Technical Area/Track 2: **Cellular and Biomolecular Engineering**

**Fall**

- **3**
  - **BME 221** M
    Measurement and Instrumentation Lab
    - BME 311
    - BME 113L
    - BME 314
    - BME 333T & 335
  - **BME 343** M
    BME Signal and Systems Analysis
    - BME 311
    - BME 113L
    - BME 314
    - M 427K
  - **BME 365R** M
    Quantitative Engr. Physiology I
    - BME 311
    - BME 113L
    - BME 314
    - M 427K
    - CH 369
    - PHYS 303L & 103N
  - **BME 353** M
    Transport Phenomena in Living Systems
    - BME 311
    - BME 113L & 314
    - BME 314
    - M 427K
    - CH 369
  - **U.S. Hist.** C
    U.S. History Course from Approved List
  - **Technical Elective** T
    Technical Elective

**Spring**

- **BME 251** M
  Biomedical Image, Signal, & Transport Process Lab
  - BME 221
  - M 427K
- **BME 348** M
  Modeling of BME Systems
  - BME 343
  - BME 113L
- **BME 365S** M
  Quantitative Engr. Physiology II
  - BME 365R
  - BME 314
  - BME 221 or Full Major Seq
- **BME 352** T
  Engineering Biomaterials
  - BME 314
  - BME 221 or Full Major Seq
- **E 316K** C
  Masterworks of Literature
  - RHE 306
- **VAPA** C
  Visual & Performing Arts from Approved List

**Fall**

- **4**
  - **BME 370** M
    Principles of Engineering Design
    - BME 348 & 353
    - BME 251
    - BME 365S
  - **GOV 310L** C
    American Government
  - **SOC. SCI.** C
    Social & Behavioral Sci. from Approved List
  - **BME 339** T
    Biochemical Engineering
    - BIO 311C
    - CH 353(M)
    - CH 369
  - **Engr. Elective*** S
    Engr. Elective (3 hours)
  - **Technical Elective** T
    Technical Elective

**Spring**

- **BME 371** M
  Biomedical Engineering Design Project
  - BME 370
  - BME 335
- **GOV 312L** C
  Issues and Policies in American Government
  - GOV 310L
- **U.S. Hist.** C
  U.S. History Course from Approved List
- **Engr. Elective*** S
  Engr. Elective (3 hours)
- **Technical Elective** T
  Technical Elective

**Cellular and Biomolecular Technical Electives:**

*Must choose two of the following for a total of six hours:

- **Any upper-division BME (3 hours)**
- **Approved upper-div Engr.**
- **Approved upper-div Comp Sci.**
- **Approved upper-div Physics**
- **Approved upper-div Math**

**Remaining three credit hours must be in Biomedical Engineering. Please choose one:**

- **BIO 325** T
  Genetics
  - BIO 311C
  - BME 314
- **CH 320N & 220C** T
  Organic Chem II & Lab
  - CH 320M
- **OR**
  - **CH 328N & 128L** T
  Organic Chem II & Lab
  - CH 328M
  - CH 128K

**Must choose two of the following for a total of six hours:**

- **Approved upper-div Engr.**
- **Approved upper-division BME**
- **Approved upper-div Comp Sci.**
- **Approved upper-div Math**
- **Approved upper-div Physics**
- **Approved BME Tech Elect**
- **Approved Graduate Course**

---

**Legend**

- **T** — Technical Area
- **B** — Basic Sequence
- **C** — Core Curriculum
- **M** — Major Sequence
- **S** — Supporting Course
- **T** — Technical Elective
- **PRE-REQ** — Pre-requisite
- **CO-REQ** — Co-requisite
- **FLAG** — Permission from Instructor

**Revised: 07/10/2013; SCD**