#### Summary

This lists the QoS entries you have created for your applications and devices.

**Priority** This column displays the bandwidth priority of High, Medium, Normal, or Low.

**Name** This column displays the application, device, or port name.

**Information** This column displays the port range or MAC address entered for your entry. If a pre-configured application or game was selected, there will be no valid entry shown in this section.

**Remove** Click this button to remove an entry.

Edit Click this button to make changes.

Click **Save Settings** to apply your changes, or click **Cancel Changes** to cancel your changes.

# Administration > Management

The *Administration* > *Management* screen allows the network's administrator to manage specific Router functions for access and security.



Administration > Management

#### Management

#### **Router Access**

To ensure the Router's security, you will be asked for your password when you access the Router's web-based utility. The default is **admin**.

Router Password Enter a new password for the Router.

**Re-enter to confirm** Enter the password again to confirm.

#### Web Access

**Web Utility Access** HTTP (HyperText Transport Protocol) is the communications protocol used to connect to servers on the World Wide Web. HTTPS uses SSL (Secured Socket Layer) to encrypt data transmitted for higher security. Select **HTTP** or **HTTPS. HTTP** is the default.

Web Utility Access via Wireless If you are using the Router in a public domain where you are giving wireless access to your guests, you can disable wireless access to the Router's web-based utility. You will only be able to access the utility via a wired connection if you disable the setting. Keep the default, **Enabled**, to allow wireless access to the utility, or select **Disabled** to block wireless access to the utility.

#### **Remote Access**

**Remote Management** To permit remote access of the Router, from outside the local network, select **Enabled**. Otherwise, keep the default, **Disabled**.

**Web Utility Access** HTTP (HyperText Transport Protocol) is the communications protocol used to connect to servers on the World Wide Web. HTTPS uses SSL (Secured Socket Layer) to encrypt data transmitted for higher security. Select **HTTP** or **HTTPS. HTTP** is the default.

**Remote Upgrade** If you want to be able to upgrade the Router remotely, from outside the local network, select **Enabled**. (You must have the Remote Management feature enabled as well.) Otherwise, keep the default, **Disabled**.

Allowed Remote IP Address If you want to be able to access the Router from any external IP address, select **Any IP Address**. If you want to specify an external IP address or range of IP addresses, then select the second option and complete the fields provided.

**Remote Management Port** Enter the port number that will be open to outside access.



**NOTE:** When you are in a remote location and wish to manage the Router, enter **http://<Internet\_IP\_address>:port** or **https://<Internet\_IP\_address>:port**, depending on whether you use HTTP or HTTPS. Enter the Router's specific Internet IP address in place of <Internet\_IP\_address>, and enter the Remote Management Port number in place of the word port.

#### UPnP

Universal Plug and Play (UPnP) allows Windows Me and XP to automatically configure the Router for various Internet applications, such as gaming and videoconferencing.

**UPnP** If you want to use UPnP, keep the default setting, **Enabled**. Otherwise, select **Disabled**.

Allow Users to Configure Keep the default, Enabled, if you want to be able to make manual changes to the Router while using the UPnP feature. Otherwise, select **Disabled**.

Allow Users to Disable Internet Access Select Enabled, if you want to be able to prohibit any and all Internet connections. Otherwise, keep the default setting, **Disabled**.

#### **Backup and Restore**

**Backup Configurations** To back up the Router's configuration settings, click this button and follow the on-screen instructions.

**Restore Configurations** To restore the Router's configuration settings, click this button and follow the onscreen instructions. (You must have previously backed up the Router's configuration settings.)

Click **Save Settings** to apply your changes, or click **Cancel Changes** to cancel your changes.

# Administration > Log

The Router can keep logs of all traffic for your Internet connection.



Administration > Log

#### Log

**Log** To disable the Log function, select **Disabled**. To monitor traffic between the network and the Internet, keep the default, **Enabled**. With logging enabled, you can choose to view temporary logs.

**View Log** To view the logs, click **View Log**.



Log > View Log

Log

- Type Select Incoming Log, Outgoing Log, Security Log, or DHCP Client Log.
- <Type> Log The Incoming Log will display a temporary log of the source IP addresses and destination port numbers for the incoming Internet traffic. The Outgoing Log will display a temporary log of the local IP addresses, destination URLs/IP addresses, and service/port numbers for the outgoing Internet traffic. The Security log will display the login information for the web-based utility. The DHCP Client Log will display the LAN DHCP server status information.

Click **Save the Log** to save this information to a file on your PC's hard drive. Click **Refresh** to update the log. Click **Clear** to clear all the information that is displayed.

Click **Save Settings** to apply your changes, or click **Cancel Changes** to cancel your changes.

# Administration > Diagnostics

The diagnostic tests (Ping and Traceroute) allow you to check the connections of your network devices, including connection to the Internet.

A Division of Disco Systems, Inc.					-	w	irele	as⊪N Broa	Firmware	Version: v1.00.1
Administration	Setup	Wireles		Security		Access Restrictions	Appli G	cations & aming	Administration	Status
	Management	Log	T	Diagnostics	Т	Factory Defaults	Т	Firmware	Upgrade	
Dispussion Ping Test	IP or URL Addres Packet Size: Times to Ping:		32 5 53	bytes (32	2 - 655	00)			Help	
Traceroute Test	IP or UFL Addres	K		Start to Tracerou	£e.	]	7			ı cısco

Administration > Diagnostics

## Diagnostics

#### **Ping Test**

The Ping test checks the status of a connection.

**IP or URL Address** Enter the address of the PC whose connection you wish to test.

**Packet Size** Enter the packet size you want to use. The default is **32** bytes.

Times to Ping Enter many times you wish to test it.

**Start to Ping** To run the test, click this button. The *Ping Test* screen will show if the test was successful. Click **Close** to return to the *Diagnostics* screen.

P	Pinging values com [216.109.124.72] with 32 bytes of data:	_
	Reply from 216.109.124.72 bytes=32 times=90ms TTL=46	

Diagnostics > Ping

#### **Traceroute Test**

The Traceroute test tests the performance of a connection.

**IP or URL Address** Enter the address of the PC whose connection you wish to test.

**Start to Traceroute** To run the test, click this button. The *Traceroute Test* screen will show if the test was successful. Click **Close** to return to the *Diagnostics* screen.



Diagnostics > Traceroute

# Administration > Factory Defaults

The Administration > Factory Defaults screen allows you to restore the Router's configuration to its factory default settings.

LINKSYS <sup>®</sup> A Division of Cisco Systems, Inc.							
				W	līreless⊷N Broa	dband Router	WRT160N
Administration	Setup	Wireless	Security	Access Restrictions	Applications & Garning	Administration	Status
	Management	Log	Diagnostics	Factory Defaults	:   Firmware	Upgrade	
Factory Defaults	Restore A	I Settings				Help	
							cisco.

Administration > Factory Defaults

**NOTE:** Do not restore the factory defaults unless you are having difficulties with the Router and have exhausted all other troubleshooting measures. Once the Router is reset, you will have to re-enter all of your configuration settings.

## **Factory Defaults**

**Restore All Settings** To reset the Router's settings to the default values, click this button and then follow the onscreen instructions. Any settings you have saved will be lost when the default settings are restored.

# Administration > Firmware Upgrade

The *Firmware Upgrade* screen allows you to upgrade the Router's firmware. Do not upgrade the firmware unless you are experiencing problems with the Router or the new firmware has a feature you want to use.

				۷	Vireless-N Broa	dband Router	WRT160N
Administration	Setup	Wireless	Security	Access Restrictions	Applications & Gaming	Administration	Status
	Management	I Log I	Diagnostics	Factory Default	s   Firmware	Upgrade	
	Please selec Warning: Upg pow	t a file to upgrade f rading firmware m ver or press the re	the firstware:	Start to Upgrade des, please don't tu	Browse	<u>Help</u>	
		Upgrade n	ust NOT be in	terrupted !!			

Administration > Firmware Upgrade

**NOTE:** The Router may lose the settings you have customized. Before you upgrade its firmware, write down all of your custom settings. After you upgrade its firmware, you will have to re-enter all of your configuration settings.

## **Firmware Upgrade**

Before upgrading the firmware, download the Router's firmware upgrade file from the Linksys website, www.linksys.com. Then extract the file.

**Please select a file to upgrade the firmware** Click **Browse** and select the extracted firmware upgrade file.

**Start to Upgrade** After you have selected the appropriate file, click this button, and follow the on-screen instructions.

# Status > Router

The *Router* screen displays information about the Router and its current settings.



Status > Router

#### **Router Information**

**Firmware Version** This is the version number of the Router's current firmware.

Current Time This shows the time set on the Router.

**Internet MAC Address** This is the Router's MAC Address, as seen by your ISP.

**Host Name** If required by your ISP, this was entered on the *Basic Setup* screen.

**Domain Name** If required by your ISP, this was entered on the *Basic Setup* screen.

# **Internet Connection**

This section shows the current network information stored in the Router. The information varies depending on the Internet connection type selected on the *Basic Setup* screen.

Click **Refresh** to update the on-screen information.

# Status > Local Network

The *Local Network* screen displays information about the local, wired network.

				Wireless-N Broa	dband Router	WRT160
Status	Setup Wir	eless Se	curity Access Restriction	Applications & Is Gaming	Administration	Statu
	Router   Local I	Network   V	freless Network			
Local Network						
	Local MAC Address:	04:04:04:04:04:0	0:00		Help	
	Router IP Address:	192.168.1.1				
	Subnet Mask:	255.255.255.4	2			
DHCP Serve						
	DHCP Server:	Enabled				
	Start IP Address:	192.168.1.100				
	End IP Address:	192.168.1.145				
	DHCP Client Table					

Status > Local Network

## **Local Network**

**Local MAC Address** The MAC address of the Router's local, wired interface is displayed here.

**Router IP Address** This shows the Router's IP address, as it appears on your local network.

Subnet Mask This shows the Subnet Mask of the Router.

# **DHCP Server**

**DHCP Server** The status of the Router's DHCP server function is displayed here.

**Start IP Address** For the range of IP addresses used by devices on your local network, the starting IP address is shown here.

**End IP Address** For the range of IP addresses used by devices on your local network, the ending IP address is shown here.

**DHCP Clients Table** Click this button to view a list of PCs that are using the Router as a DHCP server.

vision of Cisco Systems, Inc.						
DHCP Client Table						
To Sort by	P Address	Interface	ID Address	-	Fundand Yima	
To Sort by	Client Name	Interface	IP Address	MAC Address	Expired Time	Delet
To Sort by	Client Name Linksys 1 Linksys 2	Interface LAN Wireless-A	IP Address 192.168.1.100 192.168.1.101	MAC Address 00:40:05:35:CE:61 00:40:05:35:CE:62	Expired Time 23hr:59min:37sec 22hr:59min:37sec	Delet
To Sort by	Client Harne Linksys 1 Linksys 2 Linksys 3	Interface LAN Wireless-A Wireless-G	IP Address 192.168.1.100 192.168.1.101 192.168.1.102	MAC Address 00:40:05:35:CE:61 00:40:05:35:CE:62 00:40:05:35:CE:63	Expired Time 23hr:59min:37sec 22hr:59min:37sec 21hr:59min:37sec	Delet

DHCP Clients Table

#### **DHCP Client Table**

The DHCP Client Table lists computers and other devices that have been assigned IP addresses by the Router. The list can be sorted by Client Name, Interface, IP Address, MAC Address, and Expired Time (how much time is left for the current IP address). To remove a DHCP client, click **Delete**. To retrieve the most up-to-date information, click **Refresh**. To exit this screen and return to the *Local Network* screen, click **Close**.

# Status > Wireless Network

The *Wireless Network* screen displays information about your wireless network.



Status > Wireless

# Wireless Network

**MAC Address** The MAC address of the Router's local, wireless interface is displayed here.

**Mode** Displayed here is the wireless mode used by the network.

**Network Name (SSID)** Displayed here is the name of the wireless network, which is also called the SSID.

**Radio Band** Shown here is the Radio Band setting selected on the *Basic Wireless Settings* screen.

**Wide Channel** Shown here is the Wide Channel setting selected on the *Basic Wireless Settings* screen.

**Standard Channel** Shown here is the Standard Channel setting selected on the *Basic Wireless Settings* screen.

**Security** Displayed here is the wireless security method used by the Router.

**SSID Broadcast** Displayed here is the status of the SSID Broadcast feature.

# Appendix A: Troubleshooting

#### Your computer cannot connect to the Internet.

Follow these instructions until your computer can connect to the Internet:

- Make sure that the Router is powered on. The Power LED should be green and not flashing.
- If the Power LED is flashing, then power off all of your network devices, including the modem, Router, and computers. Then power on each device in the following order:
  - 1. Cable or DSL modem
  - 2. Router
  - 3. Computer
- Check the cable connections. The computer should be connected to one of the ports numbered 1-4 on the Router, and the modem must be connected to the Internet port on the Router.

#### The modem does not have an Ethernet port.

The modem is a dial-up modem for traditional dial-up service. To use the Router, you need a cable/DSL modem and high-speed Internet connection.

# You cannot use the DSL service to connect manually to the Internet.

After you have installed the Router, it will automatically connect to your Internet Service Provider (ISP), so you no longer need to connect manually.

# The DSL telephone line does not fit into the Router's Internet port.

The Router does not replace your modem. You still need your DSL modem in order to use the Router. Connect the telephone line to the DSL modem, and then insert the setup CD into your computer. Click **Setup** and follow the on-screen instructions.

# When you double-click the web browser, you are prompted for a username and password. If you want to get rid of the prompt, follow these instructions.

Launch the web browser and perform the following steps (these steps are specific to Internet Explorer but are similar for other browsers):

- 1. Select Tools > Internet Options.
- 2. Click the **Connections** tab.
- 3. Select Never dial a connection.
- 4. Click **OK**.

# The Router does not have a coaxial port for the cable connection.

The Router does not replace your modem. You still need your cable modem in order to use the Router. Connect your cable connection to the cable modem, and then insert the setup CD into your computer. Click **Setup** and follow the on-screen instructions.

#### The computer cannot connect wirelessly to the network.

Make sure the wireless network name or SSID is the same on both the computer and the Router. If you have enabled wireless security, then make sure the same security method and key are used by both the computer and the Router.

#### You need to modify the settings on the Router.

Open the web browser (for example, Internet Explorer or Firefox), and enter the Router's IP address in the address field (the default IP address is **192.168.1.1**). When prompted, enter the password to the Router (the default is **admin**). Click the appropriate tab to change the settings.



**WEB:** If your questions are not addressed here, refer to the Linksys website, **www.linksys.com**