NetVanta

617004148F1-13B P/N: 17003148F1 17004148F1 17004148F11

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# **Quick Start**

# NetVanta 3148/4148 Router

#### **GETTING STARTED**

This NetVanta unit ships with a statically assigned IP address of 10.10.10.1 and the ability to connect to a Dynamic Host Control Protocol (DHCP) network and receive an IP address assignment from a DHCP server. When connecting to a DHCP network, this unit supports Zero-Touch Provisioning, allowing the NetVanta router to download and apply configuration parameters from a configuration management server.

Regardless of the method you use to connect the NetVanta unit to the network, there are two methods available for configuration:

- Web-based graphical user interface (GUI)
- ADTRAN Operating System (AOS) command line interface (CLI)

The GUI lets you configure the main unit settings and provides online guidance and explanations for each setting. However, using the AOS CLI may be necessary for more advanced configurations.

### **ACCESS THE GUI**

You may access the GUI from a web browser in one of two ways:

#### **Connect via the Static Address**

- Connect the router to your PC using the GIG 0/1 Gigabit Ethernet port on the front of the device.
- Set your PC to a fixed IP address of 10.10.10.2. To change your PC IP address, navigate to Computer > Control Panel > Network Connections > Local Area Connection > Properties > IP (TCP/IP) and select Use this IP Address. Enter these parameters:
  - IP Address: 10.10.10.2
  - Subnet Mask: 255.255.255.0
  - Default Gateway: 10.10.10.1

You do not need to enter any DNS server information. After the information is entered, select **OK** twice, and close the Network Connections dialog box. If you cannot change the PC's IP address, you will need to change the unit's IP address using the CLI. (Refer to the next two sections for instructions).

- 3. Open a web browser and enter the unit's IP address in your browser address line as follows: http://10.10.10.1. The default IP address is 10.10.10.1, but if you had to change the unit's IP address using the CLI, enter that address in the browser line.
- 4. The initial GUI screen appears.

#### Connect via the DHCP Client Address

- Connect the router to an existing network that supports DHCP using the GIG 0/1 Gigabit Ethernet port on the front of the device. The NetVanta unit will automatically request an IP address assignment from the DHCP server.
- 2. Check the DHCP server and record the IP address assigned to the NetVanta unit.

617004148F1-13B

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- Open a web browser on any network PC that can route to the IP address recorded in Step 2 and enter the NetVanta unit's IP address.
- 4. The initial GUI screen appears.

#### Access the CLI

Access the AOS CLI via the **CONSOLE** port or a Telnet or SSH session. To establish a connection to the NetVanta unit **CONSOLE** port, you need the following items:

- PC with VT100 terminal emulation software.
- DB-9 (or appropriate interface for your terminal or PC communication port) to RJ-45 serial cable (rollover cable).



There are many terminal emulation applications available on the web. PuTTy, SecureCRT, and HyperTerminal are a few examples.

- Connect the RJ-45 connector of your serial cable to the CONSOLE port on the front panel of the unit.
- 2. Connect the other end of the serial cable to the terminal or PC.

# i NOTE

Many PCs do not come with a standard serial port. A universal serial bus (USB) to serial RJ-45 adapter can be used instead. The drivers for the USB to serial adapter must be installed according to the manufacturer's instructions. If the USB to serial adapter is not properly installed on your PC, you will not be able to communicate with the AOS unit and you should seek support from the USB to serial adapter manufacturer.

- Provide power to the unit as appropriate. Refer to the NetVanta 3148/4148 Series
   Hardware Installation Guide available online at <a href="https://supportcommunity.adtran.com">https://supportcommunity.adtran.com</a> for more details
- Once the unit is powered up, open a VT100 terminal session using the following settings: 9600 baud, 8 data bits, no parity bits, 1 stop bit, and no flow control. Press ENTER to activate the AOS CLI.
- Enter enable at the > prompt and enter the Enable mode password when prompted. The default password is password.

You can also access the CLI from a Telnet or SSH client. In order to do this, you must know the IP address of the AOS device. If you do not know the unit's IP address, you must use the **CONSOLE** port to access the CLI. To access the CLI using a Telnet or SSH client, follow these steps:

- Connect the NetVanta unit to your PC using an Ethernet cable connected to any of the 8 switch ports on the front of the device or connect the NetVanta unit to an existing network that supports DHCP using any of the 8 switch port on the front of the device.
- Open a Telnet or SSH client on your computer and enter 10.10.10.1. If your unit received an IP address from a DHCP server or you have changed your unit's IP address, you will need to enter that address.
- For SSH, log into the unit using the default login (admin) and password (password). For Telnet, only the default password (password) is required.
- Enter enable at the > prompt and enter the enable password when prompted. The default password is password.

2 617004148F1-13B



#### COMMON CLI COMMANDS

The following are common CLI commands and tips for getting started with the CLI.

- Entering a question mark (?) shows contextual help and options. For example, entering ? at the prompt will show all commands available from that prompt.
- To view interface statistics, enter **show interface** *<interface type> <interface number>*.
- To view the current configuration, enter **show running-config**.
- To view all the IP Addresses currently configured, enter show ip interfaces brief.
- To view the AOS version, serial number, and other information, enter **show version**.
- To save the current configuration, enter write.

#### POWER OVER ETHERNET

The NetVanta 3148 PoE router (P/N 17003148F11) and the NetVanta 4148 PoE router (P/N 17004148F11) are Power over Ethernet (PoE) routers. PoE routers provide the ability to detect attached powered devices (PDs) and deliver 48 VDC to the PD via exiting Ethernet cabling. The NetVanta 3148 and 4148 PoE Series are fully compliant with the IEEE 802.03af and IEEE 802.03af PoE+ standards. by default, the PoE routers discover and provide power to IEEE-compliant PDs.

To disable PoE, use the **power inline never** command in the CLI. To disable power detection and supply from the GUI, navigate to the **Power over Ethernet** page and select **OFF** in the **Enable** column for a specific port (e.g., **giga-swx 0/1**).

# MANUALLY CONFIGURING THE UNIT'S IP ADDRESS



#### NOTE

The configuration parameters used in the examples outlined in this document are for instructional purposes only. Please replace all underlined entries (**example**) with your specific parameters to configure your application. This step is unnecessary if the unit's IP address has been configured automatically using DHCP.

The following steps create an IP address and subnet mask for the **GIG 0/1** Gigabit Ethernet port. If you are not sure what IP address to assign, please contact your network administrator.

- 1. At the # prompt, enter config terminal.
- 2. At the (config)# prompt, enter interface gigabit-eth 0/1 to access the configuration parameters for the GIG 0/1 port located on the front of the unit.
- 3. Enter **ip address** 10.10.10.1 255.255.255.0 to assign an IP address to the **GIG 0/1** port using a 24-bit subnet mask.
- 4. Enter **no shutdown** to activate the interface to pass data.
- Enter exit to exit the Ethernet interface commands and return to the Global Configuration mode.
- 6. Enter ip route <u>0.0.0.0</u> <u>0.0.0.0</u> <u>10.10.10.254</u> to add a default route to the route table. 0.0.0.0 is the default route and the default subnet mask, and **10.10.10.254** is the next-hop IP address to which the AOS router should send all of its traffic. You will need to enter the proper route, subnet mask, and gateway for your network. This information is typically provided by a service provider or local network administrator.
- 7. Enter do write to save the current configuration.

617004148F1-13B 3



#### CHANGE LOGIN PASSWORDS

- To modify the user accounts and passwords, from the (config)# prompt, enter the command username <username> password <password>.
- To modify the Enable mode password, from the (config)# prompt, enter the command enable password <password>.
- To modify the Telnet password, from the (config)# prompt, enter the command line telnet
  4 and then press ENTER. Enter the command password <password>.
- 4. Enter do write to save the current configuration.

## NETVANTA 3148/4148 SERIES DEFAULTS

Feature	Default Value
IP Address	10.10.10.1
DHCP	Client Enabled
Auto-Config	Zero Touch Provisioning Enabled
Username	admin
Password	password
HTTP Server	Enabled
Event History	On
IP Routing	Enabled

### RESTORING FACTORY DEFAULTS

For information on restoring factory defaults, refer to the guide *Restoring an AOS Device to Factory Default* available online at <a href="https://supportcommunity.adtran.com">https://supportcommunity.adtran.com</a>.

## **CONFIGURE YOUR APPLICATION**

The following configuration guides provide configuration information for applications typically used within this product. All documents are available online at <a href="https://supportcommunity.adtran.com">https://supportcommunity.adtran.com</a>.

NetVanta 3148/4148 Series Hardware Installation Guide

Configuring Port Forwarding in AOS

Configuring DHCP in AOS

Configuring VPN using Aggressive Mode in AOS

Configuring Internet Access (Many to one NAT) with the Firewall Wizard in AOS

Configuring a VPN using Main Mode in AOS

Implementing Auto-Config using the CLI

Voice Traffic over SIP Trunks

Session Border Controllers in AOS

Enabling Persistent Debug Logging in AOS

