Accepted Restricted Elective Courses

Prerequisites for these courses are satisfied by required courses in the BSMET program (or satisfied by taking other accepted restricted elective courses)

Engineering
- **ENGR 329** Bicycle Design and Frame-Building (3 Credits) Prerequisites: ENGR 125 and ENGR 263.
- **ENGR 333** Lean Principles (3 Credits) Prerequisites: ENGR 225.
- **ENGR 336** Heat and Power (3 Credits) Prerequisites: ENGR 312 and ENGR 321.
- **ENGR 353** Exploring Entrepreneur Opportunities (3 Credits) Prerequisites: none.
- **ENGR 424** Machine Elements (3 Credits) Prerequisites: ENGR 325.
- **ENGR 425** Advanced Manufacturing (3 Credits) Prerequisites: ENGR 225, ENGR 305, and STAT 305.
- **ENGR 455** Fluid Power Systems (3 Credits) Prerequisites: ENGR 321.

Math
- **MATH 236** Differential Equations and Linear Algebra (4 Credits) Prerequisites: MATH 152 or MATH 136.
- **MATH 361** Numerical Analysis (4 Credits) Prerequisites: MATH 152 or MATH 136.
- **MATH 362** Fourier Analysis (3 Credits) Prerequisites: MATH 152 or MATH 136.
- **MATH 365** Mathematical Modeling (3 Credits) Prerequisites: MATH 136 or MATH 152, and one of the following: MATH 225, MATH 236, MATH 240, MATH 253, MATH 260, or STAT 200.
- **MATH 366** Methods of Applied Mathematics II (3 Credits) Prerequisites: MATH 360; and CSCI 110/CSCI 110L or CSCI 111 or CSCI 130 or CSCI 310.
- **MATH 369** Discrete Structures I (3 Credits) Prerequisites: MATH 152 or MATH 136; and CSCI 110/CSCI 110L or CSCI 111 or CSCI 130.

Computer Science
- **CSCI 360** Robotic Perception and Planning (3 Credits) Prerequisites: CSCI 111 or CSCI 130.

Business/Computer Information Systems
- **CISB 305** Solving Problems Using Spreadsheets (3 Credits) Prerequisites: none.

Statistics
- **STAT 301** Computational Statistics (3 Credits) Prerequisites: STAT 200 or STAT 215 or STAT 241 or CISB 241. (Request override from instructor if you have completed STAT 305)
- **STAT 312** Correlation and Regression (3 Credits) Prerequisites: STAT 301.
- **STAT 313** Sampling Techniques (3 Credits) Prerequisites: STAT 200 or STAT 215 or STAT 241 or CISB 241. (Request override from instructor if you have completed STAT 305)
- **STAT 425** Design and Analysis of Experiments (3 Credits) Prerequisites: STAT 301; and MATH 151 or MATH 135 or MATH 131 or MATH 121.

Biology
- **BIOL 209 & 209L** Human Anatomy and Physiology (3 Credits Lecture + 1 Credit Lab) Prerequisites: none.
- **BIOL 352 & 352L** Human Physiology (3 Credits Lecture + 1 Credit Lab) Prerequisites: BIOL 105 or BIOL 209. Corequisites: BIOL 352L.
- **BIOL 410 & 410L** Human Osteology (3 Credits) Prerequisites: BIOL 209/BIOL 209L. Corequisites: BIOL 410L.

Environmental Science
- **ENVS 331 & 331L** Water Quality (3 Credits Lecture + 1 Credit Lab) Prerequisites: CHEM 121 or higher; and STAT 200. Corequisites: ENVS 331L. (Request override from instructor if you have completed STAT 305)
- **ENVS 370** Renewable Energy (3 Credits) Prerequisites: MATH 113 or higher.
Accepted Restricted Elective Courses

May require 1 or more additional courses to satisfy prerequisites

Math
- **MATH 310** Number Theory (3 Credits) Prerequisites: MATH 240.
- **MATH 352** Advanced Calculus (3 Credits) Prerequisites: MATH 240.
- **MATH 360** Methods of Applied Mathematics (3 Credits) Prerequisites: MATH 253, and MATH 236 or MATH 260.

Computer Science
- **CSCI 322** Embedded Systems (3 Credits) Prerequisites: CSCI 241; or CSCI 112 and ENGR 140
- **CSCI 345** Video Game Design (3 Credits) Prerequisites: CSCI 112.
- **CSCI 365** Data Mining (3 Credits) Prerequisites: CSCI 112; and STAT 200 or STAT 215.

Statistics
- **STAT 350** Mathematical Statistics I (3 Credits) Prerequisites: STAT 200 and MATH 253 (may be taken concurrently).
  (Request override from instructor if you have completed STAT 305)
- **STAT 351** Mathematical Statistics II (3 Credits) Prerequisites: STAT 350.

Physics
- **PHYS 230** Intermediate Dynamics (3 Credits) Prerequisites: PHYS 132/PHYS 132L, and MATH 253 (may be taken concurrently).
- **PHYS 231** Modern Physics (3 Credits) Prerequisites: PHYS 132/PHYS 132L, and MATH 253 (may be taken concurrently).
- **PHYS 311** Electromagnetic Theory I (3 Credits) Prerequisites: MATH 253; and PHYS 230 or PHYS 231.
- **PHYS 312** Electromagnetic Theory II (3 Credits) Prerequisites: PHYS 311.
- **PHYS 321** Quantum Theory I (3 Credits) Prerequisites: PHYS 231; and MATH 260 or MATH 236.
- **PHYS 342** Advanced Dynamics (3 Credits) Prerequisites: PHYS 230, and MATH 260 or MATH 236.
- **PHYS 362** Statistical and Thermal Physics (3 Credits) Prerequisites: CHEM 321 or PHYS 230; and MATH 253.
- **PHYS 372** General Relativity (3 Credits) Prerequisites: PHYS 230 and MATH 236 or MATH 260.

Chemistry
- **CHEM 300** Environmental Chemistry (4 Credits) Prerequisites: CHEM 122/CHEM 122L or CHEM 132/CHEM 132L.
- **CHEM 301 & 301L** Analytical Chemistry (3 Credits Lecture + 1 Credit Lab) Prerequisites: CHEM 132/CHEM 132L.
  Corequisites: CHEM 301L.
- **CHEM 311 & 311L** Organic Chemistry I (4 Credits Lecture + 1 Credit Lab) Prerequisites: CHEM 132/CHEM 132L.
  Corequisites: CHEM 311L.
- **CHEM 312 & 312L** Organic Chemistry II (4 Credits Lecture + 1 Credit Lab) Prerequisites: CHEM 132/CHEM 132L or permission of instructor. Corequisites: CHEM 312L.
- **CHEM 321** Physical Chemistry I (3 Credits) Prerequisites: CHEM 132/CHEM 132L or CHEM 151/CHEM 151L; and MATH 152; and PHYS 111/PHYS 111L or PHYS 131/PHYS 131L.
- **CHEM 322** Physical Chemistry II (3 Credits) Prerequisites: CHEM 132/CHEM 132L or CHEM 151/CHEM 151L; and MATH 253 (may be taken concurrently); and PHYS 111/PHYS 111L or PHYS 131/PHYS 131L.