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Installation Guide

ProSafe M4100 Managed Switches

Start Here

Before you begin installation of your switch, check the package contents listed in the hardware installation guide on the resource CD that supports your switch. If any item is missing or damaged, contact your place of purchase.

Other documentation available on the resource CD for your switch are the software administration guide, and a command line interface reference manual.

Follow these quick steps to install your switch. You can also consult the full hardware installation guide for your switch on the resource CD.

Set Up the Switch

Prepare the site so that the mounting, access, power source, and environmental requirements are met. If you have any questions about these requirements, see the hardware installation guide for your switch on the resource CD.

1. Install the switch using one of the following methods:
   - On a flat surface: Put one of the rubber footpads that came with the switch on each of the four concave spaces on the bottom of the switch.
   - In a rack: Use the rack-mount kit supplied with your switch, following the installation instructions included with the kit.

2. Apply AC power. Some units use a power adapter, others use an AC power cord. When you apply power, the Power LED blinks yellow as it conducts a power-on self-test (POST). After the switch passes the POST, the LED turns green. The switch is now functional.
   - If the POST fails, the Power LED remains yellow (see "Troubleshooting" in the hardware installation manual for assistance).

- If the Power LED does not light, check that the power cable is plugged in correctly and that the power source is good. If this does not resolve the problem, see "Troubleshooting" in the *Hardware Installation Guide*.

3. Connect devices to the switch.
   - Use Category 5e (Cat5e) for copper ports at 1000 Mbps.
   - Use NETGEAR AGM731F or AGM732F for fiber ports at 1000 Mbps.
   - Use NETGEAR AFM735 for fiber ports at 100 Mbps.

   Note: Fiber SFP modules are shipped separately. If you need instructions on installing an SFP module, see the hardware installation guide on the resource CD.

   Note: In the room housing the switch, ensure that the ambient temperature does not exceed the specified operating temperature and that the environment is free of water condensation.

Perform the Initial Configuration

You can manage this switch through its web interface, or by using the command line interface (CLI) through a console port. This guide describes the web method. The CLI method is also described to determine a DHCP-assigned IP address or to use `ezconfig` to assign a static IP address. For web management, follow one of the following procedures, depending upon how your computer is set up.

- computer in DHCP client mode without DHCP server
- computer with static IP address
- computer in DHCP client mode with DHCP server

Computer in DHCP Client Mode without DHCP Server

WARNING!! If no DHCP server is present, the switch assumes a default IP address of 169.254.100.100 and a subnet mask of 255.255.0.0. The switch is in the same subnet used by a computer NIC port when in DHCP-client mode without a DHCP server present. Use this IP value to log in to the switch (see "*Web Login to the Switch*").

Computer with Static IP Address

When the computer is in this mode, the switch also needs to be assigned a static IP address. To assign a static IP address, connect a VT100/ANSI terminal or a workstation to one of the switch's console ports. A cable for the mini USB port is supplied.

1. Start a terminal emulation program (TEP) using the appropriate method for your operating system:
   - Start a TEP. Windows users can use HyperTerminal.
   - Windows Vista users should download a TEP from the Internet.
   - Macintosh users can use ZTerm.
   - UNIX users can use a terminal emulator such as TIP.

2. Select a console port using the console switch on the front panel:
   - Select the mini USB port on the front panel (cable included) as the console port by pushing the slide switch to the left. Use the installation CD to install the USB driver on your computer.

     Note: You might need to install the USB serial port driver available on the CD included with the package before you can use the USB port on the computer to connect to the switch.

   - Select the DB9 (cable not included) on the rear panel as the console port by pushing the slide switch to the right.

3. Configure the TEP to use the following settings (written below the connector on the switch front panel):
   - Baud rate: 115200 bps
   - Data bits: 8
   - Parity: none
   - Stop bit: 1
   - Flow control: none

4. At the command prompt `User:`, log in to the switch using the user name **admin,** and then press **Enter**. At the password prompt, press **Enter** again (no password is needed for initial configuration).

5. At the next command prompt, type **ezconfig** and press **Enter**.

6. The `ezconfig` utility is now running in the switch. Use it to set up your static IP address and subnet mask as shown in the example. Make sure that the selected switch IP address is in the same subnet as that of the computer.

```
User:admin
Password:
(switch) >ezconfig

NETGEAR EZ Configuration Utility
--------------------------------
Hello and Welcome!
This utility will walk you thru assigning the IP address for the switch
management CPU. It will allow you to save the changes at the end. After
the session, simply use the newly assigned IP address to access the Web
GUI using any public domain Web browser.

Admin password not defined. Do you want to change the password? (Y/N/Q)  n

The 'enable' password required for switch configuration via the command
line interface is currently not configured. Do you wish to change it (Y/N/Q)?  n

Assigning an IP address to your switch management

Current IP Address Configuration
--------------------------------
IP Address Assignment Mode: DHCP
IP Address: 0.0.0.0
Subnet mask: 0.0.0.0

Would you like to assign an IP address now? (Y/D/N/Q/?)? y
IP Address: 10.10.10.1
Network mask: 255.255.255.0

Do you want to assign switch name and location information (Y/N/Q)? n
There are changes detected, do you wish to save the changes permanently (Y/N)? y

The configuration changes have been saved successfully.
Please enter 'show running-config' to see the final configuration.

Thanks for using EzConfig!
```

7. Use this IP value to log in to the switch (see *Web Login to the Switch*).

For information about how to perform extensive CLI management, see both the *CLI Reference Manual* for your switch and the *Software Administration Guide*.

Computer in DHCP Client Mode with DHCP Server

By default, the switch is configured as a DHCP client to obtain its IP address from a DHCP server in the connected network. You need to access the switch from the serial console port.

1. Make sure that the switch is connected to a DHCP server.

2. Find the switch IP address assigned by the DHCP server.

  a. Perform steps 1 through 3 of the procedure *Computer with Static IP Address*.

  b. Type the `show network` command, and press **Enter**. A screen displays that shows the active switch IP address.

  c. Use this IP address to log in to the switch through its web management interface (see *Web Login to the Switch*).
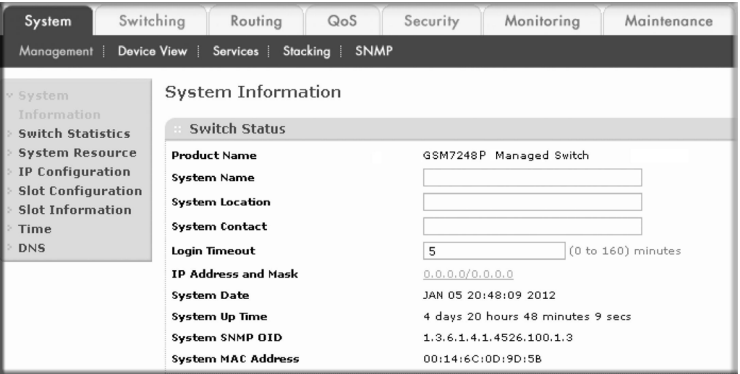
Web Login to the Switch

Use the appropriate IP address for your configuration to manage your switch through its web interface.

1. Type **http://<ipaddress>** into the URL field of your browser. A screen similar to the following displays.

```
Login    Help

   Login                          ?
   Username    admin
   Password

                          LOGIN
```

2. Type **admin** for the user name, and leave the password field blank.

3. Click **Login**. The System Information screen display. You can now navigate from this point to configure your switch.

```
System   Switching   Routing   QoS   Security   Monitoring   Maintenance
Management | Device View | Services | Stacking | SNMP

System                 System Information
Information
Switch Statistics       Switch Status
System Resource
IP Configuration         Product Name         GSM7248P Managed Switch
Slot Configuration       System Name
Slot Information         System Location
Time                     System Contact
DNS                      Login Timeout        5              (0 to 160) minutes
                         IP Address and Mask  0.0.0.0/0.0.0.0
                         System Date          JAN 05 20:48:09 2012
                         System Up Time       4 days 20 hours 48 minutes 9 secs
                         System SNMP OID      1.3.6.1.4.1.4526.100.1.3
                         System MAC Address   00:14:6C:0D:9D:5B
```

Technical Support

After installing your device, locate the serial number on the label of your product and use it to register your product at: *https://my.netgear.com*

You must register your product before you can use NETGEAR telephone support. NETGEAR recommends registering your product through the NETGEAR web site. For product updates and web support, visit: http://support.netgear.com/general/contact/default.aspx

You can get the user manual online at *http://downloadcenter.netgear.com* or through a link in the product's user interface.

WARNING!!

Do not stack equipment, or place equipment in tight spaces, in drawers, or on carpets. Make sure your equipment is surrounded by at least 2 inches of air space.

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