Biomedical Engineering (M.S.)

Create the next generation of medical devices by bridging the gap between engineering and medicine for better patient outcomes.

Today’s health issues will be solved with tomorrow’s diagnosis, monitoring, surgical and therapy technologies. With this graduate program, you’ll gain the expertise to advance the biomedical device field and create innovative solutions through research and product development.

Program Snapshot

Program type: Master’s Degree  
Format: On-campus or online  
Est. time to complete: 2 years  
Credit hours: 30

Why Study Biomedical Engineering at UND?

From amazing medical technology featured in sci-fi movies, to the futuristic-like devices in today’s most advanced hospitals, it will take experts that can fuse engineering and medicine to imagine tomorrow’s innovations. Biomedical engineers create life-saving devices that can create artificial organs, automate monitoring of vitals, assist in surgeries, simulate procedures and many other exciting medical advancements once considered science fiction.

You’ll be a part of collaborative biomedical research and device development team in the College of Engineering and Mines. Advance your knowledge to help launch the next generation of medical breakthroughs. Most importantly, you’ll gain the expertise to help create new medical devices that can help improve the healthcare outcomes of lives all around the world.

Top Online Graduate Engineering Program in the Nation

Every accredited engineering education program offers education, but not every program prepares students to make a real impact the way UND does. UND is increasingly regarded as one of the top academic and research institutions in the nation for engineering. We consistently rank among the best for educational quality, affordability, and career outcomes.

Recognized by U.S. News & World Report as a top online graduate engineering program.

Application Deadlines

FALL: Aug 1  
SPRING: Dec 1  
SUMMER: May 1

Program Highlights

- Open yourself up to greater career opportunities with a program designed to focus on areas where biomedical engineering expertise is most needed.
- Individualize your program and choose from several Biomedical Research Groups (BRG).
- BRG options include: biomechanics, biomaterials, bio-instrumentation, multi-scale, bio-simulation and modeling, bio-signals and other emerging areas.
- Leverage the expertise and resources of three departments: College of Engineering and Mines, School of Medicine and Sciences and NDSU’s College of Engineering.

Outcomes

90K  
Average salary for biomedical engineers*

*Average salary as of 2023.
Expected growth for the field in the next 10 years*

*U.S. Bureau of Labor Statistics

UND graduates of this program can expect to be highly sought by companies in the rapidly-growing field of medical devices. Top medical device companies today include:

- Johnson & Johnson
- GE Healthcare
- Siemens
- Medtronic
- Baxter International
- Philips (Healthcare)