Prestige 792H

### G.SHDSL 4-port Security Gateway

**Compact Guide** 

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# 1 Introducing the Prestige

The Prestige 792H G.SHDSL 4-port Security Gateway is a cost effective DSL solution designed for medium sized business networks connecting to the Internet or remote office networks. Key features of the Prestige include high-speed Internet access, robust firewall security, VPN (Virtual Private Network) support, auto fail-over and fail-back WAN dial backup solution and effective network bandwidth management. See your *User's Guide* for more details on all Prestige features.

You should have an Internet account already set up and have been given most of the following information.

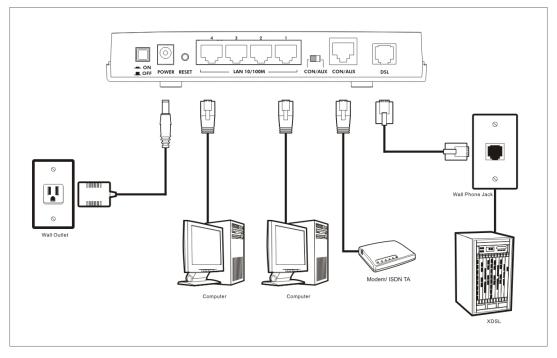
		INTERNE	ET ACCOUNT INF	ORMATION	
Your dev	vice's WAN IP	Address (if given):		_	
DNS Ser	DNS Server IP Address (if given): Primary, Secondary				
Virtual P	Path Identifier (	/PI):			
		er ( <b>VCI</b> ):			
Multiplex	xing (VC-based	or LLC-based):	□vc		
Encapsu	ulation:				
Transfer	Rate:				
Standard	d Mode:	(Select one of the ch	noices below)		
O RE	FC 1483				
O EN	NET ENCAP	Ethernet Encapsulat	tion Gateway IP Ac	Idress:	_
O PF	PPoA	User Name:		Password:	
O PF	PPoE	Service Name:			
		User Name:		Password:	

## **1.1 Certifications**

- 1. Go to <u>www.zyxel.com</u>
- 2. Select your product from the drop-down list box on the ZyXEL home page to go to that product's page.
- 3. Select the certification you wish to view from this page.

# 2 Hardware

## 2.1 Rear Panel Connections



#### Figure 1 P792H Hardware Connections

#### **Table 1 Prestige Rear Panel Description**

LABEL	DESCRIPTION
POWER	Connect to a power source using the power adapter for your region (see your <i>User's Guide</i> ).
RESET	You only need to use this button if you've forgotten the Prestige's password. It returns the Prestige to the factory defaults (password is 1234, LAN IP address 192.168.1.1, see your <i>User's Guide</i> for details).
LAN 10/100 Ethernet Ports	Connect computers or hubs to these ports with Ethernet cables. These ports are auto- negotiating (can connect at 10 or 100Mbps) and auto-crossover (automatically adjust to straight-through or crossover Ethernet cable.

#### Table 1 Prestige Rear Panel Description

LABEL	DESCRIPTION
CON/AUX switch CON/AUX port	Only connect this port if you want to configure the Prestige using the SMT via console port or set up a backup WAN connection; see your <i>User's Guide</i> for details.
	Set this switch to the "CON" side to use the <b>CON/AUX</b> port as a console port for local device configuration and management. Connect the Rj-45 of the console cable to the console port of the Prestige and the 9-pin female end to a serial port (COM1, COM2 or other COM port) on your computer. Your computer should have a terminal emulation communications program (such as HyperTerminal) set to VT100 terminal emulation, no parity, 8 data bits, 1 stop bit, no flow control and 9600 bps port speed.
	Set this switch to the "AUX" side to use the CON/AUX port as an auxiliary dial-up WAN connection. Connect the RJ-45 end of the console cable to the CON/AUX port and use the 9-pin end of the cable to connect to a modem or TA.
DSL	Connect to a telephone jack using a telephone wire.

### 2.2 The Front Panel LEDs

Turn on the Prestige by pressing the ON/OFF button.

The **PWR/SYS** LED turns on when you connect the power. The **PWR** and **SYS** LED blinks while performing system testing and then stays on if the testing is successful. The **PPP/ACT**, **DSL** and four **LAN** LEDs turn on if they are properly connected. Refer to the *User's Guide* for more detailed LED descriptions.



Figure 2 P792H Front Panel LED Description

LED	COLOR	STATUS	DESCRIPTION
PWR/SYS	Green	On	The Prestige is receiving power and functioning properly.

#### Table 2 P792H Front Panel LED Description

LED	COLOR	STATUS	DESCRIPTION
		Blinking	The Prestige is rebooting.
	Red	On	Power to the Prestige is too low.
		Off	The system is not ready or has malfunctioned.
DSL	Green	On	The Prestige is linked successfully to a DSLAM.
		Blinking	The Prestige is initializing the G.SHDSL line.
		Off	The G.SHDSL link is down.
PPP/ACT	Green	Blinking	The Prestige is sending/receiving non-PPP data.
	Amber	On	The Prestige has a PPP (PPPoA or PPPoE) connection.
		Blinking	The Prestige is sending/receiving PPPoA or PPPoE traffic.
		Off	The system is ready, but is not sending/receiving data.
LAN 1 ~ 4	Green	On	The Prestige has a successful 10Mb Ethernet connection.
		Blinking	The Prestige is sending/receiving data.
	Amber	On	The Prestige has a successful 100Mb Ethernet connection.
		Blinking	The Prestige is sending/receiving data.
		Off	The LAN is not connected.

#### Table 2 P792H Front Panel LED Description

# 3 Setting Up Your Computer's IP Address

# Skip this section if your computer is already set up to accept a dynamic IP address. This is the default for most new computers.

The Prestige is already set up to assign your computer an IP address. Use this section to set up your computer to receive an IP address or assign it a static IP address in the 192.168.1.2 to 192.168.1.254 range with a subnet mask of 255.255.255.0. This is necessary to ensure that your computer can communicate with your Prestige.

Your computer must have an Ethernet card and TCP/IP installed. TCP/IP should already be installed on computers using Windows NT/2000/XP, Macintosh OS 7 and later operating systems.

### 3.1 Windows 95/98/Me

- 1. Click Start, Settings, Control Panel and double-click the Network icon to open the Network window.
- 2. The **Network** window **Configuration** tab displays a list of installed components. You need a network adapter, the TCP/IP protocol and Client for Microsoft Networks.
- In the Network window Configuration tab, select your network adapter's TCP/IP entry and click Properties.

	k components are ins	talled:
₿ZyAIR 100 Wirel ■NDISWAN -> <n< td=""><td></td><td></td></n<>		
	n EN1207D-TX PCI F	ast Ethernet Adapte
TCP/IP -> Dial-U	Contraction of the second second	
TCP/IP -> ZyAIF	100 Wireless PCMCI	A
<u>A</u> dd	R <u>e</u> move	P <u>r</u> operties
imary Network <u>L</u> og	on:	
lient for Microsoft N	letworks	
Eile and Print Sha	aring	
Description TCP/IP is the proto wide-area network:	icol you use to conne s.	ct to the Internet an

4. Click the **IP Address** tab.

-If your IP address is dynamic, select **Obtain an IP** address automatically.

-If you have a static IP address, select **Specify an IP** address and type your information into the IP Address and **Subnet Mask** fields.

Bindings	Adv	/anced	N	etBIOS
DNS Configuration	Gateway	WINS Confi	guration	IP Address
An IP address car If your network do your network admi the space below.	es not autor	natically assig	n IP addr	esses, ask
🖲 Obtain an IP	address au	tomatically		
C Specify an IF	<sup>o</sup> address:			
[P Address:				
S <u>u</u> bnet Mas	::			
☑ Detect conn	ection to ne	twork media		

5. Click the **DNS Configuration** tab.

-If you do not know your DNS information, select **Disable DNS**.

-If you know your DNS information, select **Enable DNS** and type the information in the fields below (you may not need to fill them all in).

P/IP Properties		3011 21		<u>? ×</u>
Bindings		anced		etBIOS
DNS Configuration	Gateway	WINS Co	onfiguration	IP Address
Disable DNS	j			
C Enable DNS				
Host:		Domain		
Toor		Demain	" <b>I</b>	
DNS Server Sea	arch Order —			
			Add	1
			B	1
		_	<u>R</u> emove	1
I				
Domain Suffix S	earch Order			
			Add	1
				4
		_	Remove	
		8	ОК	Cancel
				Cancer

6. Click the Gateway tab.

-If you do not know your gateway's IP address, remove previously installed gateways.

-If you have a gateway IP address, type it in the **New** gateway field and click Add.

TCP/IP Properties		<u>?</u> ×
Bindings	Advanced	NetBIOS
DNS Configuration	Gateway WINS Conf	iguration   IP Address
	n the Installed Gateway li in the list will be the orde d.	
	. <u>A</u> do	
	<u>R</u> emo	VE
	0	Cancel

- 7. Click **OK** to save and close the **TCP/IP Properties** window.
- 8. Click **OK** to close the **Network** window. Insert the Windows CD if prompted.
- 9. Turn on your Prestige and restart your computer when prompted.

#### Verifying Your Computer's IP Address

- 1. Click **Start** and then **Run**.
- 2. In the Run window, type "winipcfg" and then click OK to open the IP Configuration window.
- Select your network adapter. You should see your computer's IP address, subnet mask and default gateway.

### 3.2 Windows 2000/NT/XP

- 1. In Windows XP, click start, Control Panel. In Windows 2000/NT, click Start, Settings, Control Panel.
- 2. In Windows XP, click Network Connections.

In Windows 2000/NT, click Network and Dial-up Connections.

- 3. Right-click Local Area Connection and then click Properties.
- 4. Select Internet Protocol (TCP/IP) (under the General tab in Win XP) and click Properties.

5. The Internet Protocol TCP/IP Properties screen opens (the General tab in Windows XP).

- To have your computer assigned a dynamic IP address, click **Obtain an IP address automatically**.

If you know your DNS sever IP address(es), type them in the **Preferred DNS server** and/or **Alternate DNS server** fields.

-To configure a static IP address, click **Use the following IP Address** and fill in the **IP address** (choose one from192.168.1.2 to 192.168.1.254), **Subnet mask** (255.255.255.0), and **Default gateway** (192.168.1.1) fields.

Then enter your DNS server IP address(es) in the **Preferred DNS server** and/or **Alternate DNS server** fields.

If you have more than two DNS servers, click **Advanced**, the **DNS** tab and then configure them using **Add**.

eneral	Alternate Configuration	
this cap		d automatically if your network supports eed to ask your network administrator for
0	btain an IP address auto	matically
OU	se the following IP addre	\$\$.
IP a	ddress:	
Subi	net mask:	
Defa	ult gateway:	40 40 M
00	btain DNS server addres	s automatically
OU	se the following DNS ser	ver addresses:
Pref	erred DNS server:	
Alter	nate DNS server:	
		Advanced.

 Click Advanced. Remove any previously installed gateways in the IP Settings tab and click OK to go back to the Internet Protocol TCP/IP Properties screen.

7.	Click OK to close the Internet Protocol (TCP/IP) Properties
	window.

8. Click **OK** to close the **Local Area Connection Properties** window.

Settings DNS	WINS Option:	\$
IP addresses		
IP address		Subnet mask
DHCP Enab	led	
	Add	Edit Remove
		Luk
Default gatewa	iys:	
Gateway		Metric
unatornay		
	Add	Edit Remove
A Anne Kan	netric	
Automatic r	c:	
Automatic r		

## 3.3 Checking/Updating Your Computer's IP Address

- 1. In the computer, click Start, (All) Programs, Accessories and then Command Prompt.
- 2. In the **Command Prompt** window, type "ipconfig" and then press **ENTER** to verify that your computer's IP address is in the correct range (192.168.1.2 to 192.168.1.254) with subnet mask 255.255.255.0. This is necessary in order to communicate with the Prestige.

Refer to your *User's Guide* for detailed IP address configuration for other Windows and Macintosh computer operating systems.

### 3.4 Testing the Connection to the Prestige

- 1. Click Start, (All) Programs, Accessories and then Command Prompt.
- 2. In the **Command Prompt** window, type "ping" followed by a space and the IP address of the Prestige (192.168.1.1 is the default).
- 3. Press ENTER and the following screen displays.

```
C:\>ping 192.168.1.1
Pinging 192.168.1.1 with 32 bytes of data:
Reply from 192.168.1.1: bytes=32 time=10ms TTL=254
Reply from 192.168.1.1: bytes=32 time<10ms TTL=254
Reply from 192.168.1.1: bytes=32 time<10ms TTL=254
Ping statistics for 192.168.1.1:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
    Minimum = 0ms, Maximum = 10ms, Average = 2ms</pre>
```

Your computer can now communicate with the Prestige using a LAN port.

# 4 Configuring Your Prestige

Choose one of these methods to access and configure the Prestige. This *Quick Start Guide* shows you how to use the web configurator wizard only. See your *User's Guide* for background information on all Prestige features and SMT configuration. Click the web configurator online help for screenspecific web help.

- Web Configurator
- SMT (System Management Terminal). Access the SMT via:

- Console port using terminal emulation software
- LAN or WAN using Telnet

### 4.1 Accessing Your Prestige Via Web Configurator

Step 1. Launch your web browser. Enter "192.168.1.1" as the web site address.



#### Figure 3 Entering Prestige LAN IP Address in Internet Explorer

**Step 2.** Type the User Name and default password ("1234") in the Password field (in non-readable format). Click Cancel to refresh the password screen without saving any changes. Click OK to proceed to the Site Map.

Enter Netv	work Passwo	rd	<u>? ×</u>	1
<b>?</b>	Please type y	our user name and password.		
٤J	Site:	192.168.1.1		
	Realm	Prestige 792H		
	User Name			Default user name.
	Password			
	🗖 Save this	password in your password list		
		OK Ca	ncel	

#### Figure 4 Web Configurator: Password Screen

- Step 3. You should now see the web configurator Site Map screen.
- Click Wizard Setup to begin a series of screens to configure your Prestige for the first time.
- Click a link under Advanced Setup to configure advanced Prestige features.
- Click a link under Maintenance to see Prestige performance statistics, upload firmware and back up, restore or upload a configuration file.
- > Click Logout in the navigation panel when you have finished a Prestige management session.

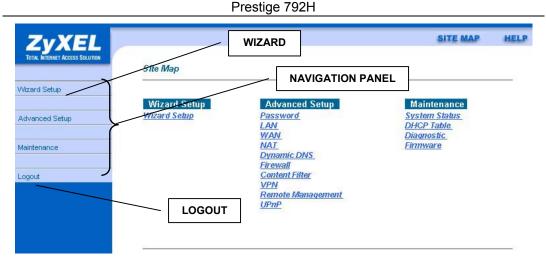


Figure 5 Web Configurator: Site Map Screen

The Prestige automatically logs you out if it is left idle for five minutes; press ENTER to log back in again.

## 4.2 Common Screen Command Buttons

The following table shows common command buttons found on many web configurator screens.

Back	Click <b>Back</b> to return to the previous screen.
Next	Click Next to proceed to the next screen.
Apply	Click <b>Apply</b> to save your changes back to the Prestige.
Reset/Cancel	Click Reset or Cancel to begin configuring this screen afresh.

## 4.3 Internet Access Using the Wizard

Use the Wizard Setup screens to configure your system for Internet access settings and fill in the fields with the information in the *Internet Account Information* table. Your ISP may have already configured some of the fields in the wizard screens for you.

Step 1. In the Site Map screen click Wizard Setup to display the first wizard screen.

Service	Туре	Olient	O Server
Transfe	er Rate		
	Rate Adaption	• Enable	O Disable
	Max Rate	2312 - Kbps	
	Min Rate	2312 - Kbps	
	Standard Mode	ANSI (ANNEX_A)	C ETSI (ANNEX_B)

Figure 6 Wizard Screen 1

If your Prestige is a server, then select the mode that applies to your region: **ANSI** (American National Standards Institute) and **ETSI** (European Telecommunications Standards Institute). If your Prestige is a client, select the same **Standard Mode** that the server side selects.

Select **Client** if your Prestige will act as a client device or **Server** if your Prestige will act as a server.

If you enable **Rate Adaption**, the Prestige will connect at the optimal transfer rate between the min and max rates below. If you disable **Rate Adaption**, it will attempt to connect at the maximum transfer rate configured. If that rate can't be attained, the connection will not be established. Next, select transfer rates from the **Max Rate** and **Min Rate** drop-down list boxes. For LAN-to-LAN applications make sure that your Prestige and its peer have the same **Transfer Max Rate** and the same **Transfer Min Rate**.

Step 2. Click Next to go to the second Wizard screen.

Mode	Routing 💌
Encapsulation	RFC 1483 •
Multiplex	LLC •
Virtual Circuit ID VPI VCI	8 35

Figure 7 Wizard Screen 2

From the **Mode** drop-down list box, select **Routing** (default) if your ISP allows multiple computers to share an Internet account. Otherwise select **Bridge**.

Select the encapsulation type your ISP uses from the **Encapsulation** drop-down list box. Choices vary depending on what you select in the **Mode** field.

Select the multiplexing method used by your ISP from the **Multiplex** drop-down list box.

Enter the correct Virtual Path Identifier (VPI) and Virtual Channel Identifier (VCI) numbers supplied by your ISP in the **VPI** and **VCI** fields. These fields may already be configured.

Click Next.

Step 3. The third wizard screen varies depending on what mode and encapsulation type you use. All screens shown are with routing mode. Configure the fields and click Next to continue or Back to go to the previous screen. See the first screen below, Internet Connection with PPPoA, for explanations of the following fields: User Name, Password, IP Address, Connection, and Network Address Translation.

User Name	any
Password	****
IP Address	
	Obtain an IP Address Automatically
	O Static IP Address
	0.0.0.0
Connection	
	Connect on Demand: Max Idle Timeout 30 Secs
	O Nailed-Up Connection
Network Addres	s Translation
	SUA Only

Enter the user name and password *exactly* as your ISP assigned them.

Select Obtain an IP Address Automatically if you have a dynamic IP address; otherwise select Static IP Address and type your ISP assigned IP address in the text box below.

Select **Connect on Demand** when you don't want the connection up all the time and specify an idle time-out period (in seconds) in the **Max. Idle Timeout** field.

Select **Nailed-Up Connection** when you want your connection up all the time. The Prestige will try to bring up the connection automatically if it is disconnected

#### Figure 8 Internet Connection with PPPoA

From the **Network Address Translation** drop-down list box, select **SUA Only, Full Feature** or **None**. Refer to the *Network Address Translation* section for more information.

IP Address and NAT will not be shown for PPPoA when the Prestige is in bridge mode.

Service Name	
User Name	any
Password	****
IP Address	
	O Obtain an IP Address Automtically
	Static IP Address
	0.0.0.0
Connection	-
	Connect on Demand: Max Idle Timeout Secs
	C Nailed-Up Connection
Network Addres	s Translation
	SUA Only 🔽

If your ISP provides the name of your PPPoE service provider, enter it in the **Service Name** field.

See Internet Connection with PPPoA for information on the remaining fields.

#### Figure 9 Internet Connection with PPPoE

IP Addre	SS			
	$\odot$	Obtain an IP Address Automat	cally	
	0	Static IP Address		
		IP Address	0.0.0.0	
		Subnet Mask	0.0.0.0	
		ENET ENCAP Gateway	0.0.0.0	
Network	Address	SUA Only		

Enter a subnet mask in dotted decimal notation in the **Subnet Mask** field.

In the **ENET ENCAP Gateway** field, enter the gateway IP address given by your ISP.

See Internet Connection with PPPoA for information on the remaining fields.

Figure 10 Internet Connection with ENET ENCAP

Wizard Setup - ISP Parameters for Internet Access	Enter the IP address given by your ISP in the IP Address field.
IP Address 172.16.1.25 Network Address Translation Full Feature 💌	The IP Address field is not available for bridge mode.
Back Next	Refer to the Advanced Configuration fo

*ion* for tion of the Network Address Translation field.

Figure 11 Internet Connection with RFC 1483

This screen will not be shown when the Prestige is in bridge mode. Instead the summary screen will be shown.

Verify the settings in the screen shown next. To change the LAN information on the Step 4. Prestige, click Change LAN Configuration. Otherwise click Save Settings to save the configuration and skip to step 6.

WAN Information:	
Mode: Routing	
Encapsulation: RFC 1483	
Mutiplexing: LLC	
VPI/VCI: 8/35	
IP Address : 0.0.0.0	
Network Address Translation: SUA Only	
LAN Information:	
IP Address: 192.168.1.1	
IP Mask: 255.255.255.0	
DHCP: ON	
Client IP Pool Stating Address: 192.168.1.33	
Size of Client IP Pool: 32	
Change LAN Configuration	

#### Figure 12 Wizard Screen 3

Step 5. If you want to change your Prestige LAN settings, click Change LAN Configuration to display the screen as shown next.

LAN IP Addres:	s 192.168.1.1	
LAN Subnet Ma	ask 255.255.255.0	
P		
DHCP Server	ON -	
Client IP Pool 9 Address	Stating 192.168.1.33	
Size of Client IF	PPool 32	
Primary DNS S	erver 0.0.0.0	
Secondary DN:	S Server 0.0.0.0	

Enter the LAN IP address of your Prestige in dotted decimal notation in the LAN IP Address field. For example, 192.168.1.1 (factory default).

If you change the Prestige's LAN IP address, you must use the *new* IP address if you want to access the web configurator again.

Enter a subnet mask in dotted decimal notation in the LAN Subnet Mask field.

#### Figure 13 Wizard: LAN Configuration

From the **DHCP Server** drop-down list box, select **ON** to allow your Prestige to assign IP addresses, an IP default gateway and DNS servers to computer systems that support the DHCP client. Select **OFF** to disable DHCP server.

When DHCP server is used, set the following items:

Specify the first of the contiguous addresses in the IP address pool in the Client IP Pool Starting Address field.

Specify the size or count of the IP address pool in the Size of Client IP Pool field.

Enter the IP address(es) of the DNS server(s) in the Primary DNS Server and/or Secondary DNS Server fields.

**Step 6.** The Prestige automatically tests the connection to the computer(s) connected to the LAN ports. To test the WAN connection from the Prestige to the ISP, click **Start Diagnose**. Otherwise click **Return to Main Menu** to go back to the **Site Map** screen.

	s now configured. Your device is capable Isted below. Click "Start Diagnose" butto u" button.	
LAN connections		
Т	est your Ethernet Connection	PASS
WAN connection	5	

Figure 14 Wizard Screen 4

## 4.4 Test Your Internet Connection

Launch your web browser and navigate to <u>www.zyxel.com</u>. Internet access is just the beginning. Refer to the *User's Guide* for more detailed information on the complete range of Prestige features. If you cannot access the Internet, open the web configurator again to confirm that the Internet settings you configured in the Wizard Setup are correct.

# 5 Advanced Configuration

This section shows how to configure some of the advanced features of the Prestige.

## 5.1 Network Address Translation Overview

NAT (Network Address Translation - NAT, RFC 1631) is the translation of the IP address of a host in a packet. For example, the source address of an outgoing packet, used within one network is changed to a different IP address known within another network.

If you have a single public IP address then select **SUA Only** in the **NAT-Mode** screen (see *Figure 15*). If you have multiple public IP addresses then you may use full feature mapping types (see the *User's Guide* for more details).

NAT supports five types of IP/port mapping. They are:

- 1. **One-to-One**: One-to-one mode maps one local IP address to one global IP address. Note that port numbers do not change for One-to-one NAT mapping type.
- 2. **Many-to-One**: Many-to-One mode maps multiple local IP addresses to one global IP address.
- 3. **Many-to-Many Overload**: Many-to-Many Overload mode maps multiple local IP addresses to shared global IP addresses.
- 4. **Many-to-Many No Overload**: Many-to-Many No Overload mode maps each local IP address to unique global IP addresses.
- 5. **Server**: This type allows you to specify inside servers of different services behind the NAT to be accessible to the outside world.

## 5.2 Configuring SUA Server

An SUA server set is a list of inside (behind NAT on the LAN) servers, for example, web or FTP, that you can make visible to the outside world even though SUA makes your whole inside network appear as a single computer to the outside world.

**Step 1.** From the main screen click **Advanced Setup** and then **NAT** to open the **NAT-Mode** screen. Select **SUA Only**. Click **Edit Details**.

#### Figure 15 NAT: Mode

**Step 4.** The following table describes the labels in this screen.

	Start Port No.	End Port No.	IP Address
1	All ports	All ports	0.0.0
2	0	0	0.0.0
3	0	0	0.0.0
4	0	0	0.0.0
5	0	0	0.0.0
6	0	0	0.0.0
7	0	0	0.0.0
8	0	0	0.0.0
9	0	0	0.0.0
10	0	0	0.0.0
11	0	0	0.0.0
12	0	0	0.0.0
			24

#### Figure 16 SUA/NAT Server

#### Table 3 SUA/NAT Server

LABEL	DESCRIPTION
Start Port No.	Type a port number in this field. To forward only one port, type the port number again in the <b>End Port</b> field. To forward a series of ports, type the start port number here and the end port number in the <b>End Port</b> field.

#### Table 3 SUA/NAT Server

LABEL	DESCRIPTION
End Port No.	Type a port number in this field. To forward only one port, type the port number in the <b>Start Port</b> field above and then type it again in this field. To forward a series of ports, type the last port number in a series that begins with the port number in the <b>Start Port</b> field above.
IP Address	Enter the inside IP address of the server here.

## 5.3 Firewall Overview

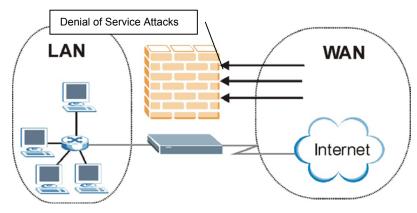
The Prestige firewall is a stateful inspection firewall and is designed to protect against Denial of Service attacks when activated. The Prestige's purpose is to allow a private Local Area Network (LAN) to be securely connected to the Internet. The Prestige can be used to prevent theft, destruction and modification of data, as well as log events, which may be important to the security of your network. The Prestige also has packet-filtering capabilities.

When activated, the firewall allows all traffic to the Internet that originates from the LAN, and blocks all traffic to the LAN that originates from the Internet. In other words the Prestige will:

#### Allow all sessions originating from the LAN to the WAN Deny all sessions originating from the WAN to the LAN

**LAN-to-WAN** rules are local network to Internet firewall rules. The default is to forward all traffic from your local network to the Internet.

The following figure illustrates a Prestige firewall application.





## 5.4 Enabling the Firewall

From the main screen, click **Advanced Setup**, **Firewall** and then **Config** to open the **Configuration** screen. Enable (or activate) the firewall by selecting the **Firewall Enabled** check box as seen in the following screen.

The firewall prote	ts against Denial of Sei	vice (DOS) atta	cks when it is a	ctive. The default Policy set:
1. allow all	essions originating fror	n theLocal Net	vork to the Interr	net and
2. deny all	essions originating from	the Internet to	the Local Netwo	ork
You may define a	dtional Policy rules or r	nodify existing	ones but please	exercise extreme caution in
doing so				
<ol> <li>Local Ne</li> </ol>	work to Internet Set			
2. Internet t	Local Network Set			
		ed, all the exis	ing firewall sec	urity policies and firewall
functions will be	isabled.			
	Back	Apply	Cancel	
	DACK	whhia	Cancer	

Figure 18 Enabling the Firewall

## 5.5 Procedure for Configuring Firewall Rules

From the main screen, click Advanced Setup, Firewall and then Rule Summary (for either local network to Internet rules or Internet to local network rules) to open the Summary screen.

#### Prestige 792H

0.	Source IP	Destination IP	Service	Action	Log
1	Any -	Any •	Any(UDP) -	Forward	None
2					
3					
4			•		
<u>5</u>	-				
<u>6</u>	-				
Z	•		•		
<u>8</u>		-	•		
<u>9</u>		-			
10		•	-		

#### Figure 19 Rule Summary

The following table describes the labels in this screen.

#### Table 4 Firewall Rules Summary: First Screen

LABEL	DESCRIPTION
The default action for packets not matching following rules	Use the drop-down list box to select whether to <b>Block</b> (silently discard) or <b>Forward</b> (allow the passage of) packets that do not match the following rules.
Default Permit Log	Select this check box to log all matched rules in the default set.
in the selected packet	hly fields summarize the rules you have created that apply to traffic traveling et direction. The firewall rules that you configure (summarized below) take eral firewall action settings above.

LABEL	DESCRIPTION
No.	This is your firewall rule number. The ordering of your rules is important as rules are applied in turn. The <b>Move</b> field below allows you to reorder your rules. Click a rule's number to edit the rule.
Source IP	This is the source address of the packet. Please note that a blank source or destination address is equivalent to <b>Any</b> .
Destination IP	This is the destination address of the packet. Please note that a blank source or destination address is equivalent to <b>Any</b> .
Service	This is the service to which the rule applies.
Action	This is the specified action for that rule, whether to <b>Block</b> (discard) or <b>Forward</b> (allow the passage of) packets.
Log	This field shows you if a log is created for packets that match the rule ( <b>Match</b> ), don't match the rule ( <b>Not Match</b> ), both ( <b>Both</b> ) or no log is created ( <b>None</b> ).
Rules Reorder	You may reorder your rules using this function. Use the drop-down list box to select the number of the rule you want to move. The ordering of your rules is important as rules are applied in turn.
To Rule Number	Use the drop-down list box to select to where you want to move the rule.
Move	Click <b>Move</b> to move the rule.

#### Table 4 Firewall Rules Summary: First Screen

Follow these directions to create a new rule.

- Step 1. In the Summary screen, click a rule's index number. The Edit Rule screen opens.
- Step 2. Configure the Source Address and Destination Address for the rule.
- **Step 3.** In the **Available Services** text box, select the services you want. Customize ports for services not predefined by the Prestige by clicking the **Edit Available Service** buttons. For a comprehensive list of port numbers and services, visit the IANA (Internet Assigned Number Authority) web site.

ource Address:		
###### Source IP Address ### Any	****	
SrcAdd SrcEdit SrcDel	lete	
estination Address:		
#### Destination IP Address ### Any	***	
DestAdd DestEdit De	estDelete	
ervice:	2 2 2022 0	
Available Services:	Selected Services:	
AIM/NEW-ICQ(TCP:5190) AUTH(TCP:113)		
BGP(TCP:179) BOOTP_CLIENT(UDP:68)	<< >>	
BOOTP_CLIENT(ODP:60) BOOTP_SERVER(UDP:67)	•	
Edit Available Service		
tion for Matched Packets:	Forward -	
ig:	None	
Alert		

#### Figure 20 Creating/Editing A Firewall Rule

The following table describes the labels in this screen.

#### Table 5 Creating/Editing A Firewall Rule

LABEL	DESCRIPTION
Source Address	Click <b>SrcAdd</b> to add a new address, <b>SrcEdit</b> to edit an existing one or <b>SrcDelete</b> to delete one. Please see the next section for more information on adding and editing source addresses.

LABEL	DESCRIPTION
Destination Address	Click <b>DestAdd</b> to add a new address, <b>DestEdit</b> to edit an existing one or <b>DestDelete</b> to delete one. Please see the following section on adding and editing destination addresses.
Services	See the User's Guide for more information on ports and services.
Available/ Selected Services	Highlight a service from the <b>Available Services</b> box on the left, then click >> to add it to the <b>Selected Services</b> box on the right. To remove a service, highlight it in the <b>Selected Services</b> box on the right, then click <<.
Edit Available Service	Click this button to go to the list of available services.
Action for Matched Packets	Should packets that match this rule be blocked or forwarded? Make your choice from the drop down list box. Note that <b>Block</b> means the firewall silently discards the packet.
Log	This field determines if a log is created for packets that match the rule, don't match the rule, both or no log is created.
Alert	Select the <b>Alert</b> check box to determine that this rule generates an alert when the rule is matched.
Delete	Click <b>Delete</b> to remove this rule.

#### Table 5 Creating/Editing A Firewall Rule

### **5.6 Configuring Source and Destination Addresses**

To add a new source or destination address, click **SrcAdd** or **DestAdd** from the previous screen. To edit an existing source or destination address, select it from the box and click **SrcEdit** or **DestEdit** from the previous screen. Either action displays the following screen.

Address Type:	Subnet Address 💌
Start IP Address:	0.0.0.0
End IP Address:	0.0.0.0
Subnet Mask:	0.0.0.0

Figure 21 Adding/Editing Source and Destination Addresses

The following table describes the labels in this screen.

Table 6 Adding/Editing Source and Destination Addresses

LABEL	DESCRIPTION
Address Type	Do you want your rule to apply to packets with a particular (single) IP address, a range of IP addresses (e.g., 192.168.1.10 to 192.169.1.50), a subnet or any IP address? Select an option from the drop down list box
Start IP Address	Enter the single IP address or the starting IP address in a range here.
End IP Address	Enter the ending IP address in a range here.
Subnet Mask	Enter the subnet mask here, if applicable.

# 6 Troubleshooting

PROBLEM	CORRECTIVE ACTION
None of the LEDs turn on when you turn on the Prestige.	Make sure that you have the correct power adaptor connected to the Prestige and plugged in to an appropriate power source. Check all cable connections.
	If the LEDs still do not turn on, you may have a hardware problem. In this case, you should contact your local vendor.
Cannot access the Prestige from the LAN.	Check the cable connection between the Prestige and your computer or hub. Ping the Prestige from a LAN computer. Make sure your computer Ethernet adapter is installed and functioning properly.
Cannot ping any computer on the LAN.	If the LAN LEDs are all off, check the cable connections between the Prestige and your LAN computers. Verify that the IP address, subnet mask of the Prestige and the LAN computers are in the same IP address range.
Cannot access the Internet.	Verify the Internet connection settings in the <b>WAN</b> screen. Make sure you entered the correct user name and password.