

## **BACKGROUND COURSES FOR MECHANICAL ENGINEERING GRADUATE PROGRAM**

Additional Course Requirements for Students with B. S. in  
**Mechanical Engineering Technology**

**MECHANICAL ENGINEERING TECHNOLOGY (MET)** students, planning to enter graduate program in Mechanical Engineering, are strongly encouraged to take the Mechanical Engineering Minor (either in Mechanics area - for design and manufacturing or mechanics specialties; or in Thermal Science area - for fluid, thermal or energy specialties). Details of courses in these minors are listed in information sheet "**Minor in Mechanical Engineering**".

All students with a BS degree in **MET** pursuing the Master Program in **Mechanical Engineering** are required to take the following background course:

1. MATH 304U Mathematical Methods 3 credit hours

### **DESIGN & MANUFACTURING**

All students with a BS degree in **MET** pursuing the Master degree in design & manufacturing are required to take additional background courses. This background course requirement can be automatically satisfied by taking ME minor in mechanics. Those students not taking ME minor will be required to take additional ME courses. These courses are:

ME 340, and ME 436 (or 438).

### **THERMAL/FLUID/ENERGY**

All students with a BS degree in **MET** pursuing the Master degree in this area are required to take additional background courses. This background course requirement can be automatically satisfied by taking ME minor in thermal science. Those students not taking ME minor will be required to take additional ME courses. These courses are: ME 303, ME 312, and ME 340.

(Please note that all prerequisites and corequisites must be satisfied for all courses taken.)

**MINOR IN MECHANICAL ENGINEERING**  
**for**  
**STUDENTS IN MECHANICAL ENGINEERING TECHNOLOGY**

**MECHANICAL ENGINEERING TECHNOLOGY (MET)** students are strongly encouraged to take the Mechanical Engineering Minor in thermal science or mechanics. This is especially important if you are planning to pursue a Master degree in Mechanical Engineering as part of five year BS-Masters program. MET students seeking graduate degree in Mechanical Engineering should consult the information sheet titled, "BACKGROUND COURSES" at [//www.mem.odu.edu/-graduate study/background courses/](http://www.mem.odu.edu/-graduate%20study/background%20courses/).

The advantages of the Minor are that

1. You satisfy University's upper division course requirement.
2. You satisfy background courses requirement to enter the Mechanical Engineering graduate program.
3. If you take two 500 level (dual 400/500) courses as part of the minor, they will count as part of your graduate program. As a result, you will be required to take only additional 24 credit hours of graduate courses for your master's degree.
4. These courses, depending on your selection, may help you in Fundamentals of Engineering examination.

The specific minimum courses required (12 credit hours) are as follows:

1. ME minor in mechanics — ME 220, 404, 405 (or 340), 436 (or 438).
2. ME minor in thermal science — ME 303, 311, 312, 312 (or 414), 315 (or 411).