

BACHELOR OF SCIENCE IN MECHANICAL ENGINEERING, 2018-19

For more information about policies and requirements, please see the [UMKC 2018-19 Catalog](#).

FIRST YEAR

| FALL SEMESTER | HOURS | SPRING SEMESTER | HOURS |
|---------------------------------------------------------------------------------------|-----------|---------------------------------------------------------------|-----------|
| MATH 266 Accelerated Calculus I | 4 | MATH 268 Accelerated Calculus II | 3 |
| CHEM 211 General Chemistry I (FOCUS B) | 4 | PHYS 240 Physics for Science & Engineering I (FOCUS Elective) | 5 |
| CHEM 211L General Chemistry I Lab | 1 | ME 130 Engineering Graphics | 3 |
| Anchor I Reasoning and Values Recommend: ANCH 150 Computing, Engineering & Society | 3 | Anchor II Culture and Diversity | 3 |
| DISC 100 Discourse I | 3 | DISC 200 Discourse II | 3 |
| Shop Safety Class (Take CIMM 101 at MCC)* | 1 | | |
| TOTAL | 16 | TOTAL | 17 |

SECOND YEAR

| FALL SEMESTER | HOURS | SPRING SEMESTER | HOURS |
|---------------------------------------------------------------------------------------------------------------------------------|-----------|-----------------------------------|-----------|
| ME 272 Engineering Analysis | 3 | MATH 250 Calculus III | 4 |
| PHYS 250 Physics for Science & Engineering II | 5 | CE 276 Strength of Materials | 3 |
| CE 275 Engineering Statics | 3 | ECE 276 Circuit Theory I | 3 |
| ECE 216 Engineering Computation | 4 | ECE 277 Circuit Theory I Lab | 1 |
| FOCUS C Human Values and Ethical Reasoning Recommend: HIST 101, 102, or POLS-SCI 210 to fulfill the Constitution Requirement | 3 | ME 299 Engineering Thermodynamics | 3 |
| | | ME 285 Engineering Dynamics | 3 |
| TOTAL | 18 | TOTAL | 17 |

THIRD YEAR

| FALL SEMESTER | HOURS | SPRING SEMESTER | HOURS |
|-----------------------------------------------|-----------|------------------------------------------|-----------|
| CE 319 Engineering Computation and Statistics | 3 | ME 306 Computer Aided Engineering | 3 |
| ME 324 Engineering Materials | 3 | ME 385 System Dynamics | 3 |
| ME 324L Engineering Materials Lab | 1 | ME 352 Mechanical Instruments Lab | 2 |
| ME 351 Fluid Mechanics | 3 | ME 380 Manufacturing Methods | 3 |
| ME 356 Mechanical Component Design | 3 | ME 399 Heat and Mass Transfer | 3 |
| ME 360 Thermal System Design | 3 | ME 353 Heat Transfer/Fluid Mechanics Lab | 2 |
| TOTAL | 16 | TOTAL | 16 |

FOURTH YEAR

| FALL SEMESTER | HOURS | SPRING SEMESTER | HOURS |
|-------------------------------------------------|-----------|----------------------------------------------|-----------|
| ANCH 309 (ME 492) Mechanical Design Synthesis I | 3 | ME 496WI Mechanical Design Synthesis II | 3 |
| DISC 300 Discourse III | 3 | ME 4XX Interest Area Required Elective | 3 |
| ME 4XX Interest Area Required Elective | 3 | ME 4SE Design Elective (ME440, ME451, ME457) | 3 |
| ME 4XX Interest Area Elective | 3 | ME 4XX Interest Area Elective | 3 |
| ME 4XX Technical Elective | 3 | FOCUS A Arts and Humanities | 3 |
| TOTAL | 15 | TOTAL | 15 |

*Can be taken any semester before ME 324L.

Total Credits to Graduate: 130

ME Elective Interest Areas: Materials; Thermal & Fluid Sciences; Robotics & Controls; Biomechanics; General.