# **EPSON**<sup>®</sup>

### EpsonNet 10/100 Base Tx High Speed Int. Print Server

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without the prior written permission of Seiko Epson Corporation. The information contained herein is designed only for use with this Epson product. Epson is not responsible for any use of this information as applied to other products.

Neither Seiko Epson Corporation nor its affiliates shall be liable to the purchaser of this product or third parties for damages, losses, costs, or expenses incurred by purchaser or third parties as a result of: accident, misuse, or abuse of this product or unauthorized modifications, repairs, or alterations to this product, or (excluding the U.S.) failure to strictly comply with Seiko Epson Corporation's operating and maintenance instructions.

Seiko Epson Corporation shall not be liable against any damages or problems arising from the use of any options or any consumable products other than those designated as Original Epson Products or Epson Approved Products by Seiko Epson Corporation.

EPSON and EPSON ESC/P are registered trademarks and EPSON Stylus<sup>™</sup> is a trademark of Seiko Epson Corporation.

NetWare and Novell are registered trademarks of Novell, Inc.

Apple, Macintosh, AppleShare, LaserWriter, AppleTalk, LocalTalk, EtherTalk,

OpenTransport, Kanji-Talk, and Rendezvous are registered trademarks of Apple Computer, Inc.

PostScript is a registered trademark of Adobe Systems, Inc.

Unix is a registered trademark in the United States and other countries, licensed exclusively through X/Open Company Limited.

IBM, OS/2, OS/2 Warp, WebExplorer, NetFinity, AIX are trademarks of IBM Corp.

LANDesk, NetPort are trademarks of Intel Corp.

Microsoft, Windows, Windows NT, Internet Explorer, ActiveX are registered trademarks of Microsoft Corp.

SPARC, SunOS, Solaris, Java are trademarks of Sun Microsystems, Inc.

SCO UNIX, SCO UnixWare are registered trademarks of The Santa Cruz Operation, Inc.

HP, HP-UX, PCL, HPGL are registered trademarks of Hewlett-Packard Company.

This product Includes software developed by the University of California, Berkeley, and Its contributors.

*General Notice:* Other product names used herein are for identification purposes only and may be trademarks of their respective owners. Epson disclaims any and all rights in those marks.

Copyright © 2003 by Seiko Epson Corporation, Nagano, Japan.

# User's Guide

#### FCC Compliance Statement For United States Users

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio or television reception. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause interference to radio and television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures.

- Reorient or relocate the receiving antenna
- □ Increase the separation between the equipment and receiver
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected
- □ Consult the dealer or an experienced radio/TV technician for help.

#### WARNING

The connection of a non-shielded equipment interface cable to this equipment will invalidate the FCC Certification of this device and may cause interference levels which exceed the limits established by the FCC for this equipment. It is the responsibility of the user to obtain and use a shielded equipment interface cable with this device. If this equipment has more than one interface connector, do not leave cables connected to unused interfaces.

Changes or modifications not expressly approved by the manufacturer could void the user's authority to operate the equipment.

#### For Canadian Users

This Class B digital apparatus complies with Canadian ICES-003. Cet appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

#### For European Users

This device complies with EU directives, 89/336/EEC.

#### **DECLARATION of CONFORMITY**

According to 47CFR, Part 2 and 15 for Class B Personal Computers and Peripherals; and/or CPU Boards and Power Supplies used with Class B Personal Computers:

We: Epson America, Inc.

Located at: MS 3-13 3840 Kilroy Airport Way Long Beach, CA 90806 Telephone: (562)290-5254

Declare under sole responsibility that the product identified herein, complies with 47CFR Part 2 and 15 of the FCC rules as a Class B digital device. Each product marketed, is identical to the representative unit tested and found to be compliant with the standards. Records maintained continue to reflect the equipment being produced can be expected to be within the variation accepted, due to quantity production and testing on a statistical basis as required by 47CFR §2.909 Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Trade Name: Epson

Type of Product: Network Interface Card

Model: EU-74

# Contents

### Introduction

About Your Print Server 1	1
Important Safety Instructions	2
About This Guide	3
Warnings, Cautions, and Notes 1	3
Package Contents	4
Operating Environment	
Supported Epson Printers	7
Features of the Print Server 1	7
Print Server Operation	8
About the Software 2	1
Terms and Concepts 2	2
Overview	

### Chapter 1 Installing Components on Your Computer

About Installing Components on Your Computer	25
Windows Me/98/95	25
Windows XP	28
Windows Server 2003	31
Windows 2000	33
Windows NT 4.0.	36
Macintosh	40
Mac OS 8.x to 9.x	40
Mac OS X	40

### Chapter 2 How to Set Up the Print Server

Connecting the Print Server to the Network	41
Installing EpsonNet WinAssist/MacAssist	44
For Windows	44
For Macintosh	45
Setting an IP Address Using EpsonNet WinAssist	47
Setting an IP Address Using EpsonNet MacAssist	53

### Chapter 3 EpsonNet WinAssist Configuration Utility

About EpsonNet WinAssist 58
Menu Bar 59
Timeout option
Search method
Search options
Firmware update
Details of the Configuration Dialog Box
Information
Ethernet
TCP/IP
NetWare
MS Network
AppleTalk
IPP
SNMP
About Password
Configuring the Print Server Using EpsonNet WinAssist
EasySetup

### Chapter 4 EpsonNet MacAssist Configuration Utility

About EpsonNet MacAssist	90
Menu Bar	90
Timeout	92
Network path search setting	92
Search options	

Details of the Configuration Dialog Box	95
Information	95
Ethernet	96
TCP/IP	97
AppleTalk1	.00
IPP 1	.01
About Password 1	.03
Configuring the Print Server Using EpsonNet MacAssist	
EasySetup 1	.04
About Password	03

# Chapter 5 Installing the Printer Driver

Windows Me/98/95 108	8
LPR printing 108	8
Internet printing (Windows 98/95) 108	
Internet printing (Windows Me) 109	
Microsoft Network Shared printing	
Installing a printer driver	
Using the NET USE command	
Windows XP	
LPR printing	
Internet printing 110	
Microsoft Network Shared printing	
Installing a printer driver	
Using the NET USE command	
Windows Server 2003 119	
LPR printing	
Internet printing 12	
Microsoft Network Shared printing 124	4
Installing a printer driver	5
Using the NET USE command	
Windows 2000	
LPR printing	
Internet printing 129	9
Microsoft Network Shared printing	0
Installing a printer driver	1
Using the NET USE command	2

Windows NT 4.0
LPR printing
Internet printing 134
Microsoft Network Shared printing
Installing a printer driver
Using the NET USE command 136
Macintosh
Mac OS 8.x to 9.x 137
Mac OS X 138
OS/2
LPR printing 140
NetBEUI printing 143

### Chapter 6 Settings for NetWare Server

Introduction to NetWare Settings 144
Supported systems 144
About modes
Instructions for Using NetWare
Using Bindery Print Server (NetWare 3.x/4.x) 147
Using NDS Print Server (NetWare 4.x/5.x/6.0) 148
Using Remote Printer Mode (NetWare 3.x) 149
Using Bindery Remote Printer Mode (NetWare 4.x) 153
Using NDS Remote Printer Mode (NetWare 4.x/5.x/6.0) 155
Using the NDPS Gateway 161
Outline of settings
Making printer environment
Creating an NDPS Manager 163
Creating a Printer Agent 164
Configuring for NetWare using EpsonNet WinAssist 166
Setting the printer on client workstations
Instructions for Using a Dial-Up Network
Using a dial-up network in each mode
When there is a primary server at the dial-up destination. 169
When there is a primary server in the local network 171

Introduction to UNIX Settings 172
lpr filters
Setting Up Different UNIX Systems Using the lpr Command 173
Setting up for SunSoft Solaris 2.4 or later
Setting up for SunOS 4.1.4 or later 175
Setting up for IBM AIX 3.2.5 or later and 4.1.3 or later 176
Setting up for HP-UX 9.05 or later 177
Setting up for SCO UNIX 4.2 or later (Open Server) 178
Using the ftp Command 180

### Chapter 8 EpsonNet Direct Print

About EpsonNet Direct Print 181
System Requirements 182
Installing EpsonNet Direct Print 182
Setting Up Your Printer Using EpsonNet Direct Print 183
Adding a printer located in the same segment 184
Adding a printer beyond a router
Adding a printer from the Printers folder
Installing the printer driver 190
Configuring the Printer Port 192
Windows Me/98/95/NT 4.0 192
Windows XP/Server 2003/2000 194

### Chapter 9 EpsonNet Internet Print

About EpsonNet Internet Print	196
System Requirements	
Installing EpsonNet Internet Print	197
Setting Up Your Printer Using EpsonNet Internet Print	
Windows 98/95	198
Windows NT 4.0	203
Status Alert Window	206

# Chapter 10 EpsonNet WebAssist

About EpsonNet WebAssist 207
Supported Web browser
About Web browser setting
Configuring the Print Server Using EpsonNet WebAssist 208
Opening Screen 213
Index
Menu
Information
General information
Configuration - Network Screens 217
Ethernet
NetWare
TCP/IP
AppleTalk
MS Network
IPP
SNMP 223
Time
Optional Screens 225
Administrator 225
Reset
Password 226

#### Chapter 11 Troubleshooting

General Problems 2	227
Problems Specific to Your Network Environment 2	231
Windows Me/98/95 environment 2	231
Windows 2000/NT environment	232
Macintosh environment 2	233
NetWare environment 2	234
Initializing the Print Server 2	235
Setting the Interface Mode 2	236
Using EpsonNet Win/Mac/WebAssist 2	236
Using jumpers on the print server 2	236

### Chapter 12 EpsonNet WebManager

About EpsonNet WebManager 2	239
System Requirements 2	240
EpsonNet WebManager Functions 2	241
EpsonNet WebManager Operating Structure 2	242
Installing EpsonNet WebManager 2	244
Starting EpsonNet WebManager 2	245
Opening the Online Guide 2	245

### Appendix A Tips for Administrator

Selecting a Printing Method	247
Printing from Windows	247
Printing from Macintosh	
Features of the Printing Methods	248
LPR (TCP/IP) printing	
Internet printing	
Microsoft Network Shared printing	
Setting an IP Address Using the arp/ping Command	250
Checking the LAN	
Setting and checking the new IP address	
Instructions on Using a Dial-Up Router	
Function of Universal Plug and Play	
Uninstalling Software	
Windows Me/98/95/2000/NT 4.0	
Windows XP/Server 2003	
Macintosh	

### Appendix B **Specifications**

Print Server Specification	257
Regulatory Approvals	
Reliability	258
Environmental	258
Network Software	258

#### Index

# Introduction

# About Your Print Server

The EpsonNet 10/100 Base Tx High Speed Int. Print Server is a print server that plugs into an optional interface slot of an Epson printer to enable the printer to connect directly to your network.

Because the print server supports multiple protocols and automatically detects protocols on your network, you can print from Microsoft<sup>®</sup> Windows<sup>®</sup>, Apple<sup>®</sup> Macintosh<sup>®</sup>, UNIX<sup>®</sup>, and IBM<sup>®</sup> OS/2 applications.

Use EpsonNet WinAssist/MacAssist/WebAssist, the configuration utilities provided with your product, to quickly and easily configure the print server to use protocols such as TCP/IP, NetWare, NetBEUI, AppleTalk<sup>®</sup>, IPP, and SNMP.

#### Note:

The EpsonNet WinAssist/MacAssist/WebAssist utility configures the print server to work only with protocols that exist on your network. This does not imply that you can use all of the above-mentioned protocols on your network or operating system. The protocols that the print server can use may vary depending on the operating system and the network configuration.

# Important Safety Instructions

Read all of these instructions and save them for later reference.

- Do not install or uninstall the print server with wet hands.
- □ Be careful not to drop or crush the print server when installing.
- □ Keep the print server away from humidity and dust.
- Do not allow children to handle the print server.
- □ When installing or uninstalling the print server, be sure to remove the Ethernet cable, turn off your printer, and then unplug the power cord to avoid electric shock.
- Avoid using the print server if there is smoke, strange smell, or strange sound; otherwise this could cause fire or electric shock. Instead, immediately turn off the printer, unplug the power cord, and then contact your Epson dealer. Do not repair it yourself because this is dangerous.
- Do not disassemble or modify the print server unless specifically instructed in the guide. This could cause injury, electric shock, or fire.

# About This Guide

This *User's Guide* contains information about using the print server on a network. It includes how to set up the print server, install the configuration software, and modify network settings of your printer and computers.

For information about your printer, see the manual shipped with your printer.

Note:

- This guide is written for network administrators, and many of the steps included here require detailed network knowledge and administrator rights.
- The term network administrator refers to the person responsible for maintaining the network. "Administrator" is synonymous with "Supervisor" in this guide.
- □ The term "print server" refers to the EpsonNet 10/100 Base Tx High Speed Int. Print Server in this guide.
- □ Some screen shots in this guide may list a printer name other than your printer. This difference does not alter the instructions.

### Warnings, Cautions, and Notes



*Warnings must be followed carefully to avoid bodily injury.* 



#### Cautions

must be observed to avoid damage to your equipment.

#### Notes

contain important information and useful tips on the operation of the print server.

# Package Contents

Your print server package includes the following items:

- Print server (The utility EpsonNet WebAssist is pre-installed on this server.)
- □ Software CD-ROM containing:
  - -- EpsonNet WinAssist
  - -- EpsonNet MacAssist
  - -- EpsonNet Direct Print
  - -- EpsonNet Internet Print
  - -- EpsonNet WebManager
  - -- User's Guide (PDF-format manual)
  - -- Acrobat Reader (for Windows only)
- □ Online Guide Supplement Sheet

#### Note:

You need to supply items such as a computer with an Ethernet network interface, an Epson printer with an optional interface slot, and an Ethernet cable (Category 5 shielded twisted-pair cable).

# **Operating Environment**

OS	Version	Protocol
Windows 98 Windows 98 SE	-	TCP/IP (using EpsonNet Direct Print)
Windows 95		IPP (using EpsonNet Internet Print)
		NetBEUI
Windows Me	-	TCP/IP (using EpsonNet Direct Print)
		IPP
		NetBEUI
Windows XP (Home, Professional)	-	TCP/IP (using LPR, Standard TCP/IP Port, or EpsonNet Direct Print)
Windows Server 2003		IPP
Windows 2000 (Professional, Server)		
Windows NT 4.0 with Support Pack 5 or	-	TCP/IP (using LRP or EpsonNet Direct Print)
higher		IPP (using EpsonNet Internet Print)
		NetBEUI
Macintosh	Mac OS X 10.x, 9.x, 8.x	AppleTalk

OS	Version	Protocol
NetWare	3.x	Bindery mode
	4.x/IntranetWare	NDS mode Bindery emulation mode
	5.x/6.0	NDS Queue-based print system NDPS
OS/2 (OS/2 Warp Connect, OS/2 Warp Server)	V3 V4	TCP/IP (Iprportd) NetBEUI
UNIX	Sun OS 4.1.4 or later: SPARC	lpr, ftp
	SunSoft Solaris 2.4 or later: SPARC and x86 SCO UNIX 4.2 or later	
	SCO UnixWare 2.01 or later	
	HP/UX 9.05 or later	
	IBM AIX 3.2.5 or later and 4.1.3 or later	

### Note:

- □ Only the Intel version of Windows NT is supported.
- **D** The multi-user environment of Mac OS 9 is not supported.
- □ If you use the printer in a dial-up router environment, you must set an IP address for the printer. Make sure the IP address is suitable for the segment; incorrect IP address may generate unexpected dial-up.

# Supported Epson Printers

The print server can be installed for the following Epson printers (as of August, 2003).

□ Ink Jet Printer: Stylus Pro 4000

#### Note:

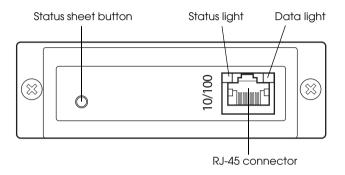
The supplied current must be 800 mA or higher. (900 mA or higher is recommended.)

# Features of the Print Server

- □ Provides high performance.
- □ Connects an Epson printer equipped with an optional interface slot to the network.
- □ Supports multiple protocols, such as TCP/IP, NetWare, NetBEUI, AppleTalk, and IPP.
- □ Supports 100Base full duplex, 100Base half duplex, 10Base full duplex, and 10Base half duplex.
- □ Supports DHCP.
- □ Supports Automatic Private IP Addressing (APIPA) that assigns an IP address automatically to the print server even if there is no DHCP server on the network.
- □ Supports the Dynamic DNS function.
- □ Supports SNMP and MIB.
- □ Support Rendezvous on Mac OS X 10.2.4 or higher.

# Print Server Operation

The status lights and status sheet provide you with important information about the operation and configuration of the print server.



### Status and Data lights

The print server has two lights (Status and Data), which indicate the current operating status of the print server when you first turn on the printer, during normal operation, and when errors occur. The Status light has two colors (green and orange). The Data light is yellow.

The status lights indicate the print server status, as follows:

Status light	Data light	Print server status
Orange	On	Initializing
Orange and flashing	On	Error status
Orange and green, and flashing alternately	Off	The current value supplied from printer is too small.
Orange Status light and yellow Data light flashing alternately		Firmware update mode
Green	On	Ready (10M link)
Green	Flashing	Receiving packets (10M link)
Green	Off	No communication is available (10M link).
Orange	On	Ready (100M link)
Orange	Flashing	Receiving packets (100M link)
Orange	Off	No communication is available (100M link).

### Status sheet button

The first time you use the print server after installing or reinstalling it, turn on the printer while holding down the status sheet button for about twenty seconds to initialize the print server. The length of time needed to hold down the status sheet button varies depending on the printer model.

Before you start configuring the print server, be sure to press and hold down the status sheet button on the print server to print a status sheet. A status sheet provides important information about the print server, such as MAC address, printer settings, and the printer's current status. Press the status sheet button once to print a simple status sheet, or twice to print a full status sheet. You cannot print a status sheet when the printer has already started printing, or when it is offline or not ready to print.

#### Note:

If the printer does not print a status sheet, make sure the printer is online and no print jobs are being processed, and then wait a minute. If it still does not print a status sheet, turn the printer off, wait until the status lights go out, and then turn it back on again. The status sheet can be printed one minute after the printer finishes warming up.

### Caution:

After turning off the printer, wait until the status lights go out before turning the printer back on; otherwise, the print server may not work correctly.

### RJ-45 connector

This connector is used to connect an Ethernet cable to the network. You can use this cable for both 10Base-T and 100Base-TX.

### Caution:

You must use a Category 5 shielded twisted-pair cable to connect the print server to prevent malfunction.

# About the Software

- EpsonNet WinAssist is a Windows-based configuration utility for administrators that allows you to configure the print server for TCP/IP, NetWare, MS Network, AppleTalk, IPP, and SNMP. See "About EpsonNet WinAssist" on page 58.
- □ **EpsonNet MacAssist** is a Macintosh-based configuration utility for administrators that allows you to configure the print server for TCP/IP, AppleTalk, and IPP. See "About EpsonNet MacAssist" on page 90.
- EpsonNet WebAssist is a web-based configuration utility that allows you to configure the print server for TCP/IP, NetWare, MS Network, AppleTalk, IPP, and SNMP. See "About EpsonNet WebAssist" on page 207.
- EpsonNet Direct Print is a utility that enables TCP/IP printing for Windows Me/98/95/XP/Server 2003/2000/NT 4.0. (Windows XP/Server 2003/2000/NT 4.0 also support OS standard LPR printing.) See "About EpsonNet Direct Print" on page 181.
- □ **EpsonNet Internet Print** is a utility that supports printing across the Internet using Internet Printing Protocol for Windows 98/95/NT 4.0. See "About EpsonNet Internet Print" on page 196.
- □ EpsonNet WebManager is a web-based utility that helps network administrators to easily manage network devices. See "About EpsonNet WebManager" on page 239.

# Terms and Concepts

*Configuration* -- a prepared set of conditions for proper operation of a device. Configuring the print server is to prepare it to work with protocols available on a network.

*DHCP* -- a dynamic host configuration protocol. It is a protocol that assigns dynamic IP addresses to devices on a network.

*EtherTalk* --the communication protocol of AppleTalk governing Ethernet transmissions

*ftp* -- a TCP/IP application protocol for file transfer

*lpd* -- a TCP/IP remote printing protocol application

*Print queue* -- a location where a print job is stored as a file, until the print server sends the job to the assigned printer

*Protocol* -- a rule that controls how data or information is exchanged through a network. Computers and software cannot communicate with each other using different protocols.

*Remote printer* -- a shared printer connected elsewhere on the network, but under the control of a NetWare print server

*TCP/IP* -- Transmission Control Protocol/Internet Protocol, a layer of protocols that provides communication between nodes on a network

# Overview

This section describes the general procedure on how to set up the print server for use on a network.

1. Check the print server operation.

Check the functions and operations of the print server, such as status lights, status sheet button, and RJ-45 connector. See "Print Server Operation" on page 18 for details.

#### 2. Install the necessary components on the computer.

Make sure the necessary components (such as TCP/IP, NetBEUI, etc.) are installed on the computer, and network settings (such as the IP address, subnet mask, etc.) of the computer is set. See "Installing Components on Your Computer" on page 25 for details.

#### 3. Connect the print server to the network.

Connect the print server to the network. See "Connecting the Print Server to the Network" on page 41 for details.

#### 4. Install EpsonNet WinAssist/MacAssist on the computer.

Install EpsonNet WinAssist or MacAssist on the computer to configure the print server. See "Installing EpsonNet WinAssist/MacAssist" on page 44 for details.

# 5. Setting an IP address for the print server using EpsonNet Win/MacAssist.

Assign an IP address to the print server, using EpsonNet WinAssist or MacAssist. For Windows users, see "Setting an IP Address Using EpsonNet WinAssist" on page 47. For Macintosh users, see "Setting an IP Address Using EpsonNet MacAssist" on page 53 for details. 6. Configure the network settings of the print server using EpsonNet Win/MacAssist.

Configure the print server for TCP/IP, AppleTalk, MS Network, etc. using EpsonNet WinAssist or MacAssist. For Windows users, see "EpsonNet WinAssist Configuration Utility" on page 58. For Macintosh users, see "EpsonNet MacAssist Configuration Utility" on page 90.

### 7. Select a printing method.

Select a printing method appropriate for your network environment and operating system. If you are not sure, see "Selecting a Printing Method" on page 247 for details.

### 8. Install the printer driver.

Install the printer driver from the CD-ROM that comes with the printer. See "Installing the Printer Driver" on page 108 for details.

# Installing Components on Your Computer

# About Installing Components on Your Computer

Before configuring the print server and printing from the computer, you need to install the necessary components (such as TCP/IP, NetBEUI, etc.) and assign an IP address and subnet mask for your computer, depending on the printing method you want to use. See the section in this chapter appropriate for your operating system.

# Windows Me/98/95

For Windows Me/98/95, use the following procedure to install the necessary components.

#### Note:

- □ The Windows Me/98/95 CD-ROM may be required during the installation.
- □ When using TCP/IP or IPP for printing, you need to set the IP address, the subnet mask, and the default gateway of the computer.
- 1. Click Start, point to Settings, and then select Control Panel.

2. Double-click the Network icon. Check if the following necessary components are in the list of installed network components on the Configuration menu. If they are already installed, go to the next chapter.

Network ? 🗙
Configuration Identification Access Control
The following network components are installed:
Client for Microsoft Networks
Elient for NetWare Networks
같 IPX/SPX-compatible Protocol 장 NetBEUI
TCP/IP
Add <u>R</u> emove <u>P</u> roperties
Primary Network Logon:
Client for Microsoft Networks
<u>F</u> ile and Print Sharing
Description TCP/IP is the protocol you use to connect to the Internet and wide-area networks.
OK Cancel

The following table lists the components required for configuring the print server with EpsonNet WinAssist.

EpsonNet WinAssist's setting screens	Necessary components
TCP/IP, AppleTalk, IPP, SNMP (IP trap)	TCP/IP
MS Network	NetBEUI or TCP/IP
NetWare, SNMP (IPX trap)	Latest Novell Client downloaded from the Novell Web site

#### Note:

Do not use Novell Client for Windows 95/98 version 3.00 and Novell Client for Windows NT version 4.50 when using the following modes: NetWare 3.x/4.x Bindery Print Server mode, NetWare 3.x Remote Printer mode, NetWare 4.x Bindery Remote Printer mode, and NetWare 4.x/5.x NDS Remote Printer mode.

The following table lists the components required for network printing.

Printing method	Necessary components
LPR or Internet printing	TCP/IP
Microsoft Network Shared printing	TCP/IP or NetBEUI Client for Microsoft Networks
Printing via NetWare server	Latest Novell Client downloaded from the Novell Web site

3. If the necessary components are not in the list, click Add to install them, as described below.

#### For LPR or Internet printing:

Select Protocol and then click Add. Select Microsoft from the Manufacturers list and TCP/IP from the Network Protocols list. Then click OK.

### For Microsoft Network Shared printing:

To use TCP/IP, see the description described earlier to install TCP/IP.

To use NetBEUI, select Protocol and then click Add. Select Microsoft from the Manufacturers list and NetBEUI from the Network Protocols list. Then click OK.

Select Client and then click Add. Select Microsoft from the Manufacturers list and Client for Microsoft Networks from the Network Clients list. Then click OK.

### For printing via NetWare server:

Download the latest Novell Client from the Novell Web site and install it on the computer. Also, be sure to install IPX. See the Novell Web site for detailed information.

- 4. For LPR, Internet, or Microsoft Network Shared printing: Double-click TCP/IP on the Configuration menu to open the TCP/IP Properties dialog box. Set the IP address, the subnet mask, etc. and then click OK.
- 5. Restart the computer.

The necessary components are now installed. Go to the next chapter "How to Set Up the Print Server" on page 41.

## Windows XP

For Windows XP, use the following procedure to install the necessary components.

#### Note:

- **The Windows XP CD-ROM may be required during the installation.**
- □ When using TCP/IP or IPP for printing, you need to set the IP address, the subnet mask, and the default gateway of the computer.
- 1. Click Start, highlight Control Panel, and then click Network and Internet Connections. Select Network Connections.
- 2. Under LAN or High-Speed Internet, click the Local Area Connection icon.
- 3. Under Network Tasks, click Change settings of this connection.

4. Check if the following necessary components are in the list. If they are already installed, go to the next chapter.

🕂 Local Area Connection Properties 🛛 🕐 🗙
General Authentication Advanced
Connect using:
B 3Com 3C905TX-based Ethernet Adapter (Generic)
This connection uses the following items:
Glient for Microsoft Networks     Section 2 Sharing for Microsoft Networks     Section 2 Sharing for Microsoft Networks     Section 2 Section
Install Uninstall Properties
Allows your computer to access resources on a Microsoft network.
Show icon in notification area when connected
OK Cancel

The following table lists the components required for configuring the print server with EpsonNet WinAssist.

EpsonNet WinAssist's setting screens	Necessary components
TCP/IP, AppleTalk, IPP, SNMP (IP trap)	Internet Protocol (TCP/IP)
MS Network	Internet Protocol (TCP/IP)
NetWare, SNMP (IPX trap)	Latest Novell Client downloaded from the Novell Web site

The following table lists the components required for network printing.

Printing method	Necessary components
LPR or Internet printing	Internet Protocol (TCP/IP)
Microsoft Network Shared printing	Internet Protocol (TCP/IP) Client for Microsoft Networks
Printing via NetWare server	Latest Novell Client downloaded from the Novell Web site

5. If the necessary components are not in the list, click Install to install them, as described below.

### For LPR or Internet printing:

Internet Protocol (TCP/IP) is installed by default. You cannot add or delete it.

#### For Microsoft Network Shared printing:

Select Client and then click Add. Select Client for Microsoft Networks and then click OK.

#### For printing via NetWare server:

Download the latest Novell Client from the Novell Web site and install it on the computer. Also, be sure to install IPX. See the Novell Web site for detailed information.

6. For LPR, Internet, or Microsoft Network Shared printing:

Double-click Internet Protocol (TCP/IP) in the Local Area Connection Properties dialog box to open the Internet Protocols (TCP/IP) Properties dialog box. Set the IP address, the subnet mask, etc. and then click OK.

7. Restart the computer.

The necessary components are now installed. Go to the next chapter "How to Set Up the Print Server" on page 41.

## Windows Server 2003

For Windows Server 2003, use the following procedure to install the necessary components.

Note:

- □ The Windows Server 2003 CD-ROM may be required during the installation.
- □ When using TCP/IP or IPP for printing, you need to set the IP address, the subnet mask, and the default gateway of the computer.
- 1. Click Start, point to Control Panel, and then select Network Connections. Click Local Area Connections.
- 2. Click the Properties button.
- 3. Check if the following necessary components are in the list. If they are already installed, go to the next chapter.

上 Local Area Connection Propertie	5		? ×
General Authentication Advanced			
Connect using:			
3Com 3C905TX-based Etherne	t Adapter (G	eneric)	
		<u>C</u> onfigure	
This connection uses the following ite	ms:		
Client for Microsoft Networks     Setwork Load Balancing     P. File and Printer Sharing for M     Set Internet Protocol (TCP/IP)      Install	licrosoft Netu	works Properties	
	·		
Show icon in notification area who	en connecte	d	
	ОК	Car	icel

The following table lists the components required for configuring the print server with EpsonNet WinAssist.

EpsonNet WinAssist's setting screens	Necessary components
TCP/IP, AppleTalk, IPP, SNMP (IP trap)	Internet Protocol (TCP/IP)
MS Network	Internet Protocol (TCP/IP)
NetWare, SNMP (IPX trap)	Latest Novell Client downloaded from the Novell Web site

The following table lists the components required for network printing.

Printing method	Necessary components
LPR or Internet printing	Internet Protocol (TCP/IP)
Microsoft Network Shared printing	Internet Protocol (TCP/IP) Client for Microsoft Networks
Printing via NetWare server	Latest Novell Client downloaded from the Novell Web site

4. If the necessary components are not in the list, click Install to install them, as described below.

#### For LPR or Internet printing:

Internet Protocol (TCP/IP) is installed by default. You cannot add or delete it.

#### For Microsoft Network Shared printing:

Select Client and then click Add. Select Client for Microsoft Networks and then click OK.

#### For printing via NetWare server:

Download the latest Novell Client from the Novell Web site and install it on the computer. Also, be sure to install IPX. See the Novell Web site for detailed information.

- 5. For LPR, Internet, or Microsoft Network Shared printing: Double-click Internet Protocol (TCP/IP) in the Local Area Connection Properties dialog box to open the Internet Protocols (TCP/IP) Properties dialog box. Set the IP address, the subnet mask, etc. and then click OK.
- 6. Restart the computer.

The necessary components are now installed. Go to the next chapter "How to Set Up the Print Server" on page 41.

# Windows 2000

For Windows 2000, use the following procedure to install the necessary components.

#### Note:

- **The Windows 2000 CD-ROM may be required during the installation.**
- □ When using TCP/IP or IPP for printing, you need to set the IP address, the subnet mask, and the default gateway of the computer.
- 1. Click Start, point to Settings, and then select Network and Dial-up Connections. The Network and Dial-up Connections screen appears.
- 2. Right-click the desired network connection and then select Properties.

3. Check if the following necessary components are in the list. If they are already installed, go to the next chapter.

ocal Area Connection Properties 🔋 🔀
General
Connect using:
III NE2000 Compatible
, <u>C</u> onfigure
MAC address: 08-00-17-05-D.9-48
Components checked are used by this connection:
Install Uninstall Properties
Description Allows your computer to access resources on a Microsoft network.
Sho <u>w</u> icon in taskbar when connected
OK. Cancel

The following table lists the components required for configuring the print server with EpsonNet WinAssist.

EpsonNet WinAssist's setting screens	Necessary components
TCP/IP, AppleTalk, IPP, SNMP (IP trap)	Internet Protocol (TCP/IP)
MS Network	NetBEUI or Internet Protocol (TCP/IP)
NetWare, SNMP (IPX trap)	Latest Novell Client downloaded from the Novell Web site

#### Note:

Do not use Novell Client for Windows 95/98 version 3.00 and Novell Client for Windows NT version 4.50 when using the following modes: NetWare 3.x/4.x Bindery Print Server mode, NetWare 3.x Remote Printer mode, NetWare 4.x Bindery Remote Printer mode, and NetWare 4.x/5.x NDS Remote Printer mode.

The following table lists the components required for network printing.

Printing method	Necessary components
LPR or Internet printing	Internet Protocol (TCP/IP)
Microsoft Network Shared printing	Internet Protocol (TCP/IP) or NetBEUI Client for Microsoft Networks
Printing via NetWare server	Latest Novell Client downloaded from the Novell Web site

4. If the necessary components are not in the list, click Install to install them, as described below.

### For LPR or Internet printing:

Select Protocol and then click Add. In the Select Network Protocol dialog box, select Internet Protocol (TCP/IP) and then click OK.

#### For Microsoft Network Shared printing:

To use Internet Protocol, see the description described earlier to install Internet Protocol (TCP/IP).

To use NetBEUI, select Protocol and then click Add. Select NetBEUI Protocol and then click OK.

Select Client and then click Add. Select Client for Microsoft Networks and then click OK.

#### For printing via NetWare server:

Download the latest Novell Client from the Novell Web site and install it on the computer. Also, be sure to install IPX. See the Novell Web site for detailed information.

- 5. For LPR, Internet, or Microsoft Network Shared printing: Double-click Internet Protocol (TCP/IP) on the Configuration menu to open the TCP/IP Properties dialog box. Set the IP address, the subnet mask, etc. and then click OK.
- 6. Restart the computer.

The necessary components are now installed. Go to the next chapter "How to Set Up the Print Server" on page 41.

# Windows NT 4.0

For Windows NT 4.0, use the following procedure to install the necessary components.

#### Note:

- **The Windows NT 4.0 CD-ROM may be required during the installation.**
- □ When using TCP/IP or IPP for printing, you need to set the IP address, the subnet mask, and the default gateway of the computer.
- 1. Click Start, point to Settings, and then select Control Panel.
- 2. Double-click the Network icon in the Control Panel.

3. Check if the following necessary components are in the list. If they are already installed, go to the next chapter.

Network ? X
Identification Services Protocols Adapters Bindings
Network Protocols:
習 NetBEUI Protocol 習 NWLink IPX/SPX Compatible Transport 習 NWLink NetBIDS 著 TCP/IP Protocol
Add <u>Remove</u> <u>Properties</u> <u>Update</u> Description: Transport Control Protocol/Internet Protocol. The default wide area network protocol that provides communication across diverse interconnected networks.
OK Cancel

The following table lists the components required for configuring the print server with EpsonNet WinAssist.

EpsonNet WinAssist's setting screens	Necessary components
TCP/IP, AppleTalk, IPP, SNMP (IP trap)	TCP/IP
MS Network	NetBEUI or TCP/IP
NetWare, SNMP (IPX trap)	Latest Novell Client downloaded from the Novell Web site

Do not use Novell Client for Windows 95/98 version 3.00 and Novell Client for Windows NT version 4.50 when using the following modes: NetWare 3.x/4.x Bindery Print Server mode, NetWare 3.x Remote Printer mode, NetWare 4.x Bindery Remote Printer mode, and NetWare 4.x/5.x NDS Remote Printer mode.

The following table lists the components required for network printing.

Printing method	Necessary components	
LPR or Internet printing	Protocols menu: TCP/IP Services menu: Microsoft TCP/IP Printing	
Microsoft Network Shared printing	Protocols menu: TCP/IP or NetBEUI Services menu: Workstation	
Printing via NetWare server	Latest Novell Client downloaded from the Novell Web site	

4. If the necessary components are not in the list, click Add to install them, as described below.

### For LPR or Internet printing:

Select the Protocols tab and then click Add. Select TCP/IP from the list and then click OK. Set the IP address, the subnet mask, etc. and then click OK.

Select the Services tab and then click Add. Select Microsoft TCP/IP Printing from the list and then click OK.

### For Microsoft Network Shared printing:

To use TCP/IP, see the description described earlier to install TCP/IP.

To use NetBEUI, select the Protocols tab and then click Add. Select NetBEUI from the list and then click OK. Select the Services tab and then click Add. Select

Workstation from the list and then click OK.

#### For printing via NetWare server:

Download the latest Novell Client from the Novell Web site and install it on the computer. Also, be sure to install IPX. See the Novell Web site for detailed information.

Network ? 🗙
Identification Services Protocols Adapters Bindings
Network Services:
Computer Browser Microsoft TCP/IP Printing NetBIOS Interface RPC Configuration Server Workstation
Add <u>Remove</u> <u>Properties</u> <u>Update</u> Description: Enables Windows NT to print to TCP/IP-connected printers or to printers that are physically attached to UNIX computers.
OK Cancel

5. Restart the computer.

The necessary components are now installed. Go to the next chapter "How to Set Up the Print Server" on page 41.

# Macintosh

To assign an IP address, subnet mask, etc. to your Macintosh, follow the steps below.

### Note:

To print using the AppleTalk protocol and configure the print server with EpsonNet MacAssist, select Ethernet or Built-in Ethernet on the AppleTalk Control Panel. Then configure the print server with EpsonNet MacAssist.

# Mac OS 8.x to 9.x

- 1. From the Apple menu, select Control Panel, and then TCP/IP.
- 2. Set Connect via to Ethernet.
- 3. Assign an IP address and other settings if necessary.
- 4. Close the dialog box to save any changes.

Go to the next chapter "How to Set Up the Print Server" on page 41.

# Mac OS X

- 1. From the Apple menu, select System Preferences.
- 2. Open the Network control panel. Click the TCP/IP tab.
- 3. Select Built-in Ethernet from the Show pull down menu.
- 4. Assign an IP address and other settings if necessary.
- 5. Click the Apply Now button to save any changes.

Go to the next chapter "How to Set Up the Print Server" on page 41.

# Chapter 2 How to Set Up the Print Server

This chapter explains how to set up the print server. This includes connecting the print server to the network, installing EpsonNet WinAssist/MacAssist, and using EpsonNet WinAssist/MacAssist to assign an IP address to the print server.

# Connecting the Print Server to the Network

Follow the steps below to connect the print server to the network.

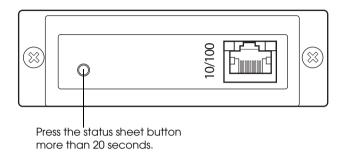


#### Warning:

Before you install or uninstall the print server, be sure to turn off the printer to prevent electric shock.

- 1. Make sure the printer is turned off. If you are using an ink jet printer, unplug the power cord from the wall outlet.
- 2. Insert the print server in an optional interface slot and tighten the screws. For more details, see the manual shipped with your printer.
- 3. Initialize the print server. To do this, turn on the printer while holding down the status sheet button for twenty seconds to initialize the print server. While the orange Status light and the yellow Data light are on, initialization is in progress.

*Be sure to initialize the print server when you install or reinstall the print server.* 



- 4. Turn off the printer.
- 5. Connect an Ethernet cable (Category 5 shielded twisted-pair cable) to the RJ-45 connector on the print server, and then connect its other end to the network.

Caution:

□ You must use a Category 5 shielded twisted-pair cable to connect the print server to prevent malfunction.

- Do not connect or disconnect the network cable when the printer is on.
- □ Do not connect the print server and the computer directly. Be sure to use a HUB to connect the print server to the network.

#### Note:

You can use both 10Base-T and 100Base-TX. If you print a lot of data, we recommend that you use a high-speed network of 100Base-TX with a light network traffic.

6. Turn on the printer.

- 7. Check the lights on the print server. The orange Status light and the yellow Data light go on. After a while, the green or orange Status light turns on and the Data light flashes.
- 8. To print a status sheet, press the status sheet button on the print server. Press the status sheet button once to print a simple status sheet, or twice to print a full status sheet.

If the status sheet prints, this indicates the print server has been set correctly.



Do not press the status sheet button while the orange Status light and the yellow Data light are on; otherwise, the print server will return to its factory default settings, and the network status sheet will not print correctly as well.

□ After turning off the printer, wait until the status lights go off before turning it back on or before removing the print server; otherwise, the print server may not work correctly.

### *Note for Mac OS X* 10.2.4*:*

Since the printer supports Rendezvous and is on by default, you can use the printer on a network just by connecting it to the network. If you want to disable the Rendezvous setting, use EpsonNet WebAssist. See "Configuring the Print Server Using EpsonNet WebAssist" on page 208 for details.

Now, you can configure the print server for the network using EpsonNet WinAssist/MacAssist. Go to "Installing EpsonNet WinAssist/MacAssist" on page 44.

# Installing EpsonNet WinAssist/MacAssist

You need to install EpsonNet WinAssist or MacAssist to configure the print server.

#### Note:

*Be sure to use EpsonNet WinAssist/MacAssist included on the Software CD-ROM shipped with this product.* 

## For Windows

Install EpsonNet WinAssist on the computer to configure the print server.

### System requirements

The following table lists the system requirements of EpsonNet WinAssist.

Operating systems	Windows Me/98/95
	Windows XP Professional/Home Edition
	Windows Server 2003
	Windows 2000 Server/Professional
	Windows NT 4.0 Server/Workstation with Service Pack 5.0 or higher
Hard disk drive space	10 MB

## Installing EpsonNet WinAssist

Follow the steps below to install EpsonNet WinAssist.

### Note:

If you add or delete protocols or services from your operating system after installing EpsonNet WinAssist, EpsonNet WinAssist may not work correctly. If this happens, uninstall EpsonNet WinAssist and then install it again.

- 1. Insert the Software CD-ROM in the CD-ROM drive.
- 2. The EPSON Installation Program starts automatically.

If the Installer dialog box does not appear, double-click SETUP.EXE on the CD-ROM.

- 3. Select Install EpsonNet WinAssist, and then click .
- 4. Follow the on-screen instructions to complete the installation.

# For Macintosh

Install EpsonNet MacAssist on your Macintosh to configure the print server.

### System requirements

The following table lists the system requirements of EpsonNet MacAssist.

Operating systems	Mac OS 10.x, 9.x, 8.x
Models	PowerPC Macintosh
Hard disk drive space	10 MB

## Installing EpsonNet MacAssist

Follow the steps below to install EpsonNet MacAssist.

- 1. Insert the Software CD-ROM in the CD-ROM drive.
- 2. Mac OS 8.x to 9.x:

Double-click the EpsonNet MacAssist folder, and then the EpsonNet MacAssist Installer icon.

Mac OS X:

Double-click the Mac OS X folder, and then the EpsonNet MacAssist folder, and then the EpsonNet MacAssist Installer icon.

### Note:

When the authentication dialog box to assign administrator rights appears, enter the user name and password, and then click OK.

- 3. Follow the on-screen instructions to install the software.
- 4. Restart your computer.

### Mac OS 8.x to 9.x:

The MacAssistxxx folder, which contains the EpsonNet MacAssist icon and the EpsonNet MacAssist EasySetup icon, is created in the Applications folder.

Mac OS X:

The EpsonNet MacAssist OSX x.xx folder, which contains the EpsonNet MacAssist for OS X icon and the EpsonNetMacAssistOSXEasySet icon, is created in the Applications folder.

# Setting an IP Address Using EpsonNet WinAssist

This section explains how to use EpsonNet WinAssist to configure the print server.

- **Check that the necessary protocols are installed on the computer.**
- □ *Make sure the printer is turned on.*
- □ The computer to use for the following steps must be in the same segment as the print server.
- □ The sample screens are taken from Windows 98 using EpsonNet WinAssist. Other systems may differ in appearance, but the instructions are the same, except as noted.
- Click Start, point to Programs or All Programs (Windows XP/Server 2003), and then select EpsonNet WinAssist V4. Click EpsonNet WinAssist to start it.
- 2. Select the printer you want to configure, and then click Configuration or double-click the printer icon.

EpsonNet WinAssist <u>Device</u> View Tool Help	-	_	_	_ [] ×
🖅 EPSON Devices	Model Name	MAC Address	IP Address	Network Address
- Scanner	AL-DOOM Stylus COLOR XXX Stylus Pro XXXX G GT-XXXX	×*************************************	******	
To update to the most recent	nformation press the F5 k	au IP N	Launch Browser	Configuration

- □ If the same printer model name appears several times in the list, you can identify the printers by checking their MAC address, which are found on the status sheet.
- □ You can search printers in other segments by using Search Options from the Tool menu. See "Search options" on page 62 for more information.
- □ The Lounch Browser button can be used only if a valid IP address is assigned to the printer.
- □ The print server does not have a default IP address. Be sure to assign a valid IP address manually or by using the DHCP server.
- 3. Click the TCP/IP tab.

*For information on other menus, see "Details of the Configuration Dialog Box" on page 65.* 

twork Interface Ca	rd Properties
nformation Ethernet	TCP/IP NetWare MS Network AppleTalk IPP SNMP
Method for specifying	g the IP address
<ul> <li>Automatic</li> </ul>	
C DHCP	Set using Automatic Private IP Addressing (APIPA)
C BOOTP	
C RARP	
C Manual	☐ Set using PING
- IP Address Setting-	
IP Address Setting -	
Subnet Mask	
Default Gateway	: 🗙 , 🗙 , 🗙 , 🗙
	Extended Settings
	OK Cancel Help

4. Select a method for specifying the IP address. If you select Automatic, DHCP becomes available and assigns an IP address automatically. If you want to set the IP address manually, select Manual instead.

- □ The network administrator must confirm any changes made to the IP address settings.
- □ When Automatic is selected, DHCP becomes available. To use the DHCP server, make sure it is installed on your computer and correctly configured. See your operating system's online help for detailed instructions.

- □ If the Dynamic DNS function is not supported, we recommend that you select Manual and enter an IP address. This is because if you select Automatic, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
- 5. If you want to get a private address between 169.254.1.1 and 169.254.254.254 automatically when an IP address cannot be obtained by the DHCP server, leave the Set using Automatic Private IP Addressing (APIPA) check box selected; otherwise, clear the check box.
- 6. When setting an IP address using the ping command, select the Set using PING check box. Do not select when setting an IP address with EpsonNet WinAssist/MacAssist/WebAssist; this prevents any unexpected change of the IP address.

*Be sure not to select the check box when not using ping; this prevents an unexpected change of the IP address by EpsonNet WebManager.* 

7. To assign an IP address manually, enter the IP address, the subnet mask, and the default gateway. Be sure the IP address does not conflict with any other devices on the network.

### Note:

If there is a server or a router functioning as a gateway, enter the IP address of the server or the router for the gateway address. If there is no gateway, leave the default values there.

8. Click the Extended Settings button if you want to make extended settings, such as Dynamic DNS and Universal Plug and Play functions.

*The check boxes are dimmed if the print server does not support the function.* 

Extended Settings		×
DNS Server Address Settings		7
C Acquire DNS server address	automatically	
DNS Server Addresses :		
	<u>±</u>	
	Add Edit Delete	
Host Name and Domain Name Se	tting	
C Acquire host name and doma	ain name automatically	
Host Name	: Stylus_Pro_XXXX	
Domain Name	:	-
E Register the network interfac	e's address to DNS server	
Register directly to DNS s	erver	
Universal Plug and Play Settings –		
🖵 Use Universal Plug and Play		
Device Name	: Stylus_Pro_XXXXXXXX	1
	OK Cancel	

9. Select the Acquire DNS server address automatically check box if you want to acquire the DNS server address using the DHCP server.

If you want to enter the DNS server address manually, click the Add button and then enter the IP address of the DNS server. Click OK.

10. Select the Acquire host name and domain name automatically check box if you want to acquire the host name and the domain name using the DHCP server.

If you want to enter manually, enter the host name and the domain name in the text boxes.

11. Select the Register the network interface's address to DNS server check box if you want to register the host name and domain name to the DNS server through the DHCP server that supports Dynamic DNS.

If you want to register the host name and the domain name directly to the DNS server, select the Register directly to DNS server check box.

12. Select the Use Universal Plug and Play check box if you want to use the Universal Plug and Play function on Windows Me or future operating systems.

Change the default Universal Plug and Play device name, if desired. This device name is used for Windows that supports the Universal Plug and Play function.

- 13. After changing the settings, click OK.
- 14. In the TCP/IP dialog box, click OK. The Password dialog box appears.
- 15. Enter your password (up to 20 characters) and then click OK to save the settings. If you are entering a password for the first time, click Change and set the password. See "About Password" on page 84 for more information.

Follow the on-screen instructions. After the update is complete, refresh the configuration by selecting Refresh from the View menu.

### Caution:

Since it takes 2 or 3 minutes to send new settings to the print server, wait until an on-screen message appears to indicate that you can turn off your printer.

# Setting an IP Address Using EpsonNet MacAssist

This section explains how to use EpsonNet MacAssist to configure the print server.

- □ *Make sure the printer is turned on.*
- □ The computer to use for the following steps must be in the same segment as the print server.
- □ Make sure that Ethernet is selected for Connect via in the AppleTalk and TCP/IP control panels according to your network environment.
- 1. Double-click the EpsonNet MacAssist icon.
- 2. Select the printer you want to configure from the list and click Configure.

	Epso	onNet MacAssist V	er. 4.1a		
EPSON Devices	Model Name	MAC Address	IP Address	Printer Name	^
	AL-CXXXX	**********		AL-CXXX-xxxxxx	1
Scanner	👔 🎡 Stylus COLOR XXX	***********	XXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXX	Stylus COLOR XXX-xxxxx	4
	😥 Stylus Pro XXXX	*********	******	Stylus Pro XXX-xxxxxx	
	📚 GT-XXXXX	*********	******		
					-
				►	
Searching the fo	lowing network paths	:USB AppleTalk	IP		
0		Laun	ch Browser	Configure	כ

- □ If the same printer model name appears several times in the list, you can identify the printers by checking their MAC addresses, which are found on the status sheet.
- □ You can search printers in other zones just like computers by changing the zone setting. See "Search options" on page 93 for more information.
- □ The Lounch Browser button can be used only if a valid IP address is assigned to the printer.
- □ The print server does not have a default IP address. Be sure to assign a valid IP address manually or by using the DHCP server.
- 3. Click the TCP/IP tab.

#### Note:

*For information on other menus, see "Details of the Configuration Dialog Box" on page 95.* 

Net	work-Card Properties E
Information Ethernet TCP/IP Apple	Talk
Automatic 🜩	
Set using PING	
✓ Set using Automatic Private IP Address	ing (APIPA)
IP Address:	
Subnet Mask:	
Default Gateway:	
Default Gateway.	
	Extended Settings
0	Cancel OK

4. Select a method for specifying the IP address. If you select Automatic, DHCP becomes available and assigns an IP address automatically. If you want to set the IP address manually, select Manual instead.

### Note:

- □ The network administrator must confirm any changes made to the IP address settings.
- □ When Automatic is selected, DHCP becomes available. To use the DHCP server, make sure it is installed on your computer and correctly configured. See your operating system's online help for detailed instructions.
- □ If the Dynamic DNS function is not supported, we recommend that you select Manual and enter an IP address. This is because if you select Automatic, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
- 5. When setting an IP address using the ping command, select the Set using PING check box. Do not select when setting an IP address with EpsonNet WinAssist/MacAssist/WebAssist; this prevents any unexpected change of the IP address.

#### Note:

Be sure not to select the check box when not using ping; this prevents an unexpected change of the IP address by EpsonNet WebManager.

- 6. If you want to get a private address between 169.254.1.1 and 169.254.254.254 automatically when an IP address cannot be obtained by the DHCP server, leave the Set using Automatic Private IP Addressing (APIPA) check box selected; otherwise, clear the check box.
- 7. To assign an IP address manually, enter the IP address, the subnet mask, and the default gateway. Be sure the IP address does not conflict with any other devices on the network.

### Note:

If there is a server or a router functioning as a gateway, enter the IP address of the server or the router for the gateway address. If there is no gateway, leave the default values there.

8. Click the Extended Settings button if you want to make extended settings, such as Dynamic DNS and Universal Plug and Play functions.

#### Note:

*The check boxes are dimmed if the print server does not support the function.* 

	Extended Settings			
DNS Server Address Settings				
Acquire DNS server address automatically				
DNS Server Addresses:				
	_ <b></b> -  -  -  -  -  -  -  -  -  -  -  -  -			
	Add Edit Del			
– Host Name and Domain Name	Setting			
🗌 Acquire host name and d	omain name automatically			
Host Name:				
	Stylus_Pro_XXX-xxxxxx			
Domain Name:				
Register the network inte	rface's address to DNS server			
Register directly to D	NS server			
_ Universal Plug and Play Setti	ngs			
Use Universal Plug and Pl				
1 -				
Device Name:	Stylus_Pro_XXXX-xxxxxx			
	Cancel OK			

9. Select the Acquire DNS server address automatically check box if you want to acquire the DNS server address using the DHCP server.

If you want to enter the DNS server address manually, click the Add button and then enter the IP address of the DNS server. Click OK.

10. Select the Acquire host name and domain name automatically check box if you want to acquire the host name and the domain name using the DHCP server.

If you want to enter manually, enter the host name and the domain name in the text boxes.

11. Select the Register the network interface's address to DNS server check box if you want to register the host name and domain name to the DNS server through the DHCP server that supports Dynamic DNS.

If you want to register the host name and the domain name directly to the DNS server, select the Register directly to DNS server check box.

12. Select the Use Universal Plug and Play check box if you want to use the Universal Plug and Play function in Windows Me or future operating systems.

Change the default Universal Plug and Play device name, if desired. This device name is used for Windows that supports the Universal Plug and Play function.

- 13. After changing the settings, click OK.
- 14. In the TCP/IP dialog box, click OK. The Password dialog box appears.
- 15. Enter your password (up to 20 characters) and then click OK to save the settings. If you are entering a password for the first time, click Change Password and set the password. For more information on passwords, see "About Password" on page 103.

Follow the on-screen instructions. After the update is complete, refresh the configuration by selecting Refresh from the Device menu.

## Caution:

Since it takes 2 or 3 minutes to send new settings to the print server, wait until an on-screen message appears to indicate that you can turn off your printer.

# EpsonNet WinAssist Configuration Utility

# About EpsonNet WinAssist

EpsonNet WinAssist is a Windows-based configuration software for administrators to configure the print server for TCP/IP, NetWare, MS Network, AppleTalk, IPP, and SNMP.

- □ Be sure to use EpsonNet WinAssist included on the Software CD-ROM shipped with this product.
- □ EpsonNet WinAssist installed on Windows XP/Server 2003 does not support NetBEUI as a search protocol because officially the NetBEUI protocol is not supported on Windows XP/Server 2003.
- □ To set the IP address for OS/2 and UNIX, use the arp and ping commands. For more information, see "Setting an IP Address Using the arp/ping Command" on page 250.
- □ If you are using the printer in a dial-up environment not running NetWare, clear the Use NetWare check box on the NetWare screen. If this check box is selected, the extra account may be charged when you use the dial-up router.
- □ When configuring the print server for NetWare, use the IPX protocol and log in to the NetWare server or the NDS context with supervisor privileges.
- □ When you configure the print server for NetWare 5.x, you must log in to the NetWare server using an IPX connection. If you log in to the NetWare server using an IP connection, the NetWare screen and the IPX trap setting of SNMP are not available.

# Menu Bar

EpsonNet WinAssist provides the following menus and sub-menus.

Device menu:

- Configuration
   Configures the print server you have selected.
- □ Launch Browser Starts EpsonNet WebAssist to configure the print server you have selected. EpsonNet WebAssist is a utility that runs on a browser.
- Quit Quits EpsonNet WinAssist.

#### View menu:

Refresh Updates to the latest information by searching for the available printers again.

### Tool menu:

#### Timeout

Set the timeout value between 2 and 120 seconds. See "Timeout option" on page 60 for more information.

### □ Search Method

Select the connections and protocols to use to search for a print server. See "Search method" on page 61 for more information.

### □ Search Options

Configures the options for a search with IP or IPX. See "Search options" on page 62 for more information.

□ Firmware Update

You can update the firmware and EpsonNet WebAssist. See the EpsonNet WinAssist online help for detailed information.

#### Help menu:

- Help Topic
   Opens EpsonNet WinAssist help.
- About EpsonNet WinAssist
   Displays the copyright and version information for EpsonNet WinAssist.

# Timeout option

Set the length of time before a timeout occurs (between 2 and 120 seconds). The default value is 6 seconds. A communication error occurs if this time is exceeded. If you set a larger value, it takes more time to search for the network printers. Therefore, change this value only if you prefer.

Select Refresh from the View menu or restart EpsonNet WinAssist for the settings to take effect.

Timeout		x
Timeout Setting For communication error (seconds)	:	6
OK	]	Cancel

# Search method

You can select the connections and protocols to search for a print server. You can select from the following: LAN connection using TCP/IP, IPX, and NetBEUI protocols, or USB connection.

Select the Select All radio button to search for print servers with all the available connections and protocols, or select the Select Individually radio button to select the preferred connections and protocols.

Select Refresh from the View menu or restart EpsonNet WinAssist for the settings to take effect.

Note:

*EpsonNet WinAssist installed on Windows XP/Server 2003 does not support NetBEUI as a search protocol because officially the NetBEUI protocol is not supported on Windows XP/Server 2003.* 

Network Path Search Setting	×
Search Path Selection	:      Select All     Select Individually
Search Path Selection	: C Select All C Select Individually
Search Paths	: 🔽 LAN
	NetBEUI
	VSB
	OK Cancel

# Search options

### Search Options-IP

To search for print servers in other segments, set the specific network address and the subnet mask. The settings you modified on this screen do not affect the search parameters used for EpsonNet WinAssist EasySetup.

Select Refresh from the View menu or restart EpsonNet WinAssist for the settings to take effect.

Search Options-IP	×
Search with IP	
Search specified address	
Network Address	
Subnet Mask	
	Network Address Subnet mask
	Add Remove
	OK Cancel

Item	Explanation
Search specified address	Select this check box to search for a print server located outside the router.
Network Address	Enter the network address (valid range 0 to 255) of the print server you want to find. Enter 0 for the local address.
Subnet Mask	Enter the subnet mask of the IP address.
List box	Displays network addresses and subnet masks that have been registered.

Add button	Registers a network address (up to 20 addresses). Do not add the network address if it is in the same segment.
Remove button	Removes a network address and its subnet mask from the List box.

- □ If you try to add an incorrect network address, the "The network address XXX.XXX.XXX.XXX that you entered will be added to the list as XXX.XXX.XXX.X. Add this address?" message appears. Check the correct network address and then click OK to add it.
- □ If you try to add the same network address, the "This network address has already been registered" message appears, which indicates this address cannot be added.

## Search Options-IPX

When you manage the print server with IPX (NetWare), and when you want to configure the print server outside of the local network, set the network address of the print server. Select Refresh from the View menu or restart EpsonNet WinAssist for the settings to take effect.

- **To use this option, you need to log in to the NetWare server as a** *supervisor.*
- When using a dial-up network, delete any unnecessary addresses from the Search Addresses list to prevent charges for any extra accounts.

Search Options-IPX Search with IPX Search specified addresses	×
Network Address List	Search Addresses
	aa >> Bemove
	OK Cancel

Item	Explanation
Search specified addresses	The display time can be reduced by selecting this check box and choosing the target networks; any unnecessary or unwanted information is then not obtained.
Network Address List	Displays all current network addresses.
Search Addresses	Displays the network address to be searched.
Add button	Select an address in Network Address List, and then click Add to add the address to Search Addresses (up to 256 address).
Remove button	Removes the selected address from the Search Addresses list.

## Firmware update

You can update the firmware and EpsonNet WebAssist. Since the firmware update function is for the support purpose, usually you do not need to use this function. See the EpsonNet WinAssist online help for detailed information.

# Details of the Configuration Dialog Box

## Information

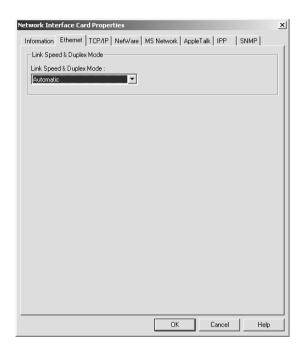
The Information menu shows the various print server parameters as described below.

etwork Interface Card Prop	
Information Ethernet TCP/If	P NetWare MS Network AppleTalk IPP SNMP
Network-Card Information	
MAC Address	: X000000000X
Hardware Version	: XXX
Software Version	: XXXX
Model Name	: Stylus Pro XXXX
Location	:
	Return to Default
Path Information Search Path	: TCP/IP NetBEUI
	OK Cancel Help

Parameters	Explanations
MAC Address	Unique hardware address of the print server. You can check the MAC address on a status sheet.
Hardware Version	Hardware version of the print server
Software Version	Software version of the print server
Model Name	Product name of the printer attached to the print server
Location	Enter the location of the print server.
Return to Default button	Reverts to the factory default settings.
Search Path	Protocol used to search for the print server
ОК	Updates the settings.
Cancel	Cancels any changes.
Help	Accesses help.

# Ethernet

To change the Ethernet setting, use the following screen.



Items	Explanations
Link Speed & Duplex Mode	Select an appropriate Ethernet speed and duplex setting. Normally, Automatic can be selected. If you select a setting other than Automatic, make sure the setting corresponds to the type of hub you are using.

# TCP/IP

To use the printer in the TCP/IP environment, configure the print server using the following screen.

etwork Interface Ca	rd Properties
Information Ethernet	TCP/IP NetWare MS Network AppleTalk IPP SNMP
Method for specifying	g the IP address
<ul> <li>Automatic</li> </ul>	
C DHCP	Set using Automatic Private IP Addressing (APIPA)
C BOOTP	
C RARP	
C Manual	☐ Set using PING
- IP Address Setting-	
IP Address Setting -	
IF Address	
Subnet Mask	
Default Gateway	: 🚾 , 🚾 , 🚾 , 🚥
	Extended Settings
	Excited occurga
	OK Cancel Help

Items	Explanations
Method for specifying the IP address	Select a method for specifying an IP address. When you select Automatic, an IP address, subnet mask, and default gateway are automatically assigned by the DHCP server.
	<b>Note:</b> If the Dynamic DNS function is not supported, we recommend that you select Manual and then enter an IP address. This is because if you select Automatic, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
Set using Automatic Private IP Addressing (APIPA)	Assigns a private IP address automatically even when there is no DHCP server on your network. It is dimmed if this function is not supported.
Set using PING	Select this check box when setting an IP address using the ping command. When not using the ping command, clear this check box.
	<b>Note:</b> Be sure to clear the check box when not using ping; this prevents any unexpected change of the IP address by EpsonNet WebManager.
IP Address	Enter an IP address for the print server. Be sure that the IP address is unique and does not conflict with any other device on the network.
Subnet Mask	Enter the subnet mask of the IP address.
Default Gateway	Enter the gateway address.
Extended Settings button	Click this button for extended settings such as Dynamic DNS and Universal Plug and Play. If both functions are not supported, this button is dimmed.

### Extended Settings dialog box

When you click the Extended Settings button on the TCP/IP menu, the following dialog box appears.

tended Settings		x
DNS Server Address Setting	\$	
F Acquire DNS server ad	dress automatically	
DNS Server Addresses :		
		1
		Ŧ
,	Add Edit Delete	
Host Name and Domain Nam	ne Setting	
☐ Acquire host name and	domain name automatically	
Host Name	: Stylus_Pro_XXXXXXXXX	
Domain Name	:	
E Register the network in	ierface's address to DNS server	
Register directly to D	INS server	
Universal Plug and Play Sett	ings	
🔲 Use Universal Plug and	Play	
Device Name	Stylus_Pro_XXXX-xxxxxx	
	. ,	
	ОК	Cancel
		Cancer

Items	Explanations
Acquire DNS server address automatically	Select this check box if you want to acquire the DNS server address using the DHCP server. To enter the DNS server address manually, clear this check box. If the DNS is not supported, this check box is dimmed.
DNS Server Addresses	Displays the DNS server address. To enter the DNS server address, click the Add button.
	To edit the DNS server address, select the address and then click the Edit button.
	To delete the DNS server address, select the address and then click the Delete button.

Acquire host name and domain name automatically	Select this check box if you want to acquire a host name and domain name from the DHCP server.
Host Name	Enter the host name supported by the Dynamic DNS (between 2 and 63 characters). The total number of characters of the host name and the domain name must not exceed 251.
Domain Name	Leave it blank or enter two or more characters of the domain name supported by Dynamic DNS. The total number of characters of the host name and the domain name must not exceed 251.
Register the network interface's address to DNS server	Select this check box if you want to register the host name and the domain name to the DNS server through the DHCP server that supports Dynamic DNS.
Register directly to DNS server	Select this check box if you want to register the host name and the domain name directly on the DNS server.
Use Universal Plug and Play	Enables or disables Universal Plug and Play. It is dimmed if this function is not supported.
Device Name	Enter the device name for Universal Plug and Play (between 2 and 63 characters).

# NetWare

To use the printer in the NetWare environment, configure the print server using the following screen. You can configure the print server in either the Print Server mode or the Remote Printer mode.

#### Note:

- □ When you are not using NetWare, be sure to select the Standby mode.
- □ Log in to the NetWare server or the NDS context with supervisor privileges.
- □ You cannot assign the print queue if you have not logged in to the bindery or NDS in the same mode you have selected for Mode.

## Print Server mode

To use the printer in the Print Server mode, configure the print server using the following screen.

Note:

When you save the settings, the Printer Objects, named PRO for the Bindery mode or print server name\_PO for the NDS mode, are automatically created. To change the printer name, use PCONSOLE or NWADMIN.

Network Interface Card Properties	x
Information Ethernet TCP/IP NetWare	MS Network AppleTalk IPP SNMP
🔽 Use Netware	
Basic Settings	Print Server
Mode:	Tree Name:
Print Server/NDS	1
Frame Type: Auto	Context:
	Browse
	Print Server Name:
	Print Server Password:
	Print Server Password (again):
	Polling Interval:
	5
	Print Queue Configuration
	OK Cancel Help

Items	Explanations
Use NetWare	Select this check box when using NetWare. When you use the printer only in the NetWare environment, it turns on automatically.
Mode	Select a mode: Print Server/Bindery or Print Server/NDS.
Frame Type	Leave the default frame type as it is.
Tree Name	For the NDS mode only: Click the Browse button and select the NDS context so the Tree name is also selected.
Context	For the NDS mode only: Click the Browse button and select the NDS context.
Browse button	Browse the NDS context.
Primary File Server Name	For the Bindery mode only: Select the server where the print server logs in.
Print Server Name	Select or enter the print server name (up to 47 characters).
Print Server Password	Enter the password to log in to the print server (up to 20 characters). See the NetWare documentation for more details. Usually you do not need to set it.
Print Server Password (again)	Enter the password again.
Polling Interval	Set the polling interval between 5 to 90 seconds. See the NetWare documentation for more details. Usually you do not need to set it.
Print Queue Configuration button	Configure the print queue settings. If you have assigned the queue with PCONSOLE, NWAdmin, or EpsonNet!2 for Windows (an older version of the configuration utility), reassign the print queue here.

#### Print Queue Configuration dialog box

When you click the Print Queue Configuration button on the Print server menu, the following dialog box appears.

#### Note:

You can configure queue settings for a higher context than the one you specified in the NDS context box. In this case, you must have the supervisor privileges for the context in which you set the queue.

Queue Configuration		X
Queue Configuration		
Queue Name:		
Queue01.SALES.EPSON	E	Browse
Queue02.EPSON		
[	Add	Remove
Ľ	ок	Cancel

Items	Explanations
Queue Name	Displays the queue name that is assigned to the print server by browsing the queue.
Browse button	Click the Browse button to select a queue. You can also create or delete a queue.
Queue list box	Lists the print queues.
Add button	Adds a print queue.
Remove button	Removes a print queue.

- Selecting a queue Click the queue and click OK to select it.
- □ Creating a queue

**For Bindery mode:** Click the file server where you want to create a queue. Right-click it, and then select Create Queue. Enter the queue name (up to 47 characters).

**For NDS mode:** Select the context where you want to create a queue. Right-click it, and then select Create Queue. Type a queue name (up to 47 characters). Browse the context, and then select the volume name from the drop-down list. The queue will be created under the SYS volume of the file server. If you want to create a queue in another volume, use PCONSOLE or NWAdmin.

Create Queue	x
Create Queue	
Queue Name:	
Volume Context:	
EPSON	
	Browse
Queue Volume:	
	•
	OK. Cancel

Deleting a queue

Select the print queue you want to delete. Right-click it, and then select Delete Queue.

#### Remote Printer mode

To use the printer in the Remote Printer mode, configure the print server using the following screen.

Network Interface Card Properties	x
Information Ethernet TCP/IP NetWare	MS Network AppleTalk IPP SNMP
Use Netware	
Basic Settings	Remote Printer
Mode:	Primary Print Server Name:
Remote Printer	Stylus_Pro_XXXX-xxxxxx
Frame Type:	Printer Port Number:
Auto	0
	OK Cancel Help

Items	Explanations
Use NetWare	Select this check box when using NetWare. When you use the printer only in the NetWare environment, it turns on automatically.
Mode	Select Remote Printer.
Frame Type	Leave the default frame type as it is.
Primary Print Server Name	Enter the primary print server name (up to 47 characters), which is created by PCONSOLE or NWAdmin.
	For NDPS Gateway, enter the SAP name you have set for NetWare (up to 47 characters).
Printer Port	Enter the printer port number.
Number	For NDPS Gateway, enter the same printer number you have set for NetWare (between 0 and 254).

## **MS Network**

To use the printer in the Microsoft network environment, configure the print server using the following screen.

Network Interface Card Properties		×
Information Ethernet TCP/IP Netwo	/are	MS Network AppleTalk IPP SNMP
🔽 Use Microsoft network shared prin	nting	1
- Basic Information		
Print Server Name	:	EPXXXXX
Workgroup Name	:	WORKGROUP
Share Name	:	EPSON
		OK Cancel Help

Items	Explanations
Use Microsoft networkshared printing	Select this check box when using Microsoft Shared Network printing. This check box is selected but dimmed when the print server's information is acquired by the NetBEUI protocol.
Print Server Name	Enter the print server name (up to 15 characters). Be sure to give a unique name that does not cause conflicts with any other device on the network.
Workgroup Name	Enter the workgroup name or domain name used for the Windows network environment (up to 15 characters).
Share Name	Enter the printer's shared name on the network (up to 12 characters). Do not use LPT1, LPT2, LPT3, or COM.

## AppleTalk

To use the printer in the AppleTalk environment, configure the print server using the following screen.

Note:

*To configure AppleTalk settings using EpsonNet WinAssist, the following conditions must be maintained;* 

- **D** The print server must be assigned a valid IP address.
- □ You have logged in to the NetWare server or the NDS context with supervisor privileges.
- **D** *The shared service is installed on the computer.*

asic Information		
Printer Name	:	Stylus_Pro_XXXX-xxxxxx
Zone Name	:	X
Entity Type	:	EPSONLQ2
		Entity Setting
Method of specifying the network number	:	<ul> <li>Automatic</li> <li>Manual</li> </ul>
Network Number for Manual Mode	:	65534

Items	Explanations
Use AppleTalk	Select this check box when using AppleTalk.
Printer Name	Enter the name of the printer (up to 32 characters).
Zone Name	Enter the network zone name (up to 32 characters). To have the zone selected automatically, select Automatic to specify the network number and enter an asterisk (*) in this text box.
Entity Type	Displays the printer's entity type. Do not change the entity type unless "epson" appears. If "epson" appears, select an entity type by clicking the Entity Setting button to match your printer.
	Impact Dot Matrix (24 pin): EPSONLQ2
Entity Setting button	Click this button and select the appropriate entity type.
Method of specifying the network number	Select a method for acquiring the network number. Automatic is usually preferred.
NetworkNumberfor Manual Mode	Enter a value between 0 and 65534 to specify the network number, if you have selected Manual.

To use the printer in the IPP environment, configure the print server using the following screen. If the print server does not support the SNMP, all of the items are dimmed.

Network Interface Card Prop	erties				x
Information Ethernet TCP/IP	NetWare	MS Network Apple	Talk IPP	SNMP	
Basic Information					
IPP URL	:	http://xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx	∝:631/EPS01	N_IPP_Printer	
Printer Name	:	EPSON_IPP_Printer			
Location	:	[			
		OK	Cancel	Help	

Items	Explanations
IPP URL	Displays the printer's URL for Internet Printing.
	<i>Format:</i> http://IP address of print server:631/ printer name set below
	<i>Example:</i> http://192.168.100.201:631/EPSON_IPP_Printer

Items	Explanations	
Printer Name	Enter the name of the printer to use for Internet Printing (up to 127 characters).	
	<b>Example:</b> EPSON_IPP_Printer	
Location	Enter the name of the printer's physical location (up to 64 characters).	

## **SNMP**

You can use the SNMP menu to set the SNMP information.

Information   Ethernet   TCP/IP Community Read Only Read/Write	Netware MS Network AppleTalk IPP SNMP
Address :	Community :
Address :	Image: Constraint of the second sec
	OK Cancel Help

Items	Explanations
Read Only	The word "public" always appears.
Read/Write	Enter the Read/Write community name (up to 32 characters).
Enable IP Trap 1 or/and 2	Enable or Disable IP trap 1, 2, or both.
Address	Enter the IP address of the server to which the trap is transmitted.
Community	Enter the community name (up to 32 characters).
Enable IPX Trap 1 or/and 2	Enable or Disable IPX trap 1, 2, or both.
Address	Enter Network Address and Node Number (MAC Address) of the server to which the trap is transmitted.
	<i>Format:</i> Network Address: Node Number
	Suppose Network Address is A7E00BB0 (hexadecimal) and Node Number is 000048930000 (hexadecimal). In this case, the address is A7E00BB0:000048930000.
Community	Enter the community name (up to 32 characters).

## About Password

A password is required to configure the print server. When you click OK in the setting dialog box or click the Return to Default button, the Password dialog box appears.

- 1. To set a password or to change the current password, click Change. The Administrator password dialog box appears.
- 2. When you set a password for the first time, leave the Old Password box blank, and enter a password in the New Password box and in the New Password (again) box (up to 20 characters). Then click OK. Passwords are case sensitive.

#### Note:

- □ The same password is used for EpsonNet WinAssist, MacAssist, and WebAssist.
- □ Since the new password becomes effective after the data is sent to the print server, enter the old password immediately after changing the password.
- □ If you forget your password, you need to initialize the print server. See "Initializing the Print Server" on page 235 for instructions.

## Configuring the Print Server Using EpsonNet WinAssist EasySetup

You can also use EpsonNet WinAssist EasySetup to easily configure the print server ready for TCP/IP and Microsoft Network printing within a short time.

#### Note:

- □ The computer to use for the following steps must be in the same segment as the print server.
- □ When you assign an IP address manually, we recommend you use EpsonNet WinAssist to set the subnet mask and default gateway.
- □ If EpsonNet WinAssist is installed on your computer, you can also run EpsonNet WinAssist EasySetup from the Start menu. Click Start, point to Programs or All Programs (Windows XP/Server 2003), and then select EpsonNet WinAssist V4. Click EpsonNet EasySetup to start it. Then go to step 5 below.

Follow the steps below to configure the print server using EpsonNet WinAssist EasySetup.

- 1. Turn on the printer.
- 2. Insert the Software CD-ROM in the CD-ROM drive.
- 3. The EPSON Installation Program starts automatically.

If the Installer dialog box does not appear, double-click SETUP.EXE on the CD-ROM.

- 4. Select EpsonNet WinAssist Easy Setup, and then click 🔜.
- 5. The EpsonNet WinAssist Easy Setup dialog box appears. Click Next.
- 6. Read the License Agreement and then click Next.

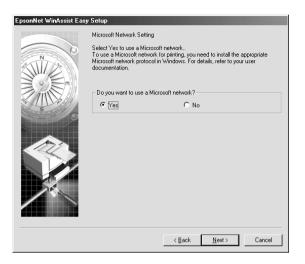
7. Select the target printer and then click Next.

#### Note:

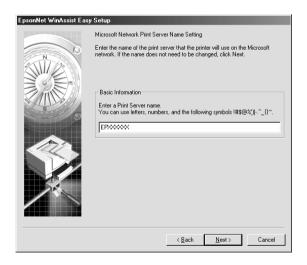
If the same printer model name appears several times on the list, you can identify the printers by checking their MAC addresses, which are found on the status sheet.

EpsonNet WinAssist Easy	Setup		
Provide the second s	Network Interface Selection	on	
2 A A A A A A A A A A A A A A A A A A A	minute, make sure it is turn Then select Refresh from If you want to configure m addresses to tell them apa	vork interfaces to appea u want to configure is n ned on and properly con the View menu. ore than one network in rt. address by printing and	r in the list. ot displayed after about one nected to the network. terface, use their MAC viewing a status sheet. See
1775	Model Name	MAC Address	IP Address
	🐊 AL-DXXXX	>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>	XXXXXXXXXXX
	🎡 Stylus COLOR XXX	**********	
	Stylus Pro XXXX	*********	******
	GI->>>>>	*********	
	1		
	· · · · · · · · · · · · · · · · · · ·		
			<u>R</u> efresh
		< <u>B</u> ack	Next > Cancel

8. Specify whether to use the Microsoft network sharing service, and then click Next. If you select NO, proceed to step 11.



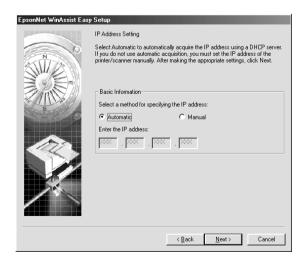
9. Check the print server name. Change it if necessary. Click Next.



10. Specify whether to use TCP/IP, and then click Next. (If you select NO, proceed to step 12.)

EpsonNet WinAssist Easy	Setup		
	TCP/IP Setting		
N A A A	Select Yes to enable TCP/IP printing. To use TCP/IP printing,you must have the TCP/IP protocol installed in Windows. For Windows Me/98/95, you must have EpsonNet Direct Print or EPSON Status Monitor 2 installed. For details, refer to your user documentation.		
2 m	Do you want to use TC	P/IP?	
S	Yes	C No	
		< <u>B</u> ack <u>N</u> ext >	Cancel

11. Select Automatic or Manual. If you select Automatic, DHCP becomes available and assigns an IP address automatically. If you select Manual, enter the IP address. Click Next.



#### Note:

- □ The print server does not have a default IP address. Be sure to assign a valid IP address manually or by using the DHCP server.
- □ If the Dynamic DNS function is not supported, we recommend that you select Manual and enter an IP address. This is because if you select Automatic, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
- □ To use the DHCP server, make sure it is installed on your computer and configured correctly. See your operating system's online help for detailed instructions.
- 12. Check the settings and then click Send. If you have set a password for the print server, the Password dialog box appears. Enter your password (up to 20 characters) and then click OK. Follow the on-screen instructions.



Caution:

It takes two or three minutes to send new settings to the print server. Do not turn off your printer until an on-screen message prompts you to do so.

## EpsonNet MacAssist Configuration Utility

## About EpsonNet MacAssist

EpsonNet MacAssist is a Macintosh-based configuration software for administrators that allows you to configure the print server for TCP/IP, AppleTalk, and IPP.

Note:

*Be sure to use EpsonNet MacAssist included on the Software CD-ROM shipped with this product.* 

## Menu Bar

EpsonNet MacAssist provides the following menus and sub-menus.

File menu:

Close Closes EpsonNet MacAssist.

Quit Quits EpsonNet MacAssist.

Edit menu:

Use it when you edit the contents of the configuration menus.

Device menu:

Configuration
 Configures the print server you have selected.

#### □ Launch Browser

Starts EpsonNet WebAssist to configure the print server you have selected. EpsonNet WebAssist is a utility that runs on a browser.

#### □ Refresh

Updates to the latest information by searching for the available printers again.

#### Timeout Setting

Set the timeout value between 3 and 99 seconds. See "Timeout" on page 92 for more information.

#### □ Network Path Search Setting

Select connections and protocols to use to search for a print server. See "Network path search setting" on page 92 for more information.

# Search Options Configures the options for a search with AppleTalk or IP. See "Search options" on page 93 for more information.

## Timeout

Set the length of time before a timeout occurs (between 3 and 99 seconds). The default value is 5 seconds. A communication error occurs if this time is exceeded. If you set a larger value, it takes more time to search for the network printers. Therefore, change this value only if you prefer.

Select Refresh from the Device menu or restart EpsonNet MacAssist for the settings to take effect.

Timeout Setting	Ξ
Timeout: 5 seconds (3 to 99 seconds)	
Cancel OK	

## Network path search setting

You can select the connection and protocols to use to search for a print server. You can either use all the connection and protocols such as AppleTalk, IP, or USB, or select the favorable ones.

Select Refresh from the Device menu or restart EpsonNet MacAssist for the settings to take effect.

] 📃 Network Path Search Setting 📃 🗏
_ Search Setting
Search the following 🗹 AppleTalk
paths: 🗹 IP
🗹 USB
Search All
Cancel OK

## Search options

#### Search options-AppleTalk

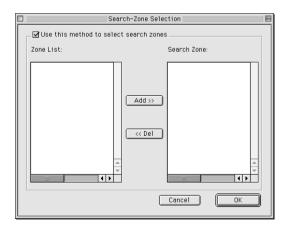
To search for the print servers in other zones, set the specific zones in this option.

Select the Use this method to select search zones check box to search for a print server in a specific zone. Clear the check box if the print server is in the same zone; this saves time in searching.

The zones obtained from the network environment are displayed on the Zone list. The zones to be searched are displayed on the Search Zone list. The maximum number of zones that can be displayed on the Zone and Search Zone lists is 2000.

To add the zone to the Search Zone list, select the zone and then click the Add button. To delete the zone from the Search Zone list, select the zone and then click the Del button.

Select Refresh from the Device menu or restart EpsonNet MacAssist for the settings to take effect.



#### Search options-IP

To search for the print servers in other segments, set the specific network address and subnet mask. The settings you modified on this screen do not affect the search parameters used for EpsonNet MacAssist EasySetup.

Select the Use the search option check box to search for a print server in another segment. Do not select it if the print server you want to configure is located in the same segment.

Enter the network address and subnet mask (valid range 0 to 255). Ask your network administrator for the address. Then click Add. You can add up to 20 addresses. To remove the address from the list, select the address and click Delete.

Select Refresh from the Device menu or restart EpsonNet MacAssist for the settings to take effect.

D IP	Search Option E
Use the search opt	ion
Network Address:	
Subnet Mask:	
Network Address	Subnet Mask
	4
	Add Delete
	Cancel OK

#### Note:

- □ If you try to add an incorrect network address, the "The network address XXX.XXX.XXX.XXX that you entered will be added to the list as XXX.XXX.XXX.X. Add this address?" message appears. Check the correct network address and then click OK to add it.
- □ If you try to add the same network address, the "This network address has already been registered" message appears, which indicates this address cannot be added.

## Details of the Configuration Dialog Box

## Information

The Information menu shows the various print server parameters as described below.

	Network-Card Properties
Information Ethernet TCP/IP	AppleTalk / IPP /
Network-Card Information	
MAC Address:	xxxxxxxxxxx
Hardware Version:	xxx
Software Version:	***
Model Name:	Stylus Pro XXXX
Location:	
	Return to Default
	Return to Default
Path Information	
Search Path:	AppleTalk IP
0	Cancel OK

Parameters	Explanations
MAC Address	Unique hardware address of the print server. You can check the MAC address on a status sheet.
Hardware Version	Hardware version of the print server
Software Version	Software version of the print server
Model Name	Product name of the printer attached to the print server
Location	Enter the location of the print server.

Return to Default button	Resets all configuration settings of the print server to their defaults.	
Search Path	Protocol used to search for the print server	
ОК	Updates the settings.	
Cancel	Cancels any changes.	

## Ethernet

To change the Ethernet setting, use the following screen.

	Network-Card Properties 🛛 🗧
∫ Information √ Ethernet √ TCP/IP √ AppleTalk √ IPP ∖	
Link Speed & Duplex Mode	
Link Speed & Duplex Mode	Automatic 🔷
0	Cancel OK

Items	Explanations
Link Speed & Duplex Mode	Select an appropriate Ethernet speed and duplex setting. Normally, Automatic can be selected. If you select a setting other than Automatic, make sure the setting corresponds to the type of hub you are using.

## TCP/IP

To use the printer in the TCP/IP environment, configure the print server using the following screen.

Net	work-Card Properties	
Information Ethernet TCP/IP AppleTalk / IPP		
Automatic 🜩		
🗌 Set using PING		
Set using Automatic Private IP Address	sing (APIPA)	
IP Address:	×××××××××	
Subnet Mask:	xxxxxxxxxxx	
Default Gateway:	xxxxxxxxxxx	
	Extended Settings	
0	Cancel OK	

Items	Explanations
Method for specifying the IP address	Select a method for specifying an IP address. When you select Automatic, an IP address, subnet mask, and default gateway are automatically assigned by the DHCP server.
	<b>Note:</b> If the Dynamic DNS function is not supported, we recommend that you select Manual and then enter an IP address. This is because if you select Automatic, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
Set using PING	Select this check box when setting the IP address using the ping command. When not using the ping command, clear this check box.

Set using Automatic Private IP Addressing (APIPA)	Assigns a private IP address automatically even there is no DHCP server on your network. It is dimmed if this function is not supported.
IP Address	Enter an IP address for the print server. Be sure that the IP address is unique and does not conflict with any other device on the network.
Subnet Mask	Enter the subnet mask of the IP address.
Default Gateway	Enter the gateway address. If there is a server or a router that functions as a gateway, enter the IP address of the server or the router. If there is no gateway, leave the default values.
Extended Settings	Click this button for extended settings such as Dynamic DNS and Universal Plug and Play. If both functions are not supported, this button is dimmed.

#### Extended Settings dialog box

When you click the Extended Settings button on the TCP/IP menu, the following dialog box appears.

	Extended Settings	
DNS Server Address Settings		
Acquire DNS server address automatically		
DNS Server Addresses:		
	Add Edit Del	
_ Host Name and Domain Name	Setting	
🗌 Acquire host name and d	omain name automatically	
Host Name:	Stylus_Pro_XXXX-xxxxx	
Domain Name:		
Register the network inte	erface's address to DNS server	
Register directly to D	NS server	
Universal Plug and Play Settings		
Use Universal Plug and Play		
Device Name:	Stylus_Pro_XXXX-xxxxxx	
	Cancel OK	

Items	Explanations
Acquire DNS server address automatically	Select this check box if you want to acquire the DNS server address using the DHCP server. To enter the DNS server address manually, clear this check box. If the DNS is not supported, this check box is dimmed.
DNS Server Address	Displays the DNS server address. To enter the DNS server address, click the Add button.
	To edit the DNS server address, select the address and then click the Edit button.
	To delete the DNS server address, select the address and then click the Delete button.
Acquire host name and domain name automatically	Select this check box if you want to acquire a host name and domain name from the DHCP server.
Host Name	Enter the host name supported by the Dynamic DNS (between 2 and 63 characters). The total number of characters of the host name and the domain name must not exceed 251.
Domain Name	Leave it blank or enter two or more characters of the domain name supported by Dynamic DNS. The total number of characters of the host name and the domain name must not exceed 251.
Register the network interface's address to DNS server	Select this check box if you want to register the host name and the domain name to the DNS server through the DHCP server that supports Dynamic DNS.
Register directly to DNS server	Select this check box if you want to register the host name and the domain name directly on the DNS server.
Use Universal Plug and Play	Enables or disables Universal Plug and Play. It is dimmed if this function is not supported.
Device Name	Enter the device name for Universal Plug and Play (between 2 and 63 characters).

## AppleTalk

To use the printer in the AppleTalk environment, configure the print server using the following screen.

	Network-Card Properties
/ Information / Ethernet / TCP/	/IP \/ AppleTalk \/ IPP \
Use AppleTalk	
Basic Information	
Printer Name:	Stylus_Pro_XXXXX
Zone Name:	*
Entity Type:	Manual Input   EPSONLQ2
Method of specifying the I	
Network number f	for manual mode: 65534 0-65534
0	Cancel OK

Items	Explanations
Use AppleTalk	Select this box when using AppleTalk.
Printer Name	Enter the name of the printer (up to 32 characters).
Zone Name	Select or enter the network zone name (up to 32 characters).
	To have the zone selected automatically, select Automatic to specify the network number and select an asterisk (*) in this text box.
	To enter manually, select Manual Input and then enter the zone name in the text box.

Items	Explanations
Entity Type	Displays the printer's entity type. Do not change the entity type unless "epson" appears. If "epson" appears, select an entity type by clicking the Entity Setting button to match your printer.
	Impact Dot Matrix (24 pin): EPSONLQ2
Method of specifying the network number	Select the method for acquiring the network number. Automatic is usually preferred.
Network number for manual mode	Enter a value between 0 and 65534 to specify the network number, if you have selected Manual.

## IPP

To use the printer in the IPP environment, configure the print server using the following screen.

۵	Network-Card Properties		
	/ Information / Ethernet / TCP/IP / AppleTalk / IPP		
	Basic Information		
	IPP URL:	http://xxxxxxxxx:631/EPS0N_IPP_Printer	
	Printer Name:	EPSON_IPP_Printer	
	Location:		
	Location.		
	0	Cancel OK	
1			

Items	Explanations
IPP URL	Displays the printer's URL for Internet Printing.
	<i>Format:</i> http://IP address of print server:631/ printer name set below
	Example: http://192.168.100.201:631/EPSON_IPP_Printer
Printer Name	Enter the name of the printer to use for Internet Printing (up to 127 characters).
	<b>Example:</b> EPSON_IPP_Printer
Location	Enter the name of the printer's physical location (up to 64 characters).

## About Password

A password is required to configure the print server. When you click OK in the setting dialog box or click Return to Default, the Password dialog box appears.

- 1. To set the password or to change the current password, click Change Password. The Change Password dialog box appears.
- 2. When you set a password for the first time, leave the Current Password box blank, and enter a password in the New Password box and in the New Password (again) box (up to 20 characters). Then click OK. Passwords are case sensitive.

#### Note:

- □ The same password is used for EpsonNet WinAssist, MacAssist, and WebAssist.
- □ Since the new password takes effect after the data is sent to the print server, enter the old password immediately after changing the password.
- □ If you forget your password, you need to initialize the print server. See "Initializing the Print Server" on page 235 for instructions.

## Configuring the Print Server Using EpsonNet MacAssist EasySetup

You can also use EpsonNet MacAssist EasySetup to easily configure the print server ready for TCP/IP and AppleTalk printing within a short time.

#### Note:

□ *Make sure the printer is turned on.* 

- □ The computer to use for the following steps must be in the same segment as the print server.
- □ When you assign an IP address manually, we recommend you use EpsonNet MacAssist to set the subnet mask and default gateway.

Follow the steps below to configure the print server using EpsonNet MacAssist EasySetup.

- 1. Double-click the MacAssistxxx folder, and then double-click the EpsonNet MacAssist EasySetup icon.
- 2. The EpsonNet MacAssist Easy Setup dialog box appears. Click Next.
- 3. Read the License Agreement and then click Next.
- 4. Select the target printer and then click Next.

#### Note:

If the same printer model name appears several times on the list, you can identify the printers by checking their MAC addresses, which are found on the status sheet.

EpsonNet	MacAssist Easy S	etup	
Eps univer warks sist Easy setup      Step 1: Network Interface Selection      Select the appropriate network Interface, then click Next. It takes a moment for network     Interfaces to appear in the list.      If the network Interface you want to configure is not displayed after about one minute, make     sure it is turned on and properly connected to the network. Then select Refresh from the Yiew     menu.      If you want to configure more than one network Interface, use their MAC addresses to tell them     apart. You can confirm the YAC address by printing and viewing a status shet. See your user     documentation for information about printing a status shet.			
Model Name AL-C>>>>> Stylue COLOR >>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>>	MAC Address	IP Address	Printer Name AL-CXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXX
			Refresh
	Back	Next	Cancel

5. Change the printer name if necessary. Click Next.

	EpsonNet MacAssist Easy Setup
	Step2: Printer Name Setting The printer name you set will be the name shown in the Chooser when selecting a printer.
	Printer Name Enter the printer name: Stylus_Pro_XXXX *******

6. Specify whether to use TCP/IP, and then click Next. (If you select NO, proceed to step 8.)

EpsonNet MacAssist Easy Setup
EpsonNet MacAssist Easy Setup         Step3: TCP/IP Settings         Select Yes to enable TCP/IP.         Do you want to use TCP/IP?             Yes          Q No
Back Next Cancel

7. Select a method for specifying the IP address. If you select Automatic, DHCP becomes available and assigns an IP address automatically. If you select Manual, enter the IP address. Click Next.

	EpsonNet MacAssist Easy Setup
	Step4: IP Address Setting Select Automatic to automatically acquire the IP address using a DHCP server. If you do not use automatic acquisition, you must set the IP address of the printer/scanner manually. After making the appropriate settings, click Next.
	Basic Information Select a method for specifying the IP address. Automatic Hanual Enter the IP address:

#### Note:

- □ The print server does not have a default IP address. Be sure to assign a valid IP address manually or by using the DHCP server.
- □ If the Dynamic DNS function is not supported, we recommend that you select Manual and enter an IP address. This is because if you select Automatic, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
- □ To use the DHCP server, make sure it is installed on your computer and configured correctly. See your operating system's online help for detailed instructions.
- 8. Check the settings and then click Send. If you have set a password for the print server, the Password dialog box appears. Enter your password (up to 20 characters) and then click OK. Follow the on-screen instructions.



Caution:

It takes two or three minutes to send new settings to the print server. Do not turn off your printer until an on-screen message prompts you to do so.

# Chapter 5 Installing the Printer Driver

To print to the network printer, you need to install the printer driver on the computer. See the section in this chapter appropriate for your operating system.

## Windows Me/98/95

For Windows Me/98/95, the printer driver installation procedure differs depending on the printing method you prefer.

## LPR printing

Since Windows Me/98/95 does not support LPR, standard TCP/IP printing cannot be used. However, you can print via TCP/IP using the EpsonNet Direct Print utility included on the Software CD-ROM. First, install EpsonNet Direct Print. Then, install the printer driver. See "About EpsonNet Direct Print" on page 181 for more details.

## Internet printing (Windows 98/95)

Internet printing is possible by using the EpsonNet Internet Print utility included on the Software CD-ROM. First, install EpsonNet Internet Print. Then, install the printer driver and set the printer port. See "About EpsonNet Internet Print" on page 196 for more details.

# Internet printing (Windows Me)

#### Installing the IPP client

The IPP client must be installed on your computer. Follow the steps below to install it.

- 1. Insert the Windows Me CD-ROM.
- 2. Select the add-ons folder, and then select the IPP folder.
- 3. Double-click wpnpins.exe. Then follow the on-screen instructions.
- 4. Click OK to restart your computer.

#### Setting up the printer

Connect your computer to a printer through IPP.

- 1. Click Start, point to Settings, and then select Printers.
- 2. Click Add Printer, and then click Next.
- 3. Click Network Printer, and then click Next.
- 4. Type the URL of the printer, and then click Next.

http://IP address of print server:631/printer name

Example: http://192.168.100.201:631/EPSON\_IPP\_Printer

5. See "Installing a printer driver" on page 111 to install the printer driver.

### Microsoft Network Shared printing

- 1. Click Start, point to Settings, and then select Printers.
- 2. Double-click Add Printer in the Printer window.
- 3. Select the Network Printer radio button and then click Next.
- 4. Click Browse, and then select the network path from the list. If you cannot browse, enter the following in the Network path or queue name box.

\\NetBIOS name of print server\ Device name of print server

Add Printer Wizard	
	Type the network path or the queue name of your printer. If you don't know its name, click Browse to view available network printers. Network path or queue name:
	Browse Do you print from MS-DOS-based programs? C Yes I No
	< Back Next > Cancel

- 5. The Add Printer wizard appears. Click Next.
- 6. See "Installing a printer driver" on page 111 to install the printer driver.

### Installing a printer driver

- 1. Insert the Software CD-ROM shipped with the printer.
- 2. Close the EPSON Installation Program screen if it appears.
- 3. Click the Have Disk button. The Install From Disk dialog box appears.
- 4. Click Browse.
- 5. Select the CD-ROM drive for Drives, and then double-click the folder named after your operating system. Click OK.
- 6. Click OK in the Install From Disk dialog box.
- 7. Select the model name of the printer, and then click Next.

#### Note:

If the Add Printer wizard prompts you to select either Keep existing driver or Replace existing driver, be sure to select the Replace existing driver radio button.

8. Click Finish and then follow the on-screen instructions to complete the setup.

When you print using Microsoft Network Shared printing in the Windows XP/Server 2003/2000/NT environment, see "Using the NET USE command" on page 112 for more details.

### Using the NET USE command

If you are running Windows XP/Server 2003/2000/NT and using NetBIOS to connect to the printer, we recommend that you use the NET USE command, as follows:

- 1. Right-click the Network Neighborhood icon or My Network Places icon and then select Properties.
- 2. Check that Client for Microsoft Networks is in the Components list. If it is not installed, click Add to install it.
- 3. Run the command prompt and then enter the following command.

**NET USE** *printer port:* \\NetBIOS name of print server\Device name of print server

#### Selecting the port

- 1. Click Start, point to Settings, and then select Printers.
- 2. Right-click the printer icon and select Properties.
- 3. Click the Details tab and select the port you have set using the NET USE command.

# Windows XP

For Windows XP, the printer driver installation procedure differs depending on the printing method you prefer.

# LPR printing

#### Note:

*If you are using EpsonNet Direct Print, the setup procedure is different. See "About EpsonNet Direct Print" on page 181 for details.* 

- 1. Click Start, click Control Panel, click Printers and Other Hardware, and then click Printers and Faxes.
- 2. Under Printer Tasks, click Add a printer to start the Add Printer wizard, and then click Next.
- 3. Click Local printer attached to this computer, clear the Automatically detect and install my Plug and Play printer check box, and then click Next.

#### Note:

You must clear the Automatically detect and install my Plug and Play printer check box because the printer is attached directly to the network, not to a Windows XP computer.

Add Printer Wizard
Local or Network Printer The wizard needs to know which type of printer to set up.
Select the option that describes the printer you want to use:
Automatically detect and install my Plug and Play printer A network printer, or a printer attached to another computer
To set up a network printer that is not attached to a print server, use the "Local printer" option.
< <u>B</u> ack <u>Next</u> Cancel

4. Select the Create a new port radio button, and then select Standard TCP/IP Port from the list. Click Next.

Add Printer Wizard	
Select a Printer Port Computers communicate with printers through ports.	
Select the port you want your printer to use. If the port is not listed, you can create a new port.	
O Use the following port: LPT1: (Recommended Printer Port)	
Note: Most computers use the LPT1: port to communicate with a local printer. The connector for this port should look something like this:	
<u>C</u> reate a new port: Type of port: <u>Standard TCP/IP Port</u>	
< <u>B</u> ack <u>N</u> ext > Cancel	

5. Enter the IP address of the print server and then click Next.

Add Standard TCP/IP Printer I	Port Wizard	×
Add Port For which device do you want	to add a port?	
Enter the Printer Name or IP a	ddress, and a port name for the desired device.	
Printer Name or IP <u>A</u> ddress:		
Port Name:		
	< <u>B</u> ack <u>N</u> ext>	Cancel

6. If an error occurs, the following dialog box appears. Select the Standard radio button and then select EPSON Network Printer. Click Next.

Add Standard T(	CP/IP Printer Port Wizard
	t Information Required could not be identified.
<ol> <li>The device is</li> <li>The network</li> <li>The device is</li> <li>The address</li> <li>If you think the ar</li> </ol>	is connected. s properly configured. on the previous page is correct. ddress is not correct, click Back to return to the previous page. Then correct perform another search on the network. If you are sure the address is correct,
Device Type	
⊚ <u>S</u> tandard	EPSON Network Printer
◯ <u>C</u> ustom	Settings
	< <u>₿</u> ack <u>N</u> ext > Cancel

- 7. Click Finish.
- 8. See "Installing a printer driver" on page 117 to install the printer driver.

### Internet printing

- 1. Click Start, click Control Panel, click Printers and Other Hardware, and then click Printers and Faxes.
- 2. Under Printer Tasks, click Add a printer to start the Add Printer wizard, and then click Next.
- 3. Click A network printer, or a printer attached to another computer, and then click Next.
- 4. Select the Connect to a printer on the Internet or on a home or office network radio button.
- 5. Enter the URL of the target printer using the format below. The URL must be the same URL you set on EpsonNet WinAssist/WebAssist's IPP configuration page.

http://IP address of printer:631/Printer name

Example: http://192.168.100.201:631/EPSON\_IPP\_Printer

Add Printer Wizard	
Specify a Printer If you don't know the name or address of the printer, you can search for a printer that meets your needs.	
What printer do you want to connect to?	
O Browse for a printer	
O Connect to this printer (or to browse for a printer, select this option and click Next):	
Name:	
Example: \\server\printer	
Onect to a printer on the Internet or on a home or office network:	
URL:	
Example: http://server/printers/myprinter/.printer	
< <u>B</u> ack Next> Cancel	

6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 117 if necessary.

### Microsoft Network Shared printing

- 1. Click Start, click Control Panel, click Printers and Other Hardware, and then click Printers and Faxes.
- 2. Under Printer Tasks, click Add a printer to start the Add Printer wizard, and then click Next.
- 3. Click A network printer, or a printer attached to another computer, and then click Next.
- 4. Select the Browse for a printer radio button, and then click Next.
- 5. Enter the following in the Printer box or select the printer you want to use from the Shared printers list box, and then click Next.

\\NetBIOS name of print server\Device name of print server

6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 117 if necessary.

#### Installing a printer driver

- 1. Insert the Software CD-ROM shipped with the printer.
- 2. Close the EPSON Installation Program screen if it appears.
- 3. Click the Have Disk button. The Install From Disk dialog box appears.
- 4. Click Browse.
- 5. Select the CD-ROM drive for Drives, and double-click the WinXP\_2K or Win2000 folder. Click Open.

- 6. Click OK in the Install From Disk dialog box.
- 7. Select the model name of the printer, and then click Next.

**Note:** If the Add Printer wizard prompts you to select either Keep existing driver or Replace existing driver, be sure to select the Replace existing driver radio button.

8. Click Finish and then follow the on-screen instructions to complete the setup.

When you print using Microsoft Network Shared printing in the Windows XP/Server 2003/2000/NT environment, see "Using the NET USE command" on page 118 for more details.

### Using the NET USE command

If you are running Windows XP/Server 2003/2000/NT and using NetBIOS to connect to the printer, we recommend that you use the NET USE command, as follows:

- 1. Click Start, click Control Panel, click Network and Internet Connections, and then select Network Connections.
- 2. Under LAN or High-Speed Internet, click the Local Area Connection icon.
- 3. Under Network Tasks, click Change settings of this connection.
- 4. Check that Client for Microsoft Networks is installed. If necessary, click Install to install it.
- 5. Run the command prompt and then enter the following command.

**NET USE** *printer port:* \\NetBIOS name of print server\Device name of print server

#### Selecting the port

- 1. Click Start, click Control Panel, click Printers and Other Hardware, and then click Printers and Faxes.
- 2. Right-click the printer icon and then select Properties.
- 3. Click the Ports tab and then select the port you have set using the NET USE command.

# Windows Server 2003

For Windows Server 2003, the printer driver installation procedure differs depending on the printing method you prefer.

# LPR printing

Note:

*If you are using EpsonNet Direct Print, the setup procedure is different. See "About EpsonNet Direct Print" on page 181 for details.* 

- 1. Click Start, and then select Printers and Faxes.
- 2. Double-click the Add Printer icon to start the Add Printer wizard, and then click Next.
- 3. Click Local printer attached to this computer, clear the Automatically detect and install my Plug and Play printer check box, and then click Next.

#### Note:

You must clear the Automatically detect and install my Plug and Play printer check box because the printer is attached directly to the network, not to a computer.

Add Printer Wizard
Local or Network Printer The wizard needs to know which type of printer to set up.
Select the option that describes the printer you want to use:
C Local printer attached to this computer
Automatically detect and install my Plug and Play printer
C A network printer, or a printer attached to another computer
To set up a network printer that is not attached to a print server, use the "Local printer" option.
< <u>B</u> ack <u>N</u> ext > Cancel

4. Select the Create a new port radio button, and then select Standard TCP/IP Port from the list. Click Next.

Selec	er Wizard t a Printer Port mputers communicate with printers through ports.
	elect the port you want your printer to use. If the port is not listed, you can create a w port.
C	Use the following port: LPT1: (Recommended Printer Port)
	Note: Most computers use the LPT1: port to communicate with a local printer. The connector for this port should look something like this:
•	<u>C</u> reate a new port: Type of port: Standard TCP/IP Port ▼
	For more information about creating printer ports, see Printer Help.
	< <u>B</u> ack <u>N</u> ext > Cancel

5. When Add Standard TCP/IP Printer Port Wizard dialog box appears, click Next.

6. Enter the IP address of the print server and then click Next.

Add Standard TCP/IP Printer Port	Wizard	
Add Port For which device do you want	to add a port?	
Enter the Printer Name or IP ad	dress, and a port name for the desired device.	
Printer Name or IP <u>A</u> ddress:		
Port Name:		
	< <u>B</u> ack <u>N</u> ext >	Cancel

7. If an error occurs, the following dialog box appears. Select the Standard radio button and then select EPSON Network Printer. Click Next.

Add Standard TCP/IP Printer Port Wizard
Additional Port Information Required The device could not be identified.
The device is not found on the network. Be sure that:          1. The device is properly configured.         3. The device is properly configured.         4. The address on the previous page is correct.         If you think the address is not correct, click Back to return to the previous page. Then correct the address and perform another search on the network. If you are sure the address is correct, select the device type below.         Device Type            © Standard             EPSDN Network Printer          Standard
< <u>B</u> ack <u>N</u> ext> Cancel

- 8. Click Finish.
- 9. See "Installing a printer driver" on page 125 to install the printer driver.

# Internet printing

- 1. Click Start, and then select Printers and Faxes.
- 2. Double-click the Add Printer icon to start the Add Printer wizard, and then click Next.
- 3. Select A network printer, or a printer attached to another computer, and then click Next.
- 4. Select the Connect to a printer on the Internet or on a home or office network radio button.
- 5. Enter the URL of the target printer using the format below. The URL must be the same URL you set on EpsonNet WinAssist/WebAssist's IPP configuration page.

http://IP address of printer:631/Printer name

#### Example: http://192.168.100.201:631/EPSON\_IPP\_Printer

Add Printer Wizard
Specify a Printer If you don't know the name or address of the printer, you can search for a printer that meets your needs.
What printer do you want to connect to?
C Browse for a printer
C Connect to this printer (or to browse for a printer, select this option and click Next): Name:
, Example: \\server\printer
Connect to a printer on the Internet or on a home or office network:     URL:
Example: http://server/printers/myprinter/.printer
< <u>B</u> ack <u>N</u> ext> Cancel

6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 125 if necessary.

#### Microsoft Network Shared printing

- 1. Click Start, and then select Printers and Faxes.
- 2. Double-click the Add Printer icon to start the Add Printer wizard, and then click Next.
- 3. Click A network printer, or a printer attached to another computer, and then click Next.
- 4. Select the Browse for a printer radio button, and then click Next.

5. Enter the following in the Printer box or select the printer you want to use from the Shared printers list box. Click Next.

\\NetBIOS name of print server\Device name of print server

6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 125 if necessary.

#### Installing a printer driver

- 1. Insert the Software CD-ROM shipped with the printer.
- 2. Close the EPSON Installation Program screen if it appears.
- 3. Click the Have Disk button. The Install From Disk dialog box appears.
- 4. Click Browse.
- 5. Select the CD-ROM drive for Drives, and then double-click the WinXP\_2K or Win2000 folder. Click Open.
- 6. Click OK in the Install From Disk dialog box.
- 7. Select the model name of the printer, and then click Next.

#### Note:

If the Add Printer wizard prompts you to select either Keep existing driver or Replace existing driver, be sure to select the Replace existing driver radio button.

8. Click Finish and then follow the on-screen instructions to complete the setup.

When you print using Microsoft Network Shared printing in the Windows XP/Server 2003/2000/NT environment, see "Using the NET USE command" on page 126 for more details.

### Using the NET USE command

If you are running Windows XP/Server 2003/2000/NT and using NetBIOS to connect to the printer, we recommend that you use the NET USE command, as follows:

- 1. Click Start, point to Control Panel, and then select Network Connections. Click Local Area Connections.
- 2. Click the Properties button.
- 3. Check that Client for Microsoft Networks is installed. If necessary, click Install to install it.
- 4. Run the command prompt and then enter the following command.

**NET USE** *printer port:* \\NetBIOS name of print server\Device name of print server

#### Selecting the port

- 1. Click Start, and then select Printers and Faxes.
- 2. Right-click the printer icon and then select Properties.
- 3. Click the Ports tab and then select the port you have set using the NET USE command.

### Windows 2000

For Windows 2000, the printer driver installation procedure differs depending on the printing method you prefer.

### LPR printing

#### Note:

*If you are using EpsonNet Direct Print, the setup procedure is different. See "About EpsonNet Direct Print" on page 181 for details.* 

- 1. Click Start, point to Settings, and then select Printers.
- 2. Double-click Add Printer to start the Add Printer wizard, and then click Next.
- 3. Click Local printer, clear the Automatically detect and install my Plug and Play printer check box, and then click Next.

#### Note:

You must clear the Automatically detect and install my Plug and Play printer check box because the printer is attached directly to the network, not to a Windows 2000 computer.

Add Printer Wizard
Local or Network Printer Is the printer attached to your computer?
If the printer is directly attached to your computer, click Local printer. If it is attached to another computer, or directly to the network, click Network printer. Coloral printer Automatically detect and install my Plug and Play printer Network printer
< <u>B</u> ack <u>N</u> ext > Cancel

4. Select the Create a new port radio button, and then select Standard TCP/IP Port from the list. Click Next.

Add Printer Wizard				
Select the Printer Port Computers communicate with printers through ports.				
Select the port you want your printer to use. If the port is not listed, you can create a new port.				
C Use the following port:				
Port Description	Printer	<b>_</b>		
LPT1: Printer Port	EPSON AL-CXXXX Advance			
LPT2: Printer Port				
LPT3: Printer Port		<u> </u>		
COM1: Serial Port				
COM2: Serial Port		<b>T</b>		
,				
Note: Most computers use the LPT1: port to communicate with a local printer.				
Create a new port:				
Type: Standard TCP/IP Port				
	< <u>B</u> ack <u>N</u> ext >	Cancel		

5. Enter the IP address of the print server and then click Next.

Add Standard TCP/IP Printer Port Wizard		
Add Port For which device do you want	to add a port?	
Enter the Printer Name or IP address, and a port name for the desired device.		
Printer Name or IP <u>A</u> ddress:	xxx. xxx. xxx. xxx	
Port Name:	xxx. xxx. xxx. xxx	
	< <u>B</u> ack <u>N</u> ext >	Cancel

6. If an error occurs, the following dialog box appears. Select the Standard radio button and then select EPSON Network Printer. Click Next.

Add Standard TCP/IP Printer Port Wizard		
Additional Port Information Required The device could not be identified.		
The device is not found on the network. Be sure that:          1. The device is turned on.         2. The network is connected.         3. The device is properly configured.         4. The address on the previous page is correct.         If you think the address is not correct, click Back to return to the previous page. Then correct the address and perform another search on the network. If you are sure the address is correct, select the device type below.         Device Type            © Standard EPSON Network Printer             © Lustom Egtings		
< <u>B</u> ack <u>N</u> ext> Cancel		

- 7. Click Finish.
- 8. See "Installing a printer driver" on page 131 to install the printer driver.

### Internet printing

- 1. Click Start, point to Settings, and then select Printers.
- 2. Double-click Add Printer to start the Add Printer wizard, and then click Next.
- 3. Select the Network printer radio button and then click Next.
- 4. Select the Connect to a printer on the Internet or on your intranet radio button.

5. Enter the URL of the target printer using the format below. The URL must be the same URL you set on EpsonNet WinAssist/WebAssist's IPP configuration page.

http://IP address of printer:631/Printer name

Example: http://192.168.100.201:631/EPSON\_IPP\_Printer

6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 131 if necessary.

### Microsoft Network Shared printing

- 1. Click Start, point to Settings, and then select Printers.
- 2. Double-click Add Printer to start the Add Printer wizard, and then click Next.
- 3. Select the Network printer radio button and then click Next.
- 4. Select the Type the printer name, or click Next to browse for a printer radio button.
- 5. Enter the following in the Name box or click Next to browse for a printer.

\\NetBIOS name of print server\Device name of print server

6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 131 if necessary.

### Installing a printer driver

- 1. Insert the Software CD-ROM shipped with the printer.
- 2. Close the EPSON Installation Program screen if it appears.
- 3. Click the Have Disk button. The Install From Disk dialog box appears.
- 4. Click Browse.
- 5. Select the CD-ROM drive for Drives, and then double-click the WinXP\_2K or Win2000 folder. Click Open.
- 6. Click OK in the Install From Disk dialog box.
- 7. Select the model name of the printer, and then click Next.

#### Note:

If the Add Printer wizard prompts you to select either Keep existing driver or Replace existing driver, be sure to select the Replace existing driver radio button.

8. Click Finish and then follow the on-screen instructions to complete the setup.

When you print using Microsoft Network Shared printing in the Windows XP/Server 2003/2000/NT environment, see "Using the NET USE command" on page 132 for more details.

### Using the NET USE command

If you are running Windows XP/Server 2003/2000/NT and using NetBIOS to connect to the printer, we recommend that you use the NET USE command, as follows:

- 1. Right-click the My Network Places icon and then select Properties.
- 2. Right-click the Local Area Connections icon and then select Properties.
- 3. Check that Client for Microsoft Networks is in the Components list. If necessary, click Install to install it.
- 4. Run the command prompt and then enter the following command.

**NET USE** *printer port:* \\NetBIOS name of print server\Device name of print server

#### Selecting the port

- 1. Click Start, point to Settings, and then select Printers.
- 2. Right-click the printer icon and then select Properties.
- 3. Click the Ports tab and then select the port you have set using the NET USE command.

# Windows NT 4.0

For Windows NT 4.0, the printer driver installation procedure differs depending on the printing method you prefer.

#### LPR printing

#### Note:

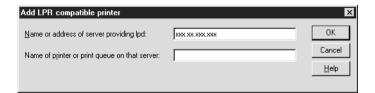
*If you are using EpsonNet Direct Print, the setup procedure is different. See "About EpsonNet Direct Print" on page 181 for details.* 

- 1. Click Start, point to Settings, and then select Printers.
- 2. Double-click the Add Printers icon.
- 3. Select the My Computer radio button, and then click Next.
- 4. Click Add Port in the Add Printer wizard dialog box.
- 5. Select LPR Port from the Available Printer Port list, and then click New Port.

#### Note:

You cannot use the Lexmark TCP/IP Network Port with this print server.

6. Enter the IP address of the print server in the first text box and the printer name in the second text box. Click OK.



7. In the Printer Ports dialog box, click Close.

- 8. In the Add Printer Wizard dialog box, click Next.
- 9. See "Installing a printer driver" on page 135 to install the printer driver.

# Internet printing

Internet printing is possible by using the EpsonNet Internet Print utility included on the Software CD-ROM. First, install EpsonNet Internet Print. Then, install the printer driver and set the printer port. See "About EpsonNet Internet Print" on page 196 for more details.

# Microsoft Network Shared printing

- 1. Click Start, point to Settings, and then select Printers.
- 2. Double-click Add Printer.
- 3. Select the Network printer server radio button and then click Next. The Connect to Printer dialog box appears.
- 4. Select the printer you want to configure from the Shared Printers list. If you cannot select the printer, enter the following in the Printer box:

\\NetBIOS name of print server\Device name of print server

- 5. Click OK.
- 6. Follow the on-screen instructions to set up the printer. See "Installing a printer driver" on page 135 if necessary.

### Installing a printer driver

- 1. Insert the Software CD-ROM shipped with the printer.
- 2. Close the EPSON Installation Program screen if it appears.
- 3. Click the Have Disk button. The Install From Disk dialog box appears.
- 4. Click Browse.
- 5. Select the CD-ROM drive for Drives, and then double-click the WINNT40 folder. Click Open.
- 6. Click OK in the Install From Disk dialog box.
- 7. Select the model name of the printer, and then click Next.

#### Note:

- Announce the share name to your clients so that they know the share name of the printer they want to use.
- □ If the Add Printer wizard prompts you to select either Keep existing driver or Replace existing driver, be sure to select the Replace existing driver radio button.
- 8. Click Finish and then follow the on-screen instructions to complete the setup.

When you print using Microsoft Network Shared printing in the Windows XP/Server 2003/2000/NT environment, see "Using the NET USE command" on page 136 for more details.

### Using the NET USE command

If you are running Windows XP/Server 2003/2000/NT and using NetBIOS to connect to the print server, we recommend that you use the NET USE command, as follows:

- 1. Check that the following services are installed. Right-click the Network Neighborhood icon on the desktop and select Properties. Click the Services tab and check that Server or Workstation is listed.
- 2. If it is not installed, click Add.
- 3. Run the command prompt and enter the following command.

**NET USE** *printer port:* \\NetBIOS name of print server\Device name of print server

Selecting the port

- 1. Click Start, point to Settings, and then select Printers.
- 2. Right-click the printer icon and then select Properties.
- 3. Click the Ports tab and then select the port you have set using the NET USE command.

# Macintosh

Follow the steps below to set a printer.

Note:

Make sure that the printer driver is installed on your Macintosh before following the steps below. See the manual shipped with your printer for instruction on how to install the printer driver.

# Mac OS 8.x to 9.x

#### AppleTalk printing

- 1. Open Chooser from the Apple menu.
- 2. Click the printer icon.
- 3. Select the zone containing the printer.
- 4. Select the printer name from the list.
- 5. Make sure AppleTalk is active.
- 6. Close Chooser.

# Mac OS X

#### AppleTalk printing

- 1. Open the Application folder.
- 2. Open the Utilities folder.
- 3. Open Print Center, and then click Add.
- 4. Select AppleTalk from the drop down list.
- 5. Select the zone from the drop down list.
- 6. Select the printer name from the list.
- 7. Click Add.

#### TCP/IP printing

- 1. Open the Application folder.
- 2. Open the Utilities folder.
- 3. Open Print Center, and then click Add.
- 4. Select EPSON TCP/IP from the drop down list.
- 5. Select the printer model from the list.
- 6. Click Add.

#### Rendezvous printing

- 1. Open the Application folder.
- 2. Open the Utilities folder.
- 3. Open Print Center, and then click Add.
- 4. Select Rendezvous from the drop-down list.
- 5. Click the machine and then change the printer model to Epson.
- 6. Select the model name, and then click Add. The Rendezvous printer appears.
- 7. Click the printer and then click the Make Default button to set the printer as the default printer.

Now the printer is ready to print.

# OS/2

This section explains how to configure and use the print server with an IBM OS/2 System, which includes OS/2 Warp 3 and 4 (OS/2 Warp Connect and OS/2 Warp Server).

# LPR printing

1. Double-click the OS/2 system folder, then the System Setup folder, and then double-click the TCP/IP Configuration icon.

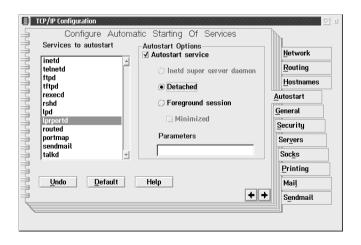


2. Click the Printing tab.

3. Enter the IP address of the print server in the Remote print server box and the name of the remote print server's printer in the second text box. Enter a value of 1 or greater in the Maximum number of LPD ports box.

TCP/IP Configuration	<u> </u>
Configure Printing Services	h.,
1	
Ę.	Network
	Routing
Remote print server xxxxxxxxx	Hostnames
3	Autostart
Remote print server's printer AL-CXXXX	<u>G</u> eneral
₹	Security
Remote print server xxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxxx	Servers
	Socks
	Printing
Lindo Default Help	Mail
₹	S <u>e</u> ndmail
	ـــــــــــــــــــــــــــــــــــــ

- 4. Click the Autostart tab.
- 5. Select lprportd from the Services to autostart list. Check the Autostart service check box, and select the Detached radio button.



6. Save the settings you made in the TCP/IP Configuration dialog box, and restart your computer.

#### Setting up your printer

- 1. Double-click Template from the OS/2 System folder.
- 2. Drag Printer to your desktop to create a printer.
- 3. Double-click the Printer icon.
- 4. Select Properties from the control menu, then click the Output Port tab.

<u>Printer driver</u> <u>Output</u>	Dut Port Queue options	Print options	Text F
Output port		1.1	
	¢ ¢ ¢		
LPT1 LPT2 LPT3 (	:0M1 COM2 COM3		
	y ce		
	E\LPD1 \PIPE\LPD2		
_£ _£	_B _B	-	
🔲 Output to <u>f</u> ile			
Install new port	Update port dr	iver	

5. From the Output Port list box, select one from \PIPE\LPD0 to \PIPE\LPDn (where n is the maximum number of LPD ports). The \PIPE\LPD -Settings dialog box will appear. 6. Enter the IP address of the print server in the LPD server box. Enter the printer name set in step 2 in the LPD printer box.

PIPE\LPDO - Settings	
Print Destination	Display port settings on print
LPD server xxx.xxx.xxx	🗌 Enable data filter
LPD printer AL-CXXXX	Filter
Print Source	Send mail on receipt User
Host name	Class
User	Additional Control Cards
Send to Server Prefix S Q Queue parameters R Network parameters	×  OKCancelHelp

7. Close the Printer icon to exit printer configuration.

#### NetBEUI printing

- 1. Be sure that IBM OS/2 NetBIOS is installed on your computer.
- 2. To create a printer, double-click the target printer icon to open the Properties dialog box. Then click the Output Port tab.
- 3. Select the port.
- 4. Connect to the printer from the command line.

Example: Connect the printer to LPT1.

**net use LPT1:** \\*NetBIOS name of print server*\ *Device name of print server*\

#### Note:

*To change the NetBIOS name and device name, use EpsonNet WinAssist or WebAssist running on Windows.* 

# Chapter 6 Settings for NetWare Server

#### Introduction to NetWare Settings

This chapter explains how to configure the print server for NetWare. First, you need to set up the printer in a NetWare environment, and then configure the print server using EpsonNet WinAssist.

#### Supported systems

□ Server environment

NetWare 3.1/3.11/3.12/3.2 (Bindery) NetWare 4.1/4.11/4.2 (NDS, Bindery emulation) IntranetWare (NDS, Bindery emulation) NetWare 5.0/5.1 (NDS, NDPS) NetWare 6.0 (NDS, NDPS)

□ Client environment

The client environment must be supported by NetWare. The clients are able to use the printer driver mounted on the print server.

The following Novell Client is supported.

- For Windows Me/98/95: Novell Client 3.3 or higher for Windows 95/98
- For Windows XP/2000/NT 4.0: Novell Client 4.8 or higher for Windows NT/2000/XP

## About modes

You can choose either the Print Server, Remote Printer, or Standby mode. We recommend that you use the Print Server mode unless the number of users exceeds the limit.

Features of these modes are described below.

### Print Server mode (NDS/Bindery Print Server):

- □ High-speed printing with direct printing
- □ Uses the NetWare user account
- □ Can connect up to 8 file servers simultaneously
- □ Can register up to 32 print queues

#### Remote Printer mode:

- □ A NetWare user account is not required.
- □ A print server is needed to control the remote printer.
- □ Can attach up to 16 printers for NetWare 3.x, and up to 255 for NetWare 4.x or later.

#### Note:

When you turn on the printer, the user account is temporarily accessed in the Remote Printer mode. If there is no user account available, turn on the printer before connecting the client to the network.

### Standby mode (factory default mode):

The Standby mode is the default mode. This mode disables all NetWare related functions. Use the Standby mode when you are not using the print server in a NetWare environment.

## Instructions for Using NetWare

### Printing a text file

When you print a text file using the NPRINT command of NetWare or DOS, redirection, misconversion or a gap in characters may occur depending on the client environment.

### IPX routing protocol "NLSP"

It is possible to set the IPX routing protocol "NLSP" from NetWare 4.x or later; however, the print server does not support NLSP. RIP/SAP controls the communication.

You can select the routing protocol from a) NLSP with RIP/SAP Compatibility, or b) RIP/SAP Only. If you remove the bind of RIP or SAP when NLSP with RIP/SAP Compatibility is specified, the print server then cannot communicate with the file server and NDS. (See "Protocols" and "Bindings" in NetWare's INETCFG utility.)

#### **Bindery and NDS**

- □ You can check the bindery context path from the server console by using the SET BINDERY CONTEXT command.
- □ If the bindery context path has not been set, or if you want to use the printing environment of another context from a non-NDS client, you need to specify the context for the bindery context. Use the SET BINDERY CONTEXT command to set the context in the AUTOEXEC.NCF file.
- You cannot use the bindery print server mode with EpsonNet WinAssist if you are running Novell Client for Windows 95/98 version 3.00 or Novell Client for Windows NT version 4.50. To configure the print server for bindery mode, use Novell IntranetWare Client or EpsonNet WebAssist.

See your NetWare documentation for more information.

### Time required to recognize the print server

It takes up to two minutes for the NetWare server to recognize the print server, after the printer is turned on. During this start-up time, the status sheet does not show the correct information.

## Frame type

The same frame type should be used for the NetWare server and IPX router on the same network. If more than one frame type is used on the same network, bind all the frame types to the NetWare servers and IPX routers.

### For NetWare 5.x

The IPX protocol must be installed (bound) on the NetWare 5.x server.

### About modes

If the mode you have logged in is different from the mode you set for the print server, a message appears when you try to configure the print server for NetWare. If you do not want to change the current settings, click Cancel and log in again using the same mode set for the print server.

## Using Bindery Print Server (NetWare 3.x/4.x)

This section contains instructions on using the print server in the Print Server mode on NetWare 3.x/4.x/IntranetWare with Bindery emulation.

### Note:

The print server in the Print Server mode of NetWare 3.x does not allow you to use the Print Server status display control with PCONSOLE.

1. Turn on your printer.

- 2. From any NetWare client, log in to the target NetWare server with supervisor privileges. You must log in with the bindery connection.
- 3. Configure the print server using EpsonNet WinAssist. See "NetWare" on page 72 for details.

If NetWare objects are already created, you can also use EpsonNetWebAssist. See "NetWare" on page 217 for details.

## Using NDS Print Server (NetWare 4.x/5.x/6.0)

This section contains instructions for using the print server in the Print Server mode on NetWare 4.x, IntranetWare, NetWare 5.x, or NetWare 6.0 with NDS mode.

- 1. Turn on your printer.
- 2. From any NetWare client, log in to the target context of the NDS tree as an ADMIN.
- 3. Configure the print server using EpsonNet WinAssist. See "NetWare" on page 72 for details.

If NetWare objects are already created, you can also use EpsonNet WebAssist. See "NetWare" on page 217 for details.

## Using Remote Printer Mode (NetWare 3.x)

For NetWare 3.x users, follow the steps below to make the printer environment with PCONSOLE.

Creating print queues in a file server

- 1. From any NetWare client, log in to the network with supervisor privileges.
- 2. Run PCONSOLE. From the Available Options screen, select Print Queue Information and press Enter.



3. Press the Insert key on your keyboard and enter the print queue name. Press Enter.

#### Note:

Since your clients need the print queue name you set here when they use the printer, announce the print queue name to your clients.

4. From the Print Queue list, select the print queue name that you just entered and press Enter. From the Print Queue Information list, select Queue Users and press Enter. Next, select EVERYONE from the list. If EVERYONE is not in the list, press Insert and select EVERYONE from the queue user list.

## Creating a print server

1. From the Available Options screen, select Print Server Information and press Enter.



- 2. Press the Insert key on your keyboard and type the print server name. Press Enter. It is a good idea to write down the print server name for later use.
- 3. From the Print Server list, select the print server name that you just typed and press Enter. From the Print Server Information list, select Print Server Configuration and press Enter.

Print Server	Information
Change Passwo Full Name Print Server Print Server Print Server Print Server	<u>Configuration</u> ID Operators

4. Select Printer Configuration from the Print Server Configuration Menu and press Enter.

Print Server Configuration Menu		
File Servers To Be Serviced Notify List for Printer		
Printer Configuration		
Queues Serviced by Printer		

5. From the Configured Printers list, select Not Installed (port number = 0) and press Enter.

	Configured	Printers	
Not Not Not	Configured Installed Installed Installed Installed Installed Installed Installed Installed Installed Installed Installed	Printers	123456789011
Not Not Not Not	Installed Installed Installed Installed		12 13 14 15

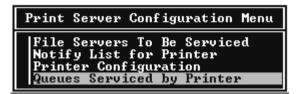
6. From the Printer configuration screen, type the printer name. Highlight Type and press Enter. Select Remote Parallel, LPT1 for Remote Printer mode.

Printer Ø configuration		
Name: Printer Ø Type: Local Parallel, LPT1		
Use interrupts: IRQ:	Yes 2	
Buffer size in K:	3	
Starting form: Queue service mode:	0 Change forms as needed	
Baud rate: Data bits:		
Stop bits: Parity: Use X-On/X-Off:		

*Note: Be sure to select* Remote Parallel, LPT1 *for Remote Printer mode.* 

7. Press ESC; then press Enter to save your changes.

- 8. Press Esc.
- 9. Select Queues Serviced by Printer from the Print Server Configuration menu and press Enter.



- 10. Select the printer that you want to use from the Defined Printers list and press Enter.
- 11. Press the Insort key and assign a queue to the print server port from the Available Queues list.
- 12. Specify a priority level between 1 to 10. One is top priority.
- 13. Press Esc to exit PCONSOLE.

Configuring for NetWare using EpsonNet WinAssist

- 1. Turn on your printer.
- Load the print server from the file server's system console which the print queue volume is set.
   >LOAD PSERVER print server name you set using PCONSOLE
- 3. Configure the print server using EpsonNet WinAssist. See "NetWare" on page 72 for details.

If NetWare objects are already created, you can also use EpsonNet WebAssist. See "NetWare" on page 217 for details.

# Using Bindery Remote Printer Mode (NetWare 4.x)

Follow the steps below to make the printer environment on NetWare 4.x and IntranetWare with Bindery emulation.

Note:

- □ Assign Trusteeships for users if necessary.
- **Be** sure to use PCONSOLE to set the print queue and print server *instead of using NWAdmin.*

## Creating objects

1. From any NetWare client, log in to the server as an ADMIN. Make sure to log in with Bindery connection.

#### Note:

If the client using for this setting has been logged in with NDS mode, press F4 key while PCONSOLE is starting to switch to the bindery mode.

2. Run PCONSOLE. From the Available Options screen, select Print Queues and press Enter. Press Insert and type the print queue name. Press Enter.

#### Note:

Since your clients need the print queue name you set here when they use the printer, announce the print queue name to your clients.

3. From the Print Queue list, select the print queue name that you just entered and press Enter. From the Print Queue Information list, select Queue Users and press Enter. Next, select EVERYONE from the list. If EVERYONE is not in the list, press Insert and select EVERYONE from the queue user list.

- 4. From the Available Options screen, select Print Servers and press Enter. Press Insert and type the print server name. Press Enter.
- 5. Press Esc to exit PCONSOLE, and log out from the server.
- 6. Log in to the server as an ADMIN. Be sure to log in with NDS connection.
- 7. Start NWAdmin.
- 8. To create the Printer Object, click the container specified as the Bindery context and select Create from the Object menu, then Printer. Type the printer name and click Create.
- 9. To assign the print queue, double-click the Printer object icon (created in step 8). The Printer dialog box appears.
- 10. Click Assignments and then click Add. From the print queue list, select the queue (created in step 2) and click OK.
- 11. Click Configuration in the Printer dialog box, and select Parallel from the Printer type pull-down menu.
- 12. Click Communication. The Parallel Communication dialog box appears.
- 13. Select LPT1 for Port; check Polled for Interrupts; and check Manual load (Remote from Print Server) for Connection type, then click OK.
- 14. Click OK in the Printer dialog box.
- 15. To assign the printer, double-click the Print Server object icon (created in step 4). The Print Server dialog box appears.
- 16. Click Assignments and then click Add. From the printer object list, select the printer object (created in step 8) and click OK.

- 17. In the Print Server dialog box, select the assigned printer from the printer object list, and click the Printer Number button to set the printer number from 0 to 15, then click OK.
- 18. To confirm the objects you have assigned, double-click the Print Server object icon. Click Print Layout, and check that the print server, printer, and print queue are connected.

#### Configuring for NetWare using EpsonNet WinAssist

- 1. Turn on your printer.
- Load the print server from the file server's system console which the print queue volume is set.
   >LOAD PSERVER print server name you set using PCONSOLE
- 3. Configure the print server using EpsonNet WinAssist. See "NetWare" on page 72 for details.

If NetWare objects are already created, you can also use EpsonNetWebAssist. See "NetWare" on page 217 for details.

## Using NDS Remote Printer Mode (NetWare 4.x/5.x/6.0)

Follow the steps below to make the printer environment using NWAdmin under NetWare 4.x, IntranetWare, NetWare 5.x, or NetWare 6.0 with NDS mode.

Creating objects

- 1. From any NetWare client, log in to the target context of the NDS tree as an ADMIN.
- 2. Run the Administrator tool (NWAdmin).

3. Create a printer:

Click the directory context icon, and select Create from the Object menu, then Printer. Type the Printer name and click Create.

Create Printer	×
Printer <u>n</u> ame:	<u>C</u> reate
EPL-C8200	Cancel
Define additional properties	<u>H</u> elp
Create <u>a</u> nother Printer	

4. Create a print server:

Click the directory context icon, and select Create from the Object menu, then Print Server. Type the Print Server name and click Create.

Create Print Server	×
Print Server <u>n</u> ame:	<u>C</u> reate
EPL-C8200-PS	Cancel
Define additional properties	<u>H</u> elp
Create <u>a</u> nother Print Server	

5. Create a print queue:

Click the directory context icon, and select Create from the Object menu, then Print Queue. Type the Print Queue name and select the Print Queue Volume, then click Create. Double-click the print queue object, and register the user.

Note:

*Since your clients need the print queue name you set here when they use the printer, announce the print queue name to your clients.* 

Create Print Queue	×
Djrectory Service Queue	<u>C</u> reate
C <u>R</u> eference a bindery queue	Cancel
Print Queue <u>n</u> ame:	
EPL-C8200-Q	<u>H</u> elp
Print Queue <u>V</u> olume:	
MAXNW411_SYS.max.EPKOWA	
Define additional properties	
Create <u>a</u> nother Print Queue	

6. Double-click the Printer Object icon in the NetWare Administrator screen.

🙀 NetWare Administrator				-	
<u>O</u> bject <u>V</u> iew Options <u>T</u> ools	s <u>W</u> indow	<u>H</u> elp			
		9			5 <u>0</u>
📻 EPKOWA (EPKOWA)				_	E F
品EPKOWA					
– See EVERYONE					
– 📲 PRIFNW					
兽 EPL-C8200					
- BEPL-C8200-PS					
L 🛎 EPL-C8200-Q					
- "E max					
│					
L 🛛 MAXNW411_SYS					
- 🕒 EPL-C8200					
- 🖧 EPL-C8200-PS					
- 븝EPL-C8200-Q					
L 🗳 Admin					<b>-</b>
<b>▲</b>					
Tree: EPKOWA			Admin.e	pkowa	

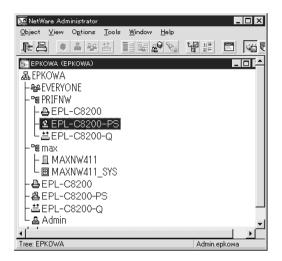
7. In the Printer dialog box appears, click Assignments and then click Add.

📴 Printer : EPL-C8200	X
Assignments Print server:	Identification
Print server: EPL-C8200-PS.PRIFNW.epkowa	Assignments
Print gueues:	, reegenteries
Queue Pi EPL-C8200-Q.PBIFNW.epkowa 1	riority Configuration
	Notification
	Features
Add Delete Priority: 1	See Also
Default print queue:	
EPL-C8200-Q.PRIFNW.epkowa	<b>•</b>
OK Cancel Page Options	Help

- 8. From the print queue list, select the queue you created in step 5 and click OK.
- 9. Click Configuration, and select Other/Unknown for the Printer type list box and click OK.

📴 Printer : EPL-C8200	X
Configuration	Identification
Printer type: Other/Unknown	
Banner type: Text	Assignments
Service interval: 5	Configuration
Buffer <u>s</u> ize in KB:  3 🚔 Starting form: 0	Notification
Network address restriction:	Features
Service <u>m</u> ode for forms: Minimize form changes within print queues	See Also
OK Cancel Page Options Help	

10. Double-click the Print Server Object icon in the NetWare Administrator screen.



11. In the Print Server dialog box that appears, click Assignments and then click Add.

题 Print Server : EPL-C8200-PS	X
Assignments           Printers:	Identification
Printer Number EPL-C8200.PRIFNW.epkowa 0	Assignments
	Users
	Operator
	Auditing Log
	Print Layout
Add Delete Printer Number	
OK Cancel Page Options Help	

- 12. From the printer object list, select the printer object you want to assign and click OK.
- 13. Go back to the screen in step 11, and click the Printer Number button to set the printer number from 0 to 254.

Change Printer N	lumber	×
<u>P</u> rinter number:	I	ОК
		Cancel
		<u>H</u> elp

14. To confirm the objects you have assigned, double-click the Print Server object icon. Click Print Layout, and check that the print server, printer, and print queue are connected.

Configuring for NetWare using EpsonNet WinAssist

- 1. Turn on your printer.
- Load the print server from the file server's system console which the print queue volume is set.
   >LOAD PSERVER print server name you set using NWAdmin
- 3. Configure the print server using EpsonNet WinAssist. See "NetWare" on page 72 for details.

If you use the NetWare objects that are already created, you can use EpsonNetWebAssist too. See "NetWare" on page 217 for details.

## Using the NDPS Gateway

This section contains instructions on printing using Novell Distributed Print Services<sup>®</sup> (NDPS<sup>®</sup>) with Novell<sup>®</sup> NetWare<sup>®</sup> 5.x/6.0. Novell Distributed Print Services (NDPS) is the new generation print services of NetWare.

#### Note:

- □ Banners cannot be printed with NDPS.
- **D** The Status Monitor 3 utility cannot be used with NDPS.
- □ Bind the IP or both IP or IPX protocols on the NetWare server that runs NDPSM.NLM and EPSONGW.NLM.

Check the following points before starting.

- □ Install the appropriate client software, such as Novell Client 3.3 or higher for Windows 95/98/Me or Novell Client 4.8 or higher for Windows NT/2000, on client workstations. Make sure they install NDPS.
- ❑ When you use the print server with Bindery (either in the Print Server mode or the Remote Printer mode), you need PCONSOLE.EXE to create bindery objects such as Print Server and Print Queue objects. Since PCONSOLE.EXE does not come with NetWare 5.x/6.0, you need to get the file from Novell.

## Outline of settings

The followings are basic steps to use the print server with the NDPS printing system. Detailed procedures are described in the subsequent sections.

- 1. Select the Connection Type and make the printer environment on the Server and Clients.
- 2. Create an NDPS Manager object in NetWare Administrator.
- 3. Create a Printer Agent in NetWare Administrator.
- 4. Configure the print server using EpsonNet WinAssist.
- 5. Set the printer on the client workstations.

The environment to use, the settings you make, and the tools to use differ depending on the printer type and connection type you choose. You can create an NDPS Manager and Printer Agent in NetWare Administrator or partially via the Server Console. See the Novell online documentation for more details.

## Making printer environment

- 1. Select the Connection Type from the following: Remote (rprinter on IPX), Remote (LPR on IP), or Forward jobs to a Queue (via the current legacy queue-based print services).
- 2. Install (bind) the following protocols on the server depending on the connection type you use.
  - □ For Remote (rprinter on IPX) connection, install IPX
  - □ For Remote (LPR on IP) connection, install TCP/IP
  - □ For Forward jobs to a Queue connection, install IPX

- 3. Install the appropriate Client Software on client workstations. Make sure they install NDPS.
- 4. Install printer drivers on client workstations. See the printer manual for the installation.

#### Note:

- **D** *Do not install the printer drivers via the NetWare server.*
- □ Do not add printers and do not install printer drivers using Novell Print Manager (NWPMW32.EXE).

## Creating an NDPS Manager

- 1. Run NetWare Administrator (NWADMN32.EXE) on the client machine. The main browser window appears.
- 2. To create an NDPS Manager, click the Directory context icon, and then select Create from the Object menu.
- 3. Select NDPS Manager from the list.
- 4. Enter the NDPS Manager name in the NDPS Manager Name field.
- 5. Browse the Resident Server and select where you want the NDPS Manager assigned.
- 6. Browse the Database Volume and select where you want the NDPS Manager database assigned.
- 7. Click Create. The NDPS Manager icon appears in the main browser window.
- 8. Type LOAD NDPSM at the server console, and then select the NDPS Manager you have created.

## Creating a Printer Agent

After creating an NDPS Manager, you can create Printer Agents, either public access printers or controlled access printers. The way to create a Printer Agent differs depending on the printer type you choose. The following are the features of public access printers and controlled access printers.

- Public Access Printers: NDPS printers that are available to all network users and not associated with an NDS object. Users can select and print to any public access printer they can view from their workstations. However, these printers do not take full advantage of services such as security and job event notification.
- Controlled Access Printers: NDPS printers that are added to the NDS tree by NetWare Administrator. They are only available to the workstation user through the NDS object list. These printers can take full advantage of the security and management features provided by NDS.
- 1. Select the printer type either public access printer or controlled access printer.
- 2. Create a public access printer. If you want to create a controlled access printer, go to step 3.

In NetWare Administrator, double-click the NDPS Manager you have created. Click Printer Agent List, then click New. Enter the Printer Agent name, and select Novell Printer Gateway for the Gateway Type. Click OK. Go step 4.

3. Create a controlled access printer.

In NetWare Administrator, select the Directory context icon. Select Create from the Object menu, then select NDPS Printer. Enter the Printer Agent name, select Create a new Printer Agent, then click Create. Select the NDPS Manager you have created, and select Novell Printer Gateway for the Gateway Type. Click OK.

- 4. Select None for the Printer Type, and Novell Port Handler for the Port Handler Type, then click OK.
- 5. Select the Connection type, and configure it as follows.
  - For Remote (rprinter on IPX) connection Print a status sheet of the print server and configure the corresponding items.
     Port Type: Select LPT1.
     SAP Name: Enter the Primary Print Server Name.
     Printer Number: Enter the Printer Port Number.
     Network: Enter the Network Address.
     Node: Enter the MAC Address.
     Interrupt: Select None.
  - For Remote (LPR on IP) connection
     IP Address: Enter the IP address of the print server. You can confirm the IP address on a status sheet.
  - For Forward jobs to Queue connection
     Queue Name: Enter the queue name that the print server uses in legacy queue-based print services (either in Print Server mode or Remote Printer mode).
     Queue User Name: Type a user name who has rights for the above queue.
     Password: Enter the password that the Queue User uses to login to the server.
- 6. Select None for the Printer Driver.
- 7. Confirm the Printer Agent that you have just created.

In NetWare Administrator, double-click the NDPS Manager object and click the Printer Agent List button. Check that the status of the Printer Agent you have just created is "Idle". Note:

If you have selected Remote (rprinter on IPX), configure the print server using EpsonNet WinAssist, as described in the next section, and then print a status sheet.

Go to the next section if you select Remote (rpinter on IPX). Go to "Setting the printer on client workstations" on page 167 if you select Remote (LPR on IP) or Forward jobs to Queue.

## Configuring for NetWare using EpsonNet WinAssist

Follow the steps below if you want to use the printer in IPX network.

#### Note:

*Be sure that the one of the following clients is installed on your computer: Novell Client 32, Novell IntranetWare Client, or Novell Client.* 

- 1. Turn on your printer.
- 2. From any NetWare client, log in to the target NetWare server as an ADMIN.
- 3. Run EpsonNet WinAssist from the Start menu. See "NetWare" on page 72 for details.

If the IP address of the printer is already assigned, you can use EpsonNet WebAssist too. See "NetWare" on page 217 for details.

## Setting the printer on client workstations

After configuring the print server, set up the printer on client workstations.

### Installing printers automatically

- Run the Novell Printer Manager from Windows. If you are running Windows Me/98/95/2000/NT, run: \PUBLIC\WIN32\NWPMW32.EXE
- 2. In the Novell Printer Manager dialog, select New from the Printer menu.
- 3. Click Add. A list of available printers appears.
- 4. Select the printer you want and click Install.

The Novell Printers---Install dialog appears. You may modify the printer name that appears and select a pre-defined configuration.

- 5. Click OK. The printer driver for that printer model is installed automatically from the Resource Management Service.
- 6. Click Close. The printer appears in the main Printer Manager window and is available for print jobs.

### Installing printers manually

- 1. Install the printer driver.
- 2. Change the Ports on the printer's properties dialog box. Specify the following objects for the port.

**Government** For Public Access Printers:

The Printer Agent you have created in "NDPS Public Access Printers" under Entire Network.

#### **Graphic For Controlled Access Printers:**

The Printer Agent you have created in the NDS tree.

See the Novell online documentation for details.

## Instructions for Using a Dial-Up Network

This section explains about using a dial-up network.

#### Note:

*The primary server described in this manual indicates a primary time server which offers time to the workstations on the network.* 

## Using a dial-up network in each mode

#### **Print Server mode**

You must use a dedicated dial-up line. Since polling is performed on the file server in the print server mode, no vicarious response by the router is possible. Therefore, no dial-up connection is possible in this case.

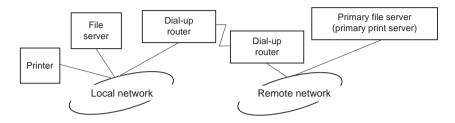
#### **Remote Printer mode**

In Remote Printer mode, use of a router with a vicarious response function allows the primary server to be installed at the dial-up destination. However, an extra account might be generated when the primary server is down. To avoid that, it is recommend to use connections via a dedicated dial-up line.

Follow the instructions for using a dial-up line.

## When there is a primary server at the dial-up destination

## For local networks with file servers:



□ When the power is turned on

A dial-up is generated because access is made to a local file server first and then to a primary server. There is no problem since this dial-up only occurs at startup.

□ When the print server is not correctly set

A dial-up is generated because access is made to a local file server first and then to a primary server. This dial-up is repeated at intervals of approximately 5 minutes. Make the print server settings correctly to avoid this problem.

□ During normal operation (standby)

An SPX Watchdog packet is sent according to the NetWare protocol convention. Use a router with a vicarious response function to avoid a dial-up.

During normal operation (printing)

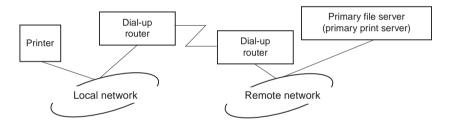
A dial-up is generated while the printing data is being transferred. This is not a problem because it is a dial-up specific to the dial-up network. □ When the primary server is down during operation

A dial-up is generated because a connection to the primary server is attempted periodically. Since this is attributable to the automatic re-connection function, turn off the printer once.

□ When the file server on the local network is down

When there is no file server on the local network, NetWare cannot be used on the local network. In this case, the NetWare protocol for the print server is also not available. No dial-up is generated under this condition. When the file server on the local network is restored, the print server is also automatically restored.

#### For local networks with no file server:

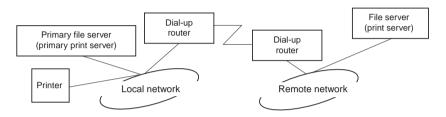


Depending on the router settings, the NetWare protocol can be used without a file server on a local network. This setup follows the same pattern as that described above.

## When there is a primary server in the local network

Even if a primary server is installed on the local network, an unnecessary dial-up may be generated depending on the configuration.

The following problems are common to both Print Server mode and Remote Printer mode.



□ When the power is turned on

Since access is made only to the primary server, no dial-up is generated.

□ When the print server is not correctly set

Since access is made only to the primary server, no dial-up is generated. However, if the file server/print server of the remote network is erroneously set as the primary server, an unnecessary dial-up might be generated. Correct the settings to avoid this problem.

During normal operation (standby/printing)

Since access is made only to the primary server, no dial-up is generated.

□ When the primary server is down during operation

Connection to the primary server is periodically attempted, but no dial-up is generated. However, if the router is set to pass SAP packets (Find Nearest Server), an unnecessary dial-up might be generated. To avoid this, turn off the printer once, or do not allow the router to pass SAP packets (Find Nearest Server).

## Chapter 7 Settings for UNIX

## Introduction to UNIX Settings

This chapter explains how to set up the printer for different UNIX systems using the lpr command.

Your printer supports many standard UNIX commands and can be configured from a host computer without using a special setup utility.

Your printer is able to function as a remote printer on systems using TCP/IP Ethernet transfer with lpr remote printing protocol, or standard ftp (file transfer protocol).

*Note:* Because this printer does not convert data into the printer control language, a printer driver and filter are necessary for each system.

## lpr filters

Filters for lpr are controlled by the name given to the remote printer. When setting up an lpr printer entry, a name is entered for:

- □ the local printer name to be redirected
- □ the host name of the station to which the print is sent
- □ the remote printer name (name of the printer port on the remote station)

Many different remote printer names may be set up, all directed to the same Ethernet remote host, and each is given a different local printer name to be redirected. Different types of print jobs may be sent to different printer names, which will then all print out on the same printer, through the same Ethernet interface, but using different filters.

The remote printer name options used to invoke the different filters are as follows:

lpb	Binary files (no filters)
lpa	ASCII files (carriage returns at line ends)
lpbf	Binary file with form feed at file end
lpaf	ASCII file with form feed at file end

All other remote printer name options will be treated the same as lpb.

The following is an example of sending a text file, "txtfile", via lpr with a form feed appended:

% lpr -plpaf txtfile

## Setting Up Different UNIX Systems Using the Ipr Command

The following UNIX systems can print using the standard lpr command.

SunSoft Solaris 2.4 or later SunOS 4.1.4 or later IBM AIX 3.2.5 or later and 4.1.3 or later HP-UX 9.05 or later SCO UNIX 4.2 or later

## Setting up for SunSoft Solaris 2.4 or later

In the following steps, substitute the name that your printer will be known by for HOSTNAME, and the name by which you want your printer to be known for Rprinter.

1. Add the IP address and printer host name to the \etc\hosts file.

*For example:* 22.33.44.55 HOSTNAME

2. Define the host name as a print server.

For example: Ipsystem -t bsd HOSTNAME

3. Create the printer.

*For example:* Ipadmin -p Rprinter -s HOSTNAME\aux-T unknown-1 any

4. Enable the printer for use.

*For example:* accept Rprinter enable Rprinter

5. To print, use the lp command.

*For example:* Ip -d RPrinter Print-File-Name

## Setting up for SunOS 4.1.4 or later

In the following steps, substitute the name that your printer will be known by for HOSTNAME, and the name by which you want your printer to be known for Rprinter.

1. Add the IP address and printer host name to the \etc\hosts file.

*For example:* 22.33.44.55 HOSTNAME

2. Create a spool directory.

For example: mkdir\var\spool\lpd\PRIFx

3. Add the printer entry to the \etc\printcap file.

```
For example:

Rprinter |

ALCXXXX:lp=:rm=HOSTNAME:rp=aux:sd=/var/spool/lpd

/PRIFx
```

4. To print, use the lpr command.

*For example:* lpt -s -PRPrinter Print-File-Name



### Caution:

*Files that exceed* 1 *MB may not be printed unless the -s option is used.* 

## Setting up for IBM AIX 3.2.5 or later and 4.1.3 or later

In the following steps, substitute the name that your printer will be known by for HOSTNAME, and the name by which you want your printer to be known for Rprinter.

1. Add the IP address and printer host name to the /etc/hosts file.

*For example:* 22.33.44.55 HOSTNAME

2. Run smit.

*For example:* smit printer

3. Set the printer name (for example: Rprinter) in:

"Manage Remote Printer" "Client Services" "Remote Printer Queues" "NAME of queue to add".

Set the host name (for example: HOSTNAME) in:

"DESTINATION HOST for remote jobs".

Set the port name (for example: aux) in:

"Name of QUEUE on remote printer".

4. To print, use the lpr command.

*For example:* Ipr -PRPrinter Print-File-Name

## Setting up for HP-UX 9.05 or later

In the following steps, substitute the name that your printer will be known by for HOSTNAME, and the name by which you want your printer to be known for Rprinter.

1. Add the IP address and host name to the /etc/hosts file.

*For example:* 22.33.44.55 HOSTNAME

2. Terminate the printer service.

*For example:* Ipshut

3. Create a printer.

*For example:* Ipadmin -pRPrinter -v/dev/null -mrmodel -ormHOSTNAME -orpaux

4. Restart the print service.

For example: Ipshed

5. Enable the printer for use.

*For example:* accept Rprinter enable Rprinter

6. To print, use the lp command.

*For example:* Ip -DRPrinter Print-File-Name

## Setting up for SCO UNIX 4.2 or later (Open Server)

In the following steps, substitute the name that your printer will be known by for HOSTNAME, and the name by which you want your printer to be known for Rprinter.

1. Add the IP address and host name to the /etc/hosts file.

*For example:* 22.33.44.55 HOSTNAME

2. Execute rlpconf to register the printer.

*For example:* rlpconf

3. Enter the name of the printer.

*For example:* Please enter the printer name (q to quit):RPrinter

4. Specify the remote printer as the printer type.

*For example:* Is Rprinter a remote printer or a local printer (r/l)? r

5. Enter the name of the remote printer's host.

*For example:* Please enter the name of the remote host that Rprinter is attached to: HOSTNAME Printer RPrinter is connected to host HOSTNAME

6. Confirm that the entries are correct.

For example: Is this correct?(y/n)y 7. Specify that the RLP extended function (valid when the print server is SCO-UNIX) will not be used.

For example:

If HOSTNAME currently runs SCO OpenServer Release 5 or above, it can support the extended remote line printer protocol. Do you want to turn on the "extended RLP protocol" support flag? If you are not sure, answer "n"? (y/n)(n)n

8. Specify whether the created printer is to become the default printer.

For example: Would you like this to be the system default printer? (y/n)y

9. To print, use the lpr command.

*For example:* Ipr -d RPrinter Print-File-Name

## Using the ftp Command

ftp commands are common to all UNIX systems.

ftp programs use interfaces that are common for all unix systems.

The following is an example of printing using the ftp command (the entry operations are underlined).

ftp> open 22.33.44.55

Connected to 22.33.44.55

220 PR-Ifx(22.33.44.55) ftp server ready.

Name: \_\_

331 Password Required for (No Name).

Password:\_\_\_\_

230 User logged in.

200 Type set to I.

ftp> put binary file

200 PORT command successful.

150 Opening data connection for binary\_file

226 Transfer complete

ftp> <u>bye</u>

# Chapter 8 EpsonNet Direct Print

# About EpsonNet Direct Print

EpsonNet Direct Print is a utility program that supports TCP/IP (LPR) printing for Windows Me/98/95/XP/Server 2003/2000/NT 4.0.

By using EpsonNet Direct Print, you can search both a printer located in the same segment and one located beyond a router. You can select from LPR standard printing, LPR extension printing, or High-speed printing.

#### Note:

Since Windows XP/Server 2003/2000/NT support standard LPR printing, EpsonNet Direct Print is not necessary on these operating systems. We recommend that you use the LPR printing system provided by the operating system rather than using EpsonNet Direct Print.

# System Requirements

Operating systems	Windows Me, 98, 95
	Windows XP Professional/Home Edition
	Windows Server 2003
	Windows 2000 Server/Professional
	Windows NT 4.0 Server/Workstation with Service Pack 3.0 or higher
CPU	Pentium 200 MHz (Pentium II or better recommended)
Memory	32 MB or more
Hard disk space	20 MB or more

## Installing EpsonNet Direct Print

Follow the steps below to install EpsonNet Direct Print. Be sure to install EpsonNet Direct Print on a computer connected to the network.

#### Note:

If EpsonNet Direct Print version 1 is installed on your computer, you need to uninstall it before installing EpsonNet Direct Print version 2.x (the installation program will lead you through uninstalling the older version of EpsonNet Direct Print).

- 1. Insert the Software CD-ROM in the CD-ROM drive.
- 2. The EPSON Installation Program screen opens automatically.

If the Installer dialog box does not appear, double-click SETUP.EXE on the CD-ROM.

- 3. Select Install EpsonNet Direct Print, and then click 🔜 .
- 4. Follow the on-screen instructions to complete the installation.
- 5. Restart the computer after installation is complete.

Your computer is now set up to print with LPR via EpsonNet Direct Print. See the next section to set up your printer.

# Setting Up Your Printer Using EpsonNet Direct Print

When setting up a printer to print with LPR, you can add both a printer located in the same segment and one located beyond a router.

- □ Be sure that the computer is connected to the network and TCP/IP is correctly set.
- □ The valid IP address must be set; otherwise the printer does not appear under the Epson\_lpr group icon.
- □ The EPSON Status Monitor 2 utility shipped with the interface card models C82362\*/C82363\*/C82364\* with software version 1.x and EPL-N2700/N4000 printers enables EPSON TCP/IP printers. These EPSON TCP/IP printers can coexist with lpr printers added by EpsonNet Direct Print.
- □ The job control functions such as Cancel Printing and Purge Print Jobs are available when you double-click the target printer icon in the Printers folder. However, if the printer has already started printing a document, the print job may not be cancelled completely.

# Adding a printer located in the same segment

Follow the steps below to add a printer located in the same segment.

1. Windows Me: Double-click the My Network Places icon.

Windows 98/95/NT 4.0: Double-click the Network Neighborhood icon.

Windows XP: Click Start and then My Network Places. Under Network Tasks, click View workgroup computers. Under Other Places, click Microsoft Windows Network and then Entire Network. Then double-click the EpsonPeripheralNetwork icon.

Windows Server 2003: Click Start and then select Windows Explorer. Click My Network Places, click Entire Network, and then click EpsonPeripheralNetwork.

Windows 2000: Double-click the My Network Places icon and then double-click the Entire Network icon. Click entire contents, and then double-click the EpsonPeripheralNetwork icon.

2. Right-click the Epson\_lpr icon and select Properties.

3. Select the Local Segment check box and click OK.

Epson_lpr Properties ? 🗙
General
Searches for available printers on the network and displays them in a list.
Specific Network Segment IP Address: SubNet Mask:
OK Cancel Apply

4. Double-click the Epson\_lpr icon to display available printers in the same segment as your computer on the screen.

둼 Network Neig	jhborhood	_ 🗆 ×
<u>F</u> ile <u>E</u> dit ⊻iew	<u>H</u> elp	
Entire Network Epson lpr Holubec Ken01 Max01 Max02	I Ocean01 I Ocean02 I Robin I Smith	
•		F
1 object(s) selected	l	1.

5. Double-click the target printer.

📮 Epson_lpr	
<u>F</u> ile <u>E</u> dit <u>V</u> iew <u>H</u> elp	
(AL-CXXX)	
💓 xxx.xx.xx.xx(EPL-N1200)	
1 object(s)	
	11.

6. Follow the on-screen instructions provided by the Add Printer wizard. If you are required to install the printer driver, see "Installing the printer driver" on page 190.

### Adding a printer beyond a router

Follow the steps below to add a printer beyond a router.

1. Windows Me: Double-click the My Network Places icon.

Windows 98/95/NT 4.0: Double-click the Network Neighborhood icon.

Windows XP: Click Start and then My Network Places. Under Network Tasks, click View workgroup computers. Under Other Places, click Microsoft Windows Network and then Entire Network. Then double-click the EpsonPeripheralNetwork icon.

Windows Server 2003: Click Start and then select Windows Explorer. Click My Network Places, click Entire Network, and then click EpsonPeripheralNetwork.

**Windows 2000:** Double-click the My Network Places icon and then double-click the Entire Network icon. Click entire contents, and then double-click the EpsonPeripheralNetwork icon.

2. Right-click the Epson\_lpr icon and select Properties.

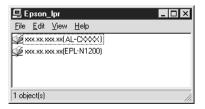
3. Select the Specific Network Segment check box and enter the IP address and subnet mask of the printer you want to find. Click OK.

Epson_lpr Properties
General
Searches for available printers on the network and displays them in a list.
Cocal Segment
IP Address : SubNet Mask : ■ ■ 36
OK Cancel Apply

4. Double-click the Epson\_lpr icon to view the available printers.

hetwork Neig	ghborhood	
<u>F</u> ile <u>E</u> dit ⊻iew	<u>H</u> elp	
Entire Network Epson Lor Holubec Ken01 Max01 Max02	📮 Ocean01 📮 Ocean02 📮 Robin 📮 Smith	
•		F
1 object(s) selected	1	li.

5. Double-click the target printer.



6. Follow the on-screen instructions provided by the Add Printer wizard. If you are required to install the printer driver, see "Installing the printer driver" on page 190.

### Adding a printer from the Printers folder

Follow the steps below to add a printer from the Printers folder.

1. Windows Me: Double-click the My Network Places icon.

Windows 98/95/NT 4.0: Double-click the Network Neighborhood icon.

Windows XP: Click Start and then My Network Places. Under Network Tasks, click View workgroup computers. Under Other Places, click Microsoft Windows Network and then Entire Network. Then double-click the EpsonPeripheralNetwork icon.

Windows Server 2003: Click Start and then select Windows Explorer. Click My Network Places, click Entire Network, and then click EpsonPeripheralNetwork.

**Windows 2000:** Double-click the My Network Places icon and then double-click the Entire Network icon. Click entire contents, and then double-click the EpsonPeripheralNetwork icon.

- 2. Right-click the Epson\_lpr icon and select Properties. The Epson\_lpr Properties dialog box appears.
- 3. Select LOCOI Segment to search a printer in the same segment, or select Specific Network Segment and enter the IP address and subnet mask of the printer to find a printer located beyond the router. Click OK.

4. Windows Me/98/95/2000/NT 4.0: Click Start, point to Settings, and then select Printers. Double-click Add Printer in the Printers folder to start the Add Printer Wizard.

**Windows XP:** Click Start and then Printers and Faxes. Under Printer Tasks, click Add a printer to start the Add Printer Wizard.

**Windows Server 2003:** Click Start and then Printers and Faxes. Double-click Add Printer in the Printers folder to start the Add Printer Wizard.

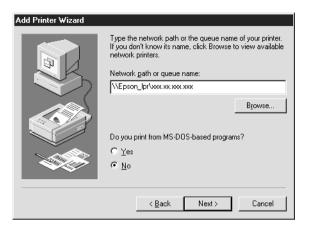
- 5. Select Network printer (Windows Me/98/95/2000), A network printer, or a printer attached to another computer (Windows XP), or Network print server (Windows NT 4.0). Then click Next.
- 6. Windows Me/98/95: Click Browse and then double-click Epson\_lpr.

Windows XP/Server 2003: Click Browse for a printer. In the Shared Printers list, double-click EpsonPeripheralNetwork.

Windows 2000: Select the Type the printer name, or click Next to browse for a printer radio button and click Next. Double-click EpsonPeripheralNetwork.

**Windows NT 4.0:** In the Shared Printers list, double-click EpsonPeripheralNetwork.

7. Select the target printer listed under Epson\_lpr or EpsonPeripheralNetwork and click OK.



8. Click Next. Follow the on-screen instructions to install the printer driver. If you are required to install the printer driver, see "Installing the printer driver" on page 190.

### Installing the printer driver

Install the printer driver which comes with your printer.

- 1. Insert the Software CD-ROM shipped with the printer.
- 2. Close the EPSON Installation Program screen if it appears.
- 3. Click the Have Disk button. The Install From Disk dialog box appears.
- 4. Click Browse.
- 5. Select the CD-ROM drive for Drives, and double-click the appropriate folder for your operating system. Click OK.
- 6. Click OK in the Install From Disk dialog box.

7. Select the model name of the printer, and click Next.

#### Note:

If the Add Printer wizard asks you to select either Keep existing driver or Replace existing driver, be sure to select the Replace existing driver radio button.

8. Click Finish and follow the on-screen instructions to complete setup.

# Configuring the Printer Port

Follow the steps in the appropriate section below to configure the printer port. The printing speed will differ depending on the selections that you make.

### Windows Me/98/95/NT 4.0

- 1. Click Start, point to Settings, and then select Printers.
- 2. Right-click the target printer and click Properties.
- 3. Windows Me/98/95: Click the Details tab and then Port Settings. The EPSON LPR Port dialog box appears.

*Note: If the message "There is nothing to configure for this port" appears when you click* Port Settings, *click* OK.

**Windows NT 4.0:** Click the Ports tab and then Configure Port. The EPSON LPR Port dialog box appears.

EPSON LPR Port
Select printing method
V LPR Printing
Standard Printing
Printing Request
C Enhanced Printing
Printing Request
High-Speed Printing
Direct Print EPSON high-speed port Printing Request Do not spool
Notify when printing completed     OK     Cancel

4. Make the appropriate settings for the desired port.

#### LPR standard printing:

Select the LPR Printing check box and then the Standard Printing radio button. Print data is spooled by the computer before sending the print job to the target network printer.

#### LPR enhanced printing:

Select the LPR Printing check box and then the Enhanced Printing radio button. LPR enhanced printing sends the print job to the target network printer without spooling all of the print data. LPR enhanced printing is faster than LPR standard printing.

#### **High-speed printing:**

Select the High-Speed Printing radio button. High-speed printing sends the print job to the target network printer without spooling all of the print data. High-speed printing is faster than the other two printing methods. If the printer does not support this function, this check box is unavailable.

- 5. Select the Notify when printing completed check box if you want to receive an on-screen notification when printing is complete.
- 6. Click OK.

## Windows XP/Server 2003/2000

1. Windows XP: Click Start and then click My Network Places. Under Network Tasks, click View workgroup computers. Under Other Places, click Microsoft Windows Network, and then click Entire Network. Then double-click the EpsonPeripheralNetwork icon.

Windows Server 2003: Click Start and then select Windows Explorer. Click My Network Places, click Entire Network, and then click EpsonPeripheralNetwork.

Windows 2000: Double-click the My Network Places icon. Double-click the Entire Network icon, click entire contents, and then double-click the EpsonPeripheralNetwork icon.

- 2. Double-click the Epson\_lpr icon.
- 3. Right-click the icon for the target printer and click Properties. The EPSON LPR Port dialog box appears.

EPSON LPR Port         Image: Control of the second se	×
CPR Printing      Standard Printing      Direct Print      Use LPD protocol      Spool	
C Enhanced Printing	
High-Speed Printing         →→       Direct Prht         →→       EPSON high-speed pot         Printing Request       →         Do not spool	
Notify when printing completed     OK     Cancel	

4. Make the appropriate settings for the desired port.

#### LPR standard printing:

Select the LPR Printing check box and then the Standard Printing radio button. Print data is spooled by the computer before sending the print job to the target network printer.

#### LPR enhanced printing:

Select the LPR Printing check box and then the Enhanced Printing radio button. LPR enhanced printing sends the print job to the target network printer without spooling all of the print data. LPR enhanced printing is faster than LPR standard printing.

#### **High-speed printing:**

Select the High-Speed Printing radio button. High-speed printing sends the print job to the target network printer without spooling all of the print data. High-speed printing is faster than the other two printing methods. If the printer does not support this function, this check box is unavailable.

- 5. Select the Notify when printing completed check box if you want to receive an on-screen notification when printing is complete.
- 6. Click OK.

# Chapter 9 EpsonNet Internet Print

# About EpsonNet Internet Print

EpsonNet Internet Print is a utility program that supports printing across the Internet using Internet Printing Protocol (IPP). Since the print server supports IPP, Internet printing is possible using this utility. You can print or make printer settings from Windows 98/95/NT 4.0 systems that can access the Internet. You can also print via a proxy server using this utility.

Before using the EpsonNet Internet Print utility, be sure to read the README file found in the EpsonNet Internet Print folder. This file contains the latest information on the EpsonNet Internet Print.

- EPSON Status Monitor is a utility program that monitors your printer and gives you information about its current status. Because this utility does not support IPP, printers connected to the Internet cannot be monitored with EPSON Status Monitor. If you use EpsonNet Internet Print on a computer which has EPSON Status Monitor installed, a communication error message may appear when you view printer properties. To avoid this, click the Optional Settings tab in the target printer's properties dialog box and click the Update the Printer Option Information Manually radio button.
- □ For Windows Me/XP/Server 2003/2000, use the OS standard IPP client for the Internet printing.

# System Requirements

#### Operating systems

- Windows 98, Windows 95, or Windows NT 4.0 Server and Workstation
- □ An Intel x86 series or compatible processor

#### Supported products

 Epson print servers that support IPP (EpsonNet Internet Print comes with Epson network interface products that support IPP)

# Installing EpsonNet Internet Print

Follow the steps below to install EpsonNet Internet Print.

- 1. Insert the Software CD-ROM in the CD-ROM drive.
- 2. The EPSON Installation Program screen opens automatically.

If the Installer dialog box does not appear, double-click SETUP.EXE on the CD-ROM.

- 3. Select Install EpsonNet Internet Print, and then click 🔜.
- 4. Follow the on-screen instructions to complete the installation.
- 5. Restart the computer after installation is complete.

# Setting Up Your Printer Using EpsonNet Internet Print

EpsonNet Internet Print supports printing across the Internet using Internet Printing Protocol. Follow the steps below to set up the printer.

#### Note:

Before following the steps below, you must make the appropriate IPP settings in EpsonNet WinAssist/WebAssist. See "IPP" on page 81 or "IPP" on page 222 for instructions on setting up IPP. In the steps below, you will be asked for the IPP URL you set in the IPP setting screen in EpsonNet WinAssist/WebAssist.

## Windows 98/95

- 1. Make sure that TCP/IP is correctly installed and setup in the computer and a valid IP address is set for the computer and printer.
- 2. Make sure that the IPP settings in EpsonNet WinAssist or EpsonNet WebAssist are correct. See "IPP" on page 81 or "IPP" on page 222 for instructions on settings for IPP.
- 3. To start EpsonNet Internet Print, click Start, point to Programs and then EpsonNet Internet Print, then click Add EpsonNet Internet Print Port.

4. The following screen appears. The address you set here becomes the port for Internet printing. Make the settings described below.

EpsonNet Internet Print.	×	
EpsonNet Internet Print	OK Cancel	
Appropriate Weak Science Scien	Get Printer Attributes	
	☐ Get <u>s</u> tatus every 20 sec.	
Enter Printer URI (e.g http://www.epson.com:631/pr	nter):	
http://		
Enter Proxy Server Name (e.g. proxy.epson.com):	Port Number	
Notice: Printer URI is treated as port name. But Windows has limit of port name length less than 49 characters. So Please input Printer URI length within 49 characters using IP Address or short LOGICAL Printer name.		
	EpsonNet Internet Print 1.1bE	

#### **Enter Printer URI:**

Enter the target printer's URI up to 49 characters. The URI you set here must be same as the IPP URL you have set for the IPP setting screen in EpsonNet WinAssist/WebAssist. Do not use the following characters;  $| \setminus [] \{\} < > # "`$ 

*Format:* http://IP address of printer:631/printer name *Example:* http://192.168.100.201:631/EPSON\_IPP\_Printer

#### **Use Proxy:**

When using the proxy server, select this box and enter the Proxy Server Name and Port Number. All communication is done via the proxy server.

#### Enter Proxy Server Name:

Enter the proxy server name or the IP address of the proxy server. You can enter up to 256 characters, but only 127 characters are valid. Do not use the following characters; | \ [] { } <> # "`

#### Port Number:

Enter the port number of the proxy server (from 0 to 65535).

#### **Get Printer Attributes:**

When you select this box and click OK, EpsonNet Internet Print communicates with the printer and acquires information, so it may take a few minutes before a message appears. This setting is available only when creating a port.

#### Get status every 20 sec.:

Select this box when you want to receive printer status updates at regular intervals (every 5 seconds during printing and every 20 seconds when idle). If you select this box, a message will appear if an error occurs during printing. You can also check the printer status by double-clicking the printer icon.

#### OK button:

Saves the settings.

#### Cancel button:

Cancels any changes.

- □ The settings you make above can be changed from the printer driver. In the printer Properties dialog box, click the Details tab, and click the Port Settings button to change the settings.
- □ Be aware that when connecting to the Internet using a dial-up router and selecting the Get status every 20 sec check box, you may be charged for the extra line connection.
- □ When you check the Get Printer Attributes check box and click OK, an error message may appear. Be sure that the printer power is on, and the printer is correctly connected on the network.

- □ If the printer power is off or there is a problem on the network, the Get status every 20 sec check box is automatically cleared. If this happens, make sure that the printer power is on and the printer is correctly connected on the network, and then select the Get status every 20 sec check box again.
- 5. Click OK to save settings.
- 6. When a message appears saying the settings are correctly configured, click OK to start the Add Printer Wizard. Click Next.

#### Note:

*If you click* Cancel *and then later want to add the printer, start the Add Printer Wizard and follow the steps below.* 

- 7. Click the Local printer radio button and click Next.
- 8. Select the printer driver and click Next.

If the following dialog box appears, select Replace existing driver and click Next.



9. Select the port added by EpsonNet Internet Print in the previous section. Click Next.

Add Printer Wizard	
	Click the port you want to use with this printer, and then click Next. Available ports: COM1: Communications Port FILE: Creates a file on disk Inter//192158100201531/ERSIONJPP.Printer LPT1: EPSON Printer Port 
	< <u>B</u> ack Next > Cancel

- 10. Follow the on-screen instructions to install the printer driver.
- 11. If a dialog box instructing you to install EPSON Status Monitor 2 or EPSON Status Monitor 3 appears, click Concel and terminate the installation.

- □ If you delete the port which you set above from the D⊖tαils tab of the printer properties, you cannot reuse the deleted port name as a new port name (the printer URI) until you restart the computer.
- □ If you are using EPSON Status Monitor 3 and printing with EpsonNet Internet Print, the message "A communication error has occurred." appears. You can get rid of this message by clearing the Monitor the Printing Status check box in the Utility menu of the printer properties.

### Windows NT 4.0

- 1. Be sure that TCP/IP is correctly installed and setup in the computer and a valid IP address is set for the computer and printer.
- 2. Make sure that the IPP settings in EpsonNet WinAssist or EpsonNet WebAssist are correct. See "IPP" on page 81 or "IPP" on page 222 for instructions on settings for IPP.
- 3. Click Start, point to Settings, and then select Printers.
- 4. Double-click the Add Printer icon and click Next.
- 5. Click the My Computer radio button and click Next.
- 6. Click the Add Port button, and select EPSON IPP Port from the list. Then click the New Port button.

Printer Ports ? X
Available Printer Ports: Digital Network Port ERSON IPP Port Lexmark DLC Network Port Lexmark TCP/IP Network Port Local Port LPR Port
New Monitor
New Port Cancel

7. The following screen appears. The address you set here becomes the port for Internet printing. Make the settings described below.

EpsonNet Internet Print.	×	
EpsonNet Internet Print	OK Cancel	
Enter Printer URI (e.g http://www.epson.com:631/prin	- nter):	
http://		
☐ <u>U</u> se Proxy		
Enter Proxy Server Name (e.g. proxy.epson.com):	Port Number	
Notice: Printer URI is treated as port name. But Windows has limit of port name length less than 127 characters. So Please input Printer URI length within 127 characters using IP Address or short LOGICAL Printer name.		
Eps	onNet Internet Print 1.1bE	

#### **Enter Printer URI:**

Enter the target printer's URI (up to 127 characters). The URI you set here must be the same as the IPP URL you set for the IPP configuration in EpsonNet WinAssist/WebAssist. Do not use the following characters;  $| \setminus [] \{\} <> #$ 

*Format:* http://IP address of printer:631/printer name *Example:* http://192.168.100.201:631/EPSON\_IPP\_Printer

#### Use Proxy:

When using a proxy server, select this box and enter the Proxy Server Name and Port Number. All communication is done via the proxy server.

#### **Enter Proxy Server Name:**

Enter the proxy server name or the IP address of the proxy server (up to 256 characters). Do not use the following characters;  $| \setminus [ ] \{ \} <> # "`$ 

#### Port Number:

Enter the port number of the proxy server (from 0 to 65535).

#### **Get Printer Attributes:**

When you select this box and click OK, EpsonNet Internet Print communicates with the printer and acquires information, so it may take a few minutes before a message appears. This setting is available only when creating a port.

#### Get status every 20 sec.:

Select this box when you want to receive printer status updates at regular intervals (every 5 seconds during printing and every 20 seconds when idle). If you select this box, a message will appear if an error occurs during printing. You can also check the printer status by double-clicking the printer icon.

**OK button:** Saves the settings.

Cancel button: Cancels any changes.

- □ The settings can be changed after setting up the printer. In the printer Properties dialog box, click the Ports tab, and click the Configure Port button to change the settings.
- □ Be aware that if you connect to the Internet using a dial-up router and select the Get status every 20 sec check box, you may be charged for the extra line connection.
- □ When you select the Get Printer Attributes check box and click OK, an error message may appear. Be sure that the printer power is on, and the printer is connected to the network.
- □ If the printer power is off or there is a problem in the network, the Get status every 20 sec check box is automatically cleared. If this happens, make sure that the printer power is on and the printer is correctly connected on the network, and then select the Get status every 20 sec check box again.

- 8. Click OK to save the settings.
- 9. Select the printer driver, and follow the on-screen instructions to install the printer driver.

#### Note:

When you are using EPSON Status Monitor 3 and printing from EpsonNet Internet Print, the message "A communication error has occurred." appears. To clear this message, right-click the printer icon, select Document Defaults, and select the Utility tab. Then select the Monitor the Printing Status check box.

# Status Alert Window

The EpsonNet Internet Print utility updates the status of the IPP printer if you have selected the Get status every 20 sec check box in the EpsonNet Internet Print dialog box.

The status alert window appears when the printer is out of paper, toner, or ink, if paper is jammed, the cover is open, or when the printer is offline.

The EpsonNet Internet Print utility checks the printer status every 5 seconds during printing and every 20 seconds when idle. If you do not want to check the printer status, clear the Get status every 20 sec check box in the EpsonNet Internet Print dialog box.

# Chapter 10 **EpsonNet WebAssist**

# About EpsonNet WebAssist

EpsonNet WebAssist is a web-based software designed to configure the printer for use on a network.

By typing the IP address of the print server for the URL in your browser, you can start EpsonNet WebAssist that allows you to configure the print server for TCP/IP, NetWare, MS Network, AppleTalk, IPP, and SNMP.

### Supported Web browser

- □ Microsoft Internet Explorer version 4.0 or later
- □ Netscape Communicator version 4.0 or later
- □ Netscape Navigator version 3.02 or later

#### Note for Windows NT 4.0 users:

*If you have not yet upgraded to Windows NT Service Pack 3, install the Windows NT Service Pack before installing Microsoft Internet Explorer.* 

# About Web browser setting

When running EpsonNet WebAssist, be sure not to use a proxy server to access the Internet. If the Access the Internet using a proxy server check box is selected, you cannot use EpsonNet WebAssist. Use the following steps to clear the Access the Internet using a proxy server check box.

- 1. Right-click the Internet Explorer icon on the desktop, and then select Properties.
- 2. Click the Connection tab.
- 3. Clear the Access the Internet using a proxy server check box.

# Configuring the Print Server Using EpsonNet WebAssist

After you have assigned an IP address to the print server using EpsonNet WinAssist, MacAssist, or the arp/ping command, you can configure the print server using EpsonNet WebAssist.

- □ *A web browser must be installed on your computer.*
- **TCP/IP** *must be correctly set for the computer and the print server.*
- Do not run both EpsonNet WinAssist/MacAssist and EpsonNet WebAssist at the same time.
- □ Your browser may restrict some characters you can use. For details, see your browser or OS documentation.

□ If you are using the dial-up environment and not using NetWare, select Disable in the NetWare screen. If Enable is selected, the extra account might be charged when you are using the dial-up router.

Follow the steps below to change the IP address using EpsonNet WebAssist.

- 1. Turn on your printer.
- 2. Run EpsonNet WebAssist using one of the following ways.
  - Run EpsonNet WinAssist or EpsonNet MacAssist. Select the printer you want to configure from the list and then click Launch Browser.
  - Open your browser, and then type in the IP address of the print server directly. Do not run EpsonNet WinAssist or MacAssist.

http://IP address of print server/

Example: http://192.168.100.201/

#### Note on NetWare setting:

- □ From any NetWare client, log in to the target NetWare server or NDS context with supervisor privileges.
- □ You cannot create a print server, print queue, or printer with EpsonNet WebAssist. You must have created these objects before using EpsonNet WebAssist.
- 3. Click TCP/IP under Network on the Configuration menu to view the TCP/IP setting screen.

#### Note:

*If you want to configure a protocol other than TCP/IP, see "Configuration - Network Screens" on page 217.* 

EpsonNet WebAssist	[Home] [Favorite] [Help] [About We	bAssist]		EPSON
Information General NetWare	Configuration - Network TCP/IP			?
TCP/IP AppleTalk MS Network	IP Address Settings			
IPP SNMP Time	Method for Acquiring the IP Address	Auto 💌		
Configuration	IP Address	200.000.000		
Network	Subnet Mask	00000000000		
Ethemet NetWare TCP/IP	Default Gateway	000.000.000		
AppleTalk MS Network IPP SNMP Time	Set Using Automatic Private IP Addressing (APIPA)	Enable 💌		
Optional	Set Using PING	Enable 💌		
<u>A dministrator</u> <u>Reset</u> Password	DNS Server Address Setting	î2		-
1.0001049	Acquire DNS Server Address Automatically	Enable 💌		
	DNS Server Address	000.000.000.000 000.000.000		
	Host Name and Domain Nar	ne Settings		
	Acquire Host Name and			
	Domain Name Automatically	Disable 💌		<u>.</u>
Ê			🕮 Local intran	et /

4. Select the method for acquiring the IP address. When you select Auto, DHCP becomes available and assigns an IP address automatically. If you want to set the IP address manually, select Manual.

- □ The network administrator must confirm any changes made to the IP address settings.
- □ When Auto is selected, DHCP becomes available. To use the DHCP server, make sure it is installed on your computer and correctly configured. See your operating system's online help for detailed instructions.

- □ If Set Using Automatic Private IP Addressing (APIPA) is enabled, a private IP address is automatically assigned to the print server even when there are no DHCP servers on your system or your network.
- □ If the Dynamic DNS function is not supported, we recommend that you select Manual and then enter an IP address. This is because if you select Auto, the IP address of the print server changes every time you turn on the printer so that you need to change the printer port setting accordingly.
- 5. To assign an IP address manually, enter the IP address, the subnet mask, and the default gateway. Be sure the IP address does not conflict with any other devices on the network.

#### Note:

If there is a server or a router functioning as a gateway, enter the IP address of the server or the router for the gateway address. If there is no gateway, leave the default values there.

- 6. If you want to get a private address between 169.254.1.1 and 169.254.254.254 automatically when an IP address cannot be obtained by the DHCP server, leave it at Enable for Set Using Automatic Private IP Addressing (APIPA); otherwise, select Disable.
- 7. When setting an IP address using the ping command, select Enable for Set Using PING. Select Disable when setting an IP address with EpsonNet WinAssist/MacAssist/WebAssist; this prevents any unexpected change of the IP address.

#### Note:

*Be sure to select* Disable *when not using ping; this prevents an unexpected change of the IP address by EpsonNet WebManager.* 

8. Select Enable for Acquire DNS Server Address Automatically if you want to acquire the DNS server address using the DHCP server.

If you want to enter the DNS server address manually, select Disable and then enter the IP address of the DNS server.

9. Select Enable for Acquire Host Name and Domain Name Automatically if you want to acquire the host name and the domain name using the DHCP server.

If you want to specify manually, enter the host name and the domain name in the text boxes.

10. Select Enable for Register Network Interface Address to DNS Server if you want to register the host name and domain name to the DNS server through the DHCP server that supports Dynamic DNS.

If you want to register the host name and the domain name directly to the DNS server, select Enable for Register Network Interface Address Directly to DNS Server.

- 11. Select Enable or Disable for Use Universal Plug and Play. Select Enable if you want to use the Universal Plug and Play function on Windows Me or future operating systems.
- 12. Change the default Universal Plug and Play device name, if desired. This device name is used for Windows that supports the Universal Plug and Play function.
- 13. Mac OS X only:

Select Enable or Disable for Use Rendezvous. If your network environment supports DHCP, you can use the printer on the network just by enabling this setting.

14. Click Submit and then enter the password to update the settings. The same password is required for EpsonNet WinAssist, MacAssist, and WebAssist. See "Password" on page 226 for more information on setting the password.

#### Note:

*If you have set the Administrator Name in the Administrator screen, enter the administrator name for the user name.* 

15. If the message "Configuration change is complete!" appears on your screen, the update is complete. Do not exit the Web browser and do not send a job to the printer until this message appears. Follow the on-screen instructions to reset the printer.

#### Note:

- □ Since the new IP address becomes available after the printer is reset, you need to restart EpsonNet WebAssist by entering the new IP address.
- Only changes on the page where you press the Submit button take effect.

# **Opening Screen**

Any user can access the following screen by typing the IP address of the print server for the URL in your browser.

EpsonNet WebAssist	[Home] [Favorite] [Help] [About W	'ebAssist]		EPSON
muormation	Information General			?
	Administrator Name Location			
	Interface Card Model Name	EIPE1		
	MAC Address	*****		
Ethemet NetWare	Hardware Version	Ver. XXXX		
TCP/IP AppleTalk	Software Version	Ver. XXXX		
MS Network IPP SNMP Time	Model Name	Stylus Pro XXX		
Ontional	Network Status	100BASE-TX, Half Duplex		
Optional Administrator Reset Password	Printer Status	Ready or Printing		
	Current Time	2000-01-01 00:00:09 GMT+00:00		
		Refresh		
Done			OF Local intra	snet //

# Index

Home	Links to the opening screen.
Favorite	Links to a Web site previously defined by the administrator.
Help	Links to Help.
About WebAssist	Links to the copyright and version information for EpsonNet WebAssist.
EPSON logo	Links to the Epson Web site (http://www.epson.com).

## Menu

Information	
General	Displays the print server information.
NetWare	Displays information about NetWare.
TCP/IP	Displays information about TCP/IP.
AppleTalk	Displays information about AppleTalk.
MS Network	Displays information about Microsoft Network.
IPP	Displays information about IPP.
SNMP	Displays information about SNMP.
Time	Displays information about time.
Configuration - Network	
Ethernet	Configure the applicable settings for Ethernet.
NetWare	Configure the applicable settings for NetWare.
TCP/IP	Configure the desired settings/method for TCP/IP.
AppleTalk	Configure the desired settings for AppleTalk.
MS Network	Configure the desired settings for Microsoft Network.

IPP	Configure the desired settings for IPP.
SNMP	Configure the desired settings for SNMP.
Time	Configure the desired settings for time.
Configuration - Optional	
Administrator	Type the name of the administrator and a link to a favorite Web site.
Reset	Resets the printer and returns to the default settings.
Password	Set the password to protect settings.

# Information

# General information

Items	Explanations
Administrator Name	Administrator name of the printer
Location	Location of the printer
Interface Card Model Name	Model of the print server
MAC Address	Unique hardware address of the print server. You can distinguish the print server by its MAC address.
Hardware Version	Hardware version of the print server
Software Version	Software version of the print server
Model Name	Product name of the printer attached to the print server
Network Status	Displays the current Ethernet speed and duplex setting.

Printer Status	The background color of the text box indicates the printer's status. Green indicates that the printer is idle or printing. Yellow indicates that either the paper or toner is low. Red indicates that either the paper or toner is completely out, the printer is offline, there is a paper jam, the cover is open, or an error has occurred.
Current Time	Displays the current time.
Refresh button	Refreshes the printer status. The printer status is not updated automatically. Press Refresh to display the latest printer information.

## **Configuration - Network Screens**

## Ethernet

Items	Explanations
Speed/Duplex Setting	Select an appropriate Ethernet speed and duplex setting. Normally, Auto can be selected. If you select a setting other than Auto, make sure the setting corresponds to the type of hub you are using.

## **NetWare**

#### **NetWare Basic Configuration**

Items	Explanations
Use NetWare	Enable or Disable NetWare.
Frame Type	Leave the default frame type (Auto) as it is.
Mode	Select an appropriate NetWare mode.
	When using 4.x/5.x/6.x NDS Print Server, select NDS Print Server.
	When using 3.x/4.x Bindery Print Server, select Bindery Print Server.
	When using Remote Printer mode, select Remote Printer.
	When not using NetWare, select Standby.

#### Print Server Mode/NDS/Bindery

Items	Explanations
Print Server Name	Enter the print server's name (up to 47 characters).
Polling Interval	Enter the polling interval in seconds.
NetWare Password	Enter the password (up to 20 characters) you use when you log in to the print server.
NDS Tree Name	For the NDS Print Server mode only: Enter the NDS tree name (up to 31 characters).
NDS Context	For the NDS Print Server mode only: Enter the NDS context (up to 255 characters).
Primary File Server Name	For the Bindery Print Server mode only: Enter the name (up to 47 characters) of the file server where the print server logs in.

#### **Remote Printer Mode**

Items	Explanations
Primary Print Server Name	Enter the primary print server name (up to 47 characters).
Printer Port Number	Enter the printer port number (0 to 254).

## TCP/IP

#### **IP Address Settings**

Items	Explanations
Method for Acquiring the IP Address	Select a method for acquiring IP addresses. If Auto is selected, DHCP becomes available. To use the DHCP server, make sure it is installed on your computer and correctly configured. See your operating system's online help for detailed instructions.
	To set the IP address manually, select Manual.
IP Address	Enter an IP address for the print server. Be sure the IP address does not conflict with any other devices on the network.
Subnet Mask	Set the subnet mask.
Default Gateway	Set the gateway address if needed.
Set Using Automatic Private IP Addressing (APIPA)	Select Enable to get a private address between 169.254.1.1 and 169.254.254.254 automatically when an IP address cannot be obtained by the DHCP server; otherwise, select Disable.
Set Using PING	Enables or disables IP address setting using the ping command.

### **DNS Server Address Settings**

Items	Explanations
Acquire DNS Server Address Automatically	Select either Enable or Disable to acquire the DNS server address from the DHCP server.
DNS Server Address	Enter the DNS server address. When the DHCP server does not respond even Enable is selected for Acquire DNS server address automatically, the DNS server address set here is used.

#### Host Name and Domain Name Settings

Items	Explanations
Acquire Host Name and Domain Name Automatically	Select either Enable or Disable to acquire the host name and domain name from the DHCP server.
Host Name	Enter the host name supported by Dynamic DNS (between 2 and 63 characters). The total number of characters of the host name and the domain name must not exceed 251.
Domain Name	Leave it blank or enter two or more characters of the domain name. The total number of characters of the host name and the domain name must not exceed 251.
Register Network Interface Address to DNS Server	Select Enable if you want to send the host name and the domain name to the DHCP server that supports Dynamic DNS update to request for DNS dynamic updates.
Register Network Interface Address Directly to DNS Server	Select Enable if you want to directly send the host name and the domain name to the DNS server that supports Dynamic DNS update to request for DNS dynamic updates.When Register the network interface's address to DNS server is Disable, then this setting is the same as Disable.

### **Universal Plug and Play Settings**

Items	Explanations
Use Universal Plug and Play	Enables or disables Universal Plug and Play.
Device Name	Enter the device name.

### **Rendezvous Settings**

Items	Explanations
Use Rendezvous	Select either Enable or Disable to use Rendezvous.

## AppleTalk

Items	Explanations
Use AppleTalk	Enable or Disable AppleTalk.
Printer Name	Enter the name of the printer attached to the print server (up to 32 characters).
Zone Name	Enter the network zone name (up to 32 characters). To have the zone selected automatically, select Auto for the Network Number Set and enter an asterisk (*) in this text box.
Entity Type	Displays the printer's entity type. Do not change the entity type unless "epson" appears. If "epson" appears, enter an entity type to match your printer. Impact Dot Matrix (24 pin): EPSONLQ2
Network Number Set	Select Auto or Manual. Usually Auto is recommended.
Network Number for Manual Mode	Enter the network number when you select to set the Network Number manually.

## **MS Network**

Items	Explanations
Use Microsoft Network Shared Printing	Enable or Disable Microsoft network.
Print Server Name	Enter the print server name, which is the name of a computer on the network (up to 15 characters). Be sure to give a name that is unique on the network.
Workgroup Name	Enter the workgroup name or domain name (up to 15 characters).
Share Name	Enter the printer's shared name (up to 12 characters). LPT1, LPT2, or LPT3, or COM cannot be used.

IPP

You must make the following settings before setting up the printer for Internet Printing on Windows Me/XP/Server 2003/2000 or using EpsonNet Internet Print on Windows 98/95/NT 4.0. See "About EpsonNet Internet Print" on page 196 for more information.

Items	Explanations
IPP URL	Displays the printer's URL for Internet Printing.
	<i>Format:</i> http://IP address of printer:631/printer name set below
	<i>Example:</i> http://192.168.100.201:631/EPSON_IPP_Printer
Printer Name	Enter the name of a printer to use for Internet Printing (up to 127 characters).
	<b>Example:</b> EPSON_IPP_Printer
Location	Enter the name of the printer's physical location (up to 64 characters).

## **SNMP**

### Community

Items	Explanations
Read Only	The word "public" always appears.
Read/Write	Enter the Read/Write community name (up to 32 characters).

### IP Trap

Items	Explanations
Trap	Enable or Disable the trap.
Address	Enter the IP address of the server to which the trap is transmitted.
Community	Enter the community name (up to 32 characters).
Port Number	Enter the Port Number of the receive host, in decimal (0-65535).

### IPX Trap

Items	Explanations
Trap	Enable or Disable the trap.
Address	Enter Network Address and Node Number (MAC Address) of the server to which the trap is transmitted. <i>Format:</i> Network Address: Node Number Suppose Network Address is A7E00BB0 (hexadecimal) and Node Number is 000048930000 (hexadecimal). In this case, the address is A7E00BB0:000048930000.
Community	Enter the community name (up to 32 characters).
Socket Number	Enter the Socket Number of the receive host, in hexadecimal (0-FFFF).

## Time

Items	Explanations
Time	Displays the time. Click the Get Time button to reload the display. When Time Server is Enable, time is acquired from the time server.

#### **Manual Settings**

If the print server has RTC (Real Time Clock), you can set the time manually.

Items	Explanations
Date	Enter the year, month, and day.
Time	Enter the hour, minutes, and seconds.
Time Difference	Enter the difference between time at the present location and Greenwich Mean Time.
Apply button	Applies the settings.

#### **Time Server Settings**

Items	Explanations
Time Server	Select either Enable or Disable to time synchronize from the time server.
Time Server IP Address	Enter the IP address of the time server.
Synchronize Interval	Enter the time interval in minutes for automatic time synchronization.
Time Difference	Enter the difference between time at the present location and Greenwich Mean Time.
Time Server Status	Displays a connection status with the time server.
Apply button	Applies the settings.

## **Optional Screens**

## Administrator

You can link to the Web site specified on this screen when you click Fovorite (the name is changeable) in Index.

Items	Explanations
Administrator Name	Enter the name of the administrator (up to 255 characters).
Location	Enter the location of the print server (up to 255 characters).
Favorite Name	Enter the link item name (up to 20 characters) which will be displayed in Index.
Favorite URL	Enter a URL (up to 64 characters).
Description	Enter any comments concerning the URL above (up to 64 characters).

# *Note: Links to ftp are not supported.*

## Reset

You can reset the print server or return the settings to the default values.

Items	Explanations
Reset button	Functions like turning the power off and on again. Click this button to make the changes take effect.
Return to Default button	Returns the print server to the default settings.

## Password

The password set here protects the settings. You will be asked for the password when you update or change the settings on each setting screen. Passwords are case sensitive. No password is set by default.

Items	Explanations
Old Password	Input the old password.
New Password	Input the new password (up to 20 characters).
Re-input Password	Re-input the new password.

#### Note:

- □ The same password can be used for EpsonNet WinAssist, MacAssist, and WebAssist.
- □ If you forget your password, you need to initialize the print server. See "Initializing the Print Server" on page 235 for instructions.

## Chapter 11 Troubleshooting

## **General Problems**

# Cannot configure the print server or cannot print from the network.

Cause	What to do
The printer settings or network settings may be wrong.	First, check to see if you can print a status sheet, as described in "Status sheet button" on page 20. If you can print a status sheet, check the network settings; otherwise, set the interface mode of the printer's control panel to Auto or Option.

# Cannot print even if you have assigned the IP address to the computer and the printer.

Cause	What to do
You have assigned an IP address to the computer manually, but you assigned the IP address to the printer by Automatic Private IP Addressing (APIPA).	Assign the printer's IP address so that it belongs to the same segment of the computer. Use EpsonNet WinAssist/MacAssist/WebAssist and the printer's control panel.

# Cannot communicate with the print server. (The print server does not appear in the printer list of EpsonNet Win/MacAssist.)

Cause	What to do
The Ethernet setting of the print server is not appropriate for your network environment.	Check the setting of the HUB or the switch. Remove the print server from the printer, and change the jumper on the board. Be sure to see "Setting the Interface Mode" on page 236 for changing the interface mode by moving the jumper.

Unable to start EpsonNet WinAssist.	
Cause	What to do
You have added or deleted protocols after installing EpsonNet WinAssist.	Uninstall EpsonNet WinAssist and then reinstall it. See "Uninstalling Software" on page 255 and "Installing EpsonNet WinAssist/MacAssist" on page 44.

The message "EpsonNet WinAssist cannot be used because no network is installed." appears when you start EpsonNet WinAssist.

Cause	What to do
Both TCP/IP and IPX/SPX are not installed on the computer.	Install the TCP/IP or IPX/SPX protocol.
TCP/IP is installed on the computer, but its IP address is not set correctly.	Set a correct IP address for the computer.

# The message "Could not complete communicating configuration data" appears when you send settings to the print server.

Cause	What to do
This may happen when using a dial-up router.	Run Command Prompt from the computer on which EpsonNet WinAssist/MacAssist is installed, and then enter the following command:
	Format: >ROUTE_ADD_the IP address of the print server_ the IP address of the computer (the under bar represents one space)
	Example: >ROUTE ADD 192.168.192.168 22.33.44.55.

Unable to start EpsonNet WebAssist.	
Cause	What to do
You have not set the IP address for the print server.	Set the IP address for the print server using EpsonNet WinAssist, MacAssist, the printer's control panel, or the arp/ping commands. You can check the IP address on a status sheet. See "TCP/IP" on page 68, "TCP/IP" on page 97, or "Setting an IP Address Using the arp/ping Command" on page 250.

### Unable to set the IP address using the arp/ping commands.

Cause	What to do
The print server is not connected to the network.	Connect the print server to the network, and check the network environment.
The printer is located beyond the router.	The printer and the computer must be in the same segment.

# The Model Name and IP Address do not appear in the EpsonNet WinAssist dialog box.

Cause	What to do
If the valid IP address is not set, the items indicated in the dialog box mentioned above may not appear.	Set a valid IP address.
	Refresh the status by selecting Refresh from the View menu.
	Increase the length of time before a timeout. To do this, select Timeout from the Tool menu. Note that doing so can cause EpsonNet WinAssist to run more slowly.

#### An extra account is generated when using the dial-up network.

Cause	What to do
NetWare is set to Enable even though you are not using NetWare.	Set NetWare to Disable on the NetWare screen of EpsonNet WebAssist.

#### How to acquire an IP address.

To acquire your IP address, you need to apply to the NIC (Network Information Center) in your country.

## Problems Specific to Your Network Environment

## Windows Me/98/95 environment

A dial-up connection dialog box appears when printing with TCP/IP via EpsonNet Direct Print.

Cause	What to do
You have selected a phone line or modem (for Internet Explorer 4.0x) for the Internet connection.	Printing ends normally after you cancel this dialog box, but the message appears every time you print. Connect to the Internet using a local area network or start a dial-up network manually.

A communication error message appears when you start printing or when you open the printer's properties.

Cause	What to do
When you print with NetBEUI or IPP, EPSON Status Monitor cannot be used.	Open the printer's properties and then click the Optional Settings tab. Select the Update the Printer Option Information manually radio button.
	Open the printer's properties and then click the Utility tab. Clear the Monitor the Printing Status check box.

## Windows 2000/NT environment

A dial-up connection dialog box appears when printing with TCP/IP via EpsonNet Direct Print.

Cause	What to do
You have selected a phone line or modem (for Internet Explorer 4.0x) for the Internet connection.	Printing ends normally after you cancel this dialog box, but the message appears every time you print. Connect to the Internet using a local area network or start a dial-up network manually.

# A communication error message appears when you start printing or when you open the printer's properties.

Cause	What to do
When you print with NetBEUI or IPP, EPSON Status Monitor cannot be used.	Open the printer's properties and then click the Optional Settings tab. Select the Update the Printer Option Information manually radio button.
	Open the printer's properties and then click the Utility tab. Clear the Monitor the Printing Status check box.

# No clients except an administrator can print via Windows NT Server 4.0.

Cause	What to do
CREATOR OWNER has been deleted from the Printer Permissions list, or CREATOR OWNER is set to Print or No Access.	Add CREATOR OWNER by clicking the Add button in the Printer Permissions dialog box, or set CREATOR OWNER to Manage Documents (default setting).

## Macintosh environment

Printers do not appear in Chooser.	
Cause	What to do
You may have selected a wrong one for "Connect via" in the AppleTalk Control Panel.	Make sure to select Ethernet in AppleTalk Control Panel, and make sure AppleTalk is active in Chooser. Also, check the network equipment including the hub cable.

#### The Rendezvous printer setting is overwritten by the AppleTalk printer setting when the same printer is set up with AppleTalk after the printer is set up with Rendezvous.

Change the AppleTalk printer name so that it does not conflict with the Rendezvous printer name.

#### Nothing prints even though clients have sent data to the printer.

Cause	What to do
, 0	Make sure clients are registered as users of the print queue and the print server. Also, make sure the print server is logged in to the NetWare server.

#### EpsonNet WinAssist/WebAssist will not start correctly.

Cause	What to do
Microsoft NetWare Directory Service is installed on your computer.	If you are using the NDS service, install the Novell NetWare Client service.

It takes a long time to start epsoninet winAssist.	
Cause	What to do
The Novell Client service is installed.	Double-click Network in Control Panel, and then double-click the network adapter that does not use the IPX/SPX-compatible protocol. Clear the items related to IPX to unbind IPX.

# It takes a long time to start Enson Net Win Assist

The printers on the IPX network do not appear in the EpsonNet WinAssist dialog box.

Cause	What to do
The printer is turned off.	Turn on the printer.
The printer is not in the same segment as the computer where you installed EpsonNet WinAssist.	To search for print servers in other segments, use Search Options of EpsonNet WinAssist.
You have not logged in to the target NetWare server with supervisor privileges.	From the computer on which EpsonNet WinAssist is installed, log in to the target NetWare server with supervisor privileges.

## Initializing the Print Server

To initialize your print server, turn on the printer, and then plug the power cord of the print server into a wall outlet while holding down the status sheet button of the print server for twenty seconds. The length of time necessary to hold down the status sheet button varies depending on the printer model. The orange Status light and yellow Data light both turn on, indicating the print server is being initialized.

After the initialization is complete, press the status sheet button to print a status sheet. Check the information on the status sheet.

#### Note:

You can also initialize the print server using EpsonNet WinAssist, MacAssist, or WebAssist by clicking the Return to Default button.

## Setting the Interface Mode

The print server automatically selects an interface mode by default. If you want to change the interface mode of the print server, use EpsonNet Win/Mac/WebAssist or the jumpters on the print server.

## Using EpsonNet Win/Mac/WebAssist

See the following pages to change the interface mode of the print server using EpsonNet Win/Mac/WebAssist:

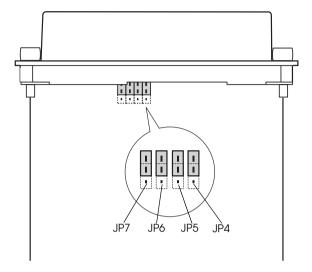
- □ To use EpsonNet WinAssist, see "Ethernet" on page 67.
- □ To use EpsonNet MacAssist, see "Ethernet" on page 96.
- □ To use EpsonNet WebAssist, see "Ethernet" on page 217.

## Using jumpers on the print server

See the following steps to manually set an interface mode of the print server using jumpers.

- 1. Turn off your printer. If you are using an ink jet printer, unplug the power cord from the wall outlet.
- 2. Pull out the print server from the printer's interface slot, and place it on an insulator such as a sheet.
- 3. Use the following table to change the jumper settings.

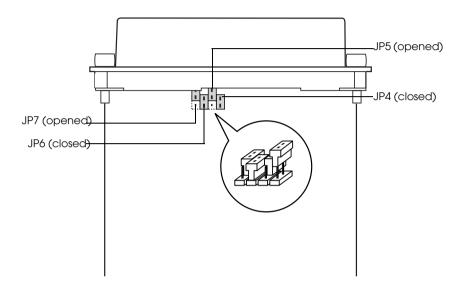
*Note: All of the jumpers are opened by default.*  Do not change any jumpers other than those listed in following table.



•

JP4	JP5	JP6	JP7	Mode
Open	Open	Open	Open	Auto-negotiation (10Half, 10Full, 100Half, 100Full) Factory default settings
Close	Close	Open	Open	100 Base-TX Full Duplex
Close	Close	Open	Close	100 Base-TX Half Duplex
Close	Open	Close	Open	10 Base-T Full Duplex
Close	Open	Close	Close	10 Base-T Half Duplex

For example, if you want to set to 10Base and Full Duplex, pull out the jumper of JP4 and JP6, and put it over the two pins. The following illustration indicates that JP4 and JP6 are closed and JP5 and JP7 are opened.



- 4. After changing the settings, make sure the printer is turned off, and then insert the print server into the printer's interface slot.
- 5. Turn on your printer.

# Chapter 12 **EpsonNet WebManager**

## About EpsonNet WebManager

EpsonNet WebManager is an application designed to manage network devices. It allows network administrators to easily control network devices such as network printers, interface cards, and network adapters attached to a printer. EpsonNet WebManager offers the following features:

- It supports Windows, Macintosh, and UNIX platforms to give network administrators flexibility in managing network devices.
- □ It allows you to search and monitor network devices, and make settings for network devices.
- □ It offers a Group Management function that helps you manage devices as a group.
- □ It provides printer driver management functions: such as the ability to store printer drivers on the EpsonNet WebManager server, and easy installation of printer drivers on client PCs.
- □ It allows you to access the screen faster in the text mode.

#### Note:

- Before installing and using EpsonNet WebManager, be sure to read the README file. This file contains the latest information on EpsonNet WebManager.
- □ *The term "device" refers to a printer, interface card, or network adapter.*

## System Requirements

#### Note:

- □ Before using EpsonNet WebManager, the computer and other devices must be properly connected to the network.
- □ Since EpsonNet WebManager runs on a web browser, you must install TCP/IP and a web browser first. See the README file for supported browsers.

#### EpsonNet WebManager server operating systems

EpsonNet WebManager server is the computer where you have installed EpsonNet WebManager.

Operating system	Windows XP Professional/Home Edition
	Windows Server 2003
	Windows 2000 Professional/Server/Advanced Server (with Service Pack 3 or higher)
	Windows NT 4.0 Server/Workstation (with Service Pack 6 or higher)
System	Pentium 300 MHz or better recommended
Memory	256MB
Hard disk space	100MB (1GB is recommended when using the printer driver management function.)

#### EpsonNet WebManager client operating systems

You can access the EpsonNet WebManager server from the following operating systems through a browser.

- □ Windows Me/98/XP/Server 2003/2000/NT 4.0
- □ Macintosh
- UNIX (see the README file for supported UNIX systems)
- □ Monitor: 1024 x 768 or higher resolution VGA monitor with support for 256 or more display colors

## EpsonNet WebManager Functions

EpsonNet WebManager provides you with the following functions:

- Device list function Searches for devices on the network and displays a device list with current status.
- Device details function You can make or change the printer settings through EpsonNet WebManager. The setting items in the Device details function will differ depending on the printer.
- Network settings function You can make or change the network interface settings through EpsonNet WebManager.
- □ Group management function Groups can help you manage network devices more effectively.
- Printer driver management Downloading and updating the printer driver through the Internet automatically, and easy installation of the printer driver on client PCs.

Note:

- □ Some functions of EpsonNet WebManager may not be available depending on the combination of network devices. See the Introduction of the EpsonNet WebManager Reference Guide for detailed information.
- When using EpsonNet WebManager with Internet Explorer in Mac OS, the Printer Layout window, Error Notification window, and Device Details window may not be available.

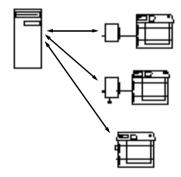
## EpsonNet WebManager Operating Structure

EpsonNet WebManager must be installed in the computer that functions as the network server. You can select the either of the two methods described below to use EpsonNet WebManager.

# EpsonNet WebManager and a Web browser running on the same PC

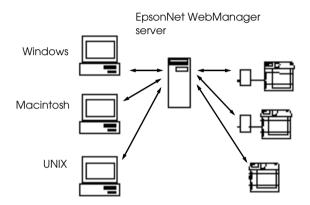
No special server is required. Just install EpsonNet WebManager and a Web browser on the same computer that functions as a server. All administration is possible from the network administrator's Windows Me/98/XP/Server 2003/2000/NT 4.0 computer.

EpsonNet WebManager server



# EpsonNet WebManager and a Web browser running on different PCs

Install EpsonNet WebManager in the server, and install a Web browser in the client computers. Run the Web browser on a client computer to access EpsonNet WebManager on the server. Multi-platform network administration is possible from Windows, Macintosh, and UNIX platforms through the browser.



## Installing EpsonNet WebManager

Follow the steps below to install EpsonNet WebManager.

- 1. Insert the Software CD-ROM in the CD-ROM drive.
- 2. The EPSON Installation Program screen opens automatically.

If the Installer dialog box does not appear, double-click SETUP.EXE on the CD-ROM.

- 3. Select Install EpsonNet WebManager, and then click .
- 4. Follow the on-screen instructions to complete the installation.

#### Note:

- □ You do not need to install EpsonNet WebManager in the client computer. Just announce the IP address or host name of the server to any clients who use EpsonNet WebManager from a client computer.
- □ To use the printer driver management function, you need to select Custom and then select the check box during installation.

## Starting EpsonNet WebManager

Be sure that TCP/IP is installed, and the IP address or host name is set for the computer. (Register the host name in the hosts file in the Windows directory.)

#### From the server

To start EpsonNet WebManager, click Start, point to Programs or All Programs (Windows XP/Server 2003), then EpsonNet WebManager, then select EpsonNet WebManager.

#### From the client

Run the Web browser and type the IP address (or the host name) of the server and default port number.

- Format: http://IP address or host name of server:8090/
- □ Example: http://192.168.100.201:8090/

## **Opening the Online Guide**

After starting EpsonNet WebManager, be sure to read the EpsonNet WebManager's online reference guide. It provides important information and instructions on using EpsonNet WebManager.

You can access the online guide by using any of the following methods:

□ Run EpsonNet WebManager. From the Help menu, select Online Guide.

- □ Click the question mark button on the current screen so that a help screen appears describing the functions on that page.
- Click Start, point to Programs or All Programs (Windows XP/Server 2003), and then select EpsonNet WebManager. Click Online Guide.

## Appendix A **Tips for Administrator**

## Selecting a Printing Method

If necessary, use this section to help you select a printing method.

## Printing from Windows

Check if there is a Windows XP/Server 2003/2000/NT print server on your network, and then use the suggestions below.

#### Note:

Only the recommended printing methods are introduced here. See "Features of the Printing Methods" on page 248 for information on additional methods.

### If no Windows XP/Server 2003/2000/NT print server exists

Use a printing method appropriate to your operating system:

- For Windows Me/98/95
   We recommend TCP/IP printing via EpsonNet Direct Print.
   See "About EpsonNet Direct Print" on page 181.
- □ For Windows XP/Server 2003/2000/NT We recommend TCP/IP printing via LPR. See "Windows XP" on page 113, "Windows Server 2003" on page 119, "Windows 2000" on page 127, or "Windows NT 4.0" on page 133.

### If a Windows XP/Server 2003/2000/NT print server exists

On the server, set the printer to connect with LPR and turn it into a shared printer. Your clients can then print to this shared printer.

## Printing from Macintosh

Use AppleTalk to print from Macintosh. See "Macintosh" on page 40.

## Features of the Printing Methods

This section describes features of the printing methods available for you to choose.

## LPR (TCP/IP) printing

**Advantages** 

- □ No computer as a print server is required.
- □ No special utility for Windows XP/Server 2003/2000/NT is required.
- □ You can see the printer status using EPSON Status Monitor 2 or 3.
- □ For Windows XP/Server 2003/2000/NT, you can create a print log using the event viewer.
- □ You can print via a router.

#### Disadvantages

- □ You need to set up TCP/IP.
- □ For Windows Me/98/95, EpsonNet Direct Print must be installed on all computers to use for printing.

## Internet printing

Advantages

- □ No proxy server (computer) is required.
- □ You can print to the printer over the Internet.

### Disadvantages

- **EPSON** Status Monitor 2 or 3 cannot be used.
- **□** TCP/IP and DNS settings are required.
- □ For Windows Me/98/95, EpsonNet Internet Print must be installed on all computers used for printing.
- □ For Windows XP/Server 2003/2000, you cannot share the Internet printer.

## Microsoft Network Shared printing

### Advantages

- □ Easy to set up (IP address is not required if NetBEUI protocol is installed).
- □ No computer as a print server is required.
- □ No special print utility is required.

#### Disadvantages

- **EPSON** Status Monitor 2 or 3 cannot be used.
- □ You cannot print via a router.
- □ It takes a longer time to start printing because more time is required to search for a network printer.

# Setting an IP Address Using the arp/ping Command

If you are using UNIX or OS/2, you need to use the arp and ping command to set the IP address of the print server. You can also use these commands with Windows Me/98/95/XP/Server 2003/2000/NT 4.0, if you have correctly installed TCP/IP networking on these systems.

#### Note:

- Make sure that the Set using PING function is enabled on the TCP/IP menu in EpsonNet WinAssist or EpsonNet WebAssist. If this function is disabled, you cannot set the IP address using the arp/ping command.
- □ Make sure the print server and the computer are in the same segment.

Before you start, you need the following information:

- A valid IP address for the print server. Ask your network administrator for an IP address which does not cause conflicts with any other device on the network. If you are the network administrator, choose an address within your subnet which does not conflict with any other device.
- □ The MAC (Ethernet hardware) address of the print server. You can find out the MAC address on a status sheet.

## Checking the LAN

First, you need to check that the computer can reach to other computer in the same segment, as follows:

1. Set the default gateway to the host on which you are setting up the print server.

If there is a server or a router which acts as a gateway, enter the address of the server or the router. If there is no gateway, enter the IP address of your computer as a gateway address.

- 2. Assume that you want to reach to the computer having the IP address "192.168.100.101". Check that the computer is reachable by "pinging" it from the command line: ping 192.168.100.101
- If the computer is reachable, you can see the following result (the exact form of the message depends on your operating system, and the time may vary): 64 bytes from 192:168:100:101:icmp\_seq=0. Time=34.ms
- If the computer is unreachable, you may see something like this: PING 192:168:100:101:56 data bytes

If you press Ctrl-C, you may see something like this: 192:168:100:101 PING Statistics 3 packets transmitted, 0 packets received, 100% packet loss

Again, the exact wording of the message you see may differ from this, depending on your operating system. If you cannot "ping" the computer, check the following:

- □ The address in the ping command is correct.
- □ The Ethernet connection to the computer has been made correctly, and all hubs, routers, etc. are switched on.

## Setting and checking the new IP address

To set the new IP address of the print server which you have obtained from your network administrator, use the ping command and arp command with the -s flag (create an ARP entry).

#### Note:

In the following procedure, we assume that the MAC address of your print server is 00:00:48:93:00:00 (hexadecimal), and that the IP address which you will be assigning is 192.168.100.201 (decimal). Substitute your values for these addresses when you type in the commands.

- 1. From the command line, type: Example: arp -s 192.168.100.201 00-00-48-93-00-00
- 2. Execute the ping command to set the IP address by pinging it: Example: ping 192.168.100.201
- 3. The print server should now respond to the ping. If it does not, you may have incorrectly typed the MAC address or the IP address in the arp -s command. Double-check and try again. If none of these actions are effective, re-initialize the print server and try again.
- 4. Print a status sheet to check whether the new IP address has been assigned to the print server.

#### Note:

When the IP address is set by the ping command, the subnet mask is automatically changed by the class of the IP address. To change the subnet mask and the default gateway according to your network environment, use EpsonNet WinAssist on Windows operating systems or EpsonNet MacAssist in Macintosh.

## Instructions on Using a Dial-Up Router

This section describes instructions on using a dial-up router.

If DHCP is used to assign an IP address of the printer and the Dynamic DNS function is not supported, you need to change the printer port setting every time you turn on the printer. Therefore, we recommend that you set a valid IP address for the print server by using the one of the following methods.

- □ Set the IP address for the print server manually. Use EpsonNet WinAssist or MacAssist. See "TCP/IP" on page 68 or "TCP/IP" on page 97.
- □ Specify the print server by using the bind of DHCP function.
- □ Set the exclusive address of the DHCP function.

#### Note:

- Use NetBEUI printing if you do not want to go through these steps.
- See the manual of the Dial-Up router for more information on scorp range, bind, exclusive address of the DHCP function.

## Function of Universal Plug and Play

When you connect your printer to the network, the printer is automatically assigned with an IP address, and the printer's icon appears in the My Network Places folder. By double-clicking the printer's icon, you can access EpsonNet WebAssist for basic information about the printer, such as manufacturer, model name, location, and administrator's name.

Right-click the printer's icon in the My Network Places folder and select Properties. You can check the brief information of the print server.

To use this function, the Universal Plug and Play must be installed on Windows Me or future operating systems. For information on how to install Universal Plug and Play, see the Windows Me online help.

#### Note:

Before using the Universal Plug and Play function, you must enable the Universal Plug and Play function in EpsonNet WinAssist or WebAssist. See "TCP/IP" on page 68 or "Configuring the Print Server Using EpsonNet WebAssist" on page 208.

## Uninstalling Software

Follow the steps below to uninstall the network software.

## Windows Me/98/95/2000/NT 4.0

- 1. Click Start, point to Settings, and then select Control Panel.
- 2. Double-click the Add/Remove Programs icon.
- 3. Select the utility you want to uninstall, and then click the Add/Remove button (Windows Me/98/95/NT 4.0) or the Change/Remove button (Windows 2000).
- 4. Follow the on-screen instructions to complete uninstallation.

## Windows XP/Server 2003

- 1. Click Start, click Control Panel, and then click Add or Remove Programs.
- 2. Click the Change or Remove Programs icon.
- 3. Select the utility you want to uninstall, and then click the Change/Remove button.
- 4. Follow the on-screen instructions to complete uninstallation.

## Macintosh

- 1. Double-click the EpsonNet MacAssist Installer icon.
- 2. Click the Continue button.

- 3. In the License dialog box, read the License Agreement, and then click the Accept button.
- 4. Select Uninstall from the pull down menu.
- 5. Click the Uninstall button.
- 6. Follow the on-screen instructions to complete uninstallation.

#### Note:

You can also uninstall EpsonNet MacAssist by dragging the MacAssistxxx folder (Mac OS 8.x to 9.x) or the EpsonNet MacAssist OSX x.xx folder (Mac OS X) to the Trash.

## Print Server Specification

Network Interface:	RJ-45 connector
Button:	Status sheet button
Jumper:	Four jumpers
Status Lights:	Status light, Data light

## **Regulatory Approvals**

Rated voltage:	DC 5 V±5%
Rated current:	1.1 A
Current consumption:	Less than 1.0 A

EMC:

FCC part 15 subpart B Class B CSA C108.8 Class B CISPR Pub.22 Class B

CE Marking:

EMC Directive 89/336/EEC EN 55022 Class B EN 55024

AS/NZS 3548 Class B

## Reliability

MTBF:	10,000 hours (power on, 100% duty)
MTTR:	N/A

## Environmental

Operating Temperature:	10 to 35° C (50 to 95° F)
Storage Temperature:	-20 to 50° C (-4 to 122° F)
Operating Humidity:	15 to 85% RH
Storage Humidity:	5 to 95% RH
Operating Vibration:	0.15 G (5 to 55 Hz)
Storage Vibration:	0.5 G (5 to 55 Hz)
Shock:	1 G

## **Network Software**

NetWare 3.x, 4.x, 5.x, or 6 EtherTalk (AppleTalk) TCP/IP NetBEUI IPP

## Index

## A

AppleTalk, 79, 100, 221 arp, 250, 252 Automatic Private IP Addressing (APIPA), 50, 55, 69, 98, 211, 219

#### В

Bindery emulation, 146, 147

#### С

Community, 83, 223 Controlled Access Printers, 164, 168

#### D

Data light, 19 Default gateway, 50, 55, 69, 98, 211 Dial-up network, 168 Dial-up router, 253 Dynamic DNS, 71, 99, 212

#### E

Epson\_lpr, 185, 187 EpsonNet Direct Print, 181 Internet Print, 196 MacAssist, 53, 90 MacAssist EasySetup, 104 WebAssist, 207 WebManager, 239 WinAssist, 47, 58 WinAssist EasySetup, 85

#### F

ftp, 180

### I

Initializing the print server, 235 Installation EpsonNet Direct Print, 182 EpsonNet Internet Print, 197 EpsonNet MacAssist, 46 EpsonNet WebManager, 244 EpsonNet WinAssist, 45 Internet printing, 198, 203 Internet Printing Protocol, 196 IntranetWare, 147, 148 IP address, 69, 98, 209, 230 IPP, 81, 101, 222 IP Trap, 83, 223 IPX Trap, 83, 223

### L

LPR filters, 172

#### М

MAC address, 66, 95, 215 Microsoft network, 78, 221

#### Ν

NDPS, 161 NDPS Manager, 163 NDPS Printer Agent, 164 NDS, 146 NET USE command, 112, 118, 126, 132, 136 NetWare, 72, 217 3.x, 147, 149 4.x, 147, 148, 153, 155 5.x, 148, 155, 161 6.0, 148, 155, 161

## 0

Operating environment, 15

#### Ρ

Password for EpsonNet MacAssist, 103 EpsonNet WebAssist, 226 EpsonNet WinAssist, 84 PCONSOLE, 149, 161 ping, 251 Print Server mode, 72, 145, 147, 148, 168, 218 Protocols, 15 Public Access Printers, 164, 168

## R

Remote Printer mode, 77, 145, 149, 153, 155, 168, 218 Rendezvous, 139, 212 Reset, 215, 225 Return to default button, 66, 96, 225 RJ-45 connector, 20 Router, 50, 55, 98, 211

#### S

SAP Name, 165 Search options, 62, 63, 93, 94 Setting the IP address, 68, 97, 250 SNMP, 82, 223 Status light, 19 Status sheet button, 20 Subnet mask, 50, 55, 69, 98, 211

#### T

TCP/IP, 68, 97, 209 Timeout option, 60, 92

#### U

Universal Plug and Play, 71, 99

UNIX, configure for different OS, 173 Using the printer with Macintosh, 137 NetWare, 144 OS/2, 140 UNIX, 172 Windows 2000, 127 Windows Me/98/95, 108 Windows NT 4.0, 133 Windows Server 2003, 119 Windows XP, 113

#### Ζ

Zone, 80, 100

#### EPSON OVERSEAS MARKETING LOCATIONS

#### Epson America, Inc.

3840 Kilroy Airport Way Long Beach, CA 90806 Phone: (562) 981-3840 Fax: (562) 290-5220

#### EPSON UK LTD.

Campus 100, Maylands Avenue, Hemel Hempstead, Herts, HP2 7TJ, U.K. Phone: (+44) 01442 261144 Fax: (+44) 01442 227227

#### EPSON DEUTSCHLAND GmbH

Zülpicher Straße 6, 40549 Düsseldorf Germany Phone: (0211) 56030 Fax: (0211) 5047787

#### **EPSON FRANCE S.A.**

68 bis, rue Marjolin 92300, Levallois-Perret, France Phone: 33.1.41.86.26.56 Telex: 610657

#### EPSON AUSTRALIA PTY. LTD.

70 GIBBES STREET, CHATSWOOD 2067 NSW. Phone: 2-9903-9000 Fax: 2-9903-9177

#### **EPSON SINGAPORE PTE. LTD.**

No. 1 Temasek Avenue #36-00 Millenia Tower, Singapore 039192 Phone: (065) 633 77 911 Fax: (065) 633 41 185

#### EPSON HONG KONG LTD.

Rooms 4706-10, 47/F, China Resources Bldg., 26 Harbour Road, Wanchai, Hong Kong Phone: 2585-4300 Fax: 2827-7083

## EPSON TAIWAN TECHNOLOGY & TRADING LTD.

14F, No.7, Song Ren Road,Taipei, Taiwan 110 Phone: (02) 8786-6688 Fax: (02) 8786-6633

#### EPSON ITALIA S.p.A.

V.le F.lli Casiraghi 427 20099 Sesto S.Giovanni MI, Italy Phone: +3902262331 Fax: +39022440750

#### SEIKO EPSON CORPORATION (Hirooka Office)

80 Harashinden, Hirooka Shiojiri-shi, Nagano-ken 399-0785 Japan

#### EPSON IBERICA S.A.

Av. de Roma, 18-26 08290 Cerdanyola del Valles Barcelona, Spain Phone: 582. 15.00 Fax: 582. 15.55

#### **EPSON PORTUGAL, S.A.**

R. do Progresso, 471, 1° Perafita 4460 Matosinhos, Portugal Phone: (02) 996 14 02 Fax: (02) 996 14 11

2003 February