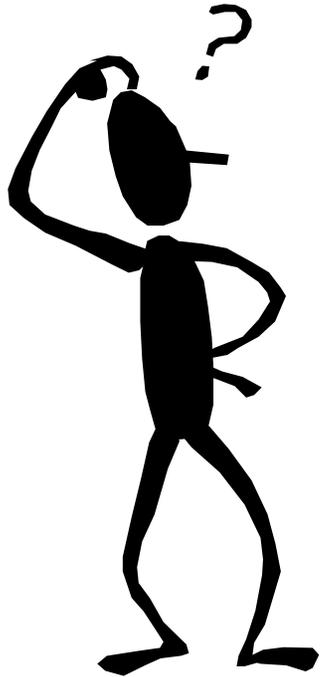




Notebook Computer Review

INSTRUCTIONS: The following screens contain a series of questions and answers you should know about this subject. Read the stem of the question, review your notes, and then write down the answer the question. The correct answer can be found on the next screen. Review and compare your answer with mine. If they match... Great! If they don't... You have some studying to do before you take the module exam.

The AC power adapter that's used to recharge most notebook computer batteries is rated around ____ VDC.



There are a few characteristics regarding the AC power adapters that come with notebook computers that you need to be aware of. They produce DC voltage around 19 volts. The current rating of the adapter is designed to match the notebook. The power pack needs to provide enough current to power the notebook... usually around 3 Amps. Most power packs for notebooks can be plugged into AC voltages found around the world. It's important to note that although the power plug might fit the power jack on the notebook, it may not deliver enough current to properly operate the notebook. It might overheat the power pack if you don't use the adapter that's designed for your computer.

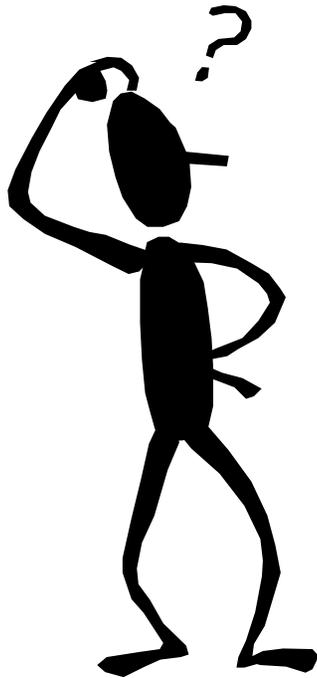
An ESD wrist strap or another type of ESD protection should be used when working with what types of components in a notebook computer?



Notebook batteries are not sensitive to static discharge. You should use ESD tools and procedures whenever working on other notebook components like memory, drives, feature cards, etc.



What is a type of LCD display used in notebook computers?



There are two types of LCD displays: Active Matrix and Passive Matrix. Active matrix gives a better display.



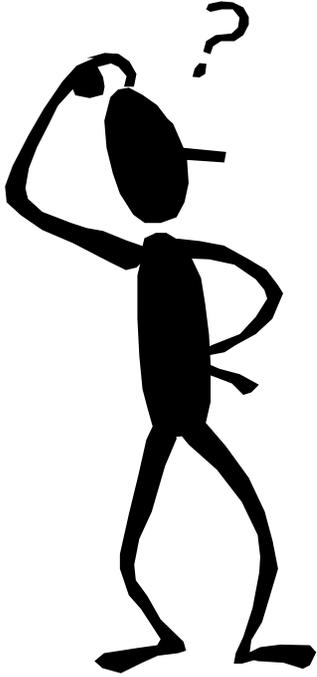
What type of memory module is most commonly seen in laptop or portable computers?



Notebook PCs and many other portable computers use Small Outline Dual In-line Memory Modules (SODIMM). A SODIMM is a smaller, narrower, and taller version of the DIMM module that is used in desktop PCs. On most newer notebook designs, memory is added through the bottom of the PC's case. The SODIMM is mounted flush to the main board and lies flat to save space.



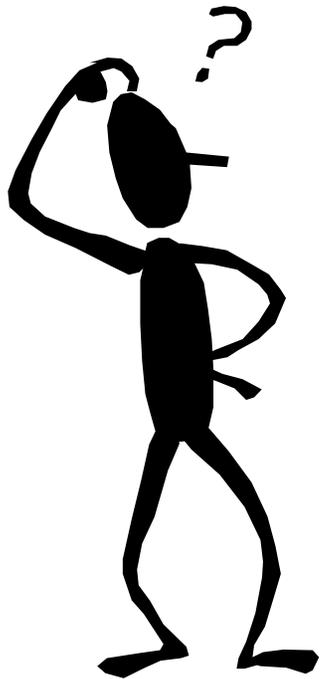
What type of display is used on a laptop?



Liquid crystal diode (LCD) displays have lower power requirements than the CRT-style monitor and can be configured into a flat-panel and are used on Laptop computers.



Regarding processors... Which of the following package form factors are used in notebook computers.



Slot A, SECC and SECC2 form factors are used with Pentium II and Pentium III desktop computers. FCPGA and FCBGA form factors are typically found in notebook computers. SECC is an acronym for Single Edge Contact Cartridge. FCPGA stands for Flip Chip Pin Grid Array.



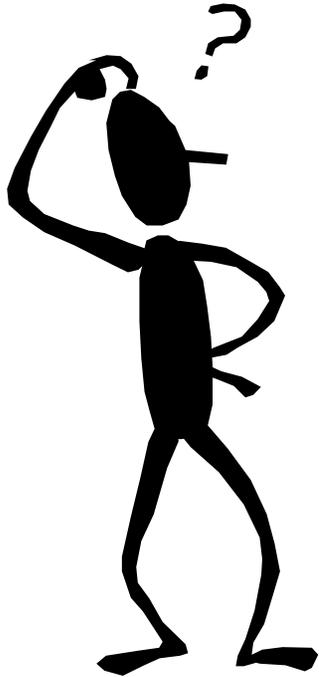
Access to the inside of the notebook computer is typically through removing the _____.



Access to most serviceable items in a notebook computer is usually through the keyboard. Removing the keyboard is sometimes like opening a Chinese lacquer box. The first temptation is to start removing screws from the bottom of the notebook. BAD IDEA. If you figure out how to remove the keyboard, you're on your way to getting inside.



In a notebook computer, most devices like keyboards, drives, and touch pads are connected using _____.

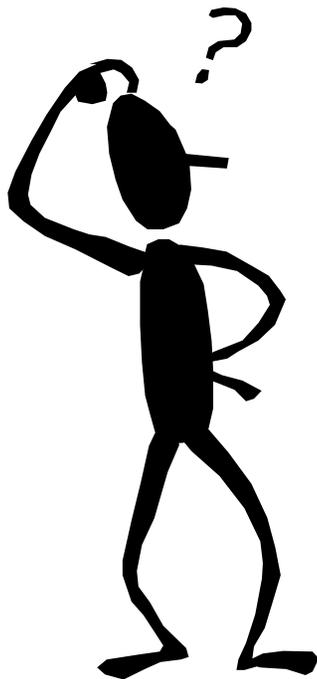


Flex circuits are very cool. They're solderless connections that fit into very confined spaces. They connect to circuit boards using special pressure connectors that clamp onto the flex circuit end. It's important to remember to release the connector



before removing or installing a flex circuit. Also... Make sure the flex circuit end is pushed in all the way into the connector before closing it. You should never force a flex circuit end into a connector. You'll damage the flex circuit if you do.

When you remove and install the blower fan in a notebook computer, it's important to remember to _____ to avoid destroying the blower mounts on the main board.



When you remove and install the blower on a notebook computer you have to loosen and tighten the screws in a specific order. This order is usually stamped on the blower itself. You loosen or tighten each screw in order turning the driver only 5 turns at a time. It's sort of like removing or replacing the lug nuts on a automobile wheel. You need to do this so you don't jam to blower screws in the blower mount.



Which device on a notebook computer requires a zero insertion force (ZIF) socket for installation?



Notebook computers use ZIF sockets for processor installation. This is important to insure the delicate connector pins on the device are not bent or broken. Some processor chips are FCPGA types. FC stands for flip chip meaning the socket lock is flipped to secure it in place... usually with a standard screwdriver.

