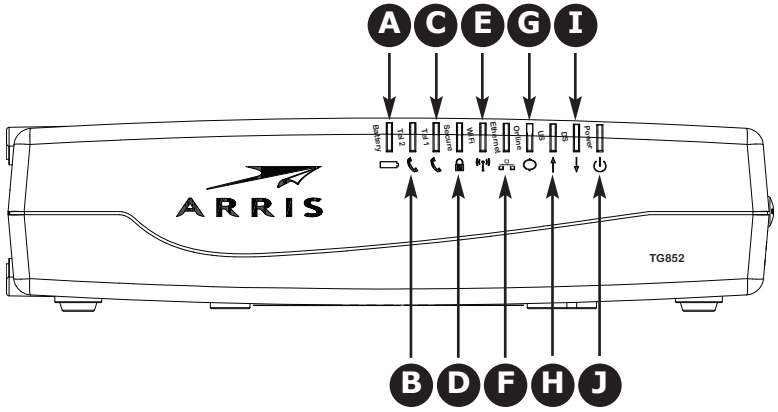
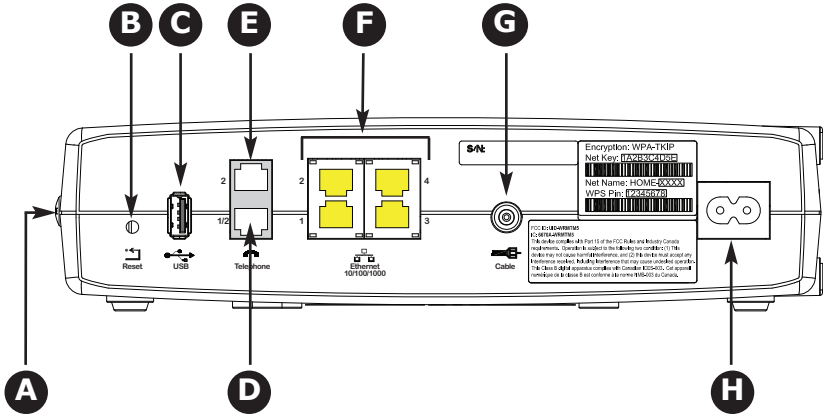


Front Panel

The front of the Telephony Gateway has the following indicators:

- **A** **Battery**: indicates the battery status.
- **B** **Tel 2**: indicates the status of telephone line 2.
- **C** **Tel 1:** indicates the status of telephone line 1.
- **D** **Secure**: indicates Wireless Protected Setup (WPS) is active.
- **E** **WiFi**: indicates the status of the wireless LAN.
- **F** **Ethernet**: indicates Ethernet connectivity between the Telephony Gateway and computers.
- **G** **Online**: indicates internet data transmission status.
- **H** **US**: indicates upstream connectivity.
- **I** **DS**: indicates downstream connectivity.
- **J** **Power**: indicates whether AC power is available to the unit.



Rear Panel

The rear of the Telephony Gateway has the following connectors and controls:

- **A** **WPS** button: begins associating the Telephony Gateway with a wireless device.
- **B** **Reset** button: resets the Telephony Gateway as if you power cycled the unit. Use a pointed non-metallic object to press this button.
- **C** **USB:** USB host connector - future support for external USB devices
- **D** **Telephone 1/2**: connector for the first phone line (or both lines of a 2-line phone).
- **E** **Telephone 2**: connector for the second phone line.
- **F** **Ethernet (1 - 4)**: connectors for use with a computer LAN port.
- **G** **Cable**: connector for the coaxial cable.
- **H** **Power**: connector for the power cord.

Selecting an Installation Location

There are a number of factors to consider when choosing a location to install your Telephony Gateway:

- Is an AC outlet available nearby? For best results, the outlet should not be switched and should be close enough to the Telephony Gateway that extension cords are not required.
- Is a cable jack available? For best performance, keep the number of splitters between the jack and cable drop to a minimum. Each splitter attenuates (reduces) the signal available to the Telephony Gateway. A large number of splitters can slow down the Internet connection and even affect your telephone service.
- Can you easily run cables between the Telephony Gateway's location and the phones?
- If you are connecting devices to the Ethernet ports, can you easily run cables between the Telephony Gateway's location and those devices?
- If you want to mount the Telephony Gateway on a wall, does the location provide a solid surface for secure attachment? For best results when mounting the Telephony Gateway on drywall, position the Telephony Gateway so at least one of the screws are fastened to a stud. This may prevent the Telephony Gateway from pulling out of the wall in the future.
- If you want to install the Telephony Gateway on a desktop, is there enough space on either side to keep the vents clear? Blocking the vents may cause overheating.
- How close are your wireless devices? The Telephony Gateway wireless connection range is typically 100–200 feet (30m–65m). A number of factors can affect connection range, as described below.

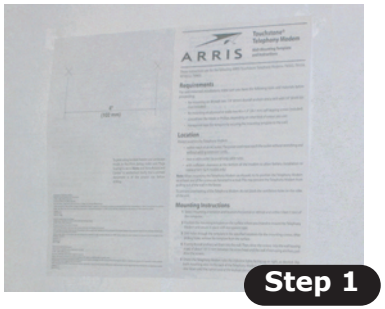
Factors Affecting Wireless Range

A number of factors can affect the usable range for wireless connections.

Increases range:	• Raising the unit above the devices (for example, installing the Telephony Gateway in the upper floor of a multi-story dwelling) • Adding wireless hubs in a bridge (WDS) network
Decreases range:	• Lowering the unit below the devices (for example, installing the Telephony Gateway in a basement) • Metal or concrete walls between the Telephony Gateway and other devices • Large metal appliances, aquariums, or metal cabinets between the Telephony Gateway and other devices • Interference and RF noise (2.4 GHz wireless phones, microwave ovens, or other wireless networks)

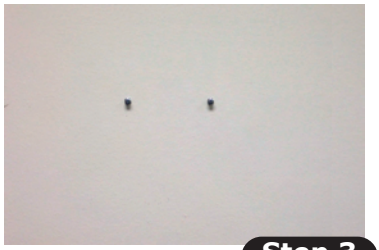
Note: Note that decreasing the range of your wireless network may be beneficial, as long as the decreased range is sufficient for your needs. By limiting your network's range, you reduce interference with other networks and make it harder for unwanted users to find and connect to your network.

Note: Setting the trasmit power level to High increases the range. Setting it to Medium or Low decreases the range proportionately.



Step 1

Step 2


Step 3


Step 4

Mounting the Telephony Gateway

You can either mount the Telephony Gateway on a wall or place it on a desktop. For wall-mount applications, you can mount the Telephony Gateway with the indicators facing upward (vertical) or to the side (horizontal).

Tools and Materials

For wall-mounted installations, make sure you have the following tools and materials before proceeding:

- for mounting on drywall: Two 1/4” (6mm) drywall anchors and a drill with 1/4” (6mm) bit (not included)
- for mounting on plywood or studs: two #6 x 1.5” (38.1 mm) self tapping screws (not included)
- screwdriver (flat-blade or Phillips, depending on what kind of screws you use)
- wall-mount template (included)
- transparent tape: for temporarily securing the mounting template to the wall (not included)

Location

Always position the Telephony Gateway:

- within reach of an AC outlet. The power cord must reach the outlet without stretching and without adding extension cords.
- near a cable outlet (to avoid long cable runs).

Instructions

Wall-mounting instructions

Note: When mounting the Telephony Gateway on drywall, try to position the Telephony Gateway so at least one of the screws is fastened to a stud. This may prevent the Telephony Gateway from pulling out of the wall in the future. To prevent overheating of the Telephony Gateway, do not block the ventilation holes on the sides of the unit.

1 Position the mounting template on the surface where you intend to mount the Telephony Gateway and secure in place with transparent tape.

2 Drill holes through the template in the specified locations for the mounting screws. After drilling holes, remove the template from the surface.

3 If using drywall anchors, set them into the wall. Then, drive the screws into the wall leaving a gap of about 1/8” (3 mm) between the screw head and the wall. If not using anchors, just drive the screws.

4 Orient the Telephony Gateway with the indicator lights facing up or right, as desired. Slip both mounting slots (in the back of the Telephony Gateway) over the screws, then slide the case down until the narrow end of the key-hole slot contacts the screw shaft.

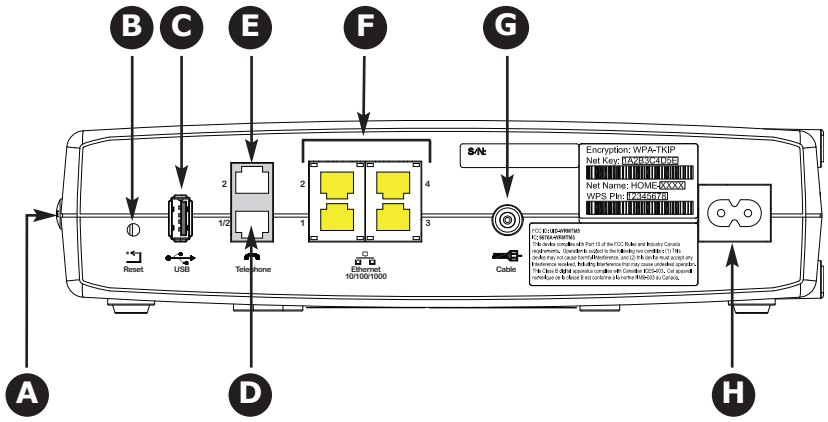
5 Proceed to Connecting the Telephony Gateway.

Desktop mounting instructions

1 Position the Telephony Gateway so that:

- air flows freely around it
- the back faces the nearest wall
- it will not fall to the floor if bumped or moved
- the ventilation holes on the side of the unit are not blocked.

2 Proceed to Connecting the Telephony Gateway.



Connecting the Telephony Gateway

WARNING
Risk of injury or equipment damage

Connecting the Telephony Gateway to the home's existing telephone wiring should only be performed by a professional installer. Physical connections to the previous telephone provider must be removed and the wiring must be checked; there must not be any voltage. Cancellation of telephone service is not adequate. Failure to do so may result in loss of service and/or permanent damage to the Telephony Gateway.

1. Connect one end of the coax cable to the cable outlet or splitter, and the other end to the Telephony Gateway's Cable connector (**G**). Tighten the connections by hand, then tighten an additional 1/8 turn with a wrench.

   Note: For best performance, use high-quality coax cable and minimize or eliminate splitters between the cable jack and the Telephony Gateway.

2. Insert the plug from the power cord into the Power connector on the back of the Telephony Gateway (**H**) and insert the power cord into a convenient AC outlet.

   The Power light on the front of the Telephony Gateway lights up, then flashes once (refer to the LED tables shown in Using the Telephony Gateway). See Troubleshooting if the Power light does not turn on.

3. Connect one end of the Ethernet cable to any Ethernet port on the back of the Telephony Gateway, (**F**) and the other end to the Ethernet port on a computer, hub, or broadband router.

   Note: If you are connecting to a computer, use the Ethernet cable included in the Telephony Gateway package.

4. Connect one end of the telephone cable to the telephone port on the back of the Telephony Gateway (**D** or **E**). Connect the other end to the telephone.

   Note: If you have a phone with two separate lines on a single RJ-14 cord, plug it into the connector labeled "Telephone 1/2".

Configuring Your Wireless Connection

The TG852 ships with a basic factory default configuration that should allow you to immediately access the Internet with a wireless connection. If your computer is equipped with a 802.11b/g/n wireless LAN card, you may wish to configure the Telephony Gateway's wireless settings.

Note: At a minimum, ARRIS suggests that you configure the security settings.

Accessing the Configuration Interface

Follow these steps to access the configuration interface. You should have already set up the TG852 as described in Installing and Connecting Your Telephony Gateway.

1. Use the connection utility for your operating system to connect to the wireless LAN **arris_xxxx**,where "xxxx" is the last four digits of the Telephony Gateway's WLAN MAC address.

   Note: This is the Telephony Gateway's factory default SSID. The WLAN MAC address can be found on the product label on the Telephony Gateway.

2. In your web browser, open the page **http://192.168.2.1/** to access the wireless router setup.

   The Login screen displays.

   Note: The Telephony Gateway ships with no password configured. When you log in for the first time, leave the Password field blank.

3. Click the **Apply** button to log in.

   The System Basic Setup screen displays.

4. Use the online help information to set configuration parameters as required.

Note: Most configuration parameters that you may want to set can be accessed on the System Basic Setup screen, including the security mode and setting a system password.

Configuring Your Ethernet Connection

If your computer is equipped with a LAN card providing an Ethernet connection, you may have to configure your computer's TCP/IP settings. The steps that follow will guide you through setting your computer's TCP/IP settings to work with the Telephony Gateway.

Requirements

Make sure you have the following before attempting to configure your Ethernet connection:

- Computer with:
  - one of: Windows 2000, Windows XP, Windows Vista, Windows 7, or MacOS X
  - Ethernet interface
- Ethernet cable (supplied)
- IP address, subnet, gateway, and DNS information for installations not using DHCP

How to use this chapter

The following list shows the procedures for modifying the TCP/IP settings on the computer. The procedure is slightly different depending on the operating system that you are using. Please ensure you are using the correct steps for the operating system on your computer. Follow the links below for instructions to configure your Ethernet connection on your operating system.

- TCP/IP Configuration for Windows 2000
- TCP/IP Configuration for Windows XP
- TCP/IP Configuration for Windows Vista
- TCP/IP Configuration for Windows 7
- TCP/IP Configuration for MacOS X

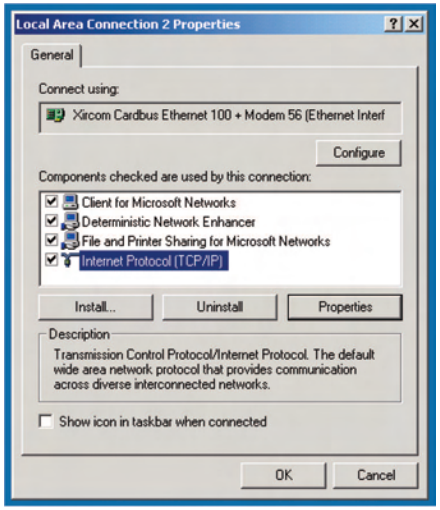
TCP/IP Configuration for Windows 2000

Follow these steps to configure the Ethernet interface on a Windows 2000 operating system.

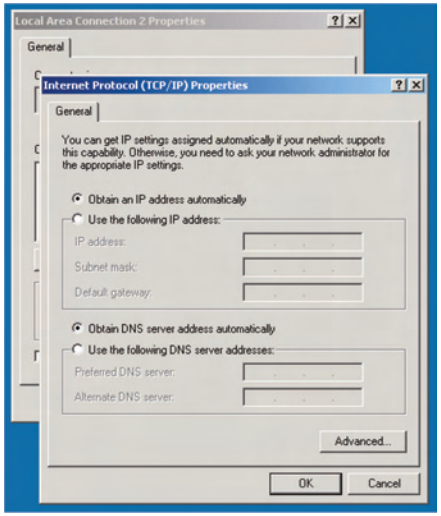
Note: Dialog boxes shown on your computer may differ slightly from those shown in this procedure.

1. From the computer, select **Start > Settings > Network and Dial-up Connections > Local Area Connection**.
2. In the Local Area Connections Properties window, highlight **TCP/IP** by clicking on it one time, then click on **Properties**.

   Note: If your computer has more than one Ethernet card, you may have to select the appropriate Ethernet card in the **Connect using:** area of the Local Area Connection Properties window.



3 Click **Obtain an IP address automatically** and **Obtain DNS server address automatically**, then click **OK**.



4 Click **OK** to accept the new settings, and **OK** again to close the Configuration window.

5 You may have to restart your computer in order for your computer to obtain a new IP address from the network.

TCP/IP Configuration for Windows XP

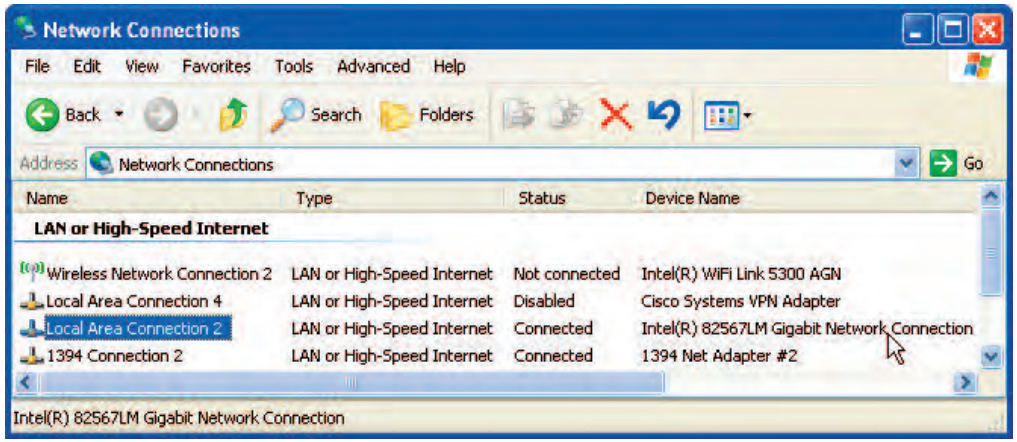
Follow these steps to configure the Ethernet interface on a Windows XP operating system.

TCP/IPv6 Note: This procedure shows the configuration of TCP/IPv4. TCP/IPv6 is not installed or enabled by default in Windows XP. If your cable provider requires TCP/IPv6 you must first install and enable it on your Windows XP system. Refer to Microsoft support materials on Windows XP for installation instructions. Once installed and enabled, follow this same configuration example, but select TCP/IPv6 at the appropriate step.

Note: Dialog boxes shown on your computer may differ slightly from those shown in this procedure.

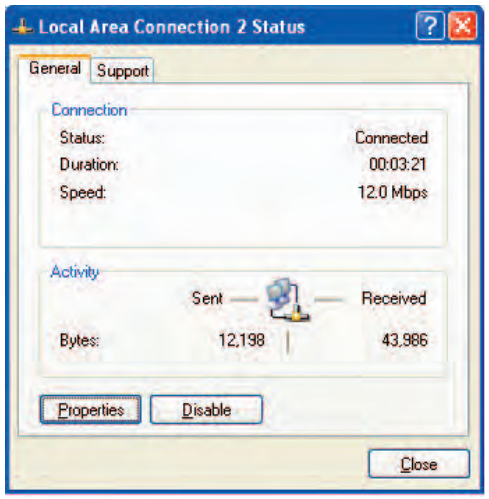
1 From the computer, select **Start > Settings > Control Panel** and double-click **Network Connections** in the Control Panel.

The Network Connection window displays a list of LAN connections and associated network adapters.



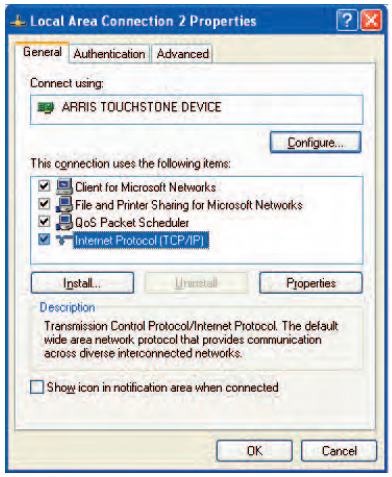
2 Double-click the local area connection to be used for your device's network connection.

The Local Area Connection Status widow displays.

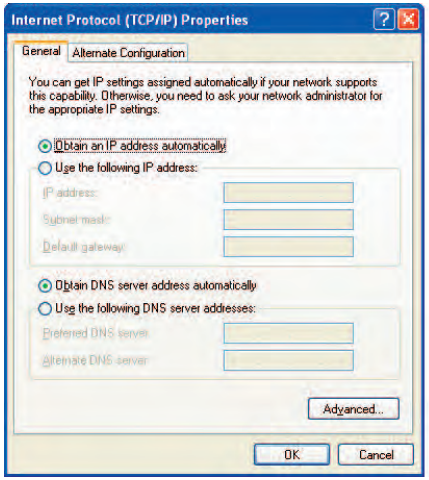


3 Click **Properties**.

4 Select **TCP/IP** by clicking it one time. Then click **Properties**.



5 Click the **General** tab. Then click **Obtain an IP address automatically** and click **OK**.



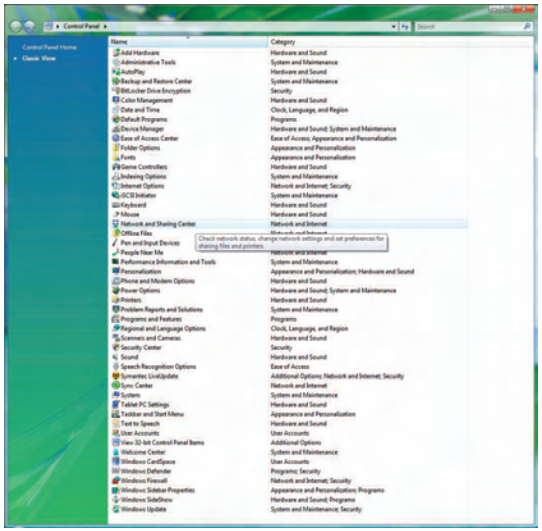
6 Click **OK** to accept the new settings, and **OK** again to close the Properties window.

7 You may have to restart your computer in order for your computer to obtain a new IP address from the network.

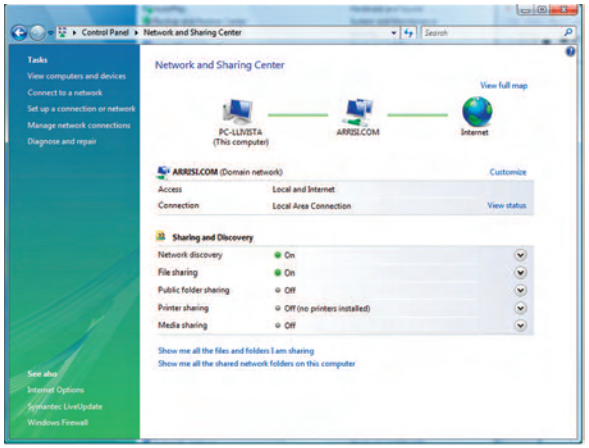
TCP/IP Configuration for Windows Vista

Follow these steps to configure the Ethernet interface on a Windows Vista operating system

1 Open the Vista Control Panel.

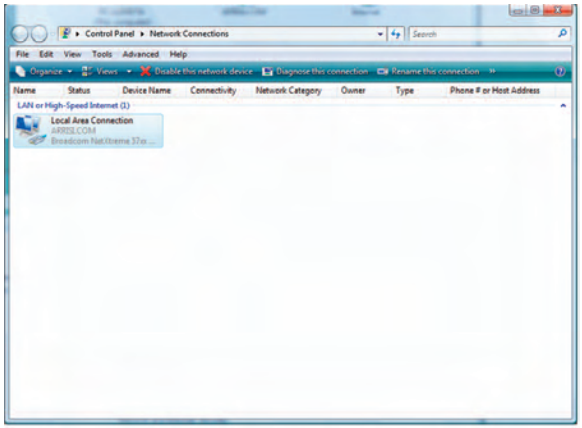


2 Double-click **Network and Sharing Center** to display the Network and Sharing Center window.



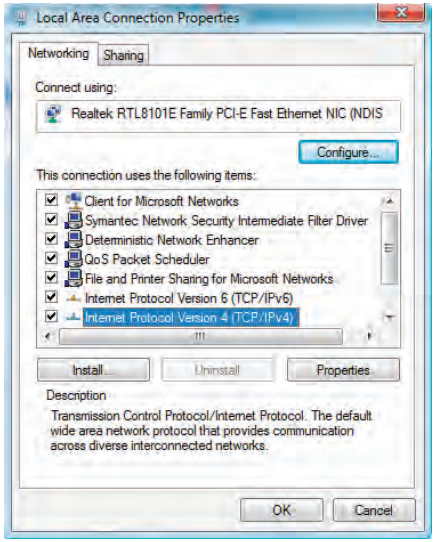
3 Click **Manage network connections**. If prompted for a connection, choose **Local Area Connection**.

The Network Connections window displays.

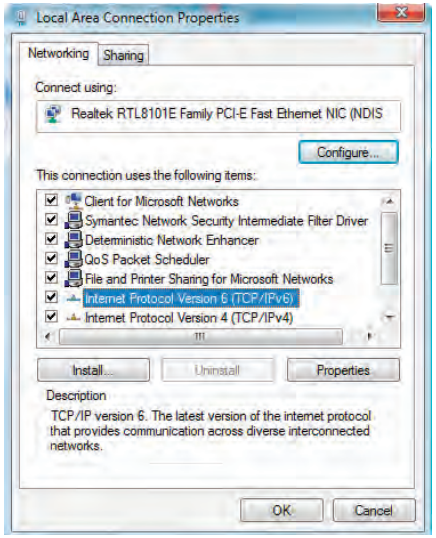


4 Double-click the **Local Area Connection** to open the Properties window:

Note: If Windows requests permission to continue, click **Continue**.



TCP/IPv4 Selected

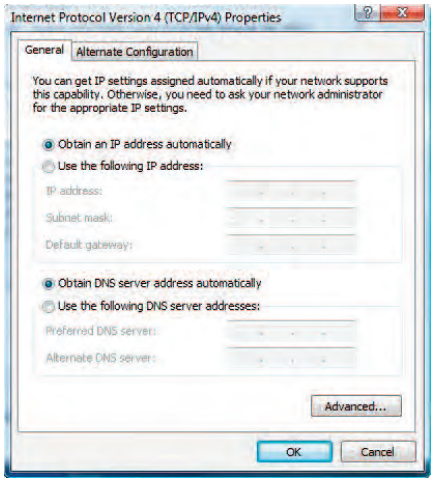


TCP/IPv6 Selected

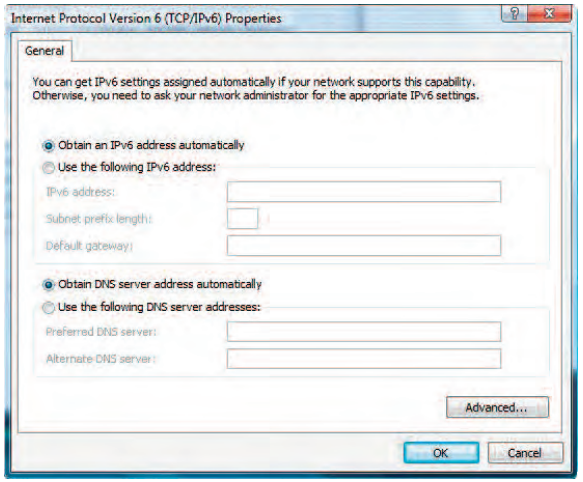
5 Double-click **Internet Protocol Version 4 (TCP/IPv4)** to configure TCP/IPv4.

Note: If your cable provider requires TCP/IP version 6, double-click **Internet Protocol Version 6 (TCP/IPv6)** to configure TCP/IPv6.

The TCP/IP properties window for the version you selected displays.



TCP/IPv4 Properties



TCP/IPv6 Properties

6 For either TCP/IPv4 or TCP/IPv6, select **Obtain an IP address automatically** and **Obtain DNS server address automatically**, unless instructed otherwise by your cable provider.

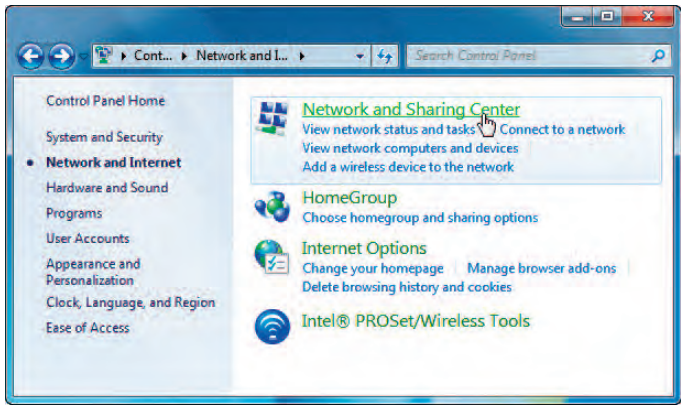
7 Click **OK** to accept the new settings and close the Properties window.

TCP/IP Configuration for Windows 7

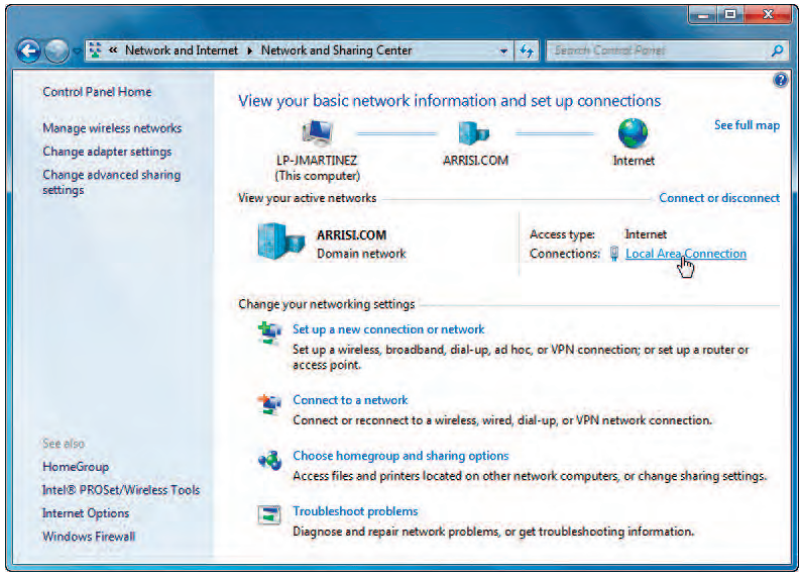
Follow these steps to configure the Ethernet interface on a Windows 7 operating system.

1 Open the Windows 7 Control Panel.

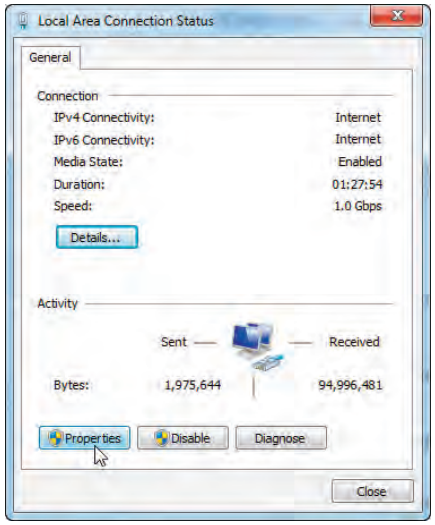
2 Click **Network and Internet**.



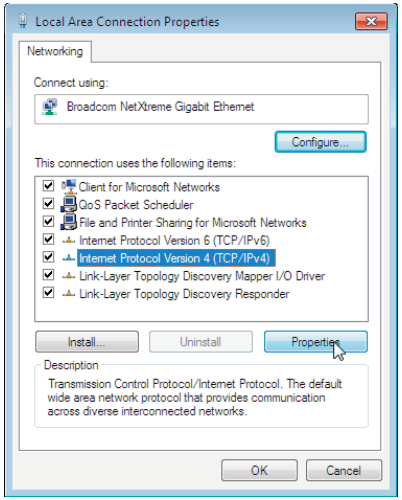
3 Click **Network and Sharing Center**.



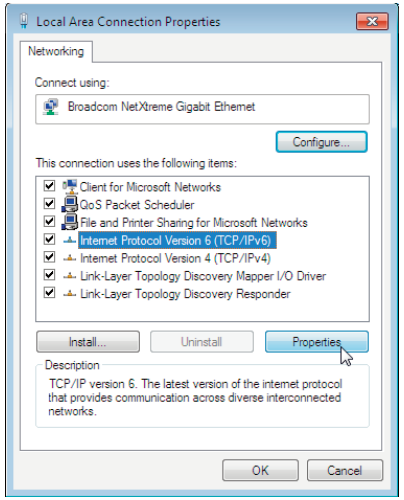
4 Click **Local Area Connection** to open the Status window.



5 Click **Properties** to open the Properties window.



TCP/IPv4 Selected

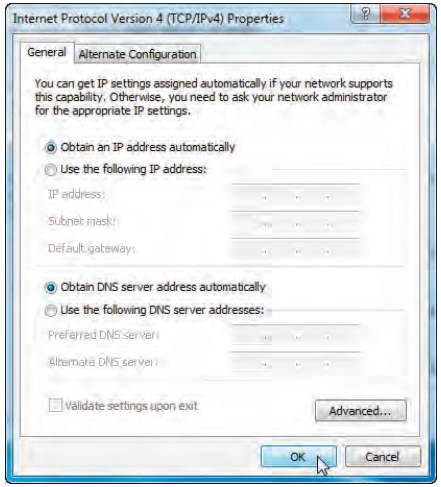


TCP/IPv6 Selected

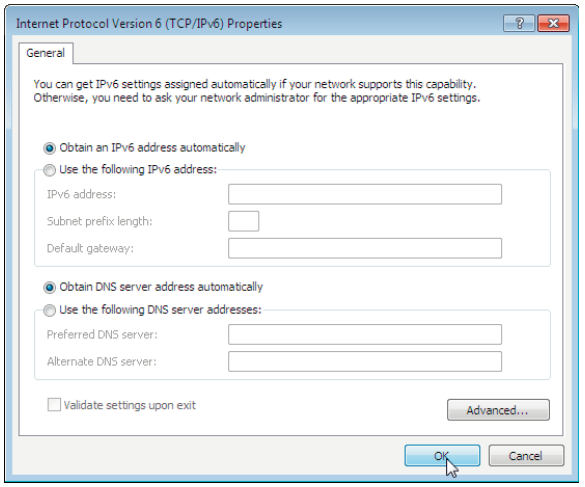
6 Select **Internet Protocol Version 4 (TCP/IPv4)** and click **Properties** to configure TCP/IPv4.

Note: If your cable provider requires TCP/IP version 6, select **Internet Protocol Version 6 (TCP/IPv6)** and click **Properties** to configure TCP/IPv6.

The TCP/IP properties window for the version you selected displays.



TCP/IPv4 Properties



TCP/IPv6 Properties

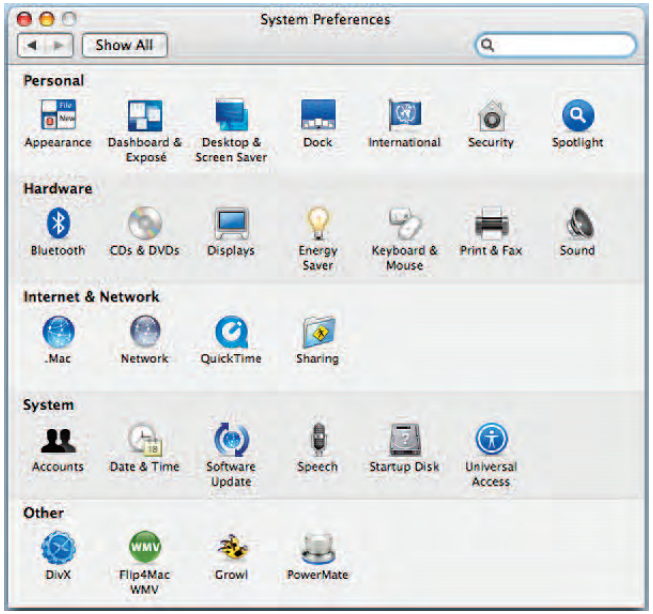
7 For either TCP/IPv4 or TCP/IPv6, select **Obtain an IP address automatically** and **Obtain DNS server address automatically**, unless instructed otherwise by your cable provider.

8 Click **OK** to accept the new settings and close the Properties window. Then click **Close** to back out of the remaining setup screens.

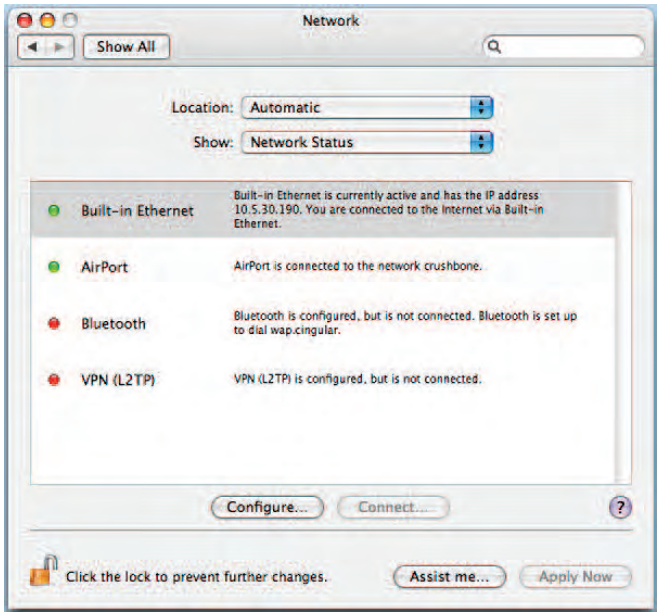
TCP/IP Configuration for MacOS X

Follow these steps to configure the Ethernet interface on a MacOS X operating system.

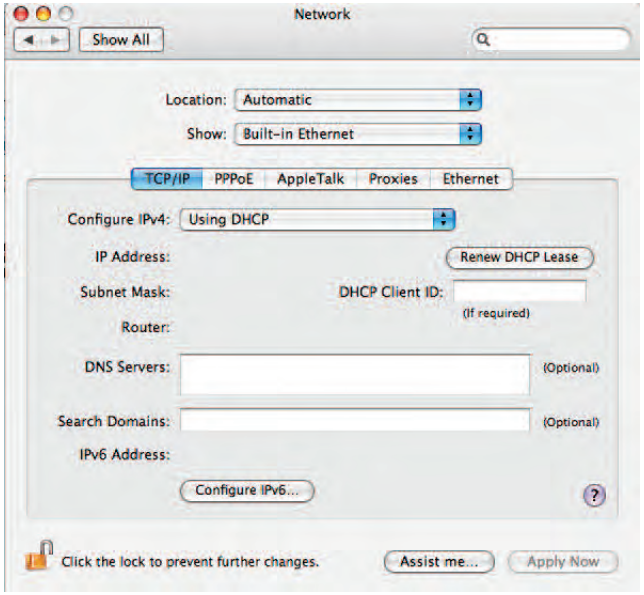
1 Open System Preferences, either by choosing System Preferences from the Apple menu or by clicking the System Preferences icon in the dock.



2 Click the **Network** icon.



3 Choose **Automatic** from the Location drop-down menu, and **Built-in Ethernet** from the Show menu.



4 Choose the TCP/IP tab, if necessary.

If you are using **TCP/IPv4**, go to **step 5**.
If your cable provider requires **TCP/IPv6**, go to **step 8**.

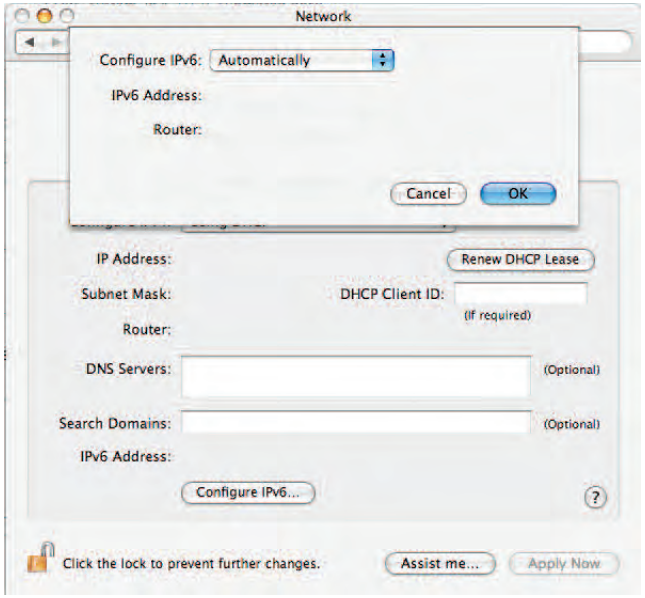
5 Choose **Using DHCP** from the Configure IPv4 menu.

6 If necessary, click the **Renew DHCP Lease** button.

7 Close the System Properties application.

TCP/IPv4 configuration is completed.

8 If you are using TCP/IPv6, click **Configure IPv6** near the bottom of the previous window.



9 Choose **Automatically** from the Configure IPv6 drop-down menu and click **OK**.

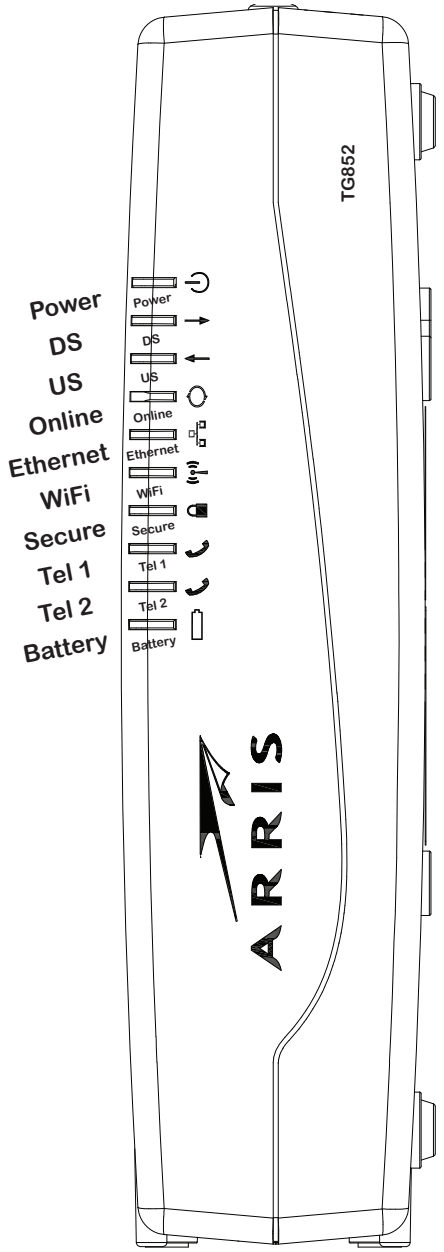
10 Close the System Properties application.

Using the Telephony Gateway

This chapter describes the controls and features available on the Touchstone Telephony Gateway, and covers basic troubleshooting procedures.

Setting up Your Computer to Use the Telephony Gateway

Follow the instructions in the information packet supplied by your cable company. Contact your cable company if you need help setting up your computer.



Indicator Lights for the TG852

The Touchstone Telephony Gateway has ten LED indicator lights to assist in troubleshooting.

Wiring Problems

If the Telephony Gateway begins flashing all its lights for more than 10 seconds, this indicates a problem with the telephone wiring — the red and green wires may be shorted (touching), or there may be undesired voltage on the lines. If this pattern persists for more than 10 seconds, disconnect the telephone lines from the Telephony Gateway, then call a wiring technician for assistance.

Patterns: Normal Operation (LAN and Telephone)

The following table shows light patterns for the Ethernet and wireless LANs, and the telephones, during normal operation.

Mode	Ethernet	WiFi	Tel 1 / Tel 2
AC Power	**On** = Computer Connected Off = Computer not connected Flash = Computer Activity	**On** = WiFi Enabled Off = WiFi Disabled Flash = Computer Activity	**On** = On-hook Flash = Off-hook Off = disabled
No AC Power	Off	Off	**On** = On-hook Flash = Off-hook Off = disabled
Firmware Upgrade	(normal operation)	(normal operation)	(normal operation)

Patterns: Normal Operation (WAN and Battery)

The following table shows light patterns during normal operation.

Mode	Power	DS	US	Online	Battery
AC Power Good	**On**	**Yellow**[1] = Connected to the Internet (high speed) **Green**[1] = Connected to the Internet (ultra-high speed) Flash = Not connected to the Internet	**Yellow**[1] = Connected to the Internet (high speed) **Green**[1] = Connected to the Internet (ultra-high speed) Flash = Not connected to the Internet	**On** = Internet available Off = Internet not available	**On** = Battery good or low Off = Battery missing Flash = Battery bad
No AC Power Battery Installed	Flash	Off	Off	Off	Off = Battery power Flash = Battery bad
No AC Power No Battery	Off	Off	Off	Off	Off
Firmware Upgrade	**On**	Flash	Flash	**On**	(normal operation)

Note 1: Your cable company may configure the Telephony Gateway to always display the **DS** and **US** indicators in green regardless of the connection speed.

Patterns: Startup Sequence

The following tables show the Telephony Gateway light patterns during each phase of the startup sequence. There are two phases of startup; the Telephony phase and the cable modem phase. Both are outlined below.

Telephony Start Up Sequence

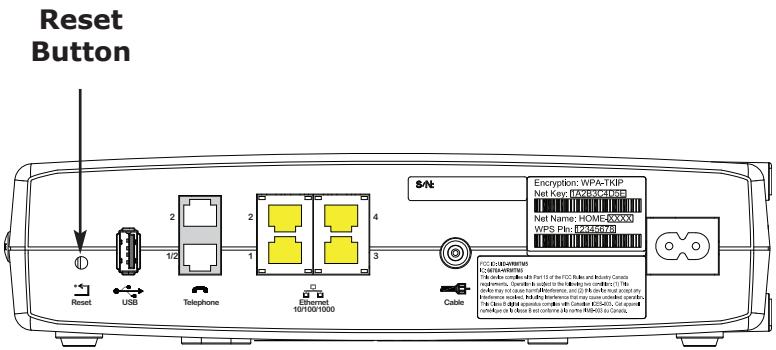
Power, DS, US, Online	Telephone		Battery	Description
	1	2		
Off	Off	Off	Off	No power to Modem
Flash	Flash	Flash	Flash	Power-on Self Test
See "Cable Modem Start Up Sequence"				
On	Flash	Off	Off	Retrieving telephone network information
On	Off	Flash	Off	Retrieving telephone line information
On	Flash	Flash	Off	Activating telephone service
Normal Operation				

Note: The **DS** and **US** indicators flash yellow during startup, and turn green if the Telephony Gateway establishes an ultra-high speed connection.

Cable Modem Start Up Sequence

DS	US	Online	Description
Flash	Off	Off	Downstream search
On	Flash	Off	Downstream found; upstream search
On	**On**	Flash	Downstream and Upstream found; retrieving setup information from cable operator
On	**On**	**On**	Ready for service

Using the Reset Button



Use the **Reset** button, on the back of the Telephony Gateway, to reset the modem and perform initialization as if you power cycled the unit. You may need to reset the Telephony Gateway if you are having problems connecting to the Internet. Using this button will be rare.

Use a pointed **non-metallic** object to press this button. The photo to the left shows the location of the **Reset** button. The **Reset** button is recessed to prevent accidental resets.

The diagram on the left shows the location of the reset button.

Resetting the Router to Factory Defaults

To reset the router to factory defaults, press and hold the **Reset** button on the back of the Telephony Gateway for more than fifteen seconds. This restores the wireless setup configuration and router configuration parameters to the factory defaults. You may need to do this if a misconfiguration has locked out all access.

Booting from Battery

The TG852 supports a "Boot from Battery" feature that allows the Telephony Gateway to begin service without AC power.

To start the TG852 from its battery, follow these steps:

1. If a battery is already installed in the Telephony Gateway, remove it.
2. Re-insert the battery into the Telephony Gateway (see Battery Installation and Removal for details).
3. Press the **Reset** button; the Power light should turn on immediately.

Troubleshooting

The Telephony Gateway is plugged in, but the Power light is off.

Check all power connections. Is the power cord plugged in firmly at both ends?

If you plugged the power cord into a power strip, make sure the strip is switched on.

Avoid using an outlet controlled by a wall switch, if possible.

Finally, check the fuse or circuit breaker panel.

I'm not getting on the Internet (all connections).

It may take over 30 minutes to establish a connection the first time you power up your Telephony Gateway, especially when many people are online. Always leave your Telephony Gateway plugged into AC power and connected to the cable system.

Check the front panel lights:

- The **Power** and **Online** lights should be on.
- If the **Power** light blinks for more than 30 minutes, call your cable company for assistance.

Check your cable connections. Connectors should be tight. The coax cable should not be pinched, kinked, or bent sharply—any of these can cause a break or short in the cable (you may have to replace the cable). If you have one or more splitters between the Telephony Gateway and CATV outlet, remove the splitters and connect the Telephony Gateway directly to the outlet.

Proceed to the Ethernet or wireless solutions (next page) if necessary.

I'm not getting on the Internet. (Ethernet)

If you are using a hub, is the hub turned on?

Are you using the right type of Ethernet cable? Use the supplied cable for direct connection to a computer; use a cross-over cable for connection to a hub.

Press the **Reset** button on the back of the Telephony Gateway.

A misconfiguration could lock out all access to the Telephony Gateway router. If you think this has happened, see Resetting the Router to Factory Defaults.

I'm not getting on the Internet. (Wireless)

Check the indicator lights (see Using the Telephony Gateway) — the WiFi light should be on.

Does your connection utility discover your wireless LAN? If you turned off "Broadcast SSID" you need to manually enter the name of your wireless LAN in the connection utility.

Change your security mode to "WEP" or "disabled". If you use "disabled," enable one of the other security modes as soon as you find the problem.

A misconfiguration could lock out all access to the Telephony Gateway router. If you think this has happened, see Resetting the Router to Factory Defaults.

My wireless Internet connection stops working sometimes.

This is usually caused by interference — two common sources are 2.4GHz "remote" telephones and microwave ovens. If you cannot remove the interfering product, try using a different channel or setting Protected Mode.

I can get on the Internet, but everything is slow.

If the Web site you are visiting is very popular, that site may be having trouble servicing all the requests. If other sites download quickly, wait for a few minutes and try again. Usage during peak hours may also affect the connection speed.

Other communications on the LAN, or interference with wireless connections, may slow down your connection.

I don’t have dial tone when I pick up my phone, why?

In order for telephone service to be functional on the Telephony Gateway, telephone service must have been purchased from the service provider and configured on your Telephony Gateway. The following steps should help in identifying the source of the problem.

1 Is the Power LED lit?

- If not, check to make sure the Telephony Gateway is plugged in and the outlet has power.
- If the LED is lit, go to the next step.

2 Is the Online LED lit?

- If not, check the coax connection at the Telephony Gateway and the wall. Ensure they are connected and tight. If they are and you do not have dial tone, contact your service provider.
- If the Online LED is lit, go to the next step.

3 Is the Telephone (Tele 1 or Tel 2) LED lit?

- If not, phone service has not been set up on that line. Contact your service provider.
- If it is blinking, there is a phone off hook somewhere in the house. Find that phone and hang it up.
- If it is lit, go to the next step.

4 Is the phone plugged directly into the Telephony Gateway?

- Make sure the phone is plugged into the port on the back of the Telephony Gateway labeled “Telephone 1/2” for line 1, and “Telephone 2” for line 2.
- If so, try a different phone. Make sure the new phone is a working phone.
- If a known good phone is used and you still don’t have dial tone, try a different phone cable. If a new phone and cable do not restore dial tone, call your service provider.

5 Is the Telephony Gateway plugged into a wall outlet?

- If so, unplug the RJ-11 connector at the back of the Telephony Gateway and plug in a known working phone. If you now have dial tone, the problem is with the house wiring. Contact your cable company or a qualified wiring technician to correct the house wiring. If you still do not have dial tone, contact your service provider.

Glossary

The following is a list of common cable and networking terms.

Amp-hour (Ah)

A measure of battery capacity. For example, a 1.0Ah battery can nominally supply one Ampere of current for one hour.

Category 5 (Cat5)

A high-quality type of cable, used for Fast Ethernet (100BaseT) connections. When purchasing Ethernet cables, always look for Category 5 cable.

Coaxial cable (coax)

A thin wire, used to connect your television and Telephony Gateway to the cable TV system. You can buy coax from any electronics retailer and many discount stores.

CPE

Customer Premise Equipment. This is the equipment that is plugged in to the Telephony Gateway; typically a computer or hub.

Cross-over

An Ethernet cable used to connect two hubs (or a hub and a cable modem) together. Also, some Ethernet hubs may have built-in cross-over on one or more ports (which eliminates the need for a cross-over cable).

DHCP

Dynamic Host Configuration Protocol. An IP protocol used to provide an IP address and location of services (such as DNS and TFTP) needed by a device connecting to the network. DHCP allows the cable company to configure your computer's networking software for you.

DNS

Domain Name Service (Server). An IP service that associates a domain name (such as www.example.com) with an IP address.

Downstream

In an HFC network, the direction from the head-end to the subscriber. Some older cable documentation may refer to this as the forward path.

DOCSIS

Data Over Cable System Interface Specification. The interoperability standards used for data communications equipment on an HFC network.

EMTA

Embedded Multimedia Terminal Adapter. An MTA device that is integrated with a cable modem.

Ethernet

A standard method of connecting two or more computers into a Local Area Network (LAN).

EuroDOCSIS

The European version of DOCSIS.

Event

An informational message used for monitoring network status.

F-connector

The type of connector used on coax cable. There are two common types of F-connector, slip-on and screw-on. Use coax with screw-on connectors for connecting your Telephony Gateway.

Firewall

A hardware or software device that prevents unauthorized access to a private network from the Internet. The TG852 provides a built-in firewall.

Gateway

The device, usually a router, that connects devices on a given IP subnet to other IP subnets.

Headend

The "central office" in an HFC network. The headend houses both video and data equipment. In larger cable networks, a "master" headend often feeds several "remote" headends to provide distributed services.

HTTP

HyperText Transfer Protocol.

Hub

A box with several Ethernet connectors. Ethernet hubs provide a common point of contact for all connected devices.

IP address

A number assigned to your computer by your cable company, used to identify your computer to other systems on the Internet.

ISDN

Integrated Services Digital Network. A digital telephony standard that provides communication speeds about twice as fast as standard dialup.

LAN

Local Area Network. A network that allows computers in a single location (such as a building) to communicate with one another.

LED

Light Emitting Diode. A semi-conductor diode that emits light when current is passed through it.

MAC address

A number that uniquely identifies any device connected to a network. Your cable company uses your Telephony Gateway's MAC address to authorize access to the Internet. The MAC address is printed on a label on the bottom of your Telephony Gateway.

Protocol

A set of rules and formats that determines the communication behavior of network entities at a given layer.

Proxy

A device or program that stands in between a server (for example, a web site) and a client (your browser), providing a way to relieve some of the burden from the server. For example, your cable company may have a web proxy that keeps copies of popular web pages; the proxy can send you those pages instead of fetching them directly from the web site, resulting in faster page loading and less network congestion.

RF

Abbreviation for Radio Frequency. Some literature refers to coax as "RF cable" and the connectors as "RF connectors."

RJ-11

A standard 2-conductor modular connector, commonly used in North America for connecting telephones.

RJ-45

A standard 8-conductor modular connector, commonly used on Ethernet cable. An RJ-45 connector looks like a wide RJ-11 (telephone) connector.

Splitter

A small box with three cable connectors: one input and two outputs. You may need a splitter if you have a TV already connected to the cable outlet that you want to use for your Telephony Gateway. You can buy a splitter from any electronics retailer and most discount stores.

SSID

Service Set IDentifier, a string of text (up to 32 characters long) that uniquely identifies a wireless LAN.

Switched outlet

A power outlet that may be turned on and off using a wall switch. Usually intended for lamps. Avoid plugging your computer or Telephony Gateway into a switched outlet to avoid disruptions.

TCP/IP

Transmission Control Protocol/Internet Protocol. The protocols used to facilitate communications across one or more connected networks.

TDMA

Time Division Multiple Access. A method used by DOCSIS-compliant cable modems for sending upstream data with minimal interference.

Upstream

The path from a subscriber device to the headend. Some older cable documentation may refer to this as the return path or reverse path.

WEP

Wired Equivalent Privacy, a common standard for encrypting data sent over a wireless LAN.

WPA

Wi-fi Protected Access, a standard for encrypting data sent over a wireless LAN. WPA offers improved security over WEP.

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TG852 Telephony Gateway User's Guide

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