Pharmaceutical Sciences

Degrees Available at SIUE
- Master of Science

Areas of Concentration
- Medicinal Chemistry
- Pharmacology
- Pharmacetics

Program Format
The program can be completed through traditional daytime courses. Lab and research courses are offered on evenings/weekends.

Pharmaceutical Sciences at SIUE
This master’s program prepares students for research positions in the pharmaceutical sciences (industrial, academic or government), or to pursue doctoral degrees in health sciences, medical and drug discovery research. In addition, students will be prepared for the sciences component of other non-research but science- and technology-related positions relevant to the pharmaceutical industry (e.g. evaluation of new technologies for business development units, scientific patent advising, administration, consulting).

Data from the Bureau of Labor Statistics, U.S. Department of Labor, indicates a continued growth rate for medical scientists of 8% between the years 2014-2024.

What can I do with a degree in pharmaceutical sciences?
This master’s program prepares students for research positions in the pharmaceutical sciences (industrial, academic or government), or to pursue doctoral degrees in health sciences, medical and drug discovery research. In addition, students will be prepared for the sciences component of other non-research but science- and technology-related positions relevant to the pharmaceutical industry (e.g. evaluation of new technologies for business development units, scientific patent advising, administration, consulting).

Data from the Bureau of Labor Statistics, U.S. Department of Labor, indicates a continued growth rate for medical scientists of 8% between the years 2014-2024.

Graduate Assistantships
Graduate assistantships for teaching, research and related administrative duties are available. Assistantships include a tuition waiver and monthly stipend. A graduate assistantship enhances your educational experience and helps to develop valuable professional skills.

Faculty
Faculty members provide opportunities for students to study in three of the main areas of the discipline. Our medicinal chemistry faculty allows students to explore all aspects of drug design and discovery, including computational methods, structure-activity studies, synthetic methods development and natural products chemistry. Our pharmacology team allows students to engage in studying the cellular signaling pathways that are important in disease processes and the mechanism of action of drug candidates for treating the resulting diseases, including pharmacogenomic aspects of patient populations. Our pharmaceutics faculty guides students in the study of mathematical, computational and experimental methods to study the pharmacokinetics (ADME) of drug molecules in vivo, as well as all aspects of drug delivery.

Admission Requirements
1. Graduate School application and $40 fee
2. Submission of all postsecondary academic transcripts
3. Completion of a baccalaureate degree in pharmacy, chemistry, or the biological sciences. Prior academic work should include a year each of biology or biochemistry and organic chemistry.
4. GPA: At least 3.00 (A=4.00) for the final 60 semester hours of baccalaureate study.
5. Graduate Record Examination (GRE) general is required. The GRE advanced subject (chemistry, biochemistry or biology) test is optional.
6. International Applicants: A minimum TOEFL Score of 550 (paper based); 213 (computer based), or 79 (internet based) is required or the IELTS minimum of 6.5.
7. Three Letters of Recommendation are Required
8. Personal Statement is Required

Program application materials may be uploaded during the application process, but official transcripts must be sent directly from the school attended, and test scores must be verifiable with the appropriate testing service. Please contact the Graduate Admissions office with questions regarding the application submission process at graduateadmissions@siue.edu.
**Graduation Requirements**

Students will be required to complete at least 30 hours of acceptable graduate credit with a GPA of 3.0 or higher (A=4.0). At least 12 semester hours must be earned from core courses and two semester hours from graduate seminar. Students must take a minimum of four hours of electives. At least 10 semester hours must be earned for research and students must be enrolled in a minimum of one hour of research per semester after choosing an advisor. Students must complete a thesis based upon the student’s original research work.

Finally, students must assemble an advisory committee and meet with this committee for a public presentation and oral defense of the thesis.

**Contact Information**

Graduate Program Director  
School of Pharmacy  
Phone: 618-650-5129  
Email: joschob@siue.edu

This information is concurrent with the 2021-2022 Academic Catalog. Courses are subject to change at any time.