

## Shopping for Broadband: Satisfying Your Need for Speed

**I**f you use your computer to shop online, play video games, make phone calls, watch movies, listen to music, or use other “hot” applications, broadband lets you do it faster.

Broadband refers to the high-speed Internet access you can get through a variety of services, including digital subscriber line (DSL), cable, fiber optic, wireless, or satellite. With broadband, you access the Internet simply by turning on your computer. There’s no need to dial a phone number to reach your Internet Service Provider (ISP).

When you are shopping for broadband service, the Federal Trade Commission (FTC), the nation’s consumer protection agency, wants you to know the types of services that are available, and the questions to ask to get the deal that best suits your needs.

### TYPES OF BROADBAND

The type of broadband available to you depends on what technology the providers in your area offer. The four most common types of residential broadband service are:

1. *Digital Subscriber Lines (DSL)*, which transmit data through phone lines without interfering with telephone service. Local phone companies typically offer DSL services; in some areas, other Internet service providers also offer DSL services.

## Facts for Consumers

2. *Cable modems*, which provide access to the Internet over cable lines without interfering with your cable television service. Cable modem Internet access services typically are offered by the same companies that offer cable TV services in your area.

3. *Fiber optic broadband*, which is a new and faster type of broadband service. The same fiber optic line providing your broadband service simultaneously can deliver phone and video (television) services. Fiber optic broadband is currently available only in certain areas.

4. *Mobile wireless broadband services*, which are available from mobile telephone service providers. Such services are accessible through certain wireless telephones and PDA devices (personal digital assistants). They also can be accessed using a computer with a built-in or plug-in air card.

Other types of broadband might be available in your community:

*Fixed Wireless broadband*, which connects a home or business to the Internet using a radio link between the customer's location and the service provider's facility.

"*Wi-fi hotspots*," which are available in increasing numbers of airports, city parks, bookstores, and other public locations.

*Satellite Delivery of Internet access services*, which are available in most areas from providers of satellite television services. Extreme weather conditions can disrupt service.

*Broadband Over Powerline (BPL)*, which is the delivery of broadband over electric utility lines. BPL is an emerging technology that has significant potential because power lines are installed virtually everywhere, eliminating the need to build new lines to every customer.

### WHAT SPEEDS CAN I EXPECT?

One appeal of broadband is that it's much faster than dial-up. But speeds vary and depend on a variety of factors including what type of service you are using, what level or tier of service you have purchased, and how congested your network and the Internet are at any time. Speeds are expressed in kilobits (kbps) — thousands of bits per second, or megabits (Mbps) — millions of bits per second.

Typically, fiber is faster than cable, and cable is faster than DSL.

Most providers offer different speeds upstream and downstream. Upstream speeds tell you how fast you can transfer data from your computer to a computer somewhere else on the Internet — for example, how fast you can upload photographs onto a website. Downstream speeds tell you how fast you can download something from the Internet to your computer. Downstream speeds usually are faster than upstream speeds.

Many applications do not require high speeds, but even basic Web browsing goes faster with a broadband connection. There are some applications that work best with high-speed connections, like watching high-definition movies or playing real-time video games.

If speed matters to you, make sure you ask providers what speeds you can expect.

The Web is full of free broadband speed testing programs. But be aware that different tests may produce different results because they may not test speed the same way. If you test your broadband speed and you're not getting what you expected, ask your provider why and if there are ways to improve it.

## SHOPPING FOR BROADBAND

The first step in signing up for broadband is to know whether you also want to get Internet, telephone, and TV service from the same provider. Consider asking providers:

*Is there a discount if I get more than one service from your company? If yes, what are the conditions?*

Buying a bundle of services from one provider can be a good deal, but it might make it more difficult to change providers for any one service if you're tied into a long-term contract. In addition, promotional prices may have time limits. Ask when they end, and what the post-promotion cost will be.

*Are you offering any specials?*

Special promotions like introductory pricing may be enticing, but read the fine print. The promotion price probably does not include taxes or the cost of extra equipment, like a digital cable modem, or additional fees, like an activation fee or an early termination fee. Ask the provider to explain all the one-time, recurring, and special charges, including taxes and fees. Get all promises in writing. Ask when the special promotions end, and what the post-promotion cost will be.

*Is there anything I need to know about setting up my broadband?*

Some promotions require you to install cables, modems, routers, satellite dishes or software yourself. Problems that can go along with setting up a connection can be daunting, especially if you're not technologically savvy. Find out early on what you'll need to do. Most providers will help you troubleshoot on the phone or make instructions available online. Message boards on a manufacturer's website also can be helpful.

*What speeds can I expect?*

Be aware that low promotional pricing may be for the lowest speeds. Make sure the listed download and upload speeds are the ones that

you're expecting, and if there's a trial period, test the service to see if it meets your expectations. Be aware that the actual transmission speeds you experience depend on many factors, such as the type of application you are using or the number of other visitors to the website you are viewing, and may be less than the maximum potential speed your provider touts.

Some deals are available only online or by phone. Even if you have to order online, call the provider first to ask questions. When you are online, review any frequently asked questions, minimum system requirements, and fine-print terms and conditions. Read the entire customer service agreement, and print a copy for your records.

Finally, some retailers may offer plans on behalf of phone or cable companies with different terms than those offered by the companies themselves. If you know exactly what you want, you also might try negotiating a customized plan with a provider or a retailer.

*Can I change plans before my contract expires?*

After you become a broadband user, you may wish to change plans. Ask about options and costs for changing your plan to reflect your usage

*Is there a cancellation fee?*

Some plans include early-termination fees. Be sure you understand what the fees are and how they are calculated before you sign up.

*If I get fiber service and then decide I don't want it, can I go back to my old DSL service?*

If you're considering fiber optic broadband, ask the provider if the copper wires that are used to carry your phone calls will be removed. High-bandwidth lines are fully capable of carrying calls as well as Internet data and television. But if the copper lines are removed, you may not be able to switch back to traditional phone service or DSL service. Before signing up for fiber service, find out the policy on converting from DSL to fiber — or back to DSL.

# Facts for Consumers

*Is it better to lease or buy the required equipment?*

It depends on how long you plan to stick with the provider, and the costs to purchase and to rent.

*Who do I call if the service goes out?*

Ask if customer service or tech support is available 24 hours a day, seven days a week, and whether it is by telephone or the Internet. Is it free?

*What happens when the power goes out?*

Check with the provider to find out whether phone and broadband service will be available in the event of a power outage. Services provided over a landline or DSL typically work during short term power outages. Services provided over cable or fiber may not. Of course, your computer needs a battery or other power supply to work during a power outage.

*What security measures does the provider include, and at what price?*

Ask the provider if anti-virus, anti-spam, and anti-spyware software are included with your service, and the cost. If the provider does not offer protective software, or if the costs are more than you are willing to pay, download it from the websites of software companies or buy it from retail stores.

## FOR MORE INFORMATION

If you have a problem with your broadband, first contact your service provider to resolve the issue. If you can't get satisfaction, consider contacting your public utility commission or other appropriate state or local regulator.

You also may contact the Federal Trade Commission. The FTC works for the consumer to prevent fraudulent, deceptive, and unfair business practices in the marketplace and to provide information to help consumers spot, stop, and avoid them. To file a complaint or to get free information on consumer issues, visit [ftc.gov](http://ftc.gov) or call toll-free, 1-877-FTC-HELP (1-877-382-4357); TTY: 1-866-653-4261. The FTC enters Internet, telemarketing, identity theft, and other fraud-related complaints into Consumer Sentinel, a secure, online database available to hundreds of civil and criminal law enforcement agencies in the U.S. and abroad.

FEDERAL TRADE COMMISSION	<a href="http://ftc.gov">ftc.gov</a>
1-877-FTC-HELP	FOR THE CONSUMER

**Federal Trade Commission**  
Bureau of Consumer Protection  
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