

Computer Policy

Mechanical Engineering students are required to have a Microsoft Windows personal laptop computer that is powerful enough to support the demanding video and computational requirements necessary for coursework. The laptop should be capable of running [SolidWorks](#).

Minimum System Requirements:

- *Operating System:* Windows 10 (64-bit)
- *Processor:* 3.3 GHz or higher
- *Memory:* 16 GB RAM
- *Hard Drive:* 256 GB Capacity
- *Graphics:* Must work reliably with SolidWorks models and assemblies (see below)
- *Mouse:* 3-button mouse with scroll wheel
- *Communication:* Wireless Ethernet (WLAN)

Recommended System Requirements:

- *Operating System:* Windows 11 Pro
- *Processor:* Intel Core Ultra 7
- *Memory:* minimum 16 GB
- *Hard Drive:* minimum 500 GB capacity, solid state drive (SSD)
- *Graphics:* 4GB or more NVIDIA Quadro / RTX or AMD Radeon Pro dedicated graphics card
- *Mouse:* 3-button mouse with scroll wheel
- *Warranty:* 3 Year onsite with accidental damage coverage
- *Communication:* Wireless Ethernet (WLAN)

Notes for SolidWorks software

Most GeForce, Radeon (non-pro) and integrated graphics cards are not “Certified” for SolidWorks use, but have often been used without problems for part and assembly modeling. If a non-certified graphics card is to be used, it is highly recommended that a newer computer with a newer high-end (i5 or i7) processor be used.

System Requirements for various software used in Mechanical Engineering:

- [MS Office](#)
- [SMath Studio](#)
- [MATLAB](#)
- [SolidWorks](#)

The above software packages are provided by the University, except for Mathcad Express, which is available for free from PTC.

The following Mobile Workstation meets the above recommendations and can be purchased through the Tech Center located inside the [UMaine Bookstore](#). These computers will be available after June 10, 2024 with a promotional mail in rebate from Dell.

Dell Mobile Precision Workstation 3591

- Intel Core Ultra 7 165H Processor
- 16 GB Memory
- 512 GB Solid State Drive
- NVIDIA RTX 1000 Ada 6GB GDDR6 Graphics Card
- 15.6-inch FHD 1920 x 1080, 60 Hz, 250 nits, non-touch, FHD HDR RGB Camera, Mic, WLAN
- Windows 11 Pro
- 3 Year Warranty w/Accidental Damage Coverage

Note: A mouse is not included with the computer.

Questions? Please contact the Tech Center at 207-581-2580 for more information or guidance in choosing the right computer for your engineering studies.

Calculator

The Mechanical Engineering department requires students to own a calculator and recommends the TI-89 model from Texas Instruments.