

Mechanical Engineering

2020-2021 Catalog

129 Total Credits

First Year

Semester 1

- 4 Chem 167 (Chem for Engrs)
- 3 ME 160 (Engr Problem Solving)
- 4 Math 165 (Calculus I)
- R Engr 101 (Engr Orientation)
- 3 Gen Ed Elective

14 Total Credits

Semester 2

- 3 Engl 150 (Critical Think & Comm)
- 3 ME 170 (Engr Graphics/Design)
- 4 Math 166 (Calculus II)
- 5 Phys 221 (Classical Physics I)
- 1 Lib 160 (Library)

16 Total Credits

Sophomore Year

Semester 3

- 3 CE 274 (Statics)
- 3 Mat E 273 (Principles of Mat E)
- 4 Math 265 (Calculus III)
- 4 Phys 232 (Classical Physics II)
- 1 Phys 232L (Classical Physics II lab)
- 3 Engl 250 (WOVE Comp)

18 Total Credits

Semester 4

- 3 EM 324 (Mech of Materials)
- 4 Math 267 (Differential Equations)
- 3 ME 231 (Thermodynamics I)
- 3 ME 270 (Intro ME Design)
- R ME 202 (ME Professional Planning)
- 3 Gen Ed Elective

16 Total Credits

Junior Year

Semester 5

- 2 EE 442 (Circuits & Instruments)
- 2 EE 448 (AC Circuits & Motors)
- 3 ME 345 (Dynamics)
- 3 ME 332 (Thermodynamics II)
- 3 Stat 305 (Engr Statistics)
- 1 ME 324L (Manufacturing Lab)
- 3 Gen Ed Elective

17 Total Credits

Semester 6

- 3 ME 325 (Machine Design)
- 4 ME 335 (Fluid Flow)
- 3 ME 370 (Engr Measurements)
- 3 ME 324 (Manufacturing Engr)
- 3 Communication Requirement
(Engl 302/309/314 or SpCm 212)

16 Total Credits

Senior Year

Semester 7

- 3 Gen Ed Elective (Intl Perspective)
- 4 ME 421 (System Dynamic/Contrl)
- 4 ME 436 (Heat Transfer)
- 3 Technical Elective
- 3 Technical Elective

17 Total Credits

Semester 8

- 3 Gen Ed Elective (US Diversity)
- 3 Technical Elective
- 3 Technical Elective
- 3 Technical Elective
- 3 Capstone Design

15 Total Credits

Shading indicates Basic Program courses

Compiled from official ISU catalog 4-year plans (catalog.iastate.edu/undergraduatemajors-alpha/)