# **Departments**

## Department of Pharmaceutical Sciences

The mission of the Department of Pharmaceutical Sciences is to educate students in the foundational scientific principles essential to the provision of exemplary patient-centered care. The Department is committed to lifelong learning and the professional growth of students, faculty, and staff through engagement in innovative educational strategies, scholarly activities, and service to the academic and scientific communities, the profession of pharmacy, and society.

The Department of Pharmaceutical Sciences subsumes three specialty areas: pharmaceutics, medicinal chemistry, and natural products/pharmacognosy.

Pharmaceutics is that area of pharmacy associated with the following: designing various dosage forms for delivery of drugs; determining drug storage and stability; and evaluating the effects of administration and formulation factors on the absorption, distribution, metabolism, and excretion of drugs in humans.

Medicinal chemistry is a science that is unique to pharmacy because it is a hybrid of the physical, chemical, biochemical, analytical, and pharmacologic principles employed in explaining the mechanisms of drug action and drug design. The application of principles associated with medicinal chemistry provides the professional student with a firm basis for their career in pharmacy.

Pharmacognosy is that pharmaceutical science concerned with the biological, chemical, and therapeutic uses of drugs obtained from plants, microbes, and animals.

#### **Department of Pharmacy Practice**

The mission of the Department of Pharmacy Practice is to develop excellence in the profession through integration of didactic, experiential and postgraduate education. The Department seeks to inspire students, residents and faculty to be responsible patient advocates by promoting and engaging in patient-centered care, community service, scholarship and professional involvement.

The Department of Pharmacy Practice is composed of faculty who provide education in the administrative and clinical sciences, as well as direct practice experience. Required courses in the administrative science area include a survey of the health care system, professional practice management, quality assurance of pharmacy practice, and pharmacy law and ethics. Required courses in the clinical science area include drug literature evaluation, pharmacotherapeutics, clinical pharmacokinetics, and professional practice classes and laboratories that emphasize communication skills, prescription processing, and patient-centered care. Supervised introductory and advanced pharmacy practice experiences required during the program provide opportunities for students to apply knowledge acquired in didactic courses to life situations. The experiences are designed to promote the development of technical, cognitive, and decision-making skills that are necessary for the contemporary practice of pharmacy in a variety of practice environments. Various states apply these experiences to their state board of pharmacy internship requirements.

# Office of Experiential Education

The mission of the Office of Experiential Education is to cultivate dedicated and proficient student pharmacists by providing high quality pharmacy practice experiences through the ongoing development of students, sites, and preceptors. The rotation experiences will prepare them to deliver collaborative and exceptional patient care and contribute meaningfully to the profession.

## Postgraduate Education

The College offers a number of postgraduate training opportunities: Postgraduate Year Two (PGY-2) ambulatory care pharmacy residency program; PGY-2 infectious diseases pharmacy residency program; and an infectious diseases pharmacotherapy fellowship. In addition, the college is affiliated with one PGY-1 community pharmacy residency program. All College residency programs are fully accredited by the American Society of Health-System Pharmacists.