deficiencies in ethical, professional, or personal conduct, as defined in University Catalog, “General Academic Policies and Procedures” section, which would make it inappropriate to award the degree of Doctor of Pharmacy.

c. Has complied with all the legal and financial requirements of the University as stated in the University Catalog.

d. Has attended in person and participated in the Commencement ceremony at which time the Doctor of Pharmacy degree is conferred. Unless special permission has been granted by the Dean, each student must participate in their respective commencement ceremony. If the Dean grants special permission for excusal from commencement, the graduate may be required to present themselves to the Dean or their designee at another specified date to take their profession’s oath before their diploma will be released. Requests for excusal will only be granted for extenuating circumstances, such as a prior military commitment.

Students may participate in commencement activities provided they will complete all requirements of the program by December 31st of that calendar year. No student will receive his or her degree until the student has completed all requirements for graduation. Degrees will be dated as appropriate to completion date.

Standards of Academic Progress

Students are required to maintain a cumulative 2.75 grade point average (GPA) during the didactic portion of the curriculum. The academic year is divided into two academic terms with the first (fall) term consisting of courses offered between August and December and the second (spring) term consisting of courses offered between January and May.

The student’s cumulative GPA will be calculated at the end of each academic term. For the first and second years, an academic term is equal to a semester. For the third year, the academic “didactic term” includes courses PHRM 6301-6306, while the “APPE” term includes courses R1-R2.

Failure to Meet Standards – IPPE Rotation Actions

When a student receives a failing or incomplete (I) grade, the Associate Dean of Experiential Education and Professional Affairs or his/her designee will notify the Associate Dean for Academic and Student Affairs in a timely manner upon which the student will be placed on Academic Probation.
Students must repeat any rotation in which a failing grade is issued. The rotation must be repeated with a WesternU-paid, full-time faculty member. If the failing grade is earned in a rotation for which no WesternU-paid, full-time faculty member is available to serve as preceptor, the student will retake the rotation with a preceptor selected by the Associate Dean of Experiential Education and Professional Affairs. In the event that an “I” grade is converted into a failing grade, the terms and conditions governing the receipt of a first failing grade in an IPPE rotation will be followed.

Failure to Meet Standards – First APPE Rotation Actions

When a student receives a NCR or incomplete (I) grade, the Associate Dean of Experiential Education and Professional Affairs or his/her designee will notify the Associate Dean for Academic and Student Affairs in a timely manner. The student will be allowed to continue with their scheduled rotations, but will be placed on Academic Probation by the Associate Dean for Academic and Student Affairs.

Students must repeat any rotation in which an NCR grade is issued. The rotation must be repeated with a WesternU-paid, full-time faculty member. If the NCR grade is earned in a rotation for which no WesternU-paid, full-time faculty member is available to serve as preceptor, the student will retake the rotation with a preceptor selected by the Associate Dean of Experiential Education and Professional Affairs.

In the event that an I grade is converted into a NCR grade, the terms and conditions governing the receipt of a first NCR grade in an APPE rotation will be followed. Rotations that need to be repeated should, where possible, be made up during the student’s designated “off rotation.” Should a student need to make up a rotation after a designated “off rotation” has been completed, the rotation must be made up after the scheduled Advanced Elective Rotation. No “split” rotations will be allowed. To monitor the quality of a student’s performance on APPEs, all students must complete at least one APPE with a voting, full-time faculty member of the College. If a student fails this required APPE assignment, he/she must complete another APPE successfully with another voting, full-time faculty member.

Failure to Meet Standards – Second APPE Rotation Actions

In the event that a student receives a NCR grade for a second APPE rotation, the student will be placed on academic suspension and required to repeat the entire APPE rotations sequence (6 rotations).

Students will be able to re-start the APPE rotation sequence only once. Thus, students repeating the APPE rotations sequence cannot fail any rotation. Receipt of an NCR grade for any rotation after re-starting the APPE sequence will result in permanent dismissal from the PharmD program.

Failure to Meet Standards – Advanced Elective Rotation

When a student receives a NCR or an Incomplete grade (I) in the 16-week Advanced Elective (AE) program, the Associate Dean of Experiential Education and Professional Affairs or his/her designee will notify the Student Performance Committee in a timely manner. If a student receives a grade of NCR for an Advanced Elective, he/she will be placed on academic probation by the Associate Dean for Academic and Student Affairs. The student must repeat the AE in which the NCR grade was issued with a WesternU paid, full-time faculty member at a time that is mutually agreed upon by the Associate Dean of Experiential Education and Professional Affairs and the preceptor. If this NCR grade is earned in an AE for which there is no WesternU full-time, paid faculty member to serve as preceptor, the student will complete the AE with a preceptor selected by the Associate Dean of Experiential Education and Professional Affairs at a time that is mutually agreed upon by the Associate Dean of Experiential
Education and Professional Affairs and the designated preceptor. Students who receive a NCR grade for an AE will not be eligible to graduate until the AE is repeated successfully and a grade of CR is recorded.

**Academic Probation**

The Associate Dean for Academic and Student affairs will automatically place students on academic probation under the following circumstances (see University Catalog section on General Academic Policies and Procedures in the Overview section):

1. A student earns a failing (“U”) grade in any didactic course.

2. A student’s cumulative GPA is below 2.75 at the end of any academic term. Students will be given one academic term to raise their cumulative GPA to the required standard of 2.75 or above.

3. A student does not achieve the required 2.75 cumulative GPA for two consecutive academic terms. Students placed on academic probation for having less than 2.75 for two consecutive terms will be required to repeat all coursework in which they received a C or U grade for the same two consecutive terms for which the student’s cumulative GPA was below 2.75.

4. A student’s cumulative GPA is below 2.75 at the end of the third year didactic term. Students achieving a less than 2.75 GPA at the end of the third year didactic term (completion of PHRM 6306) will be required to repeat all coursework in the third year didactic term in which they received a C or U grade, until their cumulative GPA is raised to 2.75 or above. Students will be placed on academic suspension until such time as the repeat coursework is offered (see University guidelines). Additionally a student cannot begin the APPE portion of the curriculum until they have raised their GPA to 2.75 or greater.

5. The first time a student receives a failing grade for IPPE1 and/or 2, or any APPE rotation (see section above regarding Failure to Meet Standards – First APPE Rotation Actions).

6. A student receives a failing (“NCR”) grade during the Advanced Elective rotation (see section above regarding Failure to Meet Standards – Advanced Elective Rotation Action).

Students in Year 2 (P2) of the professional program must complete the IPPE2 (PHRM 6999) summer rotation requirement even if they have failed the didactic component that would require them to repeat the year.

Students successfully completing IPPE-2, IPE 5000, IPE 5100, IPE 6000 and/or IPE 6100 (i.e., received a CR grade) will not have to retake those requirements when repeating courses or returning from a leave of absence.

The Associate Dean will notify the student in writing of the action. When a student has been placed on probation, the following apply:

1. The student may not hold office in any University or College organization.

2. Within 2 weeks of the date that the student receives notification of his/her academic probation, the student must meet with:
3. The Learning Enhancement and Academic Development (LEAD) office staff to develop an academic action plan. The student must obtain a signature from the LEAD office documenting agreement on the action plan.

4. The student's faculty advisor to review the student's proposed improvement plan. The student must obtain a signature from the faculty advisor documenting agreement on the action plan.

5. The Associate Dean of Academic and Student Affairs to provide the required signed documentation that the prior two meetings occurred.

6. The Assistant Dean of Student Affairs, if it is determined that non-academic issues (e.g., illness, family emergency, death or acute or chronic illness of an immediate family member, divorce or other personal family concerns) are impacting academic performance.

In addition, students are encouraged to seek regular assistance from any University or College resource deemed necessary to improve his or her academic performance over the duration of probation.

Financial Aid Warning Policy (Title IV and Title VII)

If a student is not making Satisfactory Academic Progress (SAP) they may be placed on “Financial Aid Warning” status for the next payment period and continue to receive financial aid for that period. Financial Aid is any financial assistance offered to the student for paying for their education, such as loans, scholarships, Federal Work-Study, grants and stipends (judged on the criteria of the stipend). Students who fail to make SAP by the end of the payment period lose Financial Aid eligibility.

It is the policy of the Financial Aid Office (FAO) that once a student has been placed on academic probation for not meeting SAP standards as defined by the college, the FAO will automatically place the student in a Financial Aid Warning status. During the next academic term, if the student does not meet SAP standards and the college places the student on academic suspension, the student will no longer be eligible for financial aid. If the student appeals the academic suspension and the appeal is approved, financial aid will be reinstated. If the student is directed to audit courses, those courses will not be covered by financial aid.

Veterans

Veterans who fail to maintain satisfactory progress for more than two terms or rotations will not be certified to receive any Veterans’ benefits until they have corrected the situation and are making satisfactory progress.

Tutorial Assistance Program

A Tutorial Assistance Program (TAP) has been established to assist students experiencing academic difficulty. Students will be recommended for this program by a faculty advisor or professor. Students may self-identify to TAP to receive assistance. The tutors will be chosen on the recommendation of the faculty in each discipline. Group tutoring is the methodology most used by the TAP department. For assistance, contact the Learning Enhancement and Academic Development Office (LEAD).

Remediation for Courses in the Didactic Curriculum

A student who receives a U grade may be eligible to remediate. Remediation is not a substitute for full course participation. To be eligible for remediation, students must have taken all exams, completed
all course assignments and participated in all graded activities, unless excused (refer to Course Participation and Attendance section). Students who have not completed all course assessed activities are not eligible for course remediation.

Remediation should include a joint (faculty and student) diagnostic evaluation of the student’s weaknesses, a self-directed plan for strengthening the student’s weaknesses with periodic reviews in consultation with the facilitator, followed by a comprehensive assessment, as recommended by the course facilitator, over the entire course material.

The Student Performance Committee, in consultation with the course facilitators, will set the remediation schedule. First and second year students will have their remediation exams scheduled during the month of June. Third year students will remediate failed courses prior to beginning the Advanced Pharmacy Practice Experiences (APPE) and will be required to take R-1 as an “off” rotation. Students will be informed of the remediation dates in writing with at least 72 hours advance notice. Students who require remediation but are unable to make themselves available on the designated examination date will not be allowed to progress in the curriculum and will be placed on academic suspension. They will be required to repeat the course at the next regular offering.

Students who require remediation are encouraged to share their June/February plans with the appropriate course facilitators prior to the remediation dates being determined. Once the remediation dates are confirmed, there will be no changes made to accommodate student requests. There will be no make-up remediation examinations.

Students must pass the remediation examination and all other required assignments in order to successfully pass the course. The $250 remediation examination fee must be paid to the Bursar’s Office prior to the remediation examination date.

After completing a remediation examination, the highest grade that a student will be able to achieve for the course will be a “C”.

Academic Suspension
As per University guidelines (see section 12 of the General Academic Policies and Procedures, Overview), students who are deemed unable to continue in the curriculum due to inadequate performance and are required to repeat a given academic year or portion thereof, will be placed on academic suspension through such time as they can resume their studies by starting the courses the student is required to repeat. Throughout the time the student is on academic suspension, he or she is also on academic probation, and remains on academic probation until all coursework has been satisfactorily remediated.

Permanent Dismissal for Academic Reasons
A student will be permanently dismissed from the program if he/she fails to accomplish course learning objectives and/or fails to achieve academic expectations even after granted the opportunity to repeat coursework. A student will be permanently dismissed when:

1. A student earns a failing grade (“U”) in any course that the student is repeating.

2. A student fails to earn a semester GPA of 2.75 by the end of the first term of repeated coursework.
3. A student fails to earn a cumulative GPA of 2.75 at the end of two consecutive academic terms for which the student was placed on probation previously.

4. A student currently repeating coursework due to sub-standard academic performance is found in violation of the College’s Standards for Professional Conduct at a level that merits course failure or repeating the course.

5. A student fails (receives an “NCR” grade) any APPE rotation after the student has been required to re-start the APPE rotation sequence due to failure to meet performance standards for the APPE rotations (see section above regarding Failure to Meet Standards – Second APPE Rotation Actions).

6. A student fails any IPPE (1 and/or 2) rotation after the student has been required to re-start the IPPE rotation sequence due to failure to meet performance standards for the IPPE rotations.

Standards for Academic and Professional Conduct

Academic Honesty
Academic honesty includes, but is not limited to, maintaining original assessment answers after the graded examination has been returned, maintaining honesty during assessments, bringing only authorized resources to exams or other assessed exercises, signing only your name on attendance records or team examinations/assignments, and giving proper credit when citing another person’s work.

Violations of Academic Honesty include all forms of cheating and plagiarism.

Cheating
Cheating is the unauthorized use of information or study guides in any academic exercise. The methods of cheating are varied and well-known. Cheating includes, but is not limited to:

- Copying from others during an assessment
- Sharing answers for a take-home assessment
- Using illegal notes during an examination
- Taking an assessment for another student.
- Asking or allowing another student to take an assessment for you.
- Tampering with an assessment after it has been corrected, then returning it for more credit than deserved.

Plagiarism
Plagiarism is academic theft. It refers to the use of another’s ideas or words without proper attribution or credit. An author’s work is his/her property and should be respected by appropriate documentation. Credit must be given:

- For every direct quotation.
• When a work is paraphrased or summarized in whole or in part in your own words.

• For information that is not common knowledge. Information is common knowledge when it appears in several sources about the subject.

There is no distinction between those who violate rules of academic honesty and those who allow it to occur.

**Professional Conduct**

Professional conduct includes, but is not limited to, all items as appropriate under the “Professional Standards” section. All students are expected to maintain the highest standards of professionalism at all times.

**Professional Standards**

**Professional Dress and Behavior**

Students are expected to dress and act appropriately. Students are expected to follow all rules established by faculty and preceptors in the classroom, during clinical skills labs, at practice sites, and during College-sponsored events. When requested, students should use professional dress, such as wearing their white coats.

**Respect**

Students should show respect to their fellow classmates, staff, faculty, colleagues and their patients. As future professionals, each student must assume personal responsibility for honesty and integrity.

**Professionalism**

A more comprehensive description of professionalism expectations for student pharmacists includes:

1. **Altruism**
   
   a. I will place my patients’ best interest above all others.
   
   b. I will demonstrate unselfish concern for the welfare of others.
   
   c. **Accountability**
   
   d. I will acknowledge my limitations and seek help from an appropriate source when my knowledge, skills, abilities, or judgment is inadequate for the academic or professional circumstance.
   
   e. I will assume responsibility for my actions.

2. **Excellence**

   a. I will exhibit my best effort in all academic and professional activities and endeavors.
   
   b. I will commit to continual self-assessment, development and lifelong learning.
3. Duty
   a. I will maintain a professional appearance when represented as a student pharmacist.
   b. I will come prepared and adhere to established times for classes, assessments, laboratories, rotations and meetings.
   c. I will utilize time efficiently and will adhere to established deadlines for projects and assignments.
   d. I will acknowledge academic priorities over professional and personal activities.
   e. I will consult with faculty when professional or personal activities conflict with academic responsibilities and give due consideration to their recommendations.
   f. I will be present and will actively contribute in all team activities.
   g. I will formulate constructive evaluation of others’ performance and will communicate it in a professional manner.
   h. I will demonstrate respect for patient privacy and maintain strict patient confidentiality.

4. Honor and Integrity
   a. I will honor my commitments to others.
   b. I will act with honesty and integrity at all times.
   c. I will adhere to Western University of Health Sciences’ standards of academic honesty (see University catalog).
   d. I will adhere to the profession’s code of ethics for pharmacists.
   e. I will perform all projects and assignments in an objective manner and will give credit to others who were actively involved in the development of ideas and outcomes.

5. Respect for Others
   a. I will use professional language at all times when communicating as a student pharmacist.
   b. I will maintain a professional attitude/demeanor at all times when communicating as a student pharmacist.
   c. I will display active listening and show regard in the presence of classmates, faculty, staff, patients, and healthcare professionals.
   d. I will display sensitivity towards other cultures, races, religions, genders and sexual orientations.
e. I will contribute to an environment conducive to learning.

f. I will display a positive attitude when receiving constructive feedback.

g. I will strive to resolve conflict in a respectful manner.

h. I will exhibit empathy, concern, and respect for my patients and their representatives.

i. I will interact with peers, healthcare professionals and patients with integrity and respect.

Reporting Violations

Responsibility of the Student

Because there is no distinction between those who violate rules of academic and professional honesty and those who allow it to occur, students have a professional obligation to report violations. Violation of the Standards of Academic and Professional Conduct should first be reported to those closest to the source of the violation; this may include course faculty, course facilitators, faculty advisors or the Office of the Dean. When appropriate, students may report a witnessed violation to the Assistant Dean of Student Affairs, who will maintain the student’s anonymity.

Responsibility of the Assistant Dean of Student Affairs

Upon receiving a report of academic or professional misconduct from a student, the Director of Student Services will report this violation to the appropriate person involved, course facilitator or Office of the Dean, while maintaining student anonymity.

Academic Misconduct

Responsibility of the Faculty

When faculty observe or are made aware of a violation, they have the authority to handle an incident directly. The following list is meant to be illustrative rather than exhaustive as all faculty reserve the right to impose sanctions based upon their good judgment of the given situation:

- Verbal reprimand and/or moving a student during an assessment
- No credit given for the question or assessment
- Assignment of additional work
- Re-examination
- Lowering the course grade.
- Assignment of a “U” grade for the course.

If the faculty member imposes any or all of these remedies, he or she will notify the student and submit an “Academic and Professional Misconduct Report Form” to the Office of the Dean. If a student receives a “U” grade as a result of academic misconduct, the student is not eligible for course remediation and must repeat the course during the next academic year.
Professional Misconduct

Responsibility of the Faculty and Staff

When faculty or staff observe or are made aware of a violation, they are to complete and Academic and Professional Misconduct Report Form. The completed Form is submitted to the Dean.

The following list of sanctions that can be implemented in established cases of Professional Misconduct is meant to be illustrative rather than exhaustive:

- Write a formal letter of apology.
- May not hold office in any College or University organization for one academic year.
- Complete additional professional activities.
- Write a 10-page report on professionalism and professional conduct in the pharmacy/health care environment.
- Be subject to a conduct suspension.

Responsibility of the Dean

The Dean has the sole authority to adjudicate and impose any sanctions on all academic and professional conduct issues. Once the Dean receives an “Academic and Professional Misconduct Report Form” he/she determines if the issue should be dealt with unilaterally by the Dean or referred to the Student Performance Committee. If the issue is referred to the Student Performance Committee, the Dean will adjudicate and impose any sanctions on the case upon receiving the Committee’s final recommendation. The student may appeal the action of the Dean following policies listed in the General Academic Policies and Procedures section in the Overview Section of this Catalog.

Responsibility of the Student Performance Committee

Upon preliminary investigation, the Student Performance Committee may request that the issue(s) be referred back to the Dean with a rationale as to why this would be a more appropriate venue to address the issue(s). When the Student Performance Committee believes that a case warrants formal investigation, the Committee will appoint a Student Conduct Subcommittee, which shall consist of at least one member of the Student Performance Committee, who shall serve as Chair, two voting faculty members not on the Committee, and one student representative. All members of the Student Conduct Subcommittee have full voting privileges.

As future professionals, each student must assume personal responsibility for honesty and integrity.

When dealing with allegations of student violations of professional conduct, the Student Performance Committee follows the following procedure.

1. The Committee Chair will notify the student in writing of the specific charges and the time and date of the hearing where the charges will be considered by the Committee/Subcommittee.

2. The notice shall state whether expulsion from the University may be considered if the charges are found to be true.
3. If a member of the Student Performance Committee/Subcommittee has a conflict of interest regarding the allegations, the chairperson of the Committee/Subcommittee shall recuse the member and will appoint another faculty member to serve as a member of the Committee/Subcommittee for the purposes of hearing and deliberating on the allegations.

4. Except as noted below, the meeting to consider the charges will be closed to all individuals not directly involved.

5. The Committee/Subcommittee may exclude witnesses except during the time they are testifying.

6. If the notice of the hearing states that expulsion from the University will be considered if the charges are found to be true, or if the circumstances warrant, the student may request permission for a mentor to appear at the meeting to assist the student.

   a) The mentor is normally limited to advising the student and is not permitted to examine witnesses or otherwise participate directly in the proceedings. However, the Committee/Subcommittee may permit the mentor to participate directly where special circumstances are shown that warrant such participation.

   b) The student shall make any request for a mentor to appear or participate in writing, and the request must identify the mentor the student desires and provide any additional information the student deems relevant to the request.

   c) If the allegation involves activities that may result in criminal charges being filed, the student’s request for a mentor must be granted.

   d) In other circumstances the Chair of the Committee/Subcommittee will normally inform the student within three business days of receipt of the request whether the mentor will be permitted to attend the hearing.

7. If the student requests, the specific charges will be read to the student by the Chair of the Committee/Subcommittee. If the charges are not read, the charges will be deemed to be those specified in the notice of the hearing.

8. The student will be permitted the opportunity to testify and present evidence and witnesses on his/her behalf.

9. In addition, the student, as well as any witnesses, is subject to questioning by members of the Committee/Subcommittee.

10. The student will also be provided the opportunity to question witnesses called by the Committee/Subcommittee. If the Subcommittee agrees to consider affidavits, declarations and other written statements and documents as part of its deliberations, the student will be provided copies of any such documents at least two days prior to the hearing.
11. If the student desires to present any written documents, these documents must be provided to the hearing panel at least two days prior to the hearing. The student is responsible for presenting all evidence he/she deems relevant at the scheduled hearing unless such evidence cannot be presented at that time due to circumstances beyond the student’s control. Should such be the case, the Chair of the Committee/Subcommittee, at his/her discretion, may grant a continuation of the hearing if warranted.

12. Similarly, if a party or witness called by the Committee/Subcommittee is unavailable, but whose testimony is considered important to the hearing or due to other circumstances, a continuation of the hearing may also be granted.

13. The Committee/Subcommittee shall determine whether, based on the evidence presented, it is more likely than not that the charges made are true.

14. If a Subcommittee reviewed the case, the Student Conduct Subcommittee will forward their findings and recommendations to the Student Performance Committee for vote.

15. The Student Performance Committee will review the recommendation and then forward the original recommendation, along with a statement of concurrence or of an alternate recommendation, to the Dean.

16. The Dean will affirm, deny or send back to the Committee for further deliberation.

**Maintenance of Records**

Student Professional Conduct records will be maintained by the Office of the Dean of the College of Pharmacy for seven years or until the student for whom they pertain graduates, unless the Dean determines there is good reason to retain the records longer.

**Conduct Suspension**

Conduct suspension may be imposed as a result of conduct/behaviors that are deemed by the Student Performance Committee to be adversely affecting the student’s pharmacy school performance and ability to engage the subject material, but the behavior-conduct does not, in the opinion of the Committee, warrant a recommendation for dismissal. The student would be recommended for conduct suspension for a period of time deemed appropriate by the Student Performance Committee and/or Dean, but generally would not exceed one academic year or until the conditions that provoked the conduct suspension in the first place are satisfactorily remedied in the opinion of the Student Performance Committee/Dean. In cases where the Student Performance Committee needs external assessments to make a final decision, they may recommend to the Dean that the student obtain psychological, medical and/or educational assessments (See Section 14 of the General Academic Policies and Procedures).

**Appeal Process**

Students may appeal decisions regarding suspension, student conduct, academic progression/promotion and graduation according to the regulations listed in the General Academic Policies and Procedures section in the Overview section of the Catalog.
Issues/Dispute Resolution Procedure

When an issue or dispute arises between students, the issue/dispute resolution process starts with communication among the involved students. If a satisfactory resolution is not arrived at that level, the matter should then be addressed with the course facilitator or the faculty advisor. If the problem is not resolved at the faculty advisor/course facilitator level, the matter should be brought to the Assistant Dean for Student Affairs, followed by the Dean and then the Provost/COO. If the matter has not been resolved at those levels, the final arbiter is the President.

When an incident arises involving a faculty member, the first step in the issue/dispute resolution process is discussion with the faculty member. If the matter is not satisfactorily resolved at that level, then the matter should be referred to the Department Chair, Dean, and Provost/COO, in that order. The final arbiter is the Board of Trustees.

When an incident arises involving a staff member, the dispute resolution process begins with the Department Chair, followed by the Dean. The Office of Human Relations is the final arbiter.

Failure to follow this sequence of steps will only serve to delay the appropriate resolution of the issue or dispute as the matter will only be referred back to the correct level in this chain of responsibility.

If students wish to file a complaint with the College of Pharmacy regarding a faculty or staff member or another student, they may also do so by completing the “Student Complaint Form” that is located on Blackboard in the Pharmacy Student Services course in the course documents.

Accreditation Council for Pharmacy Education (ACPE) Policy on Complaints

Students have a right to file a complaint with the Accreditation Council for Pharmacy Education (ACPE) if they feel the College of Pharmacy and/or any College of Pharmacy personnel is in violation of the accreditation standards or policies established by ACPE.

For further information, please see the following link:

http://www.acpe-accredit.org/students/complaints.asp.

Evaluation and Grading

Students are required to meet a specified set of outcome objectives in each course as described in each course syllabus/block plan. The course facilitator will provide students with the learning objectives, instructional methods, assessment strategies, schedules, and the grading criteria, in writing, prior to the beginning of each course. Achievement of course learning objectives will be based on performance on individual quizzes, examinations, and on any other graded assignments or criteria, including team or independent Pass/No Pass assessments established by the course facilitator.

Grading Scales

Course grades, including those for Introductory Pharmacy Practice Experience 1 and 2 [IPPE-1A (PHRM 5998), IPPE-1B (PHRM 5999) and IPPE-2 (PHRM 6999)] will be assigned as follows:

<table>
<thead>
<tr>
<th>Grade</th>
<th>Equivalent</th>
<th>GPA Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>90-100%</td>
<td>4.00</td>
</tr>
<tr>
<td>B</td>
<td>80-89%</td>
<td>3.00</td>
</tr>
<tr>
<td>C</td>
<td>70-79%</td>
<td>2.00</td>
</tr>
<tr>
<td>U</td>
<td>Less than 70%</td>
<td>0.00</td>
</tr>
</tbody>
</table>
Grading criteria for the Introductory Pharmacy Practice Experiences (IPPE-1A, IPPE-1B, and IPPE-2) are described in their individual course syllabi. Grading for the Advanced Pharmacy Practice Experiences (APPEs) is described in detail in *The Syllabus for Advanced Pharmacy Practice Experiences*.

Grades for Advanced Pharmacy Practice Experiences (APPEs) /Advanced Electives (AE) grades will be assigned as follows:

<table>
<thead>
<tr>
<th>Grade</th>
<th>Equivalent</th>
<th>GPA Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>CR</td>
<td>Credit</td>
<td>N/A</td>
</tr>
<tr>
<td>NCR</td>
<td>No Credit</td>
<td>N/A</td>
</tr>
</tbody>
</table>

Grading for the Interprofessional Education (IPE) courses (IPE 5000, IPE 5100, IPE 6000, IPE 6100) is described in their individual course syllabi. Grades in these courses will be assigned as follows:

<table>
<thead>
<tr>
<th>Grade</th>
<th>Equivalent</th>
<th>GPA Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>CR</td>
<td>Credit</td>
<td>N/A</td>
</tr>
<tr>
<td>NCR</td>
<td>No Credit</td>
<td>N/A</td>
</tr>
</tbody>
</table>

Administrative Grades

<table>
<thead>
<tr>
<th>Grade</th>
<th>Equivalent</th>
<th>GPA Points</th>
</tr>
</thead>
<tbody>
<tr>
<td>AU</td>
<td>Audit</td>
<td>N/A</td>
</tr>
<tr>
<td>I</td>
<td>Incomplete</td>
<td>N/A</td>
</tr>
<tr>
<td>W</td>
<td>Withdrawal</td>
<td>N/A</td>
</tr>
<tr>
<td>M</td>
<td>Missing</td>
<td>N/A</td>
</tr>
</tbody>
</table>

Incomplete grade (I)

A course facilitator has the option of assigning an Incomplete Grade under the following circumstances:

1. A student has a verifiable “Excused Absence” for missing an assessed activity due to a verifiable “Excused Absence” (see Course Participation and Attendance).

2. Course facilitators are responsible for identifying the most appropriate method(s) for assessing students’ mastery of specific skills and/or topics. For some assessed activities, course facilitators may specify within a course block plan that sub-standard performance on specific assessed activities can result in “Incomplete” grades. Typically, this will apply to skills for which students must demonstrate mastery before proceeding to more advanced topics or skills.

The following describes the process necessary for resolving an incomplete grade.

The student is responsible for meeting with the course facilitator to receive direction regarding what is necessary to resolve the incomplete grade. In a meeting between the student and the course facilitator issuing the “I” grade, an Incomplete Contract Form must be completed. The form is available from the College of Pharmacy Academic and Student Affairs Office or from the Registrar’s intranet site. The Contract Form stipulates the requirements of the student that are needed to remove the incomplete grade. The original form will be kept by the course facilitator. Copies of the form must be
sent to the student, to the College of Pharmacy Assistant Dean of Student Affairs (for inclusion in the student’s file), and to the Registrar’s Office.

The grade of “I” is not to be awarded in place of a failing grade or when the student is required to repeat the course. In such a case, a grade other the “I” must be assigned. The incomplete (I) grade remains on the transcript. In the event that an “I” grade is carried into a new academic year the Dean may conditionally promote the student to the next academic year in the program pending the satisfactory clearance of the incomplete grade.

If a student fails to comply with the conditions outlined in the notification, or fails to satisfactorily convert the incomplete grade to a passing grade, the incomplete grade will be converted to a U grade (if the “I” grade was issued in a didactic course) or to an “NCR” grade (if the “I” grade was issued in a rotations course). The student will be placed on academic suspension and will be required to repeat the course at the next regular offering.

In the event that the I grade is converted to a “U” grade; the student’s GPA will be recalculated. If there are any consequences for academic progression, the consequences will be effective the same day the incomplete grade is changed (see Failure to Meet Standards).

Grade Reports
Official grades are turned in to the Registrar by the faculty of the College of Pharmacy, at which time the online student records system, BanWeb, is updated. Official grade reports and unofficial transcripts will be available on the BanWeb student records system throughout the academic year.

Credit Hour Calculation
The College of Pharmacy calculates credit hours as follows:

- 16 hours of lecture = 1 credit hour
- 32 hours of workshops/discussions/laboratory = 1 credit hour
- For IPPE courses (PHRM 5998, 5999 and 6999), 40 contact hours = 1 credit hour
- For APPE (PHRM 7000-level courses) and AE (PHRM 8400), 30 contact hours = 1 credit hour

Course Grade Appeals
Faculty has the expertise and authority to render judgment regarding the quality of a student’s academic work. The course facilitator has final responsibility in assigning grades to activities assessed within a course. A grade appeal is to be used as a last resort after every effort has been made between student and faculty to resolve grading questions or disputes.

Course Grade Appeals will only be considered when they meet the following required criteria:

1. Only the final course grade may be appealed. The course facilitator has final decision regarding:
   a. Any questions or concerns related to grades assigned to specific course assessments.
   b. Any questions or concerns relating to specific test/exam questions.
c. Any questions or concerns related to the interpretation of grading criteria for assessing mastery of course material.

2. The course grade is inaccurate or biased and the student has evidence supporting one of the following circumstances:

   a. There was prejudice or discrimination resulting in the unequal application of grading standards.

   b. The grade assigned does not correspond with or conflicts with the course syllabus or published College policy.

   c. There was a computation error resulting in an incorrect final grade.

3. In order for a Grade Appeal to be considered, the student must:

   a. Submit the grade appeal in writing within 30 days of the last day of the course to the Assistant Dean of Student Affairs.

   b. Specify in the written appeal how the Required Criteria (above) apply to the situation.

   c. Provide specific documentation/evidence in support of the applicable Required Criteria.

The appeal shall be submitted to the Assistant Dean of Student Affairs who, upon receipt, will forward a copy of the appeal to the Chair of the Student Performance Committee. If the Student Performance Committee, upon review of the appeal, believes that the case warrants formal investigation, the Committee may decide to investigate the matter or decide that a Grade Appeals Sub-Committee will be appointed.

If a Grade Appeals Sub-Committee is appointed, it shall consist of at least one member of the Student Performance Committee, who shall serve as Chair, two voting faculty members not on the Committee, and one student representative. All members of the Grade Appeals Sub-Committee have full voting privileges.

The Grade Appeals Sub-Committee will conduct its own investigation in conjunction with such an appeal following established procedural guidelines for handling student appeals of an academic nature. The student making the appeal will be invited to meet with the Grade Appeal Sub-Committee to substantiate his/her appeal. The Grade Appeals Sub-Committee will forward their recommendation to the Student Performance Committee. The Student Performance Committee will review the recommendation and then forward the original recommendation, along with a statement of concurrence or of an alternate recommendation, to the Dean. Should the Student Performance Committee elect to investigate the matter, it will follow the same procedures as the Grade Appeal Sub-Committee, and forward the Committee’s recommendation to the Dean. The Dean’s decision on the grade earned by the student is final.
Curriculum Organization

Year 1

The 5000 series is assigned to didactic blocks in the Basic Science Foundations and Professional Practice Foundation blocks for the first-year pharmacy students (P1).

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>IPE 5000</td>
<td>Patient Centered Cases I</td>
<td>1.00</td>
</tr>
<tr>
<td>PHRM 5110</td>
<td>Introduction to Pharmacy and Healthcare Systems</td>
<td>2.00</td>
</tr>
<tr>
<td>PHRM 5111</td>
<td>Foundations of Pharmacy Practice &amp; Self Care Therapeutics I</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 5221</td>
<td>Pharmacological Basis of Therapeutics I</td>
<td>3.50</td>
</tr>
<tr>
<td>PHRM 5222</td>
<td>Pharmacological Basis of Therapeutics II</td>
<td>3.00</td>
</tr>
<tr>
<td>PHRM 5301</td>
<td>Pharmaceutics/Biopharmaceutics I</td>
<td>3.00</td>
</tr>
<tr>
<td>PHRM 5401</td>
<td>Immunology</td>
<td>3.50</td>
</tr>
<tr>
<td>PHRM 5998</td>
<td>Introductory Pharmacy Practice Experience 1A</td>
<td>2.00</td>
</tr>
</tbody>
</table>

Semester Total: 22.00

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>IPE 5100</td>
<td>Patient Centered Cases II</td>
<td>1.00</td>
</tr>
<tr>
<td>PHRM 5112</td>
<td>Foundations of Pharmacy Practice &amp; Self Care Therapeutics II</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 5113</td>
<td>Research Methods and Biostatistics</td>
<td>1.00</td>
</tr>
<tr>
<td>PHRM 5223</td>
<td>Pharmacological Basis of Therapeutics III</td>
<td>3.00</td>
</tr>
<tr>
<td>PHRM 5224</td>
<td>Pharmacological Basis of Therapeutics IV</td>
<td>3.50</td>
</tr>
<tr>
<td>PHRM 5302</td>
<td>Pharmacogenomics and Pharmaceutics</td>
<td>3.00</td>
</tr>
<tr>
<td>PHRM 5501</td>
<td>Pharmacokinetics</td>
<td>3.50</td>
</tr>
<tr>
<td>PHRM 5999</td>
<td>Introductory Pharmacy Practice Experience IB</td>
<td>2.00</td>
</tr>
</tbody>
</table>

Semester Total: 21.00

Year 1 Total: 43.00

Year 2, Year 3 – Fall Semester

The 6200 series describes the didactic curriculum for second-year student pharmacists (P2). The 6300 series denotes the didactic curriculum for the first half of the third year (P3). The series of Pharmacy Practice blocks (6201 – 6306) presents topics and accompanying skills that lay the foundation for the practice of pharmacy. The focus of the pharmacy practice blocks is to teach students how to integrate knowledge, skills, and attitudes necessary for patient-centered practice in a variety of areas in pharmacy practice. An introduction to the epidemiology, evidence-based medicine, genomics, literature evaluation, pathophysiology, clinical pharmacokinetics, and therapeutics relevant to various disease states and syndromes are covered in these blocks. In addition, a variety of skills and screening tools used to assess and monitor therapeutics effectiveness are expected to be mastered. Emphasis is placed on the principles addressing pharmaceutical care; pharmacoeconomics; pharmacy management; ethical, legal, and professional responsibilities; assessment, evaluation, and dissemination of drug information; written and verbal communication; and drug distribution. The overall goal of each block is to enable students to integrate their knowledge of the disease state topic(s) presented in the context of formulating an individualized pharmacotherapeutics plan for a given patient. Emphasis is placed on communication skills that assess a student’s ability to educate health professionals and patients
regarding lifestyle changes and drug therapy for specific diseases in a clear, concise, and organized manner. Collaboration with peers (teams) occurs in each block in order to teach students how to work with others.

Pharmacy Practice blocks 6205, 6210 and 6306 are designed to allow the student an opportunity to strengthen and expand their knowledge in the content areas previously covered while exploring some aspects of disease states in greater depth or breadth. Students engage in team discussions that incorporate and integrate aspects of those disease states previously covered. Skills (e.g., counseling, patient education, calculation applications, drug information, and drug monitoring activities) relevant to the practice of pharmacy will be practiced during these blocks. The blocks will end with a series of examinations covering content areas and skills learned and practiced during the previous blocks.

### Year 2, Fall Semester, PharmD 2016

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>IPE 6000</td>
<td>Team Training in Healthcare I</td>
<td>1.00</td>
</tr>
<tr>
<td>PHRM 6201</td>
<td>Pharmacy Practice I: Evidence-Based Medicine</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6202</td>
<td>Pharmacy Practice II: Intro to Pharmacotherapy/Renal Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6203</td>
<td>Pharmacy Practice III: Metabolic Syndromes</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6204</td>
<td>Pharmacy Practice IV: Cardiovascular Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6205</td>
<td>Pharmacy Practice V: Integration Block</td>
<td>4.00</td>
</tr>
</tbody>
</table>

**Semester Total:** 21.00

### Year 2, Spring Semester, PharmD 2016

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>IPE 6100</td>
<td>Team Training in Healthcare II</td>
<td>1.00</td>
</tr>
<tr>
<td>PHRM 6206</td>
<td>Pharmacy Practice VI: GI and Liver Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6207</td>
<td>Pharmacy Practice VII: Respiratory Diseases, Inflammatory Diseases, Endocrine Diseases, and Women’s Health</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6208</td>
<td>Pharmacy Practice VIII: Men’s Health and Psychiatric Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6209</td>
<td>Pharmacy Practice IX: Neurological Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6210</td>
<td>Pharmacy Practice X: Integration Block</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6999</td>
<td>Introductory Pharmacy Practice Experience II</td>
<td>4.00</td>
</tr>
</tbody>
</table>

**Semester Total:** 25.00

**Year 2 Total:** 46.00

### Year 3, Fall Semester, PharmD 2015

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>PHRM 6301</td>
<td>Pharmacy Practice XI: Infectious Diseases (Bacterial)</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6302</td>
<td>Pharmacy Practice XII: Infectious Diseases (Viral and Fungal), Travel Medicine, and Organ Transplant</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6303</td>
<td>Pharmacy Practice XIII: Oncology</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6304</td>
<td>Pharmacy Practice XIV: Pharmacy Administration</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6305</td>
<td>Pharmacy Practice XV: Pharmacoconomics and Pharmacoepidemiology</td>
<td>4.00</td>
</tr>
</tbody>
</table>

**Semester Total:** 20.00
Year 3 – Spring Semester, Year 4

The Advanced Pharmacy Practice Experiences (APPEs) rotations provide one year of supervised clinical education. Students advance their knowledge in areas such as taking drug histories, providing patient education, interpreting diagnostic data and dispensing and compounding medications. The 7000 series are designated for the APPE rotations. All PharmD and IPBP students are required to complete PHRM 7110, 7120, 7210, 7220, 7330, 7340, and 7350. The 8000 series is designed for elective coursework. The elective program is a capstone experience designed to prepare the student for his/her role as an entry level practitioner. Electives are offered in areas such as research, teaching, and advanced clinical practice. A project is required of each student. Students must complete 20 units of elective coursework in the 8000 series.

<table>
<thead>
<tr>
<th>Year 3, Spring Semester, PharmD 2015</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Course</td>
<td>Title</td>
</tr>
<tr>
<td>PHRM 6306</td>
<td>Pharmacy Practice XVI: Integration Block</td>
</tr>
<tr>
<td>Rotation 1</td>
<td>PHRM 7110, 7120, 7210, 7220, 7330, 7340</td>
</tr>
<tr>
<td>Rotation 2</td>
<td>PHRM 7110, 7120, 7210, 7220, 7330, 7340</td>
</tr>
<tr>
<td></td>
<td><strong>Semester Total:</strong> 20.00</td>
</tr>
<tr>
<td></td>
<td><strong>Year 3 Total:</strong> 40.00</td>
</tr>
</tbody>
</table>

Year 4, Fall Semester, PharmD 2014

| Course                              | Title                           | Credit Hours |
| Rotation 3                           | PHRM 7110, 7120, 7210, 7220, 7330, 7340, or 7350 | 8.00 |
| Rotation 4                           | PHRM 7110, 7120, 7210, 7220, 7330, 7340, or 7350 | 8.00 |
| Rotation 5                           | PHRM 7110, 7120, 7210, 7220, 7330, 7340, or 7350 | 8.00 |
| Rotation 6                           | PHRM 7110, 7120, 7210, 7220, 7330, 7340, or 7350 | 8.00 |
| Rotation 7                           | PHRM 7110, 7120, 7210, 7220, 7330, 7340, or 7350 | 8.00 |
|                                      | **Semester Total:** 40.00        |  |

Year 4, Spring Semester, PharmD 2014

| Course                              | Title                           | Credit Hours |
| PHRM 8400                            | Advanced Electives               | 20.00 |
|                                      | **Semester Total:** 20.00        |  |
|                                      | **Year 4 Total:** 60.00          |  |
## Curriculum Organization (International Post-Baccalaureate PharmD Track)

### Year 1

#### Year 1, Fall Semester, IPBP 2016

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>IPE 6000</td>
<td>Team Training in Healthcare I</td>
<td>1.00</td>
</tr>
<tr>
<td>PHRM 5606</td>
<td>Overview of Clinical Practice</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6201</td>
<td>Pharmacy Practice I: Evidence-Based Medicine</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6202</td>
<td>Pharmacy Practice II: Intro to Pharmacotherapy/Renal Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6203</td>
<td>Pharmacy Practice III: Metabolic Syndromes</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6204</td>
<td>Pharmacy Practice IV: Cardiovascular Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6205</td>
<td>Pharmacy Practice V: Integration Block</td>
<td>4.00</td>
</tr>
</tbody>
</table>

**Semester Total:** 25.00

#### Year 1, Spring Semester, IPBP 2016

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>IPE 6100</td>
<td>Team Training in Healthcare II</td>
<td>1.00</td>
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<td>PHRM 6206</td>
<td>Pharmacy Practice VI: GI and Liver Diseases</td>
<td>4.00</td>
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<td>PHRM 6207</td>
<td>Pharmacy Practice VII: Respiratory Diseases, Inflammatory Diseases, Endocrine Diseases, and Women’s Health</td>
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<td>Pharmacy Practice VIII: Men’s Health and Psychiatric Diseases</td>
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<tr>
<td>PHRM 6209</td>
<td>Pharmacy Practice IX: Neurological Diseases</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6210</td>
<td>Pharmacy Practice X: Integration Block</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6999</td>
<td>Introductory Pharmacy Practice Experience II</td>
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</tbody>
</table>

**Semester Total:** 25.00

**Year 1 Total:** 50.00

### Year 2

#### Year 2, Fall Semester, IPBP 2015

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Credit Hours</th>
</tr>
</thead>
<tbody>
<tr>
<td>PHRM 6301</td>
<td>Pharmacy Practice XI: Infectious Diseases (Bacterial)</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6302</td>
<td>Pharmacy Practice XII: Infectious Diseases (Viral and Fungal), Travel Medicine, and Organ Transplant</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6303</td>
<td>Pharmacy Practice XIII: Oncology</td>
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</tr>
<tr>
<td>PHRM 6304</td>
<td>Pharmacy Practice XIV: Pharmacy Administration</td>
<td>4.00</td>
</tr>
<tr>
<td>PHRM 6305</td>
<td>Pharmacy Practice XV: Pharmacoeconomics and Pharmacoepidemiology</td>
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**Semester Total:** 20.00

#### Year 2, Spring Semester, IPBP 2015

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<tr>
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<td>Rotation 2</td>
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**Semester Total:** 20.00

**Year 2 Total:** 40.00
### Year 3, Fall Semester, IPBP 2014

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**Semester Total:** 40.00

### Year 3, Spring Semester, IPBP 2014

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**Semester Total:** 20.00

**Year 3 Total:** 60.00
Course Descriptions (Descriptions of Blocks)

Blocks listed in this catalog are subject to change through established academic channels. New blocks and changes in existing blocks are approved by the College of Pharmacy Curriculum Committee and the Faculty.

All courses are awarded letter grades, except when indicated otherwise.

IPE 5000 Patient Centered Cases I – An Interprofessional Approach (1 credit, CR/NCR)

IPE 5000 is offered as part of the college curriculum for all first year health professional students. It is a University requirement for graduation for all participating colleges. The course is designed to prepare the healthcare student to practice patient-centered collaborative care through a team approach. Working in small interprofessional teams, students will explore cases representing conditions across the lifespan. Course competencies for IPE 5000 include communication, collaboration and understanding scope of practice. In order to receive course credit, the minimum acceptable grade is 80%.

IPE 5100 Patient Centered Cases II – An Interprofessional Approach (1 credit, CR/NCR)

Continuation of IPE 5000.

IPE 6000 Team Training in Healthcare I (1 credit hour, CR/NCR)

IPE 6000 will continue to build upon the knowledge from the IPE 5000 series, but will expand upon that knowledge and require the student to learn and apply advanced tools and strategies that are crucial to develop a collaborative healthcare team. The majority of the course is independent study with students engaging in a large scale tabletop activity where they apply team tools necessary to solve a healthcare dilemma.

IPE 6100 Team Training in Healthcare II (1 credit hour, CR/NCR)

Continuation of IPE 6000.

PHRM 5110 Introduction to Pharmacy and Healthcare Systems (2 credits)

Introduction to Pharmacy and Healthcare Systems (PHRM 5110) will introduce the student pharmacist to the knowledge, skills and attitudes necessary for: 1) successful completion of the PharmD curriculum and 2) active participation in elevating pharmacy practice for the public benefit. The course will provide a foundational primer on healthcare systems and the pharmacists’ critical role in these systems. Topics include challenges in contemporary pharmacy practice, the role of the pharmacist as a health care provider, ethical considerations pharmacists must face, pharmaceutical care, the role of pharmacist as provider of evidence-based medical information, the US health care system (history, overview, stakeholders, providers, public health policies, and the Food and Drug Administration), health care financing (Medicare, Medicaid, private insurance, and managed care), and an introduction to pharmacy practice (community pharmacy and hospital pharmacy) clerkships (IPPE). Student pharmacists will also be required to participate in Medicare Part D Outreach programs.
PHRM 5111 Foundations of Pharmacy Practice and Self-Care Therapeutics I (4 credits)

The Foundations of Clinical Pharmacy Practice (PHRM 5111) is designed to introduce the student to the knowledge, skills, and attitudes necessary for successful completion of the PharmD curriculum, and to begin to develop foundation skills for patient-centered practice. General topics include contemporary pharmacy practice issues and the role of the pharmacist as a health care provider, written and verbal communication skills, ethics, law, professionalism, pharmaceutical care, patient counseling skills, selected skills development, self-care topics and the role of the pharmacist in self-care therapeutics, the proper selection and use of nonprescription medications and dietary supplements, patient assessment skills utilizing QuEST/SCHOLAR-MAC method, nonprescription and dietary supplement product counseling.

PHRM 5112 Foundations of Pharmacy Practice and Self-Care Therapeutics II (4 credits)

This course reinforces the knowledge, skills, and attitudes introduced in PHRM 5111. Written and verbal communication skills and team collaboration skills are further developed through the use of SOAP notes, simulated patient encounters, and EMB-based team activities. General topics include the factors that lead patients to self-diagnose and self-treat their medical conditions, the role of the pharmacist in self-care therapeutics, the proper selection and use of nonprescription medications and dietary supplements, patient assessment skills utilizing QuEST/SCHOLAR-MAC method, nonprescription and dietary supplement product counseling, and contemporary pharmacy practice issues, laws, and regulations.

PHRM 5113 Research Methods and Biostatistics (1 credit)

This block focuses on an introduction to research methodology and biostatistics. Students will use these tools in this block to begin to review and evaluate peer-reviewed clinical studies. They will continue to use these tools in subsequent blocks to evaluate clinical studies pertaining to specific therapeutic topics.

PHRM 5221 Pharmacological Basis of Therapeutics I (3.5 credits)

PHRM 5221 begins a series of four courses (PHRM 5221-5224) that integrate pharmacology, pathophysiology, medicinal chemistry and toxicology. Taken in their entirety they are referred to as the Pharmacological Basis of Therapeutics (PBT) block. These courses build on the principles acquired in biochemistry, anatomy, microbiology and physiology. The objective of these courses is to present the principles of drug-receptor selectivity, mechanisms of action of drugs, and the rationale for their therapeutic use. The series of courses focus on pharmacodynamics (how the drug affects the body's functions) and pharmacokinetics (how the body handles the drug) and provides an integrated, scientific basis for understanding desired effects (therapeutic uses) and undesired side effects (adverse effects or drug-induced toxicity). The series focuses on the human system and provides the organizational knowledge and background relevant to the pharmacy practice sequence of courses presented in the second and third years. Principles addressing cellular, tissue, and organ physiology provide a conceptual framework to introduce pharmacology by emphasizing commonalities of drug mechanism with drug classification. Prototype drugs in each pharmacological class are provided for comparing and contrasting with other agents in the same class and/or for other drugs used therapeutically but with different mechanisms of action. Fundamental principles are emphasized with the intent of providing their relevance for prevention and treatment of disease using therapeutic agents, most of which can be considered as modification of intrinsic, biological compounds.

PHRM 5221 begins with an introduction to pharmacology, including pharmacokinetics, pharmacodynamics, and toxicology, as well as introducing agents that affect the autonomic nervous
system (parasympathetic and sympathetic agents). Drugs used in the treatment of asthma are also covered.

**PHRM 5222 Pharmacological Basis of Therapeutics II (3 credits)**

PHRM 5222 is part of the series of courses (PHRM 5221, 5222, 5223 and 5224) that integrates pharmacology, pathophysiology, and medicinal chemistry building on the principles acquired in biochemistry, anatomy, and physiology. As described under Block Description of PHRM 5221, the objective of these courses is to present the principles of drug-receptor selectivity, mechanisms of action of drugs, and the rationale for their therapeutic use. The series of courses focus on Pharmacodynamics (how the drug affects the body’s functions) and Pharmacokinetics (how the body handles the drug) and provides an integrated, scientific basis for understanding desired effects (therapeutic uses) and undesired side effects (adverse effects or drug-induced toxicity). The series focuses on the human system and provides the organizational knowledge and background relevant to the pharmacy practice sequence of courses presented in the second and third years. Principles addressing cellular, tissue, and organ physiology provide a conceptual framework to introduce pharmacology by emphasizing commonalities of drug mechanism with drug classification. Prototype drugs in each pharmacological class are provided for comparing and contrasting with other agents in the same class and/or for other drugs used therapeutically but with different mechanisms of action. Fundamental principles are emphasized with the intent of providing their relevance for prevention and treatment of disease using therapeutic agents, most of which can be considered as modifications of intrinsic, biological compounds.

PHRM 5222 introduces agents used to treat disorders of the cardiovascular (CV) system as well as diabetes. Specific CV topics include: angina, arrhythmias, blood coagulation, heart failure, hyperlipidemia, and hypertension. Taken together, the combination of obesity, diabetes, hyperlipidemias and hypertension, is termed “metabolic syndrome” and it is currently a major health concern with an increasing prevalence in the United States. An overview of the pathophysiology of each system will be presented followed by the pharmacology and medicinal chemistry of the agents used to treat these diseases/disorders. Prototype drugs in each class will be covered to further your understanding of the subject.

**PHRM 5223 Pharmacological Basis of Therapeutics III (3 credits)**

PHRM 5223 focuses mainly on the central nervous system. Principles addressing basic anatomy, cellular and tissue physiology provide a conceptual framework to introduce pharmacology by emphasizing commonalities of drug mechanism with drug classification. Fundamental principles are emphasized, and principles are the focus in discussing the prevention and treatment of diseases using therapeutic agents. Clinically relevant conditions will include a series of neurological and psychiatric disorders and their relevant pharmacotherapies. Pain and pain management is introduced. This class also introduces endocrine hormones and their signaling mechanisms and how defects in these pathways are treated with pharmacotherapy. The concept of hormone replacement therapy will be introduced. Fundamental information will be introduced in lectures, reinforced during team assignment and assessed during quizzes and exams.
PHRM 5224 Pharmacological Basis of Therapeutics IV (3.5 credits)

PHRM 5224 introduces agents used to treat viral, bacterial, fungal, and parasitic diseases as well as cancer. This subject is then extended into the pharmacology and medicinal chemistry of these agents, including the designation of prototype drugs that are used to treat different pathological conditions. The course begins with a section on cancer and cancer treatment, followed by an introduction to nutritional biochemistry. Nutritional guidelines, the relationship between diet and disease, and commonly encountered nutritional diseases are introduced, as are vitamins, minerals and nutritional supplements. Students will be required to develop a food journal and use this as a basis for comparing their diet and exercise patterns with the guidelines proposed by the American Heart Association. Infectious diseases and the drugs to treat them (i.e., antiviral, antibacterial, antifungal, and antiparasitic agents) are also covered. This course also includes an introduction of agents used in the treatment of diseases of the gastrointestinal (GI) system. A review of the pertinent anatomy and physiology of this system is presented, which is then extended into the pharmacology of prototype drugs that are used to treat pathological conditions affecting the GI system. The course concludes with an introduction of toxicology with an emphasis on commonly encountered toxicants and their antidotes.

PHRM 5301 Pharmaceutics/Biopharmaceutics (3 credits)

This block introduces the student to physicochemical principles and their applications in order to develop an understanding of the formulation, manufacturing, compounding, and proper use of solid dosage forms (tablets and capsules), liquid dosage forms (homogeneous and disperse systems), topicals, suppositories, aerosols, parenterals, radiopharmaceuticals, novel drug delivery systems, and veterinary products. The course includes a laboratory component in which students are required to compound various dosage forms and perform analytical studies related to them.

PHRM 5302 Pharmacogenomics and Pharmaceutics (3 credits)

The goal of this block is to prepare future pharmacists to incorporate new technological and scientific developments in genetics/genomics into clinical practice. The course covers basic concepts of pharmacogenomics and molecular biology and how these relate to the development and implementation of pharmacogenomics tests. It explains how genetic variants may influence the pharmacokinetics and pharmacodynamics of medications. In addition, the course discusses important issues in pharmaceutical technology, including the design, formulation, manufacture and delivery of peptide, protein, monoclonal antibodies and oligonucleotide drugs. The course includes a laboratory component in which students are required to compound various dosage forms and perform analytical studies related to them. Pharmaceutical calculations are an independent element of the block; students must accurately determine the quantities of active and inactive ingredients required to prepare a dosage form. The Pharmaceutical Calculations component is required to be satisfactorily passed independent of other course content.

PHRM 5401 Immunology (3.5 credits)

This course introduces students to the basic concepts of immunology. Topics include regulatory interactions between different components of the immune system and the deleterious effects of aberrant immune processes. Team assignments are an important component in this course and allow students to integrate the knowledge gained during didactic lectures to a pharmacy-related application. The objective of the course is to provide a clear understanding of disease state immunopathology, immunopharmacology and immunotherapeutics.
PHRM 5501 Pharmacokinetics (3.5 credits)

PHRM 5501 introduces students to the principles and basic concepts of pharmacokinetics, including compartmental modeling, distribution of drugs, volume of distribution, half-life and clearance concepts. Wherever appropriate, clinically relevant examples are used to emphasize these principles. Information will also include the relevance of pharmacokinetics in drug action and toxicity. Students will be challenged to apply pharmacokinetic principles in clinical situations. The course will demonstrate the use of pharmacokinetic principles and essential equations in predicting plasma drug concentrations as well as changes in plasma drug concentrations that accrue over time. Pharmacokinetic changes will be examined in special populations such as hepatic disease, renal disease, cardiovascular disease, obesity, pediatrics, and geriatrics. Drug interactions and therapeutic drug monitoring is also introduced.

PHRM 5601 Overview of Clinical Practice (4 credits)

PHRM 5601 is intended for International Post-Baccalaureate Doctor of Pharmacy students (IPBP students admitted with advanced standing in the PharmD program) whose educational pharmacy experience has been outside of the US. The introductory course provides important information on topics such as the drug distribution system in the US, drug information, literature evaluation, biostatistics, the structure of the US health care system, and health care issues in the USA. The purpose of building the knowledge base of the IPBP students is to allow them to be at par with their peers in the entry-level program. Additionally, introduction to patient counseling skills, the use of the objective, structured clinical examination (OSCE) in evaluating a student’s clinical knowledge and skills, immunization certification, and self-study on medical terminology are also offered. The intent is to further strengthen IPBP students’ foundation such that their knowledge, skills and attitudes are in concert with the entry-level PharmD program in terms of the overall provision of pharmaceutical care. Prerequisite: Admission to the IPBP program. Required of all IPBP students.

PHRM 5998 Introductory Pharmacy Practice Experience 1A (IPPE-1A) (2 credits)

The Fall Term Introductory Pharmacy Practice Experience I (IPPE-1A) introduces students to pharmacy practice in a community setting. Through the IPPE-1a, student pharmacists are expected to master foundational competencies in three domains: Communication, Professionalism and the Practice of Pharmacy. These competencies address the basic skills that prepare the student pharmacist for the Advanced Pharmacy Practice Experiences (APPEs) offered through the pharmacy curriculum. Students will familiarize themselves with the practice of pharmacy in the following areas: laws and regulations pertaining to the licensing and operation of a pharmacy, the licensing and functions of a pharmacist, a pharmacy intern, a pharmacy technician and a pharmacy clerk; Federal and State legend laws; Federal and State narcotic laws; receiving and interpreting prescriptions; processing third party prescriptions; preparing a prescription order; dispensing a prescription order. In addition, students will be practicing patient counseling on non-prescription medications; practicing communication skills with patients and other health care providers, observing management principles and financial reimbursement processes and maintaining a portfolio that reports, comments and reflects on these essential competencies. Requisites: Concurrent or prior enrollment in PHRM 5111.

PHRM 5999 Introductory Pharmacy Practice Experience 1B (IPPE-1B) (2 credits)

Continuation of PHRM 5998 in the Spring Term. In addition, students are required to satisfactorily complete and submit their Professional Development Activities portfolio and satisfactorily pass the Top 200 Drug Quiz. Prerequisites are prior enrollment in PHRM 5998 and PHRM 5111. Requisites: Concurrent or prior enrollment in PHRM 5112.
PHRM 6201 Pharmacy Practice I (4 credits)
PHRM 6201 emphasizes the fundamental skills of evidence-based clinical practice through teaching how to ask answerable clinical questions, how to conduct effective searches for the best evidence, how to critically appraise the evidence for its validity and importance, and how to integrate patient values and circumstances to formulate an evidence-based decision.

PHRM 6202 Pharmacy Practice II (4 credits)
PHRM 6202 is designed to introduce the students to the management (evaluation, treatment, monitoring, and follow-up) of patients with common kidney and fluids/electrolytes disorders, and common gastrointestinal ailments, i.e., nausea, vomiting, diarrhea and constipation, and anemias. In addition, the block introduces clinical approaches necessary to manage special populations, i.e., pediatrics and geriatrics. Students integrate knowledge, attitudes, and skills in a variety of ways to accomplish the block outcomes. This block contains anatomy, biochemistry, physiology, pharmacology, pharmacokinetics, pharmacotherapy, and clinical evidence as they relate to nephrology and fluid/electrolytes. Accordingly, the overall goal of this block is to enable students to integrate their knowledge of these disciplines in the context of formulating an individualized pharmacotherapeutic plan for a given patient.

PHRM 6203 Pharmacy Practice III (4 credits)
The goal of PHRM 6203 is to equip students with essential knowledge, skills, and attitudes required for providing pharmaceutical care to patients with diabetes, hypertension, or dyslipidemia as an entry-level practitioner. This block will build on the foundations, such as anatomy, biochemistry, physiology, pharmacology, and pharmacokinetics, as well as the pharmacotherapeutics of renal disease to introduce the management of diabetes, hypertension and dyslipidemia. Throughout the block, there will be emphasis on utilizing up to date evidence-based clinical data to make patient specific therapeutic decisions for patients. The management of diabetes, hypertension, and dyslipidemia is continuously evolving, and the students will also obtain skills to stay current with the rapidly changing information.

PHRM 6204 Pharmacy Practice IV (4 credits)
The emphasis of PHRM 6204 is to enable students to provide pharmaceutical care to patients with cardiovascular disorders as an entry-level practitioner. This block builds on the foundations, such as anatomy, biochemistry, physiology, pharmacology, pharmacokinetics, and pharmacogenomics as well as the pharmacotherapeutics of the basic metabolic syndrome (e.g., hypertension, diabetes, hyperlipidemia) to introduce the management of advanced cardiovascular disorders. Throughout the block there will be emphasis on utilizing up to date evidence-based clinical data to make patient specific therapeutic decisions for patients with cardiovascular disorders. The management of cardiovascular disorders is continuously evolving. As such, the students will also obtain skills to stay current with the rapidly changing cardiovascular therapeutics.

PHRM 6205 Pharmacy Practice V (4 credits)
Learning to integrate and apply knowledge, skills, and attitudes to complex patients with multiple disease states and drug-related problems are essential to successful practice as a pharmacist. This course integrates the information from PHRM 6201-6204. The students are required to apply their knowledge and skills to complex, multi-disease patient cases, using interactive methods.
PHRM 6206 Practice Pharmacy VI (4 credits)
PHRM 6206 focuses on providing the student with an understanding of the gastrointestinal and hepatobiliary systems. Specific emphasis will be placed on the pharmacologic treatment of various gastrointestinal disorders (i.e., peptic ulcer disease, gastroesophageal reflux disease, inflammatory bowel disease, irritable bowel syndrome, alcoholic liver disease, and acute and chronic liver failure). The course concludes with a unit on nutritional assessment and enteral and parenteral nutrition.

PHRM 6207 Pharmacy Practice VII (4 credits)
At the end of this course, students should feel confident about counseling patients on the proper use of inhalers and devices, birth control pills and pain medications used to treat a variety of joint disorders. This block is designed for the second year pharmacy student to learn how to solve patient-based pharmacotherapeutic problems in airway diseases, arthritic disorders, and women’s health issues. Asthma, COPD, and contraceptive technology, pathophysiology, and treatment are introduced in this course, including national guidelines for diagnosis and treatment. Major concepts of prior block material are reinforced throughout the block.

PHRM 6208 Pharmacy Practice VIII (4 credits)
The purpose of this block is to enable students to integrate the pathophysiology, medicinal chemistry, pharmacology and therapeutic knowledge in the management of specific psychiatric disease states (DSM IV-TR). Students will be prepared to give careful attention to accuracy of diagnosis, drug regimen selection, drug pharmacokinetics, appropriate dosing, and monitoring of efficacy and safety associated with pharmacotherapy. The content of the block includes psychiatric diseases and substance abuse. In addition, the block discusses urinary incontinence, benign prostate hypertrophy, and erectile dysfunction. Students are provided the opportunity to practice clinical problem assessment and therapeutic drug monitoring in preparation for providing pharmaceutical care.

PHRM 6209 Pharmacy Practice IX (4 credits)
PHRM 6209 focuses on the epidemiology, pathophysiology, pharmacology and pharmacotherapy relevant to diseases affecting the central nervous system, including epilepsy, headache, pain and pain management, Parkinson’s disease, dementia and stroke. Smoking cessation training and pharmaceutical law are also components of the block. The main goals are to provide students with the fundamental knowledge, skills and attitudes required to provide optimal pharmaceutical care to patients with various neurological disorders.

PHRM 6210 Pharmacy Practice X (4 credits)
Learning to integrate and apply knowledge, skills, and attitudes to complex patient cases with multiple disease states and drug-related problems are essential to successful practice as a pharmacist. This course integrates the information from PHRM 6201-6209. Students are required to apply their knowledge and skills to complex, multi-disease patient cases, using interactive methods.

PHRM 6301 Practice Pharmacy XI (4 credits)
PHRM 6301 provides an integrated approach to microbiology, antimicrobial pharmacology, and infectious disease syndromes. The initial part of the block consists of identification, laboratory diagnosis, epidemiology, and modes of spread of the medically important pathogens. Pharmacology of the major classes of antimicrobial agents will be discussed. The latter part of the block will focus on the microbiology, epidemiology, pathogenesis, pathophysiology, clinical features, preventive and infection control measures associated with major infectious disease syndromes due to common bacteria.
PHRM 6302 Pharmacy Practice XII (4 credits)

PHRM 6302 is an extension of PHRM 6301 with a focus on special patient populations and opportunistic infections, including fungal and viral infections. Treatment and counseling of patients with HIV/AIDS are presented. The pharmacology of antiviral and antifungal agents and the application in treating infections are discussed. A portion of the block focuses on the basic pharmacology of immunotherapeutic agents in organ transplantation, travel medicine, and pharmacokinetic applications of vancomycin and aminoglycosides.

PHRM 6303 Pharmacy Practice XIII (4 credits)

Pharm 6303 is designed to introduce students to several common malignancies and complications of both cancer and cancer therapy, which will form a foundation that students can utilize to understand current and evolving strategies in cancer therapy. Throughout the block, students will practice critical thinking and clinical decision-making skills using an interactive case study approach. The contemporary pharmacist’s role in hematology and oncology, however, is not limited to the treatment of patients with cancer. As such, students will have the opportunity to explore a number of diverse issues during the block, such as death and dying, cancer prevention, the treatment of non-malignant hematologic disorders and the pharmacist’s role in medication error prevention. At the conclusion of the block, students will gain a better understanding not only of cancer therapeutics, but also the potential scope of the pharmacist’s practice.

PHRM 6304 Pharmacy Practice XIV (4 credits)

PHRM 6304 provides students an overview of pharmacy practice management in the community and hospital pharmacy settings. Students are familiarized with the conceptual underpinnings and applications of operations of pharmacy practice management, such as marketing, financial analysis, human resource management, and operations management (purchasing and inventory control). Disease state management is emphasized as an important component of community pharmacy practice management. In the hospital setting, the importance of formulary decisions, medication safety, drug information, utilization review and clinical therapy guidelines and protocols are stressed. Material from this block and the next block are enmeshed for continuity and integration. The course includes a team project and poster presentation on developing a disease state management clinic in a community pharmacy setting.

PHRM 6305 Pharmacy Practice XV (4 credits)

PHRM 6305 emphasizes the field of Health Outcomes and its applications to pharmacy practice. The ECHO model is used as a framework of measuring program, procedure or product effectiveness. The block covers an introduction to pharmacoeconomics and its techniques (CMA, CBA, CEA, CUA), basic review of the methodology employed in pharmacoeconomic research, a basic review of modeling techniques such as decision models, and application of pharmacoeconomics in formulary and guideline development in the current environment within private (managed care) and public health care policy. Further, various patient-reported outcomes (PROs) such as quality of life, patient satisfaction and adherence are introduced that provide a measure of patient preference in treatment plans and program effectiveness. Evidence based medicine (EBM), biostatistical analyses and research methods are also reviewed as necessary tools to evaluate the clinical and pharmacoeconomic literature as well as to apply these skills in developing monographs for recently approved drugs, which is a course assignment.

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**PHRM 6306 Pharmacy Practice XVI (4 credits)**

This block is designed to prepare the student to optimally perform and to successfully complete the APPE rotations. The third installment of pharmacy law is provided so that student pharmacists can practice legally and within societal expectations for a professional pharmacist. Students develop and practice thought processes associated with clinical case discussions by interacting with clinical practice faculty in a similar environment to APPE practice sites. Other activities include an OSCE exercise and journal clubs. Students integrate knowledge, attitudes and skills in a variety of ways to accomplish the block outcomes. The overall goal of this block is to enable students to integrate their knowledge of these disciplines in the context of formulating an individualized pharmacotherapeutic plan for a given patient. This block also includes a high-stakes clinical examination that covers all topics of the curriculum, including therapeutic topics that are weighted similar to what is seen in general practice, and topics likely to be seen when taking the licensure examination. Student must pass the Final Comprehensive Examination administered in this block before they will be allowed to proceed to the APPE.

**PHRM 6999 Introductory Practice Experience 2 (IPPE-2) (4 credits)**

Introductory Pharmacy Practice Experience 2 (IPPE-2) introduces students to pharmacy practice in an institutional setting. Student pharmacists are expected to master foundational competencies in three domains: Communication, Professionalism and the Practice of Pharmacy. These competencies address the basic skills that prepare the student pharmacist for the Advanced Pharmacy Practice Experiences (APPEs). As such, they represent an intermediate point in the professional development of a pharmacist. The student pharmacist will be able to behave in a professional and ethical manner, articulate the pharmacist’s role as a member of the health care team; communicate accurate and appropriate medical and drug information to a pharmacist, preceptor or other health care professional in a clear and concise manner; and demonstrate adherence to all State and Federal laws and regulations (including those of The Joint Commission and the United States Pharmacopeia) as a student pharmacist in the practice setting. At the completion of IPPE-2, through observation, practice and self-learning, student pharmacists will be able to demonstrate an understanding of different methods of drug distribution and dispensing within an institutional setting, calculations commonly encountered in institutional settings, and the pharmacist’s role in medication management (formulary management, cost containment, preventing adverse drug reactions and medication errors, managing drug therapies by protocol).

**PHRM 7110 Advanced Community Practice (CP) (8 credits, CR/NCR)**

Supervised advanced patient care experience in a community pharmacy setting under the supervision of a pharmacist preceptor.

**PHRM 7120 Health-Systems Practice (HS) (8 credits, CR/NCR)**

Supervised advanced patient care experience in an inpatient pharmacy setting under the supervision of a pharmacist preceptor.

**PHRM 7210 Ambulatory Care (AC) (8 credits, CR/NCR)**

Supervised clinical pharmacy experience emphasizing the development of pharmaceutical care skills in an out-patient setting.
PHRM 7220 General Medicine (GM) (8 credits, CR/NCR)
Supervised clinical pharmacy experience emphasizing the development of pharmaceutical care skills in a hospital or other acute-care institutional setting such as a long term care facility.

PHRM 7330 Elective clerkship I (8 credits, CR/NCR)
Supervised education in clinical, administrative or research settings that provide additional experience in specialty areas such as pediatrics, geriatrics, infectious disease, drug information, oncology, pharmaceutical research, pharmacy administration, etc.

PHRM 7340 Elective clerkship II (8 credits, CR/NCR)
Supervised education in clinical, administrative or research settings that provide additional experience in specialty areas such as pediatrics, geriatrics, infectious disease, drug information, oncology, pharmaceutical research, pharmacy administration, etc. Prerequisite: PHRM 7330.

PHRM 7350 Elective clerkship III (8 credits, CR/NCR)
Supervised education in clinical, administrative or research settings that provide additional experience in specialty areas such as pediatrics, geriatrics, infectious disease, drug information, oncology, pharmaceutical research, pharmacy administration, etc. Prerequisite: PHRM 7340.

PHRM 8200 Elective Coursework (4 credits, CR/NCR)
Advanced level coursework in an area of special interest beyond that presented as part of the previous didactic coursework of the Doctor of Pharmacy Curriculum. Repeatable to a maximum of 16 credits.

PHRM 8400 Advanced Electives (20 credits, CR/NCR)
Advanced clinical educational experiences in an area of special interest beyond that provided as part of the previous clinical coursework of the Doctor of Pharmacy curriculum. Student pharmacists chose from one of three tracks to help them focus on their area(s) of interest.

The Health-Systems (clinical/research) Practitioner Track is intended for student pharmacists interested in furthering their clinical training in settings such as hospital, ambulatory care, home infusion, skilled nursing facilities and other non-community practice sites. This includes a dedicated project and poster presentation of their work which may include research, medication use evaluations, staff education guidelines, cost-effectiveness analyses, implementation of pre-printed order sets, etc. Student Pharmacists should expect to be on campus for progress reports and the PIC Week.

The Community Pharmacy Track is intended for student pharmacists who plan to be clinical staff pharmacists at chains or independent pharmacies. The experience will focus on the provision of direct patient care services (i.e. drug therapy management, immunization, MTM collaborative practice) that they will be qualified to provide as a practicing clinical pharmacist. This option includes a formal poster presentation on a project assigned/accepted by their preceptor. This experience may also include off-site conferences and/or case studies as well as completion of the Community Pharmacy and Practice Self-Assessment from the California State Board of Pharmacy.

The Community Pharmacy Entrepreneur Independent Ownership Track is intended for student pharmacists who intend to be independent community pharmacists with the goal of owning their own pharmacy. The course includes the development of a business plan and a formal presentation on the development of the business plan. This experience includes weekly on-campus meetings/lectures, and
may also include off-site conferences and/or case studies as well as completion of the Community Pharmacy and Practice Self-Assessment from the California State Board of Pharmacy.

**PHRM 8800 Other Electives (20 credits, CR/NCR)**

Individualized, supervised educational experiences in an area of special interest related to pharmacy practice and/or pharmaceutical sciences beyond that provided by previous coursework in the Doctor of Pharmacy curriculum and not eligible for credit within PHRM 8200 or 8400.
Honors and Awards

The following awards for PharmD students are presented annually on Honors Day in April.

- Albertsons/Sav-on Scholarship
- Arthur Madorsky, MD Memorial Scholarship Award
- Dean’s Letter for Service Recognition
- Dean’s List
- Debbie Robinson Memorial Scholarship
- East-West Scholarship
- Good Neighbor Pharmacy/Institute for Community Pharmacy Scholarship
- Hendricks Pharmacy Scholarship
- Linda Fox Memorial Endowment Fund Award
- President's Society Award
- South Bay Pharmacists Association Scholarship
- The J.M. Long Foundation Scholarship
- The Joseph and Dorothy Gendron Journalism Award
- Tribute to Caring Scholarship
- Walgreens Scholarship
- Wal-Mart Scholarship
- Who’s Who Among Students in American Universities and Colleges Nominations

The following awards are presented annually to graduates at the Commencement Dinner Dance:

- APhA-ASP Outstanding Graduate Award
- Dean's Award
## Academic Calendar

*COP academic calendar is subject to change. *Students in clinical rotations observe their preceptor’s hours, which may include working on federal holidays.*

### Fall 2013

<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
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| Monday, May 20, 2013 | Fall Semester Rotations Begin  
*PharmD Year 4, IPBP Year 3* |
| Thursday, July 4, 2013 | Independence Day – No Classes* |
| Tuesday, July 8, 2013 | Fall Semester Begins  
*IPBP Year 1* |
| August 5 – August 9, 2013 | Orientation Week  
*PharmD Year 1* |
| Saturday, August 10, 2013 | Convocation/White Coat Ceremony |
| Monday, August 12, 2013 | Fall Classes Begin  
*PharmD Years 1-3, IPBP Year 2* |
| Monday, September 2, 2013 | Labor Day – No Classes* |
| Monday, October 14, 2013 | Columbus Day – No Classes* |
| Wednesday, November 27, 2013 | Thanksgiving Recess Begins @ 5:00 p.m.* |
| Monday, December 2, 2013 | Classes Resume |
| Friday, December 20, 2013 | End of Fall Semester Classes/Rotations  
*PharmD Years 1-4, IPBP Years 1-3* |
| Monday, December 23, 2013 | Winter Recess Begins  
*PharmD Years 1-4, IPBP Years 1-3* |

### Spring 2014

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<th>Date</th>
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| Monday, January 6, 2014 | Spring Classes Begin  
*PharmD Years 1-3, IPBP Years 1-2* |
| Monday, January 20, 2014 | Martin Luther King Day – No Classes*  
Spring Rotations Begin  
*PharmD Year 4, IPBP Year 3* |
| Monday, February 17, 2014 | President’s Day – No Classes* |
| Thursday, April 3, 2014 | Honors Day |
| Wednesday, May 14, 2014 | End of Spring Semester Classes (Year 4)  
**Commencement** |
| Friday, May 16, 2014 | End of Spring Semester Classes  
*PharmD Year 3, IPBP Year 2* |
| Friday, May 23, 2014 | End of Spring Semester Classes  
*PharmD Year 1* |
| Monday, May 26, 2014 | Memorial Day – No Classes* |
| Thursday, July 3, 2014 | End of Spring Semester Classes  
*IPBP Year 1* |
| Friday, August 8, 2014 | End of Spring Semester Classes  
*PharmD Year 2* |