Pathology, M.S.

The M.S. with a major in pathology prepares postbaccalaureate science majors for a range of biomedical careers. Graduate-level course work provides students with a foundation in cellular and molecular biology, as well as specialized knowledge in pathobiology. A laboratory intensive thesis project equips trainees with cutting edge research skills. Students typically complete the program in two and one-half years.

Requirements

The Master of Science program in pathology requires a minimum of 30 s.h. of graduate credit, including 21 s.h. of course work and 9 s.h. of research leading up to the thesis.

The course work results in:

- a basic understanding of molecular and cellular biology,
- a basic understanding of biostatistics, and
- an advanced understanding of pathobiology, histology and mechanisms of human disease.

Remaining graduate-level course work for the degree consists of electives focused on the area or topic related to a student’s thesis project. The elective courses are offered by a range of departments on the biomedical campus.

The thesis project is carried out under the guidance of the mentor and thesis committee. Generally, the thesis consists of four chapters with the first being a concise review of the literature, the second materials and methods, and the last two a scholarly description of the project results. The thesis must be defended before the committee prior to final approval.

For more information, view M.S. Graduate Program on the Department of Pathology website.

Admission

Applicants must have a bachelor’s degree in a science discipline and have a g.p.a. of at least 3.00. They must have taken the Graduate Record Exam (GRE) General Test, with a strong performance on all three portions of the exam. In addition, previous research experience is highly desired. Applicants who are available for an on-site interview are preferred. International students must submit Test of English as a Foreign Language (TOEFL) scores that meet institutional requirements.

Applicants must meet the admission requirements of the Graduate College; see the Manual of Rules and Regulations of the Graduate College.

Career Advancement

The M.S. program is designed for graduates to advance into research assistant or research scientist positions in academic and private sector laboratories, or to be competitive for advanced degree programs such as the Ph.D., M.B.A., or M.D.