MD/MSE Dual-Degree Program

Current students at Dell Medical School may choose the MSE in BME option to fulfill requirements of the Growth Year during year 3 of their medical training. After completion of one year of coursework, students earn a Master of Science in Engineering (MSE) in Biomedical Engineering (BME).

MD/MSE in BME Goal

The goal of this program is to produce physicians who are able to practice medicine and biomedical research with the **quantitative analytical skills** of an engineer, with skills in:

- · imaging and instrumentation
- biomaterials and/or biomolecular engineering
- computational bioengineering and
- · molecular, cellular, and tissue biomechanics

Page Contents:

- MD/MSE in BME Goal
- Years 1-4 MD/MSE in BME Progression
- Coursework Requirements (30 credit hours)
- Other Requirements
- Questions?

Years 1-4 MD/MSE in BME Progression

Year	Plan
1	Student enrolled at DMS in MED coursework, includes 12 credit hours of BME supporting coursework (MED 181 & 185)
2	Student enrolled at DMS in MED coursework
3	Student enrolled at UT Graduate School in master's degree program and completes 18 credit hours of courses (6 BME courses)
4	Student enrolled at DMS in MED coursework and completes outstanding BME coursework, if any

Coursework Requirements (30 credit hours)

Required Courses (24 credit hours)	Credit Hours	MS Year	Course Title
(24 Credit Hours)			
BME 681M / MED 181	6	MS Y1	Normal Body Structure and Function
BME 685M / MED 185	6	MS Y1	Mechanisms of Disease
BME 382J, Topic 4	3	MS Y3	Advanced Engineering Biomaterials
BME 381J, Topic 3	3	MS Y3	Biomedical Imaging: Signals and Systems
BME 380J, Topic 7	3	MS Y3	Biomechanics of Tissues, Scaffolds, and Cells
or Topic 10			or Immune Engineering
BME 380J, Topic 5	3	MS Y3	Biostatistics, Study Design, and Research Methodology
Choose 2 Electives	Credit Hours	MS Year	Course Title
(6 credit hours)			
BME 381J, Topic 8	3	MS Y3	Functional Imaging Laboratory
BME 384J, Topic 5	3	MS Y3	Projects in Biomedical Engineering
BME 397	3	MS Y3	Research Problems
Other	3	MS Y3	

Application for Admission

The application for admission opens in August each year with an application deadline of December 1. Application materials required include:

- graduate application for admission
- 3 letters of recommendation
- structured statement of purpose
- transcripts
- GRE requirement is waived for MSE MD applicants

At this time, our program does not have a limit on the number of students that can apply or be admitted

To maintain satisfactory academic progress, students enrolled in this program must maintain at least a 3.0 GPA.

Other Requirements

All graduate students in BME, including master's students in the coursework only and thesis track, are required to attend seminars designed to promote academic and professional development and networking opportunities. These seminars include the Responsible Conduct in Research (Ethics) Seminar offered in two parts in the fall and spring semesters, the Individual Development Plan (IDP) Workshop each fall semester, and the Graduate Research Seminars that take place throughout the semester on Thursday afternoons.

Questions?

Contact Cyndi Goodson, UT BME's graduate program administrator, at cyndi.goodson@austin.utexas.edu