Master of Engineering: 30 Credits / 10 Courses
The standard course plan for each consists of five courses from the core area and five technical electives. There is no research or thesis required for this degree.

### General Mechanical Core (choose five):
- ENME600 Engineering Design Methods
- ENME605 Advanced Systems Control
- ENME607/ENRE671 Engineering Decision Making and Risk Management
- ENME610 Engineering Optimization
- ENME631 Advanced Conduction and Radiation Heat Transfer
- ENME632 Advanced Convection Heat Transfer
- ENME640 Fundamentals of Fluid Mechanics
- ENME662 Linear Vibrations
- ENME690 Mechanical Fundamentals of Electronic Systems
- ENME712 Measurement, Instrumentation and Data Analysis for Thermo-Fluid Processes
- ENPM652 Applied Finite Element Methods (every summer)
  or ENME674 Finite Element Methods
- ENPM671 Advanced Mechanics of Materials

### General Mechanical Pre-Approved Technical Electives (choose five):
- ENME611 Fiber Optics
- ENME625 Multidisciplinary Optimization
- ENME627 Manufacturing with Polymers
- ENME641 Viscous Flow
- ENME642 Hydrodynamics I
- ENME656 Physics of Turbulent Flow
- ENME664 Dynamics
- ENME665 Advanced Topics in Vibrations
- ENME670 Continuum Mechanics
- ENME672 Composite Materials
- ENME675 Mathematical Introduction to Robotics
- ENME680 Experimental Mechanics
- ENME684 Modeling Material Behavior
- ENME693 High Density Electronic Assemblies and Interconnects
- ENME695 Failure Mechanisms and Reliability
- ENME700 Advanced Mechanical Engineering Analysis I
- ENME704 Active Vibration Control
- ENME711 Vibration Damping
- ENME765 Thermal Issues in Electronic Systems
- ENME770 Life Cycle Cost and System Sustainment Analysis
- ENME780 Mech. Design of High Temp. and High Power Electronics
- ENPM809D Applied Engineering Optimization
- ENPM809E Applied Topology Optimization

NOTE: Any courses not listed above must be approved by the Senior Academic Advisor PRIOR to registration.

### KEY
- Online Option * (offering information)
- [Prerequisite course]