

Computer Specifications  
University of Arkansas  
Interior Design Program, Fay Jones School of Architecture  
Fall 2012

The following comparisons and specifications are provided as a guideline for purchasing a personal computer that you will use in your design studio courses. These guidelines reflect currently available hardware and software. However, the computer industry is continuously evolving. As software is improved, offering more complex programs and expanding your possibilities, more powerful computers are required to run these programs. The computer industry introduces new technology and higher performance standards on an almost monthly basis. As a result, a computer purchase must be seen as a starting point with the understanding that your system will need to be upgraded as technology changes. When making an initial computer purchase it is important to take into account the expandability of the system. How much RAM (random access memory) can be added in the future? Can a second hard drive be added? Can the video card be replaced? Are there extra slots for peripheral ports (i.e.: for scanner, printer, etc.) A wise computer purchase will allow for upgrades along the way; otherwise the computer will quickly become obsolete. Current industry trends suggest that any computer purchased today will need to be upgraded within one year and will be upgradeable for only three to four years. Anyone wanting to install and keep current with software releases should plan on purchasing a new computer every third or fourth year. New software almost always requires more powerful computers to make use of increased speed and capabilities. Today's graphics programs expect minimum system requirements for use that exceed almost any computer made more than four years ago. And the rate at which technology improvements are made is increasing dramatically. With all of this in mind, we have provided information to assist you in the initial purchase of a computer. In order to prepare students for the interior profession, University of Arkansas' School of Architecture is committed to exposing students to the most current CAD/CAM and graphic visualization technology available. As a result, it is realistic to expect that the computer you purchase in your Second year will need to be upgraded before the end of your Third year. It is likely that students will want to purchase a new computer in their Fourth year as they become more proficient and the programs they use become more sophisticated. Any future upgrades you will make to your system should be considered when planning a long-term budget for computer maintenance.

#### Operating System (OS) Requirements

##### PCs with Windows 7 Pro (64Bit)

Mac users are required to run at least Mac OS 10.5

New computers ship with the Windows 7 OS (PCs) and Snow Leopard (Macs). There are several versions of each Windows available, but the University of Arkansas strongly suggests that students use Windows 7 Enterprise, Professional, 7 Ultimate. Home versions of 7 will not allow proper network connectivity in the UA's computing environment and, therefore, are not fully supported by UA IT Services or the School of Architecture.

Please Note: If your computer has XP, 7, or Vista Home editions, upgrade licenses can be purchased on campus with educational discount pricing.

## Things to Consider When Purchasing a Laptop

MAC computers are **not** recommended for the interior design program. If you choose to purchase a MAC for your personal computer, please keep the following in mind:

You MUST run dual platforms. One for MAC OS and one for Windows, significantly reducing the performance of your computer. This could delay large projects.

The majority of software manuals are based on Windows OS.

There is a conflict with Blackboard and MAC OS. You will not be able to access it on your MAC.

## Components and Recommendations

Expandability	Limited number of ports for peripherals. Limited memory and storage expansion. Processor, display, and video hardware not upgradeable.
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Price	You pay extra for portability. Laptops are typically 30-50% higher than a desktop with similar specs. Price increases as the size/weight decreases.
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Monitor	Smaller screen, but with very high resolutions available; may consider an external monitor.
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Portability	Easily transportable; Wireless network access.
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Processor	Intel and AMD dual- and multi-core mobile processors are available from most laptop manufacturers. Prices increase substantially as you get closer to the "fastest" available.
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Hard Drive	Currently laptop hard drive capacity is upward of 750GB. Most laptops currently do not support additional internal hard drives, but external ones are available for \$100-\$200.
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Networking	All laptops ship with 10/100/1000 Ethernet ports. Must also have 802.11 wireless adapters built-in as well
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Video Adapter	You will need at least 256MB of dedicated video [512 MB+ suggested]. Not upgradeable in laptops.
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Storage	Most laptops come with at least a CDRW or a DVD/R drive. Possible but pricey to upgrade. External drives are available. Portable storage is handy as well [USB flash drives and hard drives].
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Memory (RAM)	Revit requires a minimum 8GB RAM and 64-bit OS. We suggest purchasing a laptop with at least 8GM of RAM, as RAM upgrades can be very costly for laptops.
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### Minimum Hardware Requirements

Processor	Dual core Intel or AMD processor 2.0GHz or more
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Boot Hard Drive	Recommend at least 250GB 7.2K SATA
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Hard Drive	Recommend at least 160GB C1 All SATA, non-RAID
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Memory (RAM)	Recommend at least 4GB (2GB minimum)
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Video Adapter	<p>*CAUTION: Nvidia GeForce cards, are designed for gaming systems, designed for fast refresh rates and the display of precreated scenes and environments. Nvidia Quadro Series are a full 30 times faster than the traditional GPU. Users can use Nvidia's proprietary CUDA environment to manage and visualize immense amounts of data.</p> <p>The Quadro series is ideally suited for designers, however, these cards are currently not offered as an option for the Mac. <a href="http://www.deprocess.org">http://www.deprocess.org</a></p> <p>Recommend dedicated video due to graphics intensive applications. NVIDIA Quadro REQUIRED for AUTODesk products</p> <p>NVIDIA® Quadro® FX 380M (512MB min)</p>
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Storage	DVD/RW or BluRay recommended. (8x or 16x speed)
	Will also need portable flash drive with at least 1-2 GB capacity.

Monitor	Minimum SXGA [1280x1024] At least 19" Flat panel recommended.
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Network Adapter	Integrated PCIE 10/100/1000
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Wireless Adapter	REQUIRED
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Cable	10-15 ft. cat5 cable required for AGRX studio network connections.
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## Suggested Software

### CAD Software

AutoDesk AutoCAD 2012  
Architecture or AutoCAD 2012

Free downloads for students  
[ARCH LAB TECHNOLOGY](#)

### Building Information Modeling (BIM) Software

AutoDesk REVIT  
Bentley Architect

Free downloads for students  
[ARCH LAB TECHNOLOGY](#)

### Word Processing

Ms Office 2007/08/10  
  
Adobe CS5 Design Standard  
*Required for Studio 5 and beyond*

Student Licenses available at UA Computer Store  
for \$99.00  
  
Student Licenses available at UA Computer Store  
for \$228.00

### 3D Modeling

AutoCAD Architecture  
Bentley Generative Components  
Google Sketchup (required)†

Free downloads for students  
[ARCH LAB TECHNOLOGY](#)  
Free download [Sketchup](#)

† *IDX Renditioner and SUPodium plug-ins*

### Structural Design Software

MultiFrame  
Bentley STADD Pro

Free downloads for students  
[ARCH LAB TECHNOLOGY](#)

### Optional Software

Rhino/Flamingo

Student Licenses available at UA Computer Store  
for \$99.00

3DS Max, Maya

Free downloads for students  
[ARCH LAB TECHNOLOGY](#)

### Suggested retailers

Educationally Priced Software

UA Computer Store  
Studica  
Academic Superstore  
ARCH LAB TECHNOLOGY

Dell Computers

[UA Computer Store Dell Portal](#)  
[Dell Higher Ed](#)

NOTE: The University of Arkansas Computer Store will configure computers to fit student's needs.