

With the ever increasing popularity of laptops and tablet PC's, every week I get asked the same question, "What should I look for in a laptop?" This month I am going to cover some considerations when purchasing a laptop or tablet PC as well as go over some of the differences between brands

When someone asks about the differences in processors, or RAM or any of the other myriad of technical specifications listed by retailers, we advise them to think about the decision process in more functional terms of four interrelated aspects: 1) overall speed, 2) screen size, 3) weight, and 4) built-ins.

In laptops, speed is determined by a combination of three things: processor speed, amount of RAM, and hard drive speed. Laptop hard drives can spin anywhere from 4200RPM to 10,000RPM, however 5400RPM drives are the most common especially in tablet PCs. We recommend 7200RPM drives if possible. The faster the drive spins the faster it chews through battery life. Increasing RAM, or Random Access Memory, can make a huge difference, therefore the minimum amount of RAM we always specify is 512MB. If you are running large database EMR programs, increase the RAM to 1GB if possible. As far as processors go, 1.5Ghz for tablets and 1.7Ghz for laptops is acceptable, but you won't have a whole lot of choice as manufacturers generally have only one or two different processors offered at a time. Currently, as the laptop price drops below \$700 you won't find more than 256MB RAM or drives faster than 5400RPM.

The next thing to think about is the size of the display, how much information do you want to be able to see at one time. People who use 17" or 19" LCDs at their station are going to be frustrated by a 10.1" laptop or tablet. Some EMR products put so much information on each screen that you are continually scrolling to one side or the other to input data. Toshiba and Acer both offer a 15.4" screen on tablets to date.

Think about whether the laptop is going to be a 'desktop replacement' or a truly mobile unit. If it is a desktop replacement, the weight is probably not as important as having a larger screen size. It is also a good idea to get a port replicator or docking station so you don't have to unplug and replug all the different connectors each time. If it is going to be mobile, consider how much additional weight you want to lug around with you. Women tend to like the lighter models (under 7lbs) and men don't mind up to nine pounds.

The last area is how many components are built-in to the unit itself. To eliminate weight, some models have external CD-ROM or DVD-ROM drives, external floppy drives, etc. Sometimes these are forgotten when traveling or don't fit in the carrying case. Also the pins on the plugs can get bent from not being plugged in properly and the external drives will stop working.

The weighted importance of all these considerations will result in a unit that fits the desired purpose, and there are several brands to choose from with many similar models; Dell, IBM, Toshiba, Fujitsu, Acer. No matter which brand you choose your best investment will be a warranty that covers

three years and includes accidental damage. These policies have a variety of names like 'complete care' but all the major brands offer one. Spend the extra money and get the warranty. We have found that we have used this warranty more than not, and 90% of the time it is due to accidental damage not manufacturer defect. Complete care warranties generally cost an extra \$300 for 3 years, but consider that one screen repair is \$900 or more, and even minor repairs such as replacing a keyboard can cost \$150 with labor. Each warranty is slightly different from manufacturer to manufacturer; for example with Toshiba you have to take the unit to an authorized Toshiba depot and with Acer they schedule a pickup with a prepaid label. Be sure to understand the details before you purchase.

In all likelihood, you may need an out of warranty repair one day, and even these vary across brands. Fujitsu will not sell spare parts to their dealers for out of warranty machines, you have to send it to an authorized Fujitsu service center (the closest ones are in Orlando, FL and Raleigh, NC) and only then will they give you an estimate as to the cost of the repair plus you pay shipping both ways. Acer and Dell will sell spare parts to their dealers if the machine is out of warranty.

Battery life - Although we have seen many claims of 6-hour, 8-hour, or all day battery life, in real life we rarely see one last up to 6 hours. Some brands, such as Acer, have hot-swappable battery bays so you can take out the old one and put in a new one without powering down. Batteries also come in 6-cell or 9-cell size, obviously the 9-cell last longer. We always recommend the purchase of an additional power cord (also called an AC adapter) so you can leave one at the office and have one at home or in your carrying case.

Although we are authorized to sell several brands, the one we have had the most success with is Acer. Acer is a Tier II brand as opposed to the Tier I brands of Dell or IBM, but on the overall national ranking Acer is in the top 10 along with Dell, IBM, Toshiba and Fujitsu. What this means to you is more machine for your money. Their warranty service is fast, prepaid, and they pickup and drop-off your repairs. This holds true for their desktops and monitors as well as their laptops or tablets.

Next month: the new Toshiba Tecra M4 product review. For more information regarding laptops or tablet PCs please email [CSlader@MDServ.com](mailto:CSlader@MDServ.com) or call 864-297-8889