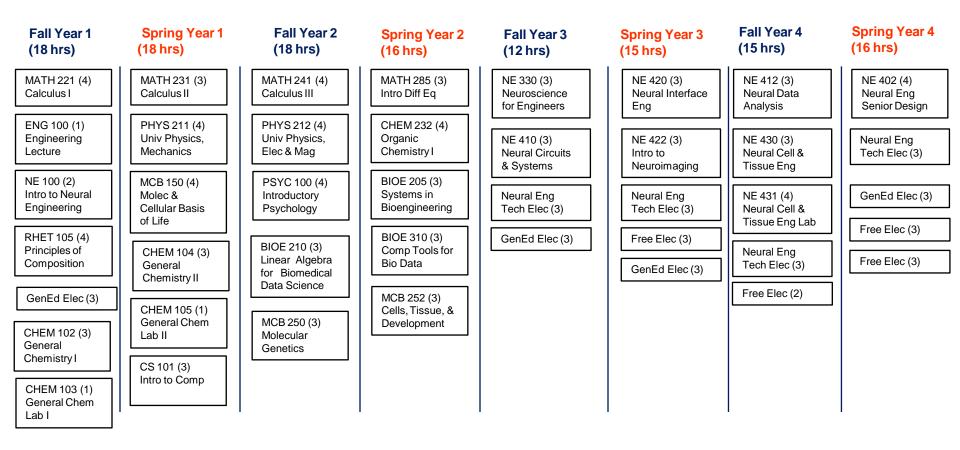
Neural Engineering Curriculum Map Suggested Sequence by Semester



General Education Requirements

- □ 6 hours in Humanities
- □ 2 hours in Social/Behavioral Sciences
- I Advanced Composition Course
- Language Other Than English

- □ 1 Western Comparative Cultures Course
- □1 Non-Western Comparative Cultures Course
- □1 US Minority Cultures Course

Neural Engineering Technical Electives

- Bioengineering:
- BIOE 420 Intro Bio Control Systems (3 hr)
- BIOE 424 Preclinical Molecular Imaging (3 hr)
- BIOE 430 Intro to Synthetic Biology (3 hr)
- BIOE 460 Gene Editing Lab (3 hr)
- BIOE 476 Tissue Engineering (3 hr)
- BIOE 483 Biomedical Computed Imaging Systems (3 hr)
- BIOE 484 Statistical Analysis of Biomedical Images (3 hr)
- BIOE 485 Comp Math for Machine Learning & Imaging (4 hr)
- BIOE 486 Applied Deep Learning for Biomedical Images (3 hr)
- BIOE 487 Stem Cell Bioengineering (3 hr)
- BIOE 488 Applied High-Performance Comp for Imaging Science (3 hr)
- BIOE 489 Regulations, Ethics, & Logistics in Biomedical Applied Learning (3 hr)
- BIOE 498 HG Soft Robotics (3 hr)
- BIOE 498 AL Immunoengineering (3 hr)

- Electrical & Computer Engineering:
- ECE 416 Biosensors (3 hr)
- ECE 442 Silicon Photonics (3 hr)
- ECE 459 Communications Systems (3 hr)
- ECE 460 Optical Imaging (4 hr)
- ECE 461 Digital Communications 3 hr)
- ECE 467 Biophotonics (3 hr)
- ECE 470 Intro to Robotics (4 hr)
- ECE 480 Magnetic Resonance Imaging (3 hr)
- Mechanical Engineering:
- ME 483 Mechanobiology (4 hr)
- Psychology:
- PSYC 210 Behavioral Neuroscience (3 hr)
- PSYC 404 Cognitive Neuroscience (3 hr)
- Physics:
- PHYS 475 Intro to Biophysics (3 hr)