

School of Arts and Sciences

PRE-DENTISTRY

www.placement.pitt.edu/advisors/aabt.html

In recent years, dentistry and related sciences have grown in scope to accommodate new technology and meet the concerns and demands of modern society, such as rising healthcare costs, increased public interest in personal health, population growth, and increased life expectancy. The University of Pittsburgh provides undergraduate students a unique setting in which to explore and deepen their interest in dental medicine. While providing the necessary resources for you to become a successful candidate for dental school, the University offers a variety of options for an undergraduate education.

You will be an undergraduate student in a city renowned for training healthcare professionals and transforming research developments into methods of patient care. The University of Pittsburgh takes pride in the concentration of hospitals, institutes, clinics, and specialty practices that reside in the half-square-mile section of the city on which its Oakland campus is located. The University has six graduate schools of the health professions, including the Schools of Dental Medicine, Medicine, Nursing, Pharmacy, and Health and Rehabilitation Sciences, as well as the Graduate School of Public Health. The School of Dental Medicine provides dental services to almost 100,000 patients each year from Western Pennsylvania and the surrounding region and is ranked among the top 20 accredited dental schools in the United States by *The Gourman Report*, an annual rating of American collegiate programs.

Having the School of Dental Medicine on campus means current dental students and dental school faculty can give you insight into what it's like to attend dental school and treat patients. Research at the school is ongoing, involving subjects such as cleft palate, periodontics, oral cancer, geriatric dentistry, dental fears, pharmacology and pain control, implantology, and dentistry for immunosuppressed patients. You also can choose to live on a residence hall floor reserved exclusively for students interested in pursuing health-related careers.

Your Undergraduate Degree

When selecting candidates for admission, **dental schools do not require a particular undergraduate major**. They do emphasize the importance of pursuing a broad liberal arts education and avoiding narrow specialization in any one area. While the University does not have a major in pre-dentistry, it offers the full array of science and other classes needed to prepare you for graduate work in dentistry, i.e., a pre-dental curriculum. You can select from among a variety of majors, including more than 50 in the School of Arts and Sciences, or undergraduate degree programs in other Pitt schools such as business administration, bioengineering, pharmacy, or social work. Should you decide not to attend dental school, the structure of the pre-dental curriculum gives you an excellent background for many types of graduate programs and employment.

However, because many pre-dental students are interested in the sciences and because many of the courses required for certain science majors coincide with the preparatory course work needed for dental school, many who plan to attend dental school pursue an undergraduate degree in biology, neuroscience, or chemistry.

Required Courses

Regardless of major, all students interested in applying to dental school must show competence in the required science courses (a 3.00 mean quality point average [QPA] is the required minimum to be considered for an interview), as well as academic competence (a 3.0 required minimum overall QPA for dental school admission). Dental schools also look for excellent communication and problem-solving abilities, a love of learning, creativity, motivation, and a commitment to a career in dentistry. These attributes are reflected in your academic performance, as well as in the activities you pursue that are related to dental medicine, such as volunteering with a general dental practitioner, working in a hospital, and/or participating in research.



The following courses are required for admission to dental school and should be completed by the end of your junior year:

Biology

BIOSC 0150 Foundations of Biology 1 (3 credits)
BIOSC 0050 Foundations of Biology Lab 1 (1 credit)
BIOSC 0160 Foundations of Biology 2 (3 credits)
BIOSC 0060 Foundations of Biology Lab 2 (1 credit)

Chemistry

CHEM 0110 General Chemistry 1 (4 credits)
CHEM 0120 General Chemistry 2 (4 credits)
CHEM 0310 Organic Chemistry 1 (3 credits)
CHEM 0330 Organic Chemistry Lab 1 (1 credit)
CHEM 0340 Organic Chemistry 2 (3 credits)
CHEM 0320 Organic Chemistry Lab 2 (1 credit)

English (6 credits minimum)

Any composition or literature courses

Physics

PHYS 0110 Introduction to Physics 1 (3 credits)
PHYS 0111 Introduction to Physics 2 (3 credits)
PHYS 0212 Introduction to Laboratory Physics (2 credits)
Other courses recommended for pre-dentistry students are BIOSC 1000 Biochemistry, BIOSC 1080 Human Anatomy and Physiology, and SA 0140 Foundation Sculpture.

University Honors College

Many students interested in attending dental school take courses through the University Honors College (UHC) as undergraduates. UHC offers many resources for talented, active students—unique courses, special degrees, opportunities to perform independent research or teach, supplemental advising, and a social and academic community of similarly motivated students. It does not have a formal membership and is open to students throughout the campus, although you usually must meet the academic qualifications of individual courses. An average of 40 UHC courses is offered each semester in a variety of departments, and many of these are honors equivalents of the science courses required for admission to dental school. Examples of courses include Literature and Psychoanalysis, Buddhist Civilization, Modern Physical Measurements, History of Sports, and Functional Neuroanatomy.

Certificate in Conceptual Foundations of Medicine

The Department of History and Philosophy of Science offers a Certificate in Conceptual Foundations of Medicine program that gives students an opportunity to examine the connections between science and the humanities as they relate to medicine. Students explore topics such as the aim of medicine, the nature of diagnosis, and philosophical approaches to ethical dilemmas in contemporary medicine. This program is of particular interest to students interested in the healthcare professions and consists of the following courses:

- HPS 0612 Mind and Medicine
- HPS 0613 Morality and Medicine
- One two-term college-level course in biology (satisfied by BIOSC 0150 and 0160 Foundations of Biology 1 and 2)
- Two upper-level courses dealing with social and conceptual issues in the medical sciences (these courses must be from two different departments)
- At least a C grade in each of the required courses and at least a C+ average overall in the certificate requirements

Advising

Advisors from the School of Arts and Sciences advising center assist students who want to attend dental school in planning their course work to satisfy the requirements of their major, selecting the science courses required for admission to dental school, and pursuing a broad-based education that reflects their interests. The pre-professional health careers consultant meets with students individually to help them clarify their career goals, balance their academic life with extracurricular activities and community service, and apply to dental school. Near the end of their junior year, most students elect to prepare a personal portfolio to be reviewed by the pre-professional health committee, which is a group of University faculty members who prepare a composite evaluation for each student based on a review. This evaluation is then submitted as part of the dental school application.

DAT Entrance Exam

All dental school applicants must take the Dental Admission Test (DAT), which is the entrance examination required for admission to all dental schools. Dental school candidates are advised to take this exam no later than September of the year before the intended entrance to dental school. The DAT tests skills in physical and biological sciences, reading comprehension, quantitative reasoning, and perceptual ability (two- and three-dimensional problem solving).

For more information on the pre-dentistry, pre-medicine, or other pre-professional allied health career programs (optometry, podiatry, veterinary science, or chiropractic medicine), contact:

University of Pittsburgh
Career Development Office
Pre-professional Health Advising
224 William Pitt Union
Pittsburgh, PA 15260
412-648-7130
www.placement.pitt.edu/advisors/aabt.html

For information on other majors, including preparation for health careers such as occupational therapy, clinical dietetics and nutrition, and emergency medicine, contact:

University of Pittsburgh
Office of Admissions and Financial Aid
Alumni Hall, 4227 Fifth Avenue
Pittsburgh, PA 15260
412-624-PITT
E-mail: oafa@pitt.edu
www.oafa.pitt.edu

Campus and Community Involvement

Dental Science Club

To introduce undergraduate students to the field of dentistry, this group, under the supervision of current dental school students, hosts professional speakers and sponsors laboratory exercises that enable undergraduates to learn rudimentary skills such as drilling and filling teeth (using plastic teeth) and making impressions.

Volunteering

All undergraduate students who are interested in a career in dentistry are encouraged to volunteer at medical institutions to explore and confirm their interest in dentistry. The University of Pittsburgh Medical Center (UPMC) offers volunteer opportunities for undergraduate students at a variety of locations in its hospitals and clinics, including the emergency department, anesthesia workroom, operating rooms, recovery room, pharmacy, and laboratories. Additionally, it is recommended that students solidify their decision to attend dental school by volunteering or working for a local dentist.

Community Service

Community service gives all students hands-on experience with helping people. Some programs you can get involved with include tutoring University and middle-school students, helping out at local nursing homes, and building homes for low-income families with Habitat for Humanity.

Undergraduate Research

For students interested in biomedical research, opportunities exist to assist in research labs in locations such as the Departments of Biological Sciences, Chemistry, or Neuroscience; the School of Medicine; the Graduate School of Public Health; UPMC hospitals; the University of Pittsburgh Cancer Institute; and Western Psychiatric Institute and Clinic. Undergraduate research can be undertaken for academic credit or a salary in the junior or senior year or during the summer.

Study Abroad

Studying abroad is an exciting way to add an international perspective to your undergraduate education and strengthen your credentials as a graduate. The University of Pittsburgh encourages you to take advantage of this opportunity (almost 5 percent of Pitt students study abroad compared with 1.3 percent, nationally). Study abroad will not only distinguish you when you enter the job market or pursue graduate study, but also help broaden your experience of the world beyond your own country's borders, giving you an appreciation of other cultures and peoples while allowing you to earn credits toward your degree. Scholarships are available, and financial aid is applicable.

Students considering this tract should be aware that study abroad is a viable option. It is recommended that you look into study abroad rather early in your undergraduate career. You may fulfill Arts and Sciences required courses practically anywhere in the world. However, the option to study in the United Kingdom or the University of Sussex exists. The University of Lancaster offers a huge range of courses and allows students to register in multiple departments. Lancaster is one of the few universities in England to offer an independent research option with virtually no restrictions on your choice of topic. In addition, science students find Lancaster particularly welcoming, because nearly all science courses are open to study abroad students. Through a Pitt exchange to the University of Sussex, where you will pay Pitt tuition and room and board to the host institution, you will find a lively student body and a huge number of clubs and societies. Sussex prides itself on effective teaching styles that attract scholars from around the world.