

PHARMACEUTICAL SCIENCES GRADUATE MAJOR (MS, PHD)

Graduate Areas of Concentration

Biopharmaceutics, medicinal chemistry, natural products chemistry, pharmaceuticals, pharmacoeconomics, pharmacokinetics, pharmacology, toxicology

The emphasis of most graduate programs is on foundational research investigating drug discovery, chemistry, mechanisms of drug action, molecular biology, genomics, drug metabolism, and dosage form design.

Faculty in the department are involved in identification of new drugs from the ocean and other biological sources, biochemical toxicology, and drug metabolism studies; the design and development of new drug delivery and dosage forms; and studies on the clinical efficacy and distribution of drugs through the body as a function of dosing regimen or dosage form. They are using biochemical and molecular biological techniques to investigate signal transduction pathways mediated by phospholipids and retinoids; electrophysiological approaches to studying ion channel function; and the molecular biology of nuclear receptors and factors regulating gene expression.

Major Code: 4790