

Wireless – “Pulling the Cord”

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Most, if not all, of today's laptops come with some sort of built in antenna system allowing you to surf the Internet wirelessly. Wireless comes in different frequencies, Frequencies "B and G" are the most common and are compatible with each other. The newer frequency "N" is also compatible with B and G but sends and receives information much quicker. The real difference between frequencies is speed. B being the slowest and N being the fastest. Meaning that a connection from a laptop with an N transmitter will connect faster to an access point that is also compatible with the N frequency. This same laptop will still be able to connect to access points with B and G frequencies but at a slower speed. They are backwards compatible and only matter when it comes to connection speeds.

Most coffee shops provide free wireless access, as do about 75% of hotels nationwide. These places are referred to as "hot spots." No fee is required. You just boot up your laptop and it searches for a signal. These are unencrypted (open) signals and free to use. Very little setup is required.

Please note, not all wireless signals that are obtained are free to use. The FCC has regulated that in certain instances where a business or individual has set up a wireless access point also known as a (WAP) and has not encrypted it, unauthorized connections to it are illegal. This means that if you connect to it, you can be charged with illegal wiretapping by means of electronic device even though it's not encrypted.

Under the Homeland Securities Act, this could result in some serious penalties so use caution when connecting to an unfamiliar network wirelessly. Caution should be used as some places may have an open network (unencrypted) and not know this.

At home for a standard setup, you would need to purchase and install your own transceiver, which is called a wireless router, and have it connected to your high-speed network. Examples of a high-speed network would be DSL or the newer FIOS from Verizon or Comcast cable Internet. This is a piece of equipment that sits in between your high Speed modem and your existing computer(s) and would be purchased by the end user to utilize the wireless capabilities in their home /

home office. Your monthly Internet bill won't increase as your computers are sharing your connection to the Internet as you would with two TVs hooked up to the same cable wire.

Once a wireless connection has been successfully set up, you will probably want to encrypt it using what is called a WEP encryption key. "WEP" stands for Wireless Encryption Protocol. This key is a series of numbers and letters you enter into the wireless router and into your laptop's wireless software settings. It is a key / pass code that allows your laptop and other wireless devices, such as Xbox Live, to connect securely to your high speed Internet connection. This encryption prevents others from stealing your free wireless signal. Others would need to know what the pass code was to connect to your WAP. The stronger the key the less likely intruders can guess it and the more secure you are.

For access beyond the WAPs in your area, there are some other alternatives. Some choose the route of a satellite card that plugs into your laptop and receives signals as a cell phone would, via satellite. Others buy a cable that connects to their cell phone directly and connect to the Internet this way. This will allow the user to connect to the Internet anytime they are in range of a cellular signal. (There are still some dead spots out there where cell signals are too weak to use or nonexistent. - These are known as dead spots or "no phone zones.")

Both of these wireless methods, satellite and cell phone, require a setup with an Internet Provider, usually your cellular carrier, carry a monthly fee, and could go against the minutes in your cellular plan. Connection via a cellular signal is reminiscent of the days of dial-up with a bit of a speed enhancement.

With the price of today's laptops coming down and Hot Spots becoming more widespread around town, connection to the Internet is sometimes right around the corner.

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