# 1

# Getting Started

## Contents

# Introduction

This *Advanced Traffic Management Guide* is intended for use with the following switches:

- ProCurve Switch 10G CX4 6400cl-6xg
- ProCurve Switch 10G X2 6400cl-6xg
- ProCurve Switch 5304xl
- ProCurve Switch 5348xl
- ProCurve Switch 5308xl
- ProCurve Switch 5372xl
- ProCurve Switch 4204vl
- ProCurve Switch 4208vl
- ProCurve Switch 4202vl-48G
- ProCurve Switch 4202vl-72
- ProCurve Switch 3400cl-24G
- ProCurve Switch 3400cl-48G

This guide describes how to use the command line interface (CLI), Menu interface, and web browser to configure, manage, monitor, and troubleshoot switch operation.

For an overview of other product documentation for the above switches, refer to *"Product Documentation"* on page xxiii.

The *Product Documentation CD-ROM* shipped with the switch includes a copy of this guide. You can also download a copy from the ProCurve Networking web site, **www.procurve.com**.

# Conventions

This guide uses the following conventions for command syntax and displayed information.

## Feature Descriptions by Model

In cases where a software feature is not available in all of the switch models covered by this guide, the section heading specifically indicates which product or product series offer the feature.

For example, (the switch is highlighted here in **bold italics**):

"QoS Pass-Through Mode on the **Series 5300xl and 4200vl Switches**".

## Command Syntax Statements

***Syntax:*** ip < default-gateway < *ip-addr* >> | routing >

***Syntax:*** show interfaces [*port-list* ]

- Vertical bars ( | ) separate alternative, mutually exclusive elements.
- Square brackets ( [ ] ) indicate optional elements.
- Braces ( < > ) enclose required elements.
- Braces within square brackets ( [ < > ] ) indicate a required element within an optional choice.
- Boldface indicates use of a CLI command, part of a CLI command syntax, or other displayed element in general text. For example:

    "Use the **copy tftp** command to download the key from a TFTP server."
- Italics indicate variables for which you must supply a value when executing the command. For example, in this command syntax, you must provide one or more port numbers:

    ***Syntax:*** aaa port-access authenticator < *port-list* >

## Command Prompts

In the default configuration, your switch displays one of the following CLI prompts:

```
ProCurve 6400cl#
ProCurve 5304xl#
ProCurve 5308xl#
ProCurve 4204vl#
ProCurve 4208vl#
ProCurve 3400-24cl#
ProCurve 3400-48cl#
```

To simplify recognition, this guide uses **ProCurve** to represent command prompts for all models. For example:

```
ProCurve#
```

(You can use the **hostname** command to change the text in the CLI prompt.)

## Screen Simulations

**Displayed Text.** Figures containing simulated screen text and command output look like this:

```
ProCurve> show version
Image stamp:    /sw/code/build/info
                September 30 2005 13:43:13
                E.08.22
                139

ProCurve>
```

**Figure 1-1.  Example of a Figure Showing a Simulated Screen**

In some cases, brief command-output sequences appear without figure identification. For example:

```
ProCurve(config)# clear public-key
ProCurve(config)# show ip client-public-key
show_client_public_key: cannot stat keyfile
```

## Port Identity Examples

This guide describes software applicable to both chassis-based and stackable ProCurve switches. Where port identities are needed in an example, this guide uses the chassis-based port identity system, such as "A1, "B3-B5", "C7", etc.

However, unless otherwise noted, such examples apply equally to the stack-able switches, which typically use only numbers, such as "1", "3-5", "15", etc. for port identities.

### Keys

Simulations of actual keys use a bold, sans-serif typeface with square brackets. For example, the Tab key appears as **[Tab]** and the "Y" key appears as **[Y]**.

# Sources for More Information

For additional information about switch operation and features not covered in this guide, consult the following sources:

■ For information on which product manual to consult on a given software feature, refer to the chapter *"Product Documentation"*.

**Note**
For the latest version of all ProCurve switch documentation, including Release Notes covering recently added features, visit the ProCurve Network-ing Web Site at **www.procurve.com**, click on **Technical support**, and then click on **Product Manuals (all)**.

■ Software Release Notes—Release notes are posted on the ProCurve Networking web site and provide information on new software updates:

   • New features and how to configure and use them

   • Software management, including downloading software to the switch

   • Software fixes addressed in current and previous releases

   To view and download a copy of the latest software release notes for your switch, refer to "Getting Documentation From the Web" on page 1-6.

■ Product Notes and Software Update Information—The printed *Read Me First* shipped with your switch provides software update information, product notes, and other information. For the latest version, refer to "Getting Documentation From the Web" on page 1-6.

■ Installation and Getting Started Guide—Use the *Installation and Getting Started Guide* shipped with your switch to prepare for and perform the physical installation. This guide also steps you through connecting the switch to your network and assigning IP addressing, as well as describing the LED indications for correct operation and trouble analysis. A PDF version of this guide is also provided on the *Product Documentation CD-*

*ROM* shipped with the switch. And you can download a copy from the ProCurve Networking Web Site. (See "Getting Documentation From the Web" on page 1-6.)

■ Advanced Traffic Management Guide—Use the *Advanced Traffic Management Guide* for information on:

• VLANs: Static port-based and protocol VLANs, and dynamic GVRP VLANs

• Multicast traffic control (IGMP) and Protocol-Independent Multicast routing (PIM-DM)

• Spanning-Tree: 802.1D (STP), 802.1w (RSTP), and 802.1s (MSTP)

• Meshing

• Quality-of-Service (QoS)

• Access Control Lists (ACLs)

• IP routing

• Static NAT for intranet applications (*Series 5300xl switches only*)

• XRRP (XL Router Redundancy Protocol)

■ Access Security Guide—Use the *Access Security Guide* for information on:

• Local username and password security

• Web-Based and MAC-based authentication

• RADIUS and TACACS+ authentication

• SSH (Secure Shell) and SSL (Secure Socket Layer) operation

• 802.1x port-based access control

• Port security operation with MAC-based control

• Authorized IP Manager security

• Key Management System (KMS)

## Getting Documentation From the Web

1. Go to the ProCurve Networking Web Site at

   **www.procurve.com**

2. Click on **Technical support**.

3. Click on **Product manuals**.

4. Click on the product for which you want to view or download a manual.

**Figure 1-2.    Example of How To Locate Product Manuals on the ProCurve Networking Web Site**



**Figure 1-3.    Listing of ProCurve Manuals on the ProCurve Networking Web Site**

## Online Help

If you need information on specific parameters in the menu interface, refer to the online help provided in the interface. For example:

```
=========================- CONSOLE - MANAGER MODE -=========================
                Switch Configuration - Internet (IP) Service


  Default Gateway : 10.35.204.1
  Default TTL     : 64

  IP Config [DHCP/Bootp] : Manual
  IP Address  : 10.35.204.104
  Subnet Mask : 255.255.240.0                         Online Help
                                                       for Menu

 Actions->   Cancel     Edit     Save       Help

Display help information.
Use arrow keys to change action selection and <Enter> to execute action.
```
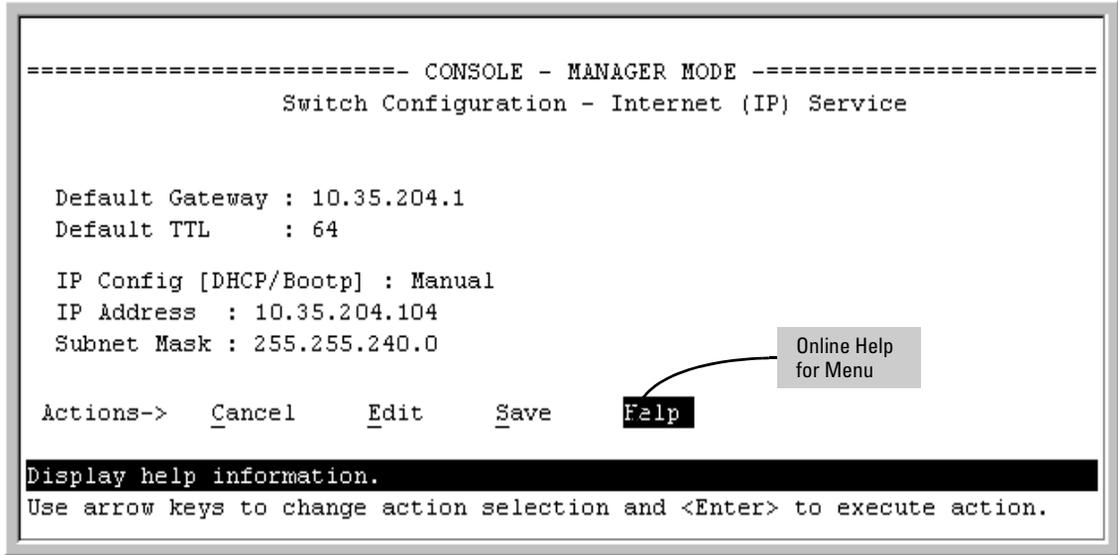
If you need information on a specific command in the CLI, type the command name followed by "help". For example:

```
ProCurve# write help
Usage: write <memory|terminal>

Description: View or save the running configuration of the switch.

             write terminal - displays the running configuration of the
                               switch on the terminal
             write memory   - saves the running configuration of the
                               switch to flash. The saved configuration
                               becomes the boot-up configuration of the switch
```

If you need information on specific features in the web browser interface use the online help available for the web browser interface. For more information on web browser Help options, see the section "Online Help for the Web Browser Interface" in the Management and Configuration Guide.

If you need further information on Hewlett-Packard switch technology, visit the ProCurve Networking web site at:

**www.procurve.com**

# Need Only a Quick Start?

## IP Addressing

If you just want to give the switch an IP address so that it can communicate
on your network, or if you are not using VLANs, HP recommends that you use
the Switch Setup screen to quickly configure IP addressing. To do so, do one
of the following:

■ Enter **setup** at the CLI Manager level prompt.

        Procurve# setup

■ In the Main Menu of the Menu interface, select

    **8. Run Setup**

For more on using the Switch Setup screen, see the *Installation and Getting
Started Guide* you received with the switch.

# To Set Up and Install the Switch in Your Network

Use the ProCurve *Installation and Getting Started Guide* (shipped with the
switch) for the following:

■ Notes, cautions, and warnings related to installing and using the switch
   and its related modules

■ Instructions for physically installing the switch in your network

■ Quickly assigning an IP address and subnet mask, set a Manager pass-
   word, and (optionally) configure other basic features.

■ Interpreting LED behavior.

For the latest version of the *Installation and Getting Started Guide* for your
switch, refer to "Getting Documentation From the Web" on page 1-6.

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