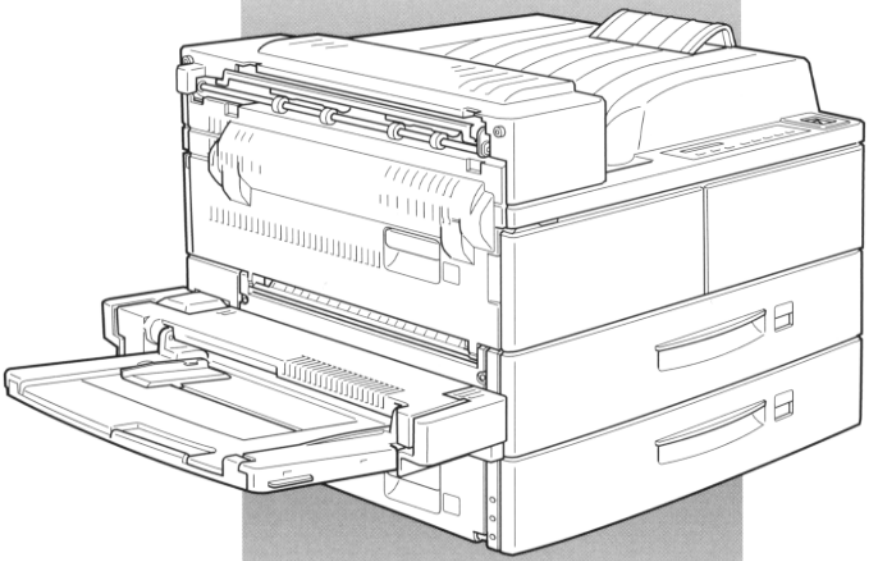
EPSON

Page Printer

EPL-N4000



Administrator's Guide

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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 and 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 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 digital apparatus does not exceed the Class B limits for radio noise emissions from digital apparatus as set out in the radio interference regulations of the Canadian Department of Communications.

Le présent appareil numérique n'émet pas de bruits radioélectriques dépassant les limites applicables aux appareils numériques de Classe B prescrites dans le règlement sur le brouillage radioélectrique édicté par le Ministère des Communications du Canada.

EPSON®

Laser Printer

EPL-N4000

Printed on Recycled Paper.

Administrator's Guide

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Introduction

The EPL-N4000 printer contains a parallel interface connector, an Ethernet interface connector, and an optional Type B interface slot for use on your network. This manual covers information about the network device that is built-in to your printer and the EPSON Net!2 for Intranet utility that configures it for network printing. For information about the printer, see your printer guide.

The network device automatically selects the correct interface when it connects to a network. In addition, it supports and automatically selects IEEE 802.2, IEEE 802.3, Ethernet II, and Ethernet SNAP network protocols.

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

Use EPSON Net!2 for Intranet, the setup utility that runs on the browser, to quickly and easily configure the network device to use protocols such as Novell® NetWare®, Microsoft IPX/SPX, Microsoft TCP/IP, EtherTalk®, NetBEUI, and NetBIOS and TCP/IP for OS/2 Warp and Warp Connect.

Note:
The EPSON Net!2 for Intranet utility configures the network device to work only with the protocols that exist on your network. This does not imply that you can use all of the above mentioned protocols in your network or operating system. The protocols that the network device can use may vary depending on the operating systems used and network configuration.

The following are the feature of the network device and EPSON Net!2 for Intranet.

- ❏ The network device automatically selects either 10BASE-T or 100BASE-TX when it is connected to a network.

- ❏ After setting the IP address for the network device on your printer's control panel, you can configure the network device for TCP/IP, NetWare, AppleTalk, or NetBIOS using EPSON Net!2 for Intranet.

- ❏ You can select to either enable or disable the protocols from EPSON Net!2 for Intranet.

- ❏ Supported browsers are Microsoft Internet Explorer version 4.0 or higher and Netscape Navigator version 3.02 or higher.

About This Guide

This guide contains information about using your printer on a network, including installing the printer software and making network settings.

Note:

- ❏ *This manual is written for network administrators, and many of the steps included here require detailed network knowledge and administrator rights.*

- ❏ *The term network administrator refer to the person responsible for maintaining the customer network. "Administrator" is synonymous with "Supervisor" in this manual.*

Cautions and Notes

Cautions *must be observed to avoid damage to your equipment.*

Notes *contain important information and useful tips on the operation of the network device.*

Terms and Concepts

The following terms and concepts are defined here to help you understand this guide.

A *configuration* is a prepared set of conditions for proper operation of a device. *Configuring* the network device is to prepare it to work with protocols available on a network.

A *file serve*r stores data required for the network device to operate as a print server.

A *print queue* is an area where a print job is stored as a file, until the print server sends the job to the assigned printer.

A *print server* moves jobs from print queues to printers.

A *remote printer* is a shared printer connected elsewhere on the network, but under the control of a NetWare print server.

EtherTalk is AppleTalk's communication protocol governing Ethernet transmissions.

A *protocol* is a rule that controls how data or information is exchanged through a network. There are many different layers of protocols for different aspects of hardware and software operation. Computers and software cannot communicate with each other using different protocols.

TCP/IP (Transmission Control Protocol / Internet Protocol) is a layer of protocols that provides communications between nodes on a network.

ftp is a TCP / IP application protocol for file transfer.

lpd is a TCP / IP remote printing protocol application.

Supported Network Protocols and Features

The network device supports the following network protocols and features. It cannot use protocols that are not available or are not installed in your operating system.

NetWare in Windows 3.1, Windows 95/98, Windows NT 3.51/4.0

- ❏ Supports IPX / SPX protocols that are configured for NetWare 3.x, NetWare 4.x, and IntranetWare. (Supports both Bindery emulation and NDS mode on NetWare 4.x and IntranetWare.)
- ❏ Uses Microsoft IPX with Windows 95 / 98, and Windows NT 3.51 / 4.0 for NetWare.
- ❏ Provides the same functions as NetWare's PSERVER program in print server mode and RPRINTER in remote printer mode.
- ❏ Services up to 32 print queues on up to 8 file servers in print server mode.
- ❏ It is easy to configure the network device for NetWare using EPSON Net!2 for Intranet.

Windows

- ❏ Supports Microsoft TCP / IP in Windows NT 3.51 / 4.0.
- ❏ Supports Microsoft Windows Network (NetBIOS over TCP / IP and NetBEUI).
- ❏ It is easy to configure and change the IP address and other settings with EPSON Net!2 for Intranet.

Macintosh

- ❏ Macintosh OS
  Supported System 7.1, 7.5.3, 7.5.5, 8.0, 8.1
- ❏ Supports EtherTalk Phase II communication
- ❏ Supports OpenTransport 1.1.1, 1.1.2, 1.2
- ❏ Supports AppleTalk
- ❏ It is easy to set the AppleTalk zone, rename the printer, and change other settings with EPSON Net!2 for Intranet.

OS/2

- ❏ Supports IBM OS/2 Warp (OS/2 Warp Connect and OS/2 Warp Server).
- ❏ Supports TCP/IP, NetBEUI, and NetBIOS over TCP/IP.

UNIX

- ❏ Supports most major commands, including lpr, ftp, and ping over TCP/IP.
- ❏ Requires no setup utility. The IP address is allocated by sending the arp and ping commands directly from the host computer.
- ❏ Supported systems:

  SunSoft Solaris 2.4 or higher
  Sun OS 4.1.4 or higher
  IBM AIX 3.2.5 or higher
  HP/UX 9.05 or higher
  SCO UNIX 4.2 or higher

Environment for EPSON Net!2 for Intranet

You can configure the network device for TCP/IP, NetWare, AppleTalk, and NetBIOS using EPSON Net!2 for Intranet, the utility that runs on the browser.

- ❏ Applicable operating systems:
  Windows 95 / 98
  Windows NT 3.51 Server & Workstation
  Windows NT 4.0 Server & Workstation
  Macintosh System 7.1, 7.5.3, 7.5.5, OS 8.0, OS 8.1

- ❏ Applicable browser:
  Microsoft Internet Explorer version 4.0 or later
  Netscape Navigator version 3.02 or later

Operation Modes for Novell NetWare

If you are setting up the network device for use in a NetWare environment, you will need to determine whether you want to set it up in Print Server mode or Remote Printer mode. For more details, find the appropriate chapter for your operating system and read the NetWare section in that chapter. The factory default operating mode for the network device in a NetWare environment is Print Server mode.

Note:

- ❏ *If you use the network device in a NetWare and WAN (Wide Area Network) environment and connect it to a general phone line (including ISDN), the network device may open the dial-up-router and packets may be sent to the WAN. To avoid this problem and extra phone fees, see the instructions in Appendix A.*

- ❏ *The factory default NetWare condition of the network device is disabled. You must configure the network device with EPSON Net!2 for Intranet to work on a NetWare network.*

Print Server mode

In Print Server mode, the network device performs all print server functions and can service up to 32 queues and 8 file servers. No VAP (Value-Added Process) or NLM (NetWare Loadable Module) is required. When you send a print job from your application, the file server assigns the print job to a print queue. When the corresponding printer is ready, the print server (which is the printer) requests the jobs from the file server.

The network device operates like any Novell NetWare print server, servicing the assigned queues in a round robin fashion. In queues of the same priority, the network device services the first job in a queue before those in a lower priority queue. The network device also supports encrypted passwords.

This mode provides the highest printing speed while retaining the control, security, and convenience of a NetWare print server.

Remote Printer mode

As a remote printer, the network device emulates a workstation running Novell's RPRINTER program, and operates under the control of a Novell NetWare print server. The print server can be either a dedicated workstation running PSERVER or a file server.

At power-up, the interface will attempt to attach to a print server (elsewhere on the network) and act as a particular printer of that print server. To do this, it needs to know which print server to attach to, and which printer of that print server to use. This is similar to the need to specify these parameters in the RPRINTER command line (or to interactively choose them from the RPRINTER program).

You can set these parameters on the network device with EPSON Net!2 for Intranet. Once the network device is set up, it will store these settings, which means that you will normally only need to do this once at the time of installation. However, as with all Novell remote printers, the network device's print speed is slower in Remote Printer mode than in Print Server mode.

The main advantage of Remote Printer mode is that connection to a file server is not required, making this mode desirable in installations with limited available file server connections. Each NetWare print server can support up to 16 printers for NetWare 3.1x and up to 255 for NetWare 4.1x and requires only one file server connection.

Note:
In Remote Printer mode, user account is temporarily used when turning on the printer. If there is no room in the user account, turn the printer on before connecting the client to the network.

Chapter 1

Installing the Printer Software

The CD-ROM that comes with your printer contains utility programs and a printer driver for Microsoft® Windows® 3.1, Windows 3.11 for Workgroups, Windows 95, Windows 98, Windows NT® 3.51, and NT 4.0.

After you have connected the printer to a computer via the parallel port or to the network using either the network device or the optional interface card, install the printer driver. The printer driver is software that runs, or "drives", your printer, translating the software's fonts, margin settings, etc. into commands that can be understood by the printer.

With the driver software supplied with the printer, you can make settings such as paper size, paper source, orientation, and output tray. You can also refer to the printer driver's online help for detailed information about printer settings.

In addition to installing the printer software in the administrator's computer, the administrator must also instruct the users how to install the printer software on their own machines.

System Requirements

Your computer must meet the following requirements in order to be able to use the Windows driver included with the printer:

- ❏ Windows 3.1, Windows for Workgroups (3.11):
  i386 / 16MHz or higher, 16MB RAM or more, 10MB or more hard disk space, VGA greater than 640 × 480 pixel monitor

- ❏ Windows 95 / 98:
  i486 / 25 MHz (for Windows 95), i486 / 66 MHz (for Windows 98), or higher, 16MB RAM or more, 10MB or more hard disk space, Greater than 800 × 600 pixel monitor

- ❏ Windows NT 3.51 / 4.0:
  i486 / 25 MHz or higher, 16MB RAM or more, 20MB or more hard disk space, Greater than 800 × 600 pixel monitor

Installing the Printer Driver

Follow these steps to install the printer driver:

1. Make sure the printer is turned off and Windows is running.

2. Insert the CD-ROM that comes with your printer into your CD-ROM drive.

3. If you are using Windows 3.1, Windows 3.11 for Workgroups or Windows NT 3.51, make sure the Program Manager window is open; then choose Run from the File menu. If you are using Windows 95, Windows 98, or Windows NT 4.0, click Start, then choose Run.

4. Type D:\EPSETUP.EXE, then click OK (or substitute the appropriate drive letter).

5. In the dialog box that appears, double-click Install Printer Driver; or you can also install by selecting Install Printer Driver and then clicking the arrow at the top right.

6. In the dialog box that appears, select EPL-N4000 and click OK. The printer driver is installed automatically.

7. When installation is complete, click OK.

The printer driver is now installed on your computer.

Installing EPSON Status Monitor 2

To learn how to install EPSON Status Monitor 2, see page 7-7.

Note:
The EPSON Remote Control Panel utility is automatically installed in your computer when you install EPSON Status Monitor 2. For information about EPSON Remote Control Panel utility, see "Making Remote Control Panel Settings" on page 1-9 and online help.

Installing Screen Fonts

Follow these steps to install the screen fonts:

1. Make sure Windows is running and the printer is turned off.

2. Insert the CD-ROM that comes with your printer into your CD-ROM drive D (or E).

3. If you are using Windows 3.1, Windows 3.11 for Workgroups or NT 3.51, make sure the Program Manager windows is open; then choose Run on the File menu. If you are using Windows 95/98, or NT 4.0, click Start, then choose Run.

4. Type D:\EPSETUP.EXE (or E:\EPSETUP.EXE); then click OK.

5. **[Excluding Windows NT 3.51 users]:** In the dialog box that appears, double-click Install Font Manager; or you can install by selecting Install Font Manager and then clicking the arrow at the top right.
   [For Windows NT 3.51 users only]: In the dialog box that appears, double-click Install Screen Fonts; or you can install by selecting Install Screen Fonts and then clicking the arrow at the top right.

6. Follow the on-screen instructions.

The screen fonts are now installed on your computer.

Making Basic Driver Settings

Before you start printing, you should make sure that the driver settings match your document requirements. While many Windows applications override the printer settings made with the driver, some do not.

Be sure to check the following:

❑ Paper	The size of the paper loaded in the printer
❑ Orientation	The direction of printing on the page (portrait or landscape)
❑ Print Quality	The print resolution in dots per inch (dpi)
❑ Paper Source	Auto Selection, MP/ENV Tray, Lower Cassette 1, Lower Cassette 2, or Lower Cassette 3 to 5 (if installed)
❑ Output Tray	Face-down Tray, Face-up Tray, Mailbox n, Sorter, Stacker, or Multiple Sorter (The list of the output tray will be different depending on the mode you select in the Multibin Mode Settings dialog box.)
❑ Printer Memory	The amount of memory installed in the printer (standard memory is 16 MB).

For Windows 95 / 98 and Windows NT 4.0 users

Follow these steps to make the required settings:

1. Click the Start button, point to Settings; then click Printers.
2. Right-click your printer icon and choose Properties.
3. Click the Options tab (in Windows 95/98) or Option Equipment (in Windows NT 4.0).
4. Set the amount of installed memory in your printer.
5. If you have installed the optional Large Capacity Paper Unit, highlight the word Large Capacity Paper Unit. This will allow you to select Lower Cassettes 3 to 5 as paper sources.
6. Select the optional output tray. When you select Multibin Unit, the Multibin Mode Settings button will be available.
7. Click the Multibin Mode Settings button to match the Multibin Unit Settings in the driver to the Multibin Unit Settings in SelecType and the Remote Control Panel.
8. **[For Windows NT 4.0 users only]:** You need to right-click your printer icon again and choose Document Defaults.
9. Click the Basic Settings tab.
10. Select the paper size you loaded in the printer from the Paper list.
11. Select Portrait or Landscape orientation. The direction of printing on the diagram on the screen changes according to the orientation you select.
12. Select the resolution from Print Quality, paper source, paper type, or output tray.

Make any other settings you wish, and click OK when you are finished.

For Windows 3.1 and Windows 3.11 for Workgroups users

Follow these steps to access the driver and make the required settings:

1. In the Main window, double-click the Control Panel icon.
2. Double-click the Printers icon.
3. Make sure your printer is highlighted, and click the Setup button.
4. Select the paper size you loaded in the printer from Paper. If you don't see your paper size on the list, use the arrow on the right to scroll through the list.
5. Select Portrait or Landscape orientation. The printing direction of the screen illustration changes according to the orientation you select.
6. Select the resolution from Print Quality.
7. Select the paper source.

Make any other settings you wish, and click OK when you are finished.

For Windows NT 3.51 users

Follow these steps to access the driver and make the required settings:

1. In the Main window, double-click the Control Panel icon.
2. Double-click the Printers icon.
3. Double-click your printer icon.
4. Select Properties from the Printers menu.
5. Make sure your printer is selected and click the Setup button.
6. In the Printer Setup tab, select the paper source and paper size.
7. Click the Option Equipment tab.
8. If you select Multibin Unit for the Optional Output Trays, the Multibin Mode Settings button will become available.
9. Click the Multibin Mode Settings button to match the Multibin Unit Settings in the driver to the Multibin Unit Settings in SelecType and the Remote Control Panel.

Make any other settings you wish, and click OK when you are finished.

Making Remote Control Panel Settings

You can make some printer control panel settings with the EPSON Remote Control Panel utility.

This utility is supported by Windows 95/98 and Windows NT 3.51/4.0 Server & Workstation.

Note:
Windows NT 3.51 does not support local printers with this utility.

There are some options for which users cannot make settings themselves. For those options, the administrator must make settings for the users.

Be sure to check the following:

❑ Paper tab	The size and types of the paper loaded in the printer Multibin Mode settings
❑ Panel tab	Standby, Offset Stacking, Auto Continue, Avoid Error, Panel Lock, Time Out, Parallel Speed, Parallel Bi-D, Parallel Buffer Size, and Network Buffer Size
❑ Option tab	Optional Paper Sources, Optional Output Trays, and Duplex Print Unit

For more information, see the EPSON Remote Control Panel online help.

Follow these steps to access the EPSON Remote Control Panel and make the required settings:

1. Click the Start button, select Programs, then Epson. Click EPSON Remote Control Panel Utility.

   The EPSON Remote Control Panel dialog box appears.

2. If you are the administrator, click the Administrator button (the third button from left) in the tool bar.

3. Double-click the target printer name in the list.

   The printer setting dialog box appears.

4. Make any settings you wish on the Paper, Panel, and Option tabs, and click OK when you are finished.

For more information on making the Remote Control Panel settings, see the EPSON Remote Control Panel online help.

Accessing Online Help

Your Windows printer driver has an extensive online help feature that includes detailed information and instructions on the driver settings. Online help will answer most of your questions about the driver.

Note:
Online help is only available for Windows applications.

Accessing online help from the Windows printer driver

To access online help from the printer driver, follow the instructions on page 1-6 to access the driver; then click the Help button at the bottom of the window that appears.

Accessing online help from Windows applications

To access help from your application, open the File menu and choose Print or Print Setup. The click Printer, Setup, Options, or Properties (you may need to click a combination of these buttons) depending on the software you are using. Then click the ? or Help button in the window that appears.

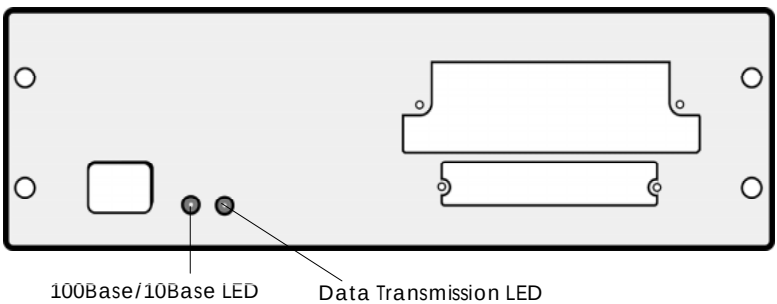
Chapter 2

Connecting to the Network

This chapter explains how to connect the network device to the network, setting the IP address, and setting up EPSON Net!2 for Intranet.

Ethernet Operation

The LED lights can provide you with important information about the operation of the network device.



LEDs

The interface bracket has two LEDs (1 orange and 1 green). The orange light is a 100Base / 10Base LED that indicates the connection status, whether 10Base-T or 100Base-TX is used. The LED is on when the network device is connected with the 100Base-TX, and the LED is off when the network device is connected with the 10Base-T.

The green light is a data transmission light which blinks when the host interface receives data.

Printing a status sheet

Before you start configuring the network device, be sure to print a network status sheet. To print a network status sheet, press the SelecType button on the printer's control panel to enter SelecType mode and then press the Item button until Network Status Sheet appears in the display, then press the Enter button. The status sheet contains important information such as current configuration and the MAC address of the network device.

Note:
See the Reference Guide for more information about printer's control panel.

Initializing and resetting the network device

You can initialize and reset the network device using EPSON Net!2 for Intranet.

Note:
See the section "Changing the IP Address Using EPSON Net!2 for Intranet" on page 2-6 to start EPSON Net!2 for Intranet.

Initialization:

Click Reset under Optional, then click the RETURN TO DEFAULT button. All the settings you have made will be replaced by the default settings.

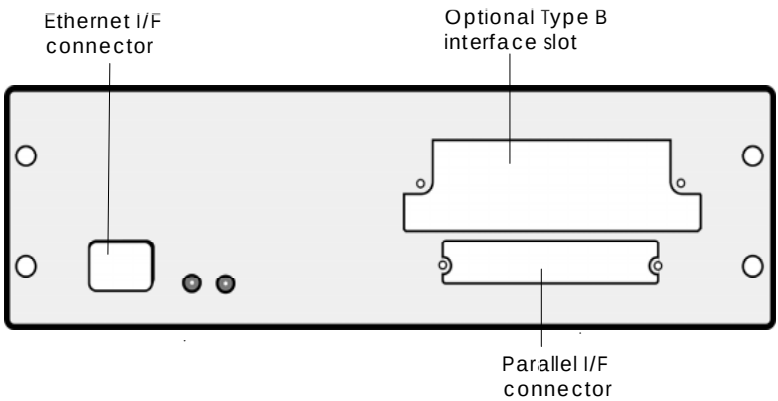
Reset:

Click Reset under Optional, then click the RESET button to simulate turning the power on and off. It makes the changes take effect.

Connecting the Network Device to the Network

This printer has the following three host interfaces: a parallel interface, a network device, and an optional Type B interface. You can use these host interfaces to connect the printer to the network.

Interface bracket



Parallel interface

The interface type is an IEEE 1284 bi-directional parallel interface. You can connect the printer directly to the computer, and any client can print through the computer.

Ethernet interface

The network device automatically selects either 10Base-T or 100Base-TX when the printer is turned on. You must use a shielded twisted-pair cable (Category 5).

Caution:
Make sure to use a shielded twisted-pair cable (Category-5) to connect the network device, otherwise the network device may malfunction.

Type B interface card

The printer has an optional Type B interface slot. See the Reference Guide for what interface card models you can use with this printer and how install them in your printer. For instructions on using the interface card, see your interface card manual.

Making the interface connection setting

If the printer is set to the auto interface mode by default, you do not have to make the interface connection setting on the printer's control panel.

The following table shows the available host interfaces.

	Parallel I/F	Ethernet I/F	Type B I/F
Auto	O	O	O
Parallel	O	X	X
Ethernet	X	O	X
AUX	X	X	O

Note:

- ❑ AUX *appears in the menu on the printer's control panel when the Type B interface card is installed in the printer.*

- ❑ *To learn more about the interface connection setting, see the section on SelecType settings in the Reference Guide.*

Setting the IP Address on the Printer's Control Panel

After connecting the printer to the network, you need to set the IP address for the network device on the printer's control panel.

Follow the steps below to set the IP address, Subnet Mask, and Gateway.

1. Press the SelecType button to enter SelecType mode.
2. Then, press the Menu button until Ethernet Menu appears.
3. Press the Item button until IP Byte 1* appears.
4. Press the Value button until the desired value appears. Then press the Enter button to set the value.

   Note:
   To decrease the value, press the Value *button while pressing the* SelecType *button.*

5. Repeat steps 3 and 4 to set the IP address, Subnet Mask, and Gateway.
6. Restart the printer so that the settings take effect.

Note:

- ❏ *You must first set the IP address on the printer's control panel before you can use EPSON Net!2 for Intranet. See the next section for information and instructions about changing the IP address using EPSON Net!2 for Intranet.*
- ❏ *See the Reference Guide for more information about settings on the printer's control panel.*

Changing the IP Address Using EPSON Net!2 for Intranet

Read this section only if you need to change the IP address of the network device with EPSON Net!2 for Intranet.

Note:
You can also change the IP address on the printer's control panel.

Follow the steps below to change the IP address.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

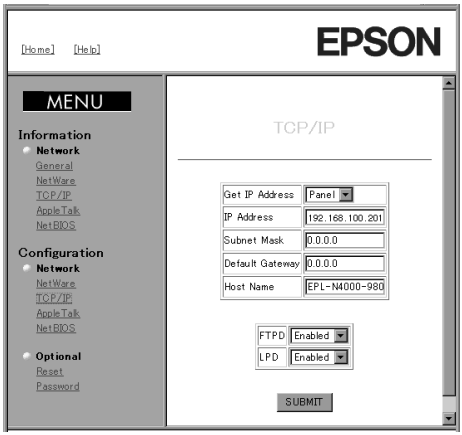
   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. Click TCP/IP under Configuration.

4. The Enter Network Password dialog box appears. Input the password and click OK. See "Setting a password" on page 2-11 for more information about passwords.

5. The TCP/IP screen appears.



6. Configure for TCP/IP as follows.

Get IP Address:
Select either Panel, DHCP, or PING.

IP Address:
Input the IP address of the EPL-N4000. Make sure to give an IP address which does not conflict on the network.

Subnet Mask:
Input the subnet mask.

Default Gateway:
Input the gateway address. If there is a server or router which serves as a gateway, input the IP address of the server or router. If there is no gateway, type the IP address of your computer.

Note:
When you don't need to set an IP address, subnet mask, or default gateway, input 0.0.0.0 in the appropriate box.

Host Name:
Give a unique name for the host on the network (up to 32 characters).

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Note:
Since the IP address you set becomes available after you click the RESET *button, you need to reopen the browser. Type the new IP address as the URL to restart EPSON Net!2 for Intranet.*

Setting the IP Address Using the ARP Command

If you are using UNIX or OS/2, you can use the ARP command to set the IP address of the network device, and the ping command to check that you have set it correctly. You can also use these commands in Windows 95 or Windows NT, if you have correctly installed TCP/IP networking on these systems.

Before you start, you will need the following information:

- ❑ A valid IP address for the network device. Ask your system administrator for an IP address which will not cause conflicts with any other device on the network. If you are the system administrator, choose an address within your subnet which will not conflict with any other device.
- ❑ The MAC address of the network device. This is the hardware serial number of the interface, which cannot be changed. You can check the MAC address on the status sheet.
- ❑ If the host from which you will be setting up the network device is on a different LAN segment, make sure that the gateway to the network device (router or routing host) is correctly configured on your machine.

Setting and checking the new IP address

To set the new IP address which you have obtained from your system administrator, use the ARP command, with the -s flag (create ARP entry).

Note:
In the following, we will assume that the MAC address of your network device is 00:00:48:93:00:00 (hexadecimal); that the IP address which you will be assigning is 192.135.223.6 (decimal); and a computer IP address is 192.135.223.10 (decimal). Substitute your values for these addresses when you type in the commands.

1. Check the LAN by "pinging" any computer on the network. If it is reachable, you should see results something like the following (the exact form of the message depends on your operating system, and the times probably vary from those shown here):

   64 bytes from 192:135:223:10:icmp_seq=0. Time=34.ms
   64 bytes from 192:135:223:10:icmp_seq=1. Time=4.ms
   64 bytes from 192:135:223:10:icmp_seq=2. Time=4.ms
   64 bytes from 192:135:223:10:icmp_seq=3. Time=4.ms

2. From the command line, type the IP address of the network device and its MAC address:
   Example: arp -s 192.135.223.6 00:00:48:93:00:00

3. You can now check the new IP address, by "pinging" it:
   Example: ping 192.135.223.6

4. The network device should now respond to the ping. If it does not, you may have mistyped the MAC address or the IP address in the ARP -s command. Double-check and try again. If all else fails, re-initialize the network device and try again.

5. You can check whether the IP address has been set on the status sheet.

Note:

- ❑ *To change the subnet mask or gateway of the network device, use the EPSON Net!2 for Intranet running on Windows (95/98 or NT), or Macintosh to change these parameters.*

- ❑ *If the network device or the computer is unreachable, you should check the following:*

  The address is correct in the ping command.

  The Ethernet connection to the printer and to the host has been made correctly, and all hubs, routers, etc. are switched on.

Setting Up EPSON Net!2 for Intranet

After setting the IP address for the network device on the printer's control panel, you can configure the network device using EPSON Net!2 for Intranet, the utility that runs on the browser.

See the appropriate section for configuring the network device using EPSON Net!2 for Intranet.

Setting a password

You can protect the settings you make in EPSON Net!2 for Intranet by setting a password.

To set a password, click Password under Optional. Input the password and click SUBMIT. Then reset the printer. To do this, click Reset under Optional and then click the RESET button.

First time you click any items under Configuration, you will be asked for a user name and the password. Input the user name (default is "Administrator") and the password you set in the Password screen (just like you did above).

Note:
Do not forget your password; otherwise, you have to return all the settings to the default value. To do this, click Reset *under* Optional *and click the* RETURN TO DEFAULT *button.*

Chapter 3

Settings for Windows

This chapter describes how to configure the network device using EPSON Net!2 for Intranet to operate with multiple protocols on the network.

EPSON Net!2 for Intranet, the utility that runs on the browser, can configure the network device for NetWare, TCP/IP, AppleTalk, and NetBIOS.

Note:
The EPSON Net!2 for Intranet utility configures the network device to work only with the protocols that exist on your network. This does not imply that you can use all of the above mentioned protocols in your network or operating system. The protocols that the network device can use may vary depending on the operating systems used and network configuration.

Before you start configuring the network device, make sure of the following points.

- ❏ To use Novell NetWare 3.1x/4.1x or Novell IntranetWare for Windows 3.1, Windows 95/98, and Windows NT 3.51/ 4.0, you must set up print services on the network. For details about setup, see the following sections or the Novell NetWare documentation.
- ❏ Decide whether you want to use the network device in Print Server mode or Remote Printer mode under Novell NetWare.
- ❏ To use TCP/IP with Windows NT 3.51/4.0, you must install TCP/IP protocol and Microsoft TCP/IP Printing.
- ❏ To use TCP/IP with Windows 95/98, you must install TCP/IP and EPSON TCP/IP printer protocol. The Status Monitor installer program automatically prompts you when to install EPSON TCP/IP, as described on page 7-7.

Configuring the Network Device for NetWare 3.1x

To use the printer on a NetWare environment, you need to configure the network device for NetWare.

To use NetWare 3.1x, you need to set up the printer environment using PCONSOLE, and then configure the network device for NetWare using EPSON Net!2 for Intranet.

With EPSON Net!2 for Intranet, you can configure the network device in one of two operating modes, Print Server or Remote Printer.

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 might occur depending on the client environment.

- **PCONSOLE limitation**
  To set up the network device in Print Server mode, you cannot use the Print Server status display control in PCONSOLE.

- **Time required to recognize the network device**
  It takes two minutes or less for the NetWare server to recognize the network device after turning on the printer. During this start-up time, EPSON Net!2 for Intranet and the status sheet do not show the correct information.

- **When not using NetWare**
  When you are not using NetWare environment, set NetWare to Disabled. See page 3-8 for more information.

Caution:
Make sure to read Appendix A for instructions on using a dial-up network to prevent from being charged for the line connection (depending on the number of hops you set).

Setting up the printer environment with PCONSOLE

You need to create a print server and print queue to use the printer in Print Server mode or Remote Printer mode.

Follow the steps below to create a print server and print queue and assign them to the network device.

Note:
It is a good idea to write down the print server name and the printer port number to which you will assign the network device. They will be required for configuring the network device using EPSON Net!2 for Intranet.

Creating print queues in a file server

1. From any NetWare client, log in to the network with supervisor or equivalent right.

2. Type PCONSOLE at the DOS prompt.

3. From the Available Options screen, select Print Queue Information and press Enter.

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

5. 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 users list.

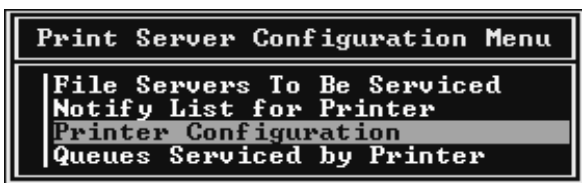
Creating a print server

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

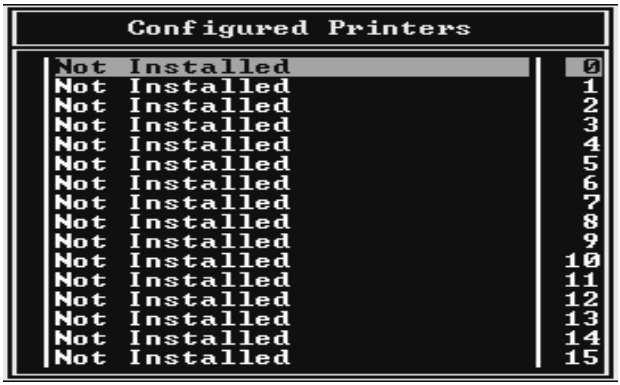
2. Press the Insert key on your keyboard and type the print server name. Press Enter. It is a good idea to write down the print server name for later use.

3. From the Print Server list, select the print server name that you just entered and press Enter.
   Then, from the Print Server Information list, select Print Server Configuration and press Enter.

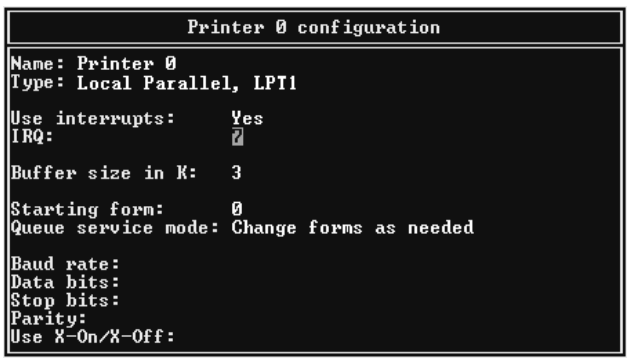
4. Select Printer Configuration from the Print Server Configuration Menu and press Enter.



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



6. From the Printer configuration screen, type the printer name. Then, highlight Type and press Enter.
Select Local Parallel, LPT1 for Print Server mode, or select Remote Parallel, LPT1 for Remote Printer mode.

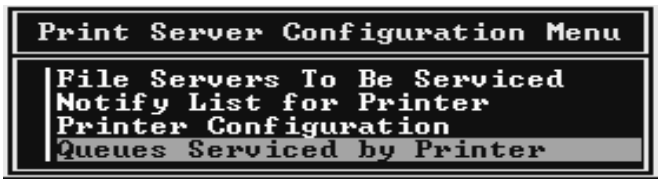


Note:
Make sure to select Local Parallel, LPT1 *if you are using Print Server mode, and make sure to select* Remote Parallel, LPT1 *if you are using Remote Printer mode.*

7. Press Esc; then press Enter to save 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 Insert key and assign a queue to the print server port from the Available Queues list.

12. Specify the priority level between 1 to 10. One is top priority.

13. Press Esc to exit PCONSOLE.

14. **For Remote Printer mode only:**
Load the print server you just created.

    - ❏ For a file server as a print server
    >LOAD PSERVER the print server name

    - ❏ For a dedicated print server
    >PSERVER the print server name

Note:
Announce the print queue name to the clients so they will be able to know which printer to use on the network.

Configuring the network device using EPSON Net!2 for Intranet

Follow the steps below to configure the network device in Print Server mode or Remote Printer mode using EPSON Net!2 for Intranet.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. Click NetWare under Configuration.

4. The Enter Network Password dialog box appears. Input the password and click OK. (See “Setting a password” on page 2-11 for more information about passwords.)

5. The NetWare screen appears.

6. Make NetWare settings as follows.

NetWare Basic Configuration:

NetWare:
Select either Enabled or Disabled. Choose Enabled to use NetWare.

Primary Frame Type:
Automatically selects the primary frame type.

Mode:
Select the mode either Bindery Print Server or Remote Printer.

NDS Tree Name:
Do not type any name in this box.

NDS Context:
Do not type any context in this box.

Print Server Mode:

Note:
Make the following settings when you select Bindery Print Server *for the mode.*

Primary File Server Name:
Type the file server name (up to 47 characters) which this print server logs in.

Print Server Name:
Type the print server name (up to 47 characters) which is created by PCONSOLE.

Polling Interval (5-90):
Type the polling interval in seconds.

NetWare Password:
Type the password (up to 19 characters) which you use to log in to the primary file server.

Remote Printer Mode:

Note:
Make the following settings when you select Remote Printer *for the mode.*

Primary Print Server Name:
Type the primary print server name (up to 47 characters) which was created with PCONSOLE.

Print Port Number:
Type the print port number from 0 to 15.

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

9. After configuring the network device using EPSON Net!2 for Intranet, confirm the settings as follows.

For Print Server Mode:
Select the Connection Information from the File Server Console's MONITOR.NLM, and check if the print server name assigned to the network device has been logged in to the Active Connections list. It takes five minutes or less to complete this.

For Remote Printer Mode:
Switch to the Print Server screen of the File Server Console, and check if the status is Waiting for job.

Configuring the Network Device for NetWare 4.1x

To use the printer in a NetWare environment, you need to configure the network device for NetWare.

To use NetWare 4.1x, you need to set up the printer environment using Nwadmin or PCONSOLE, and then configure the network device for NetWare using EPSON Net!2 for Intranet.

With EPSON Net!2 for Intranet, you can configure the network device in one of two operating modes, Print Server or Remote Printer. You can use either NDS mode or Bindery emulation mode.

Instructions for using NetWare

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

- **Bindery and NDS**
  When printing on the network printer from the non-NDS client (Bindery correspondence), it is necessary to make the object related to the print right under the Bindery context in the directory tree.

  Bindery context path can be confirmed from the server console by the SET BINDERY CONTEXT command.

  If the bindery context path has not been set, or if you want to use the print environment of another context from the non-NDS client, it is necessary to specify the context for the Bindery context. Use SET BINDERY CONTEXT command to set the context in the AUTOEXEC.NCF file.

See your Netware 4.1x documentation for more information.

❑ **IPX routing protocol "NLSP"**
It is possible to set the IPX routing protocols "NLSP" from NetWare4.1x; however, the network device 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 arbitrarily remove the bind of RIP or SAP when NLSP with RIP / SAP Compatibility is specified, the network device is not able to communicate with the file server and NDS. (Reference: "Protocols" and "Bindings" in the task of the Utility INETCFG.)

❑ **Time required to recognize the network device**
It takes two minutes or less for the NetWare server to recognize the network device after turning on the printer. During this start-up time, the EPSON Net!2 and the status sheet do not show the correct information.

❑ **When not using NetWare**
When you are not using NetWare environment, set NetWare to Disabled. See page 3-23 for more information.

Caution:
Make sure to read Appendix A for instructions on using a dial-up network to prevent from being charged for the line connection (depending on the number of hops you set).

Setting up the environment with Bindery Emulation

This section explains how to set up the printer in Print Server mode or Remote Printer mode with Bindery Emulation.

Follow the steps below to set up the printer environment when using Bindery Emulation mode in NetWare 4.x.

Making settings in Print Server mode

1. Log in to the server as a SUPERVISOR. Make sure to log in as Bindery correspondence.

2. Run PCONSOLE.

3. From the Available Options screen, select Quick Setup.

4. Type the Print Server and Print Queue name, and select Parallel for Printer type, Manual load for Location, None (polled mode) for Interrupt, or LPT1 for Port.

5. Press Esc to exit PCONSOLE.

6. Using EPSON Net!2 for Intranet, configure the network device in Print Server mode. Make sure to use the print server created in step 4.

   Note:

   - ❏ *To configure the network device in Print Server mode, see "Configuring the network device using EPSON Net!2 for Intranet" on page 3-7.*

   - ❏ *Assign Trustee status to each user if necessary.*

Making settings in Remote Printer mode

1. Log in to the server as a SUPERVISOR. Make sure to log in as Bindery correspondence.

2. Run PCONSOLE.

3. From the Available Options screen, select Print Queues and press Enter. Press Insert and type the print queue name. Then press Enter.

4. Press Esc.

5. From the Available Options screen, select Print Servers and press Enter. Press Insert and type the print server name. Then press Enter.

6. Press Esc to exit PCONSOLE, and log out from the server.

7. Then, log in to the server as an ADMIN. Make sure to log in with NDS connection.

8. Start Nwadmin.

9. To create the Printer Object, click the container specified as the Bindery context and select Object, then Create, and then Printer. Type the printer name and click Create.

10. To assign the print queue, double-click the Printer object icon (created in step 9). The Printer dialog box appear.

11. Click Assignments and then click Add. From the print queue list, select the queue (created in step 3) and click OK.

12. Click Configuration in the Printer dialog box, and select Parallel from the Printer type pull-down menu.

13. Then, click Communication. Select LPT1 for Port; check Polled for Interrupts; and check Manual Load (Remote from Print Server) as the Connection type.

14. Click OK to close the dialog box, then click OK in the Printer dialog box.

15. To assign the printer, double-click the Print Server object icon (created in step 5). The Print Server dialog appears.

16. Click Assignments and then click Add. From the printer object list, select the printer object (created in step 9) 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 a 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.

19. From the System Console of the file server, load the print server module by the following command:

    >LOAD PSERVER the print server name

20. Using EPSON Net!2 for Intranet, configure the network device in Remote Printer mode. Make sure to use the print server name created in step 5 and the printer number set in step 17.

    Note:
    To configure the network device in Remote Printer mode, see "Configuring the network device using EPSON Net!2 for Intranet" on page 3-7.

Setting up the environment with NDS mode

This section explains how to set up the printer in Print Server mode or Remote Printer mode using the Nwadmin.

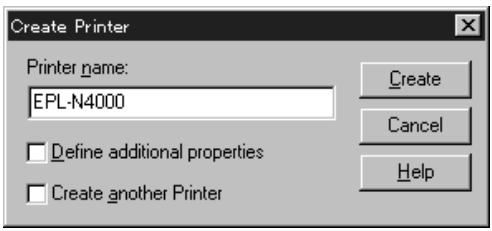
Follow the steps below to set up the printer environment when using NDS mode in NetWare 4.x.

1. Log in to the NetWare 4.x server as an ADMIN. Make sure to log in with the NDS connection.

2. Start Nwadmin.

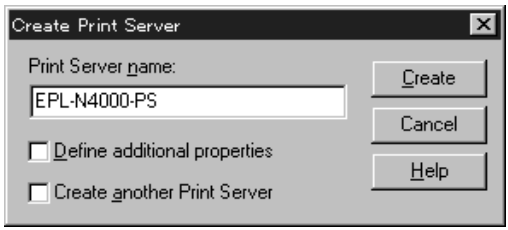
3. Create a printer:

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



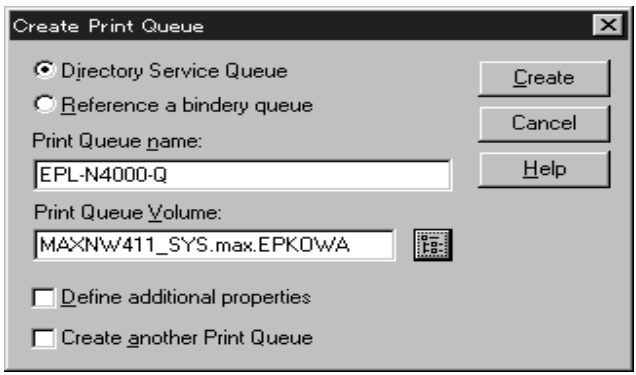
4. Create a print server:

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



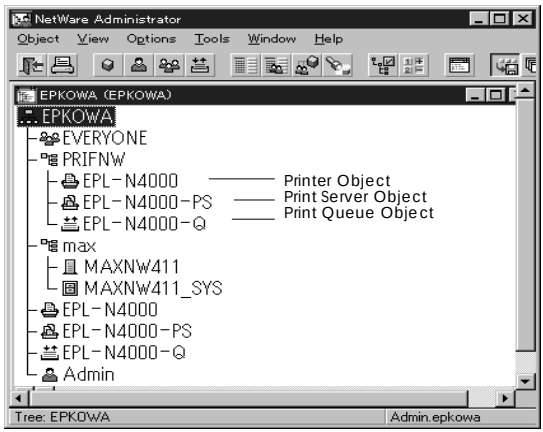
5. Create a print queue:

   Click the directory context icon, and select Object, then Create, and then Print Queue. Type the print queue name and select the print queue volume. Then click Create.

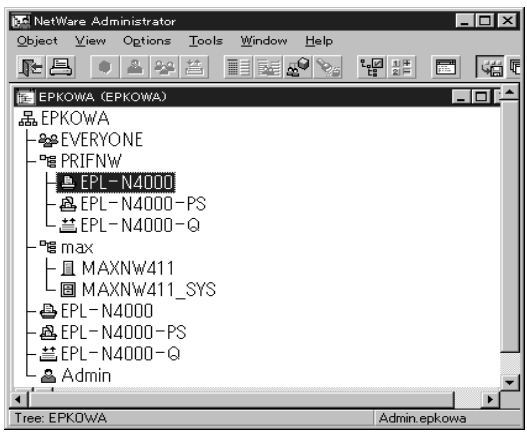


Note:
Announce the print queue name to the clients so they will be able to know which printer to use on the network.

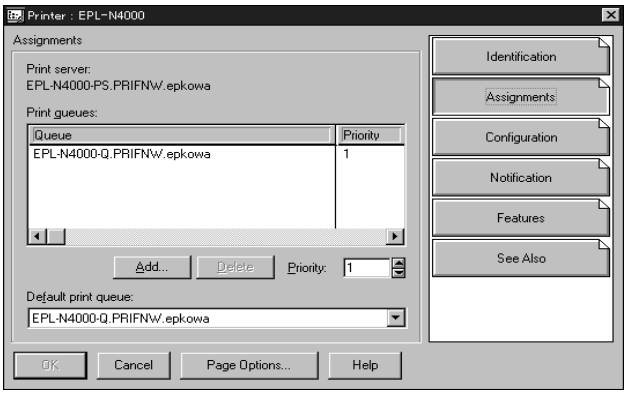
6. The objects you have just created are added to the directory context.



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

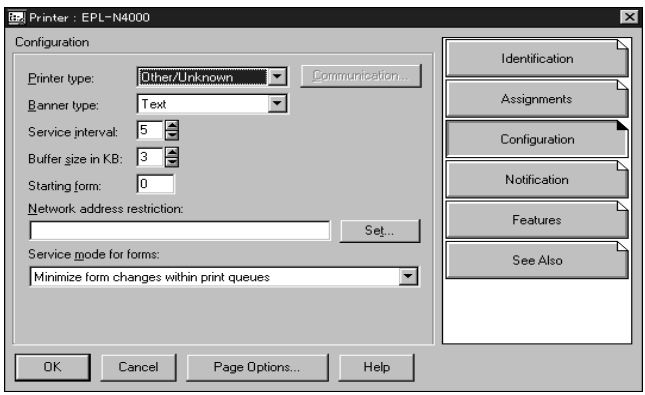


8. The Printer dialog box appears. Click Assignments and then click Add.

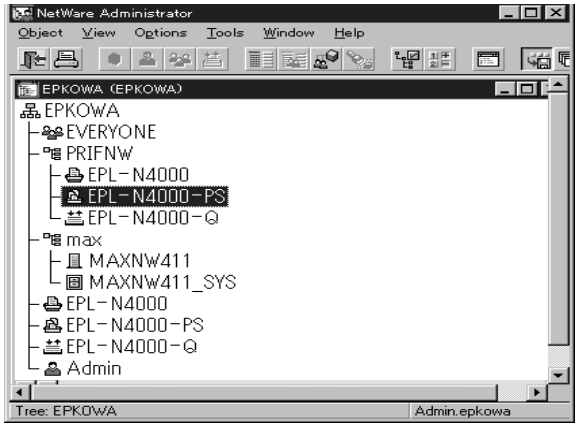


9. From the print queue list, select the queue you want to assign and click OK.

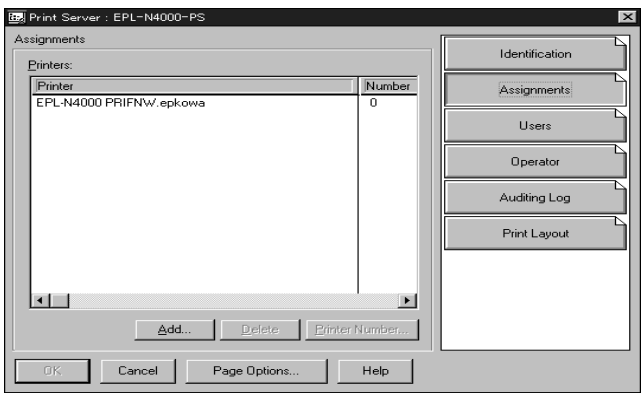
10. **For Remote Printer mode only:**
Click Configuration, and select Other/Unknown for the Printer type box and click OK.



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

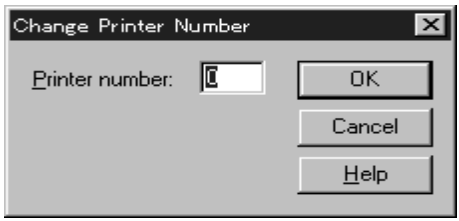


12. The Print Server dialog box appears. Click Assignments and then click Add.

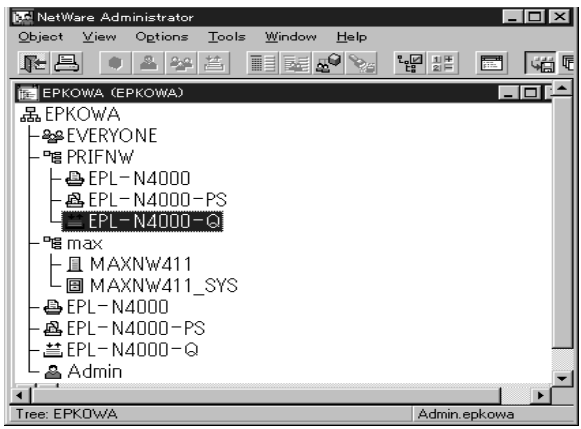


13. From the printer object list, select the printer object you want to assign and click OK.

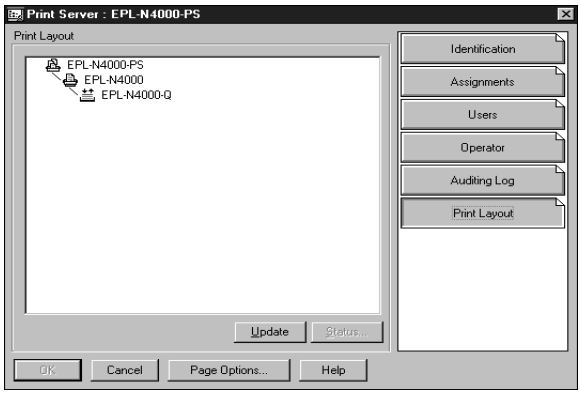
14. **For Remote Printer mode only:**
    Go back to the screen in step 12, and click the Printer Number button to set the printer number from 0 to 254. Then click OK.



15. Double-click the Print Queue Object icon in the NetWare Administrator screen.



16. 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.



17. **For Remote Printer mode only:**
    Load the print server only if you are using Remote Printer mode. From the System Console of the file server in which you set the print queue, load the print server module by the following command. Type the print server name which you assigned using Nwadmin.

    >LOAD PSERVER the print server name

See your NetWare 4.1x documentation for more detailed information.

Configuring the Network device using EPSON Net!2 for Intranet

Follow the steps below to configure the network device in Print Server mode or Remote Printer mode using EPSON Net!2 for Intranet.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. Click NetWare under Configuration.

4. The Enter Network Password dialog box appears. Input the password and click OK. (See "Setting a password" on page 2-11 for more information about passwords.)

5. The NetWare screen appears.

6. Configure for NetWare as follows.

NetWare Basic Configuration:

NetWare:
Select either Enabled or Disabled. Choose Enabled to use NetWare.

Primary Frame type:
Automatically selects the primary frame type.

Mode:
Select the mode either NDS Print Server or Remote Printer.

NDS Tree Name:
Type the same NDS tree name (up to 31 characters) as you set in Nwadmin.

NDS Context:
NDS context is the Object position in the Directory tree. Type the container object name (up to 255 characters) from the Object to the Root.

Example: OU=OFFICE.O=EPSON

Print Server Mode:

Note:
Make the following settings when you select NDS Print Server *for the mode.*

Primary File Server Name:
Type the file server name (up to 47 characters) which this print server logs in.

Print Server Name:
Type the leaf (printer) object name (up to 47characters).

Polling Interval (5-90):
Type the polling interval in seconds.

NetWare Password:
Type the password (up to 19 characters) which you use to log in to the primary file server.

Remote Printer Mode:

Note:
Make the following settings when you select Remote Printer *for the mode.*

Primary Print Server Name:
Type the primary print server name (up to 47 characters) which was created with Nwadmin.

Print Port Number:
Type the print port number (between 0 and 254).

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

9. After configuring the network device using EPSON Net!2 for Intranet, confirm the settings as follows.

   For Print Server Mode:
   Select the Connection Information from the File Server Console's MONITOR.NLM, and check if the print server name assigned to the network device has been logged into the Active Connections list. It takes five minutes or less to complete this.

   For Remote Printer Mode:
   Select Printer Status from the Print Server Console screen. Select the printer from the list, then check the status.

Configuring the Network Device for TCP/IP

To use the printer in a TCP/IP environment, you need to configure the network device for TCP/IP.

Before using the network device with TCP/IP, you need to install the TCP/IP Protocol and EPSON Status Monitor 2 in Windows 95/98; and the TCP/IP Protocol and Microsoft TCP/IP Printing in Windows NT.

Note:
In most cases, Windows 3.1 can't use TCP/IP to share network printers.

Installing LPR software in Windows NT 3.51

Follow the steps below to install LPR software in Windows NT 3.51. If you have already installed Microsoft TCP/IP Printing, you can skip these steps.

1. Double-click the Network icon in the Control Panel to open the Network Settings dialog box.
2. If Microsoft TCP/IP Printing is in the Installed Software list box, you can skip to the next section. Otherwise, click Add Software.
3. Select TCP/IP Protocol and related components and click Continue.
4. Select TCP/IP Network Printing Support. Then click Continue.
5. Follow the instructions on the screen.

For more information, see your Windows NT 3.51 documentation.

Installing LPR software in Windows NT 4.0

Follow the steps below to install LPR software in Windows NT 4.0. If you have already installed Microsoft TCP/IP Printing, you can skip these steps.

1. Double-click the Network icon in the Control Panel and click Add on the Services menu.

2. Select Microsoft TCP/IP Printing and click OK.

3. Follow the instructions on the screen.

For more information, see your Windows NT 4.0 documentation.

Configuring the network device using EPSON Net!2 for Intranet

To use TCP/IP on the network, you need to set the IP address for the network device.

See "Changing the IP address using EPSON Net!2 for Intranet" on page 2-11 to configure the network device for TCP/IP.

In addition to the TCP/IP settings, set the LPD to Enabled in the TCP/IP setting screen of EPSON Net!2 for Intranet.

Note:
Make sure you have installed TCP/IP in your operating system. For information on installing TCP/IP, see your operating system documentation.

Setting up the printer in Windows 95/98

After configuring the network device, you need to set up the network printer. In Windows 95/98, use the Add Printer wizard as follows:

Note:
Windows 95/98 do not support LPR printing. Before setting up your printer in Windows 95/98, you must install the EPSON TCP/IP printer protocol. The Status Monitor installer program automatically prompts you when to install EPSON TCP/IP, see "Installing EPSON Status Monitor 2" on page 7-7 for instructions.

1. Double-click the My Computer icon, then double-click the Printers folder.
2. Double-click Add Printer and click Next.
3. Select the Network Printer radio button and click Next.
4. Click Browse; then double-click the EPSON_TCPIP_Printers icon. If you do not see the icon, EPSON Status Monitor 2 has not been installed. See Chapter 7 for installation.
5. Double-click the target printer icon.
6. Follow the on-screen instructions to set up the printer.

You can change the printer driver settings from the Properties dialog box at any time.

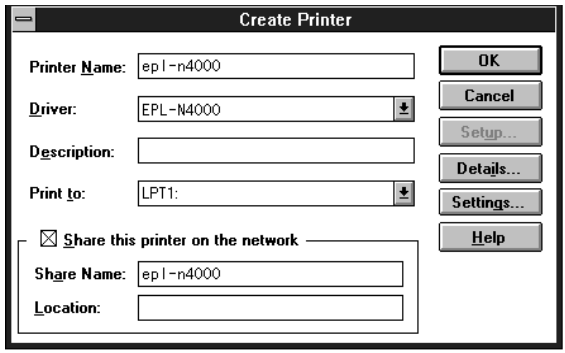
Setting up the printer in Windows NT 3.51

After configuring the network device, you need to set up the network printer. Follow these steps to set up the printer in Windows NT 3.51.

Note:
Make sure you have installed the correct printer driver in your computer before starting these steps. If you haven't installed the printer driver yet, see "Installing the Printer Driver" in Chapter 1 for installation.

1. Double-click Print Manager in the Main program group.

2. Click the target printer icon and select Properties from the Printer menu.



3. To share the printer on a network, select the Share this printer on the network check box. Type the share name and the location.

4. Choose Other from the Print To pull-down menu. The Print Destinations dialog box appears.

5. Select LPR Port from the Available Print Monitors list and click OK. The Add LPR compatible printer dialog box appears.

6. Type the previously specified IP address of the network device and the appropriate printer name. Then click OK.

7. Verify that all your settings and are correct in the Create Printer dialog box. Make changes if necessary.

Note:
When you share the printer, announce the printer name and the location to the clients so they will be able to know which printer to use on the network.

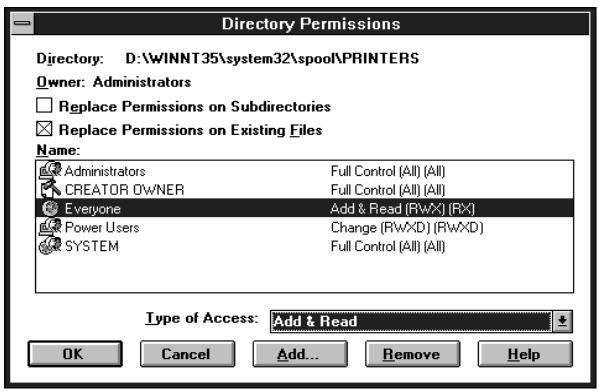
Change the type of access of the spool directory

You need to change the access rights of the spool directory when you create a shared printer on the Windows NT 3.51 Server (if you have set up your computer to use a NTFS file system, rather than a FAT file system).

1. Start the File Manager and point the cursor at \WINNT35\SYSTEM32\SPOOL\PRINTERS.

2. Choose Permissions from the Security menu.

3. Change the type of access of Everyone to ADD & READ (RWX)(RX), and click OK.



Setting up the printer in Windows NT 4.0

After configuring the network device, you need to set up the network printer. Follow these steps to set up the printer in Windows NT 4.0.

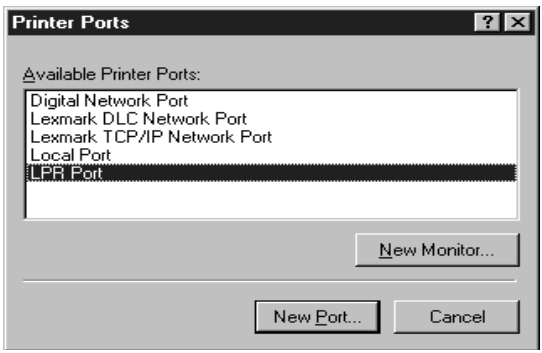
Note:
Make sure you have installed the correct printer driver in your computer before starting these steps. If you haven't installed the printer driver yet, see "Installing the Printer Driver" in Chapter 1 for installation.

1. Double-click the My computer icon, then double-click the Printer folder.

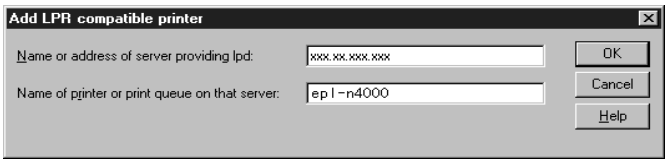
2. Right-click the target printer's icon, and select Properties.

3. Click the Port tab, and then click the Add Port button.

4. Select LPR Port from the Available Printer Port list, and click the New Port button.



5. The Add LPR compatible printer dialog box appears. Type the IP address of the network device in the first text box and an appropriate printer name in the second text box, and click OK.



6. Follow the on-screen instruction if it appears.

Note:
When you share the printer, announce the printer name and the location to the clients so they will be able to know which printer to use on the network.

FTP Printing

You can print using FTP command from Windows. First, you need to set the IP address for the network device.

See “Changing the IP address using EPSON Net!2 for Intranet” on page 2-6 to configure the network device for TCP/IP.

In addition to the TCP/IP settings, set the FTPD to Enabled in the TCP/IP setting screen of EPSON Net!2 for Intranet.

The following is an example of printing using the FTP command (User input is shown underlined).

C:Windows>ftp 22.33.44.55

Connected to 22.33.44.55

220 FTP server (EPSON FTPD version 1.01) ready.

User (22.33.44.55:(none)):

230 VUser (none) logged in.

ftp> put c:\testdata\aa.txt ftp15

150 About to open data connection.

226 File transferred.

ftp> bye

Configuring the Network Device for NetBIOS

To use the printer for SMB printing, you need to configure the network device for NetBIOS.

Before you follow these steps, make sure that the following protocols and services are installed in your computer. See your operating system documentation for installing the protocols.

For Windows 95:
TCP/IP protocol, NetBEUI protocol, and Client for Microsoft Networks

For Windows NT 3.51/4.0:
TCP/IP protocol, NetBEUI protocol, and Workstation service

Configuring the network device using EPSON Net!2 for Intranet

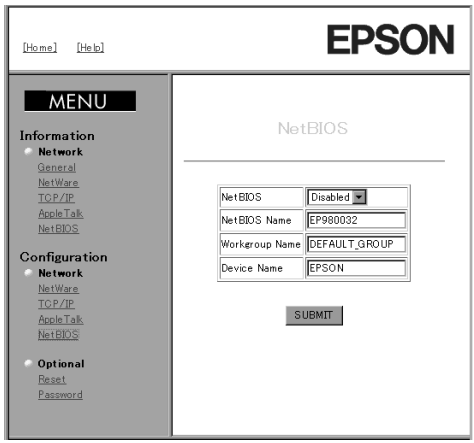
Follow these steps to configure the network device for NetBIOS.

1. Make sure the printer is turned on.
2. Open your Web browser. Type the following URL and press Enter.

   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/
3. Click NetWare under Configuration.
4. The Enter Network Password dialog box appears. Input the password and click OK. (See "Setting a password" on page 2-11 for more information about passwords.)

5. The NetBIOS screen appears.



6. Configure for NetBIOS as follows.

NetBIOS:
Select either Enabled or Disabled. Choose Enabled to use NetBIOS.

NetBIOS Name:
Type a NetBIOS name (up to 15 characters). The NetBIOS name is the computer's name on the network. Make sure to use a unique name on the network.

Workgroup Name:
Type the workgroup name (up to 15 characters). The workgroup name is the domain name or the workgroup name used in a Windows network environment.

Device Name:
Type the device name (up to 12 characters), except LPT1, LPT2, LPT3, and COM.

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Setting up your printer in Windows 95/98

This section explains how to set up the printer with the network device.

1. Double-click the My Computer icon, then double-click the Printers folder.

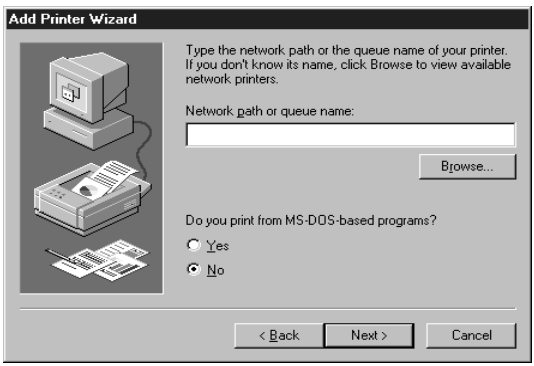
2. Double-click Add Printer and click Next.

3. Click the Network Printer radio button and click Next.

4. Click Browse, and double-click the target printer.

5. When you cannot browse the printer, type the following at the Network path or queue name box.

   \\(NetBIOS name of the network device)\
   (Device name of the network device)



6. Follow the on-screen instructions to set up the printer.

Setting up the printer in Windows NT 3.51

To print from a shared printer on the network, you need to connect to the printer. Follow the steps below.

1. Double-click Print Manager from the Main dialog box, and select Connect to Printer from the Printer menu.

2. Select the target printer from the Shared Printers list and click OK.

   If you cannot select the printer, type directly in the Printer box as follows.

   \\ (NetBIOS name of the network device)
   (Device name of the network device)

3. Follow the on-screen instructions.

Setting up the printer in Windows NT 4.0

1. Double-click Add Printer in the Printers dialog box.

2. Click the Network printer server radio button in the Add Printer Wizard dialog box.

3. Type the printer name directly in the Printer box as follows:

   \\ (NetBIOS name of the network device) \
   (Device name of the network device)

4. Follow the on-screen instructions to set up the printer.

Using the NET USE command to set up the printer

When you are using Windows NT server and NetBIOS to connect with the network device, we recommend that you use the NET USE command, as outlined below.

You can also use the NET USE command with Windows 95/98.

1. **For Windows NT only:**
   Double-click Network in Control Panels and check that the following services are installed.

   [Windows NT 3.51]
   Check that Server and/or Workstation are listed in the Installed Network Software list.

   [For Windows NT 4.0]
   Check that Server and/or Workstation are listed in the Services menu.

2. Open the Windows command prompt and type in the following command.

   NET USE (printer port): \\(NetBIOS name of the network device)\(Device name of the network device)

3. **[Windows 95/98]:**
   Open the target printer's Properties and click the Details tab. Select the port you entered in step2.

   [Windows NT 3.51]:
   Select the target printer in the Print Manager, and choose Printer Information from the Printer menu. Then, select the port from the Print to pull-down menu which you entered in step 2.

   [Windows NT 4.0]:
   Open the target printer's Properties and click the Port tab. Check the port you have entered in step 2.

Configuring the Network Device for AppleTalk Using EPSON Net!2 for Intranet

To use the printer on an AppleTalk network, you need to configure the network device for AppleTalk.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. Click AppleTalk under Configuration.

4. The Enter Network Password dialog box appears. Input the password and click OK. (See “Setting a password” on page 2-11 for more information about passwords.)

5. The AppleTalk screen appears.

6. Configure for AppleTalk as follows.

   AppleTalk:
   Select either Enabled or Disabled. Choose Enabled to use AppleTalk.

   Printer Name:
   Type the printer name (up to 31 characters).

   Entity Types:
   Shows the printer's entity type.

   Zone Name:
   Type the zone name (up to 31 characters). If you are not sure of the default zone name, input the asterisk (*).

   Node ID:
   Type the Node ID (between 0 and 255).

   Network Number Set:
   Select the network number setting. Usually you should select Auto.

   Network Number for Manual Mode:
   When you select Manual for the Network Number Set, you need to type the network number manually (between 0 and 65535).

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Note:
If you cannot see the printer in the Chooser, check whether any AppleTalk routers have been set incorrectly. If you cannot change the router settings, select Manual *for the Network Number Set and type a network number in the Network Number for Manual Mode box as a temporary solution. In this case, you must type the correct zone and the network number of the zone.*

Chapter 4

Settings for Macintosh

This chapter describes how to configure the network device for TCP/IP or AppleTalk using EPSON Net!2 for Intranet, the utility that runs on the browser.

Note:

- ❏ *The EPSON Net!2 for Intranet utility configures the network device to work only with the protocols that exist on your network. This does not imply that you can use all of the above mentioned protocols in your network or operating system. The protocols that the network device can use may vary depending on the operating systems used and network configuration.*

- ❏ *Do not use EPSON Namer with the network device.*

Before you start configuring the network device, make sure of the following points:

- ❏ The correct printer driver must be installed in the Macintosh system.

- ❏ EPSON Net!2 for Intranet can configure the network device for AppleTalk and TCP/IP.

Before continuing, be sure to connect the network device to the network, turn on the printer, and set the IP address for the network device using the printer's control panel.

Applicable Systems

- ❏ Macintosh OS
  System 7.1, 7.5.3, 7.5.5, OS 8.0, OS 8.1

- ❏ Apple network driver
  EtherTalk Phase 2
  OpenTransport 1.1.1, 1.1.2, 1.3

- ❏ Apple printer driver
  LaserWriter, LaserWriter 8

Configuring the Network Device for AppleTalk Using EPSON Net!2 for Intranet

To use the printer on an AppleTalk network, you need to configure the network device for AppleTalk.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

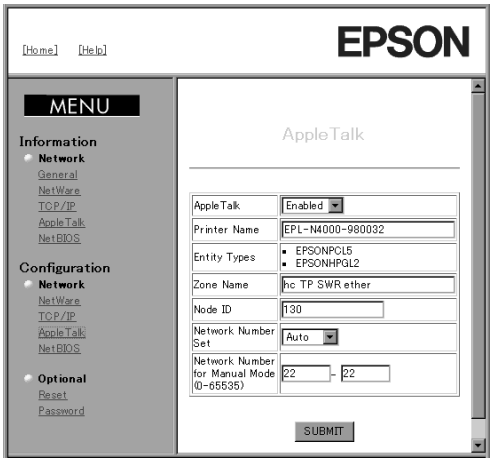
   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. Click AppleTalk under Configuration.

4. The Enter Network Password dialog box appears. Input the password and click OK. (See “Setting a password” on page 2-11 for more information about passwords.)

5. The AppleTalk screen appears.



6. Configure for AppleTalk as follows.

AppleTalk:
Select either Enabled or Disabled. Choose Enabled to use AppleTalk.

Printer Name:
Type the printer name (up to 31 characters).

Entity Types:
Shows the printer's entity type.

Zone Name:
Type the zone name (up to 31 characters). If you are not sure of the default zone name, input an asterisk (*).

Node ID:
Type the Node ID (between 0 and 255).

Network Number Set:
Select the network number setting. Usually you should select Auto.

Network Number for Manual Mode:
When you select Manual for the Network Number Set, you need to type the network number manually (between 0 and 65535).

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Note:
If you cannot see the printer in the Chooser, check whether any AppleTalk routers have been set incorrectly. If you cannot change the router settings, select Manual *for the Network Number Set and type a network number in the Network Number for Manual Mode box as a temporary solution. In this case, you must type the correct zone and the network number of the zone.*

Choosing the printer on Macintosh

To print to the new printer, use the Chooser to select the printer. Select the options you have specified with EPSON Net!2 for Intranet.

Make sure the following points before going through the steps below;

- ❑ **For models without Open Transport:**
  Select EtherTalk in the Network Control Panel.

- ❑ **For models with Open Transport:**
  Select EtherTalk in the AppleTalk Control Panel.

1. Open the Chooser from the Apple menu.
2. Click the printer driver icon.
3. If there is a zone, click the AppleTalk zone that contains the printer.
4. Click the printer name.
5. Make sure AppleTalk is active.
6. Close the Chooser.

Chapter 5

Settings for OS/2

This chapter describes how to configure and use the network device with an IBM OS/2 System, which includes OS/2 Warp3 and 4 (OS/2 Warp Connect and OS/2 Warp Server).

Applicable Systems and Protocols

- ❏ OS/2 Warp3, OS/2 Warp4
- ❏ lprportd (TCP/IP)
- ❏ NetBIOS over TCP/IP

TCP/IP Printing

This section explains about TCP/IP printing using the lprportd supported by standard OS/2. First of all, you need to configure the network device using EPSON Net!2 for Intranet through any other client. Then set up the printer.

Configuring the network device using EPSON Net!2 for Intranet

First, you need to make the following settings using EPSON Net!2 for Intranet through any other client such as Windows 95/98 or Windows NT.

Follow these steps to configure the network device for TCP/IP.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

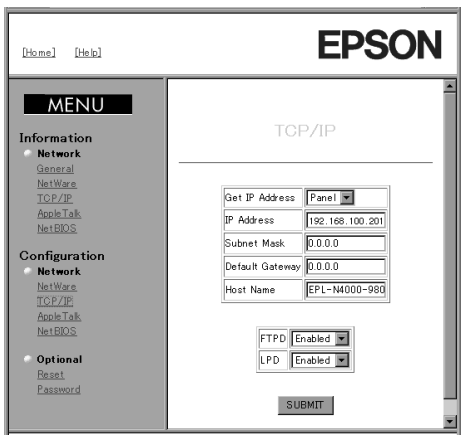
   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. Click TCP/IP under Configuration.

4. The Enter Network Password dialog box appears. Input the password and click OK. (See “Setting a password” on page 2-11 for more information about passwords.)

5. The TCP/IP screen appears.



6. Configure for TCP/IP as follows.

   Get IP Address:
   Select either Panel, DHCP, or PING.

   IP Address:
   Input the IP address of the EPL-N4000. Make sure to give an IP address which does not conflict on the network.

Subnet Mask:
Input the subnet mask.

Default Gateway:
Input the gateway address. If there is a server or router which serves as a gateway, input the IP address of the server or router. If there is no gateway, type the IP address of your computer.

Note:
When you don't need to set an IP address, subnet mask, or default gateway, input 0.0.0.0 in the appropriate box.

Host Name:
Give a unique name for the host on the network (up to 32 characters).

7. Click SUBMIT to send the settings to the network device.

8. Select Enabled to use LPD or FTPD depending on the port you use.

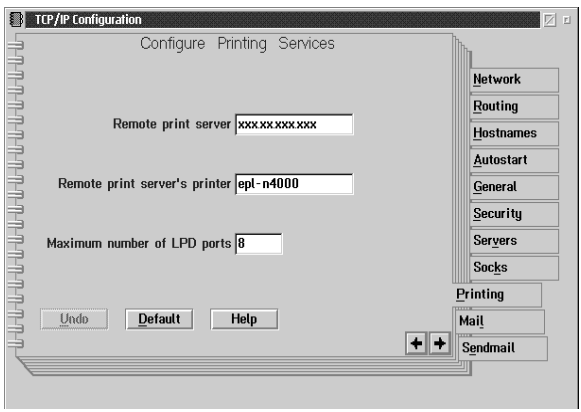
9. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Setting up the printer

Follow the steps below to set up the printer.

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. Type the IP address of the network device at the Remote print server box and the name of the remote print server's printer at the second text box. Type a value greater than or equal to 1 in the Maximum number of LPD ports box.

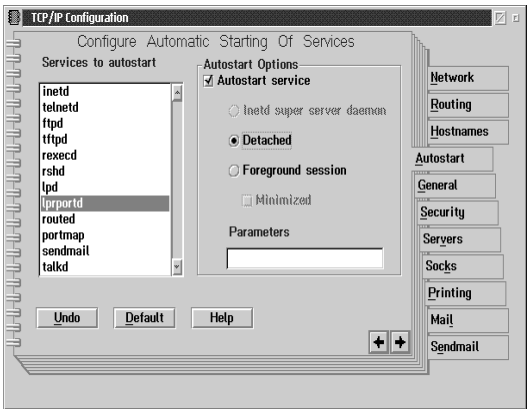


3. Click the Hostnames tab. Go to Page 2 by clicking the arrow.

4. Click Add. In the HOSTS Entry dialog box, type the IP address and hostname of your machine. Then click Add.

5. Click Add again. In the HOST Entry dialog box, type the IP address and hostname of the printer. Then click Add.

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



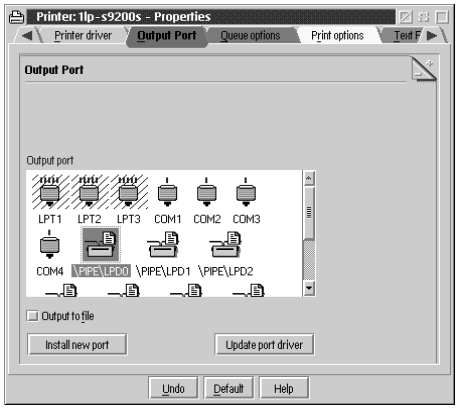
7. Save the settings you made in the TCP/IP Configuration dialog box, and restart your computer.

8. Double-click Template from the OS/2 System folder. Right-click Printer and drag it to your desktop to create a printer.

9. Double-click the Printer icon to link lprportd to the printer.

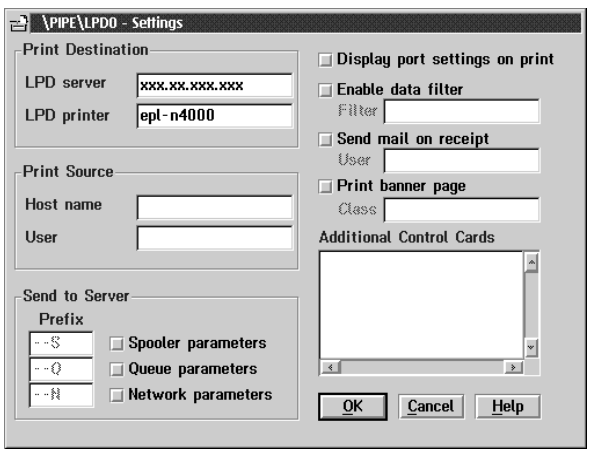
Note:
If you haven't set up the printer, see your OS/2 documentation for instructions.

10. Select Properties from the control menu, then click the Output Port tab.



11. From the Output Port list box, double-click a port from \PIPE\LPD0 to \PIPE\LPDn (where n is the maximum number of LPD ports).

12. Type the IP address of the network device at the LPD server box. Type the printer name set in step 2 at the LPD printer box.



13. Close the Printer icon to exit printer configuration.

SMB Printing

This section explains about SMB printing. First of all, you need to configure the network device using EPSON Net!2 for Intranet through any other client. Then set up the printer.

Configuring the network device using EPSON Net!2 for Intranet

First, you need to make the following setting using EPSON Net!2 for Intranet through any other client such as Windows 95/98 or Windows NT.

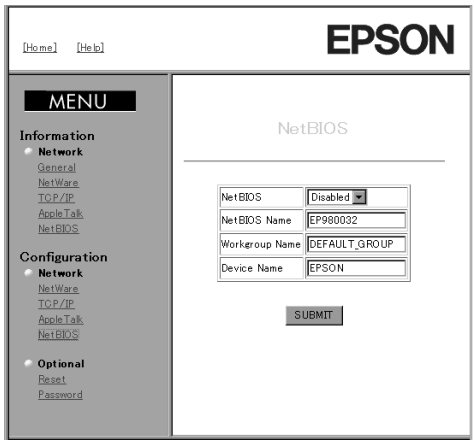
Follow these steps to configure the network device for NetBIOS.

1. Make sure the printer is turned on.
2. Open your Web browser. Type the following URL and press Enter.

   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/
3. Click NetBIOS under Configuration.
4. The Enter Network Password dialog box appears. Input the password and click OK. (See “Setting a password” on page 2-11 for more information about passwords.)

5. The NetBIOS screen appears.



6. Configure for NetBIOS as follows.

NetBIOS:
Select either Enabled or Disabled. Choose Enabled to use NetBIOS.

NetBIOS Name:
Type a NetBIOS name (up to 15 characters). The NetBIOS name is the computer's name on the network. Make sure to use a unique name on the network.

Workgroup Name:
Type the workgroup name (up to 15 characters). The workgroup name is the domain name or the workgroup name used in a Windows network environment.

Device Name:
Type the device name (up to 12 characters), except LPT1, LPT2, LPT3, and COM.

7. Click SUBMIT to send the settings to the network device.

8. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Setting up the printer

Follow the steps below to set up the printer for SMB printing.

1. Create a printer.
2. Right-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 the network device) \(Device name of the network device)

Chapter 6

Settings for UNIX

This chapter explains how to set up the printer for different UNIX systems using the lpr or lp command (depending on the system).

The network device supports many standard UNIX commands and can be configured from a host computer.

The network device 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 network device does not convert data into the printer control language, a printer driver and filter are necessary for each system.

Setting Up Different UNIX Systems Using the lpr Command

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

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

Setting up with SunSoft Solaris 2.4 or higher

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

1. Register the IP address and host name in the \etc\hosts file.

   For example:
   22.33.44.55 HOSTNAME

2. Register the host name as a print server.

   For example:
   lpsystem -t bsd HOSTNAME

3. Create the printer.

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

4. Make the printer available for printing.

   For example:
   accept RPrinter
   enable Rprinter

Print a file using the “lp” command.

For example:
lp -d RPrinter Print-File-Name

Setting up with SunOS 4.1.4 or higher

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

1. Register the IP address and host name in 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 |
   LP-1700:lp=:rm=HOSTNAME:rp=aux:sd=/var/spool/
   lpd/PRIFx

Print a file using the "lpr" command.

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

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

Setting up with IBM AIX 3.2.5 or higher

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

1. Register the IP address and host name in the /etc/hosts file.

   For example:
   22.33.44.55 HOSTNAME

2. Start 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".

Print a file using the "lpr" command.

For example:
lpr -PRPrinter Print-File-Name

Setting up with HP-UX 9.05 or higher

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

1. Register the IP address and host name in the /etc/hosts file.

   For example:
   22.33.44.55 HOSTNAME

2. Terminate the printing service.

   For example:
   lpshut

3. Create the printer.

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

4. Restart the printing service.

   For example:
   lpshed

5. Make the printer available for printing.

   For example:
   accept RPrinter
   enable Rprinter

Print a file using the “lp” command.

For example:
lp -DRPrinter Print-File-Name

Setting up with SCO UNIX 4.2 or higher (Open Server)

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

1. Register the IP address and host name in 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 host name of the remote printer.

   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

Print a file using the "lpr" command.

For example:
lpr -d RPrinter Print-File-Name

Using the ftp command

ftp commands are common to all UNIX systems.

ftp programs use an interface that is common to all UNIX systems.

The following is an example of printing using the ftp command (User input is shown underlined).

ftp> open 22.33.44.55

Connected to 22.33.44.55

220 <hostname> FTP server (EPSON FTPD version 1.01) ready.

Name : _

331 Password Required for No Name.

Password:_

230 User logged in.

ftp>binary

200 Type set to I.

ftp> put binary file

200 PORT command successful.

150 Opening data connection for binary_file

226 Transfer complete

ftp> bye

Configuring the Network Device Using EPSON Net!2 for Intranet

To use the printer on the network, you need to configure the network device.

You need to make the following settings using EPSON Net!2 for Intranet through any other client such as Windows 95/98 or Windows NT.

1. Make sure the printer is turned on.

2. Open your Web browser. Type the following URL and press Enter.

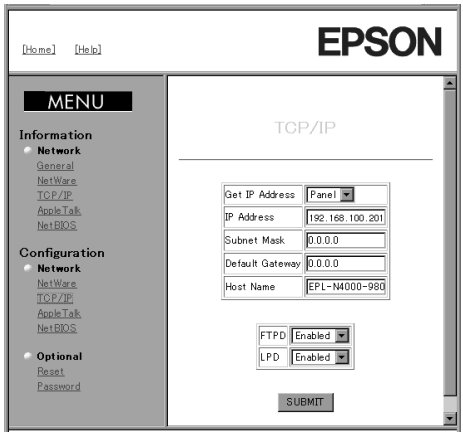
   URL: http://<the IP address of the EPL-N4000>/

   Example: http://192.168.100.201/

3. The Enter Network Password dialog box appears. Input the password and click OK. (See "Setting a password" on page 2-11 for more information about passwords.)

4. Click TCP/IP under Configuration.

5. The TCP/IP screen appears.



6. Configure for TCP/IP as follows.

Get IP Address:
Select either Panel, DHCP, or PING.

IP Address:
Input the IP address of the EPL-N4000. Make sure to give an IP address which does not conflict on the network.

Subnet Mask:
Input the subnet mask.

Default Gateway:
Input the gateway address. If there is a server or router which serves as a gateway, input the IP address of the server or router. If there is no gateway, type the IP address of your computer.

Note:
When you don't need to set an IP address, subnet mask, or default gateway, input 0.0.0.0 in the appropriate box.

Host Name:
Give a unique name on the network (up to 32 characters).

7. Select Enabled to use LPD or FTPD depending on the port you use.

8. Click SUBMIT to send the settings to the network device.

9. After clicking SUBMIT, click Reset under Optional. Then click the RESET button to reset the network device. It takes a few minutes to update the changes. Do not exit the Web browser while updating the changes.

Chapter 7

EPSON Status Monitor 2 (Windows only)

EPSON Status Monitor 2 is a utility program that monitors your printer and gives you information about the current status of the printer, including the amount of remaining toner. If a print error occurs, the Status Monitor also provides you with a message describing the error. The Status Monitor allows you to print using the TCP/IP protocol with Windows 95/98.

For more information on using the Status Monitor, open the online help included with this utility.

Before using the Status Monitor, be sure to read the Readme file located on the EPSON Status Monitor 2 Disk 1 folder. This file contains the latest information on the Status Monitor.

Environment for EPSON Status Monitor 2

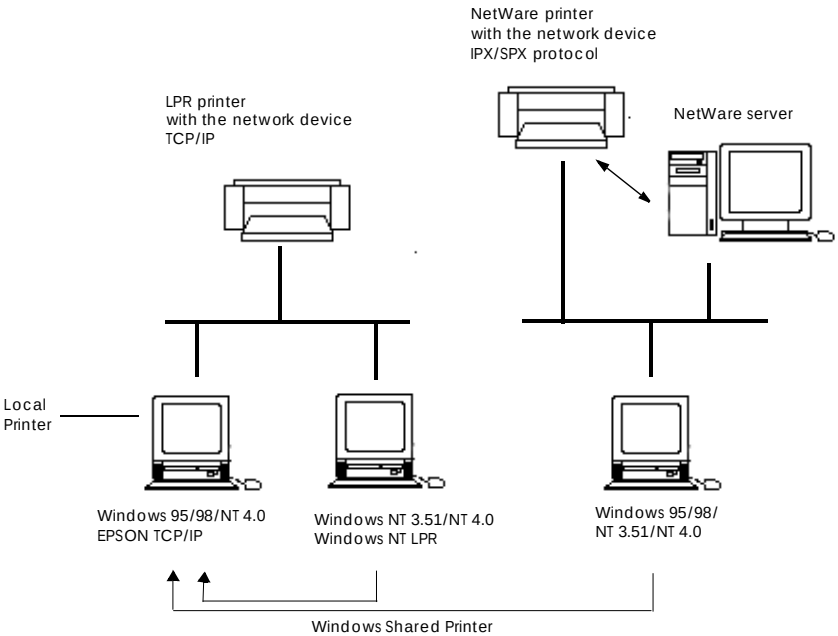
Protocols

The protocols that must be installed to run EPSON Status Monitor 2 vary depending on your operating system and printer type. The following table divides printers into four categories: Local printers; LPR printers, which use TCP/IP (generally in a Windows NT network environment); NetWare printers, which use Novell's IPX/SPX protocol in a NetWare environment; and Windows shared printers.

Use this table to determine what ports are used and what protocols you need to install according to your operating system and printer type, then see the corresponding section for your operating system.

	Local Printer	**LPR Printer (TCP/IP)**	**NetWare Printer*1 (IPX/SPX)**	**Windows Shared Printers**
Windows 95	LPT	TCP/IP & EPSON[1]	NetWare[3]	LPT
Windows 98	LPT	TCP/IP & EPSON[1]	—	LPT
WindowsNT3.51	—	TCP/IP & LPR[2]	NetWare[3]	LPR[2]
Windows NT 4.0	LPT	TCP/IP & LPR[2]	NetWare[3]	LPR[2] & LPT

EPSON1 = EPSON TCP/IP Printing protocol
LPR2 = Windows NT LPR protocol
LPT = LPT port
NetWare3 = Necessary protocols already installed



Note:

- ❏ *To set up the network device for use with TCP/IP, see Chapter 3. To set up the network device for use with NetWare, see your NetWare documentation.*

- ❏ *If you configure more than one interface for one queue, the Status Monitor cannot monitor the printer that is assigned to that queue.*

For Windows 95*:*
You can also use Novell NetWare Client32 for Windows 95.

LPR printers use LPR over TCP/IP as their communication protocol suite, and you must install both protocols to use the Status Monitor to monitor a LPR printer. See your operating system documentation for installing TCP/IP.

NetWare printer protocols are already installed in your NetWare network, so if you have a NetWare printer, skip to "Installing the EPSON Status Monitor 2" on page 7-7. For an explanation of NetWare printer protocols, see your NetWare documentation.

Note for Win 95/98:
Windows 95/98 does not come with LPR, so in addition to installing TCP/IP, you need to install the EPSON TCP/IP printer protocol. The Status Monitor installer program automatically prompts you when to install EPSON TCP/IP. See "Installing EPSON Status Monitor 2" on page 7-7 for instructions.

Windows shared printer

To monitor a shared printer from the client through the server, select Allow monitoring in the Windows shared printer dialog box when you install EPSON Status Monitor 2 in the server.

① The port used for monitoring will differ from system to system.

② The environment must support normal printing from the shared printer..

	LPT1	LPR
Windows 95/98	O	X
Windows NT 3.51	X	O
Windows NT 4.0	O	O

See the Readme file for more information about support for Windows shared printers.

Local Printer

Connect the printer directly to the printer port of your computer.

Windows 95/98	Windows NT 3.51	Windows NT 4.0
Bi-directional support is necessary.	Not able to monitor.	Do not need any special settings.

For Windows 95/98:
You need to set the bi-directional support in the printer's properties dialog box. Click the Details *tab and click* Spool Settings. *Then click the* Enable bi-directional support for this printer *radio button.*

Note:
When you monitor a local printer with Windows 95/98, use LPT1 for the printer port.

TCP/IP printer (Windows 95/98) / LPR printer (Widows NT 3.51/ 4.0)

To connect to a printer on the network and share the printer without using the server:

For Windows 95/98:
Select Yes to enable EPSON TCP/IP printing at the installation of EPSON Status Monitor 2.

> ***Note for Win95/98:***
> *When printing with more than one computer without using the server, install EPSON Status Monitor 2 for each computer and select* Yes *to enable EPSON TCP/IP printing.*

For Windows NT 3.51/4.0:
You need to set for TCP/IP printing. See “Installing LPR software in Windows NT 3.51” on page 3-25 or “Installing LPR software in Windows NT 4.0” on page 3-26.

NetWare printer

You can use the network printer though a NetWare server. Make sure the following points;

- ❏ Connect the printer to a Bindery queue or NDS queue in Windows 95, Windows NT 3.51, or Windows NT 4.0.
- ❏ Use IntranetWare Client32 Ver1.12 or later if you are using Windows 95. Use IntranetWare Client if you are using Windows NT.
- ❏ See the EPSON Status Monitor 2 Readme file for more information about NDS support.
- ❏ You must set the port number to 0 when using Remote Printer mode.

If you use your printer in a NetWare environment, you need to connect to the print queue that is assigned to your printer before installing EPSON Status Monitor 2.

1. Click Start, point to Settings, and click Printers.
2. Click Add Printer.
3. Select Network printer, and click Next.
4. Double-click the NetWare file server that services the print queue assigned to your printer.
5. All of the queues serviced by that file server appear in a list. Select the correct print queue, and click OK. (If the printer driver is not installed, a dialog box appears prompting you to select the printer driver.)
6. Make the default printer setting and click Next.
7. Click Finish.

Installing EPSON Status Monitor 2

Note:

- ❏ *Turn off all other active applications (such as virus protection). For instructions on how to do this, see your application or Windows documentation.*

- ❏ *The EPSON Remote Control Panel utility is automatically installed in your computer when you install EPSON Status Monitor 2. For information about EPSON Remote Control Panel utility, see "Making Remote Control Panel Settings" on page 1-9 and online help.*

Note for NT 3.51/4.0:
Before starting the installation, you need to log on as an Administrator.

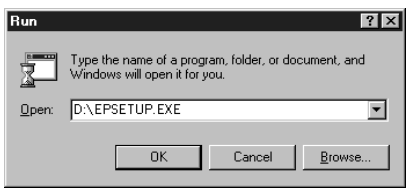
1. Insert the Software CD-ROM shipped with the printer in the CD-ROM drive.

2. Click Install EPSON Status Monitor 2, and then click [-->].

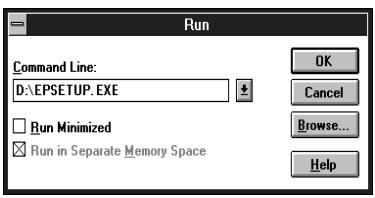
   Note:
   If the Installer screen does not appear automatically, follow the step below.

   If you use Windows 95/98 or Windows NT 4.0, click Start *and* Run. *If you use Windows NT 3.51, choose* Run *from the File menu in the Program Manager. Then, type* D:\EPSETUP.EXE *and click* OK. *If you inserted the CD-ROM in a drive other than drive D, substitute the appropriate letter.*

   Windows 95/98/NT 4.0



   Windows NT 3.51



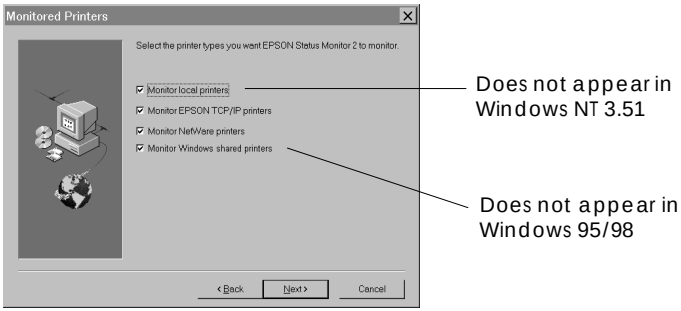
3. Read the on-screen instructions and click Next.

4. Click Next, or if you want to change the destination directory, click Browse and select your directory.

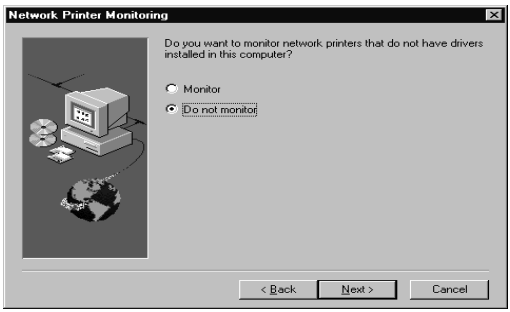
Note for Win 95/98:
Select Yes *in the screen below to enable EPSON TCP/IP printing, and then click* Next. *Because Windows NT 3.51 and Windows NT 4.0 support standard TCP/IP printing, so this screen does not appear in those systems. This screen only appears if TCP/IP is installed.*

5. Select the type of the printer you want to monitor and click Next. The printer types that you can monitor and the protocols you need to use to monitor those printer types vary from system to system. For more information, see page 7-2.

Windows NT 4.0



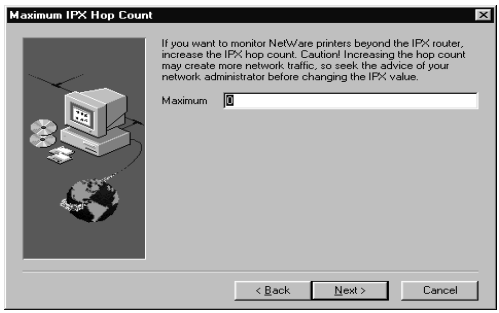
6. Select Monitor to monitor network printers that do not have drivers installed in this computer. Select Do not monitor only if network traffic is a problem. Click Next.



Note:
If you are network printer administrator, select Monitor *to monitor network printers that do not have drivers installed in your computer.*

Note for NT 3.51/4.0:
You can select these options only if you have logged on as an Administrator.

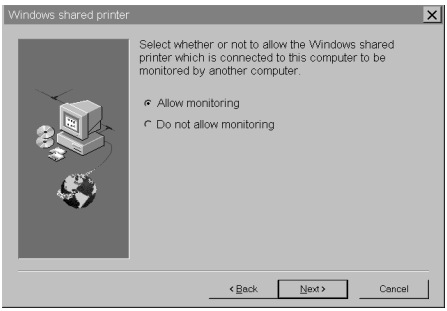
7. **Only for Netware network-based printers:**
In the screen shown below, set the number of hops from 0 to 15 and click Next. This screen appears only if the IPX/SPX protocol is installed in your computer and you selected Monitor Netware printers in step 5.



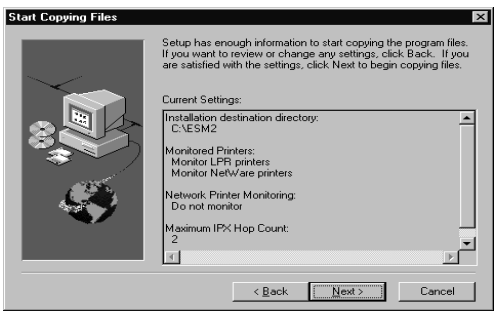
Caution:
If you have dial-up routers in a NetWare environment, they may automatically dial up the next hop and you are likely to be charged for the line connection depending on the number of hops you set. To prevent this and to keep network traffic to a minimum, set hops carefully. For more information, see "Monitoring printers beyond routers" on page 7-36.

8. Select Allow monitoring to monitor Windows shared printers. Select Do not allow monitoring to not monitor Windows shared printers. Click Next.

Note for Win 95/98:
The screen shown below does not appear in Windows 95/98.



9. Check the current settings and click Next. The installation program will start installing the necessary files. Follow the instructions on the screen.



7

10. Select Yes and click Finish to restart Windows when you see the following screen.

Caution:
If you install EPSON printer drivers after you have installed EPSON Status Monitor 2, EPSON Status Monitor 2 might not work correctly. When this happens, see "Making Status Monitor Settings" on page 7-15 to make settings again.

Selecting a Printer to Monitor

Before you can start monitoring a TCP/IP or LPR printer with EPSON Status Monitor 2, you need to select the printer in your operating system. Follow the steps for your operating system: Windows 95/98, below; NT 3.51, page 3-28; and NT 4.0, page 3-30.

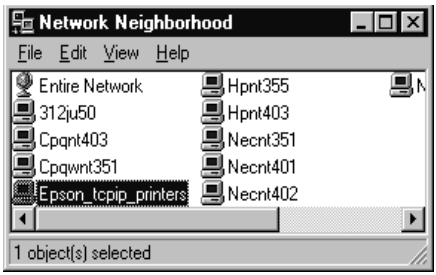
Note:
The IP address of the network device must be set; otherwise the printer does not appear on the screen. For instructions on setting the IP address for the network device, see Chapter 2.

Windows 95/98

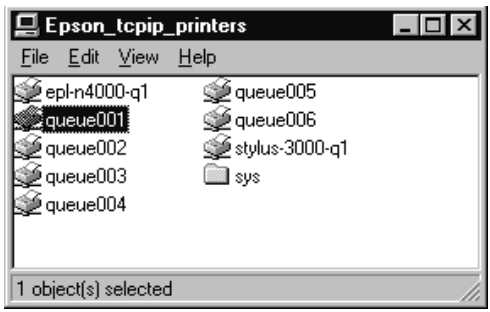
Note:
If the EPSON TCP/IP Printing setting is not set to Yes *for Windows 95/98, you cannot follow these steps. See step 4 of the installation instructions on page 7-8 for more information.*

1. Double-click the Network Neighborhood icon on your desktop.

2. Double-click EPSON_TCPIP_Printers, so that available printers equipped with the network device in the same segment as your computer appear in the window.

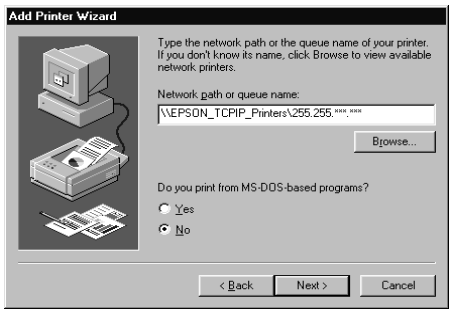


3. Double-click the target print queue.



4. Follow the instructions that the Wizard gives you on the screen. If you are required to install the printer driver, set up the printer referring to the user's guide that came with the printer.

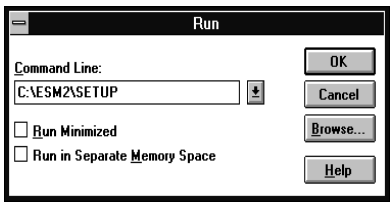
Note:
To install a printer located beyond a router, double-click Add Printer *in the Printers folder to start the Add Printer Wizard. Set the IP address for the target printer by typing* \\EPSON_TCPIP_Printers\ *followed by your IP address.*



Making Status Monitor Settings

You can change the settings in EPSON Status Monitor 2 as described below.

1. Open the Run dialog box from the Start menu or the Control Panel depending on your system. Type the path to the directory where you installed the Status Monitor, followed by Setup. Then click OK.



When you have installed the program in directory ESM2 of drive C, type C:\ESM2\SETUP.

Note:
If you installed the program in a directory other than ESM2, type the path to the directory instead of ESM2. If you installed the program in drive C, type C:\[path]\SETUP.

2. Follow the instructions on the screen.

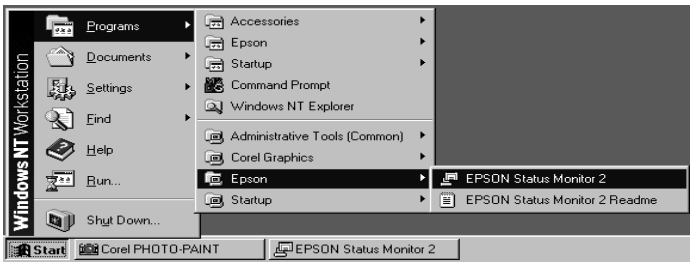
Note for NT 3.51 & 4.0:
Users can individualize their own settings without affecting the settings of other users.

Starting EPSON Status Monitor 2

From Windows 95/98 and NT 4.0

Double-click the Status Monitor icon on the right side of the taskbar.

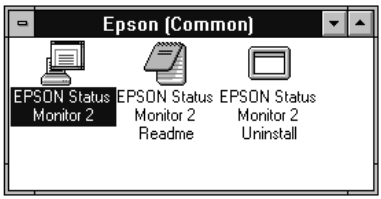
You can also start EPSON Status Monitor 2 by clicking Start, pointing to Programs and EPSON, and then clicking EPSON Status Monitor 2.



From Windows NT 3.51

Double-click the EPSON Status Monitor 2 icon on the screen.

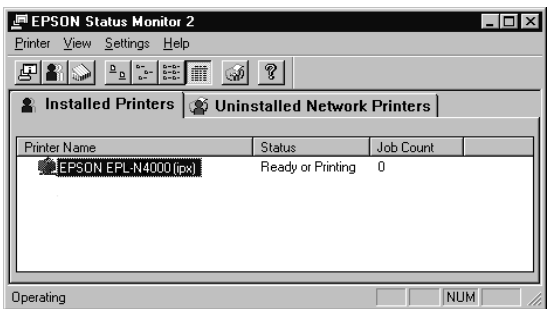
Note:
You can also start EPSON Status Monitor 2 from within the Epson program group in Program Manager.



Basic Operating Procedure

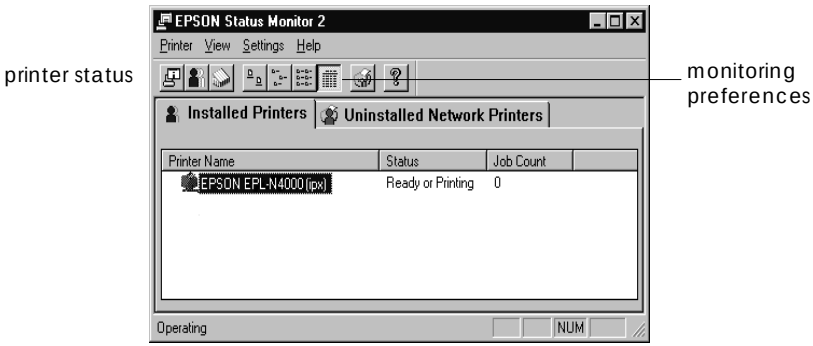
This section describes the basic operation and functions of EPSON Status Monitor 2.

1. Click a printer in the EPSON Status Monitor 2 window. The Installed Printers list shows the current status of all EPSON printers that have printer drivers installed in your computer.



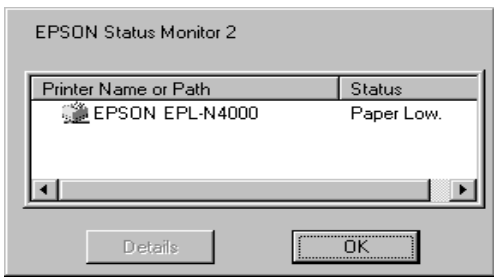
For more information about the Status Monitor window, see page 7-19.

2. Click the printer status icon for detailed information about the printer. See page 7-19 for more information. Click the monitoring preferences icon to make various settings. See page 7-28 for more information.



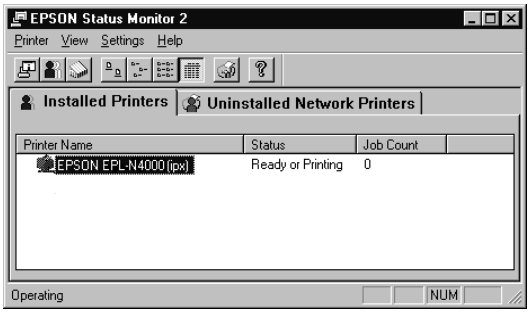
3. Click OK to close the dialog box after checking the printer status or making preference settings.

Note:
If you click the Monitor this printer *check box in the Monitoring Preferences dialog box, a Status Alert message appears according to the conditions you select in the Status Alert box. For detailed information, see "Background Monitoring Icon and Status Alert" on page 7-29.*



Main window

The Main window shows the current status of the printers. The color of the printer icon changes according to the printer's status.



Printer Icon:	**Meaning:**
Green	Ready to print.
Yellow	Ready to print; however the printer has detected something that may become a problem if it isn't fixed.
Red	Cannot print because of a problem.
Gray	Cannot monitor the printer.

Menus

Printer menu

This menu provides you with detailed information about the printer and print job status for any printer you select in the Installed Printers list. Click Printer Status for detailed information on the printer's status, or click Job Status to get details on jobs waiting to print. Click Select Paper Memory to open the Paper Memory Selection dialog box, where you can select a saved paper type to print on. The Select Paper Memory command is not available on some printers. Click Close to close the Status Monitor.

Note for Win 95/98:
If you select Job Status *while monitoring an EPSON TCP/IP printer, the following menu commands are available but do not take effect:*

Printer menu	Pause Printing, Purge Print Jobs
Document menu	Pause Printing, Cancel Printing

View menu

This menu lets you control the appearance and content of the EPSON Status Monitor 2 window and the Installed Printers list. You can choose to show or hide the toolbar and status bar, and you can choose whether large or small icons will appear next to the printers in the Installed Printers list. Clicking List on this menu displays only the printer name and icon in the Installed Printers list. Clicking Details displays the printer name, status, and job count. Click Refresh to update the status information shown in the Installed Printers list.

Settings menu

The Settings menu gives you control over the Status Monitor's background monitoring feature, and allows you to add and delete printers from the Installed Printers list. Select a printer from the Installed Printers list and click Monitoring Preferences to turn background monitoring on or off, and to adjust the monitoring preferences for the printer. Click Add Printer to add a new printer to the list, or click Delete Printer to delete the selected printer from the list. Point to Background Monitoring to select when to start and stop the background monitoring feature. Click Select background monitoring icon to specify the type of printer icon that is displayed on the taskbar when background monitoring is turned on.

Help menu

Choose Help Topics from this menu to view online help about the EPSON Status Monitor 2. Click About to view the Status Monitor's version number and copyright information.

Toolbar

Many of the commands available on the Status Monitor menus can be accessed directly by clicking the buttons on this toolbar. If you point to a toolbar button, the corresponding menu command appears briefly on your screen, and an explanation of the button's function appears in the Status Bar at the bottom of the Status Monitor window.

Note for NT 3.51 & 4.0:
Job Status is not available.

Note:

- ❏ *Close the Printer list window when you do not need it: this window uses computer resources if left open.*
- ❏ *If you change the printer port setting* (Print to the following port *or* Print to) *in the printer driver, quit EPSON Status Monitor 2 as described in "Stopping Monitoring" on page 7-31, and then restart it.*

Installed Printers list

This list displays information about the EPSON printers that are connected to your computer through the network and have printer drivers installed in your system. To change the printer information that is displayed in this list, see "View menu" on page 7-20.

Printer Name

Provides the names of the installed printers. You can add or delete printers to be monitored by choosing Add Printer or Delete Printer from the Settings menu. To save computer resources and reduce network traffic, delete printers you do not need to monitor. (Doing so does not remove the printer driver from your computer.)

Status

Displays brief messages describing the current status of the printer.

Job Count

Displays the number of print jobs waiting to be printed from a particular printer.

The number is not displayed for Windows shared printers.

Note:
You can rearrange the order of the printers in the list by clicking the Printer Name, Status, *and* Job Count *title bars.*

Uninstalled Network Printers list

The Uninstalled Network Printers list displays non-EPSON printers and EPSON printers that do not have installed printer drivers.

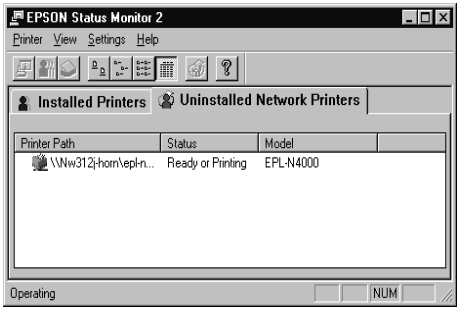
Note:
You need to check Monitor *in the Network Printer Monitoring dialog box during installation for the Uninstalled Network Printers list to be available.*

To monitor network printers that do not have drivers installed in your computer, add uninstalled network printers as described on the next page.

Printer Path: Shows the network printer path.

Status: Shows the current printer status.

Model: Shows the model name of the network printer.



Note for NT 3.51 & 4.0:
You need to log on as the Network Administrator to use this feature.

Note:
Delete printers that appear in this list but are not always connected to the network and printers that the Status Monitor cannot get status information about, because they unnecessarily use system resources. To delete a printer, select the printer and click Delete Printer *on the Settings menu.*

Adding uninstalled network printers

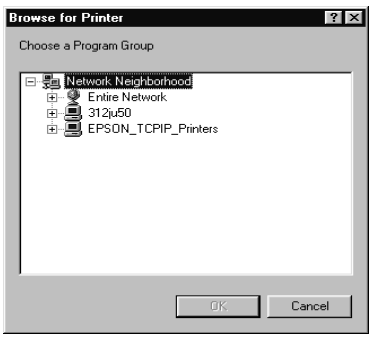
Before you start monitoring uninstalled network printers, you need to add them to the Uninstalled Network Printers list. Follow these steps:

1. Click the Uninstalled Network Printers list.

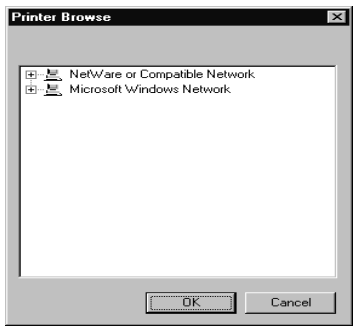
2. Click Add Printer on the Settings menu.

3. Type the path or IP address of the printer. If you do not know either, click Browse to select the target printer from the network.

Note for using Browse to add a printer:
The Browse for Printer window shows the entire network configuration. Do not select printers that you cannot monitor.



Windows 95/98



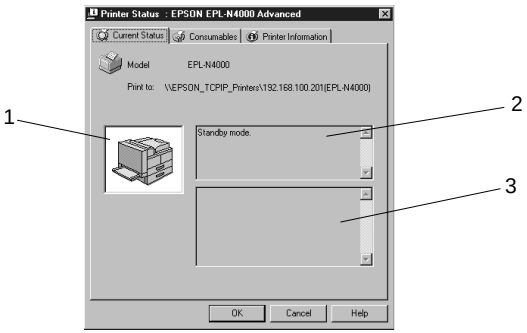
Windows NT 3.51/4.0

Getting detailed information about printer status

To get detailed information about a printer, right-click that printer and select Printer Status, or select the printer and click Printer Status on the Printer menu. The Printer Status window appears. There are three menus in the Printer Status window, and you can switch between menus by clicking the tabs at the tops of the menus.

Current Status menu

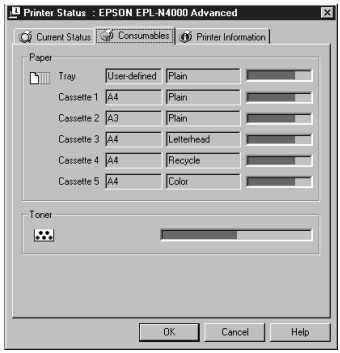
You can check the status of the printer on the Current Status menu. If a problem occurs, the most likely solution appears in the Troubleshooting Message box.



1. Image icon: Shows the printer status graphically.
2. Current Status Message box: Explains the current status of the printer.
3. Troubleshooting Message box: Explains how to solve problems that may occur. If the problem is not solved after following the instructions given here, see the troubleshooting section of the printer.

Consumables menu

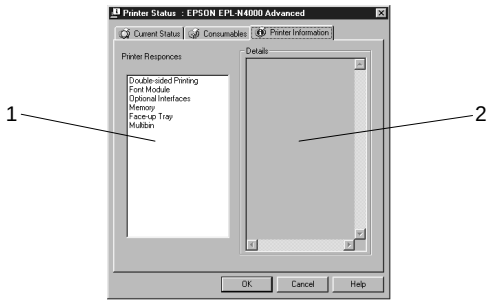
The Consumables menu provides you with information about the paper and toner.



Remaining paper:	Shows the paper size and approximate amount of remaining paper in each paper source.
Remaining toner:	Shows the amount of toner remaining.

Printer Information menu

The Printer Information menu provides you with information about the selected printer and its options.



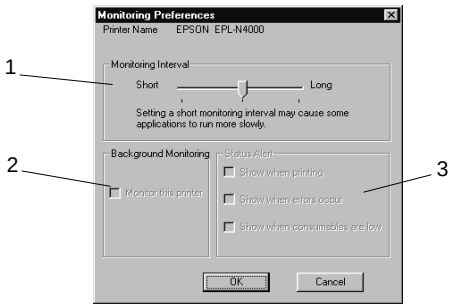
List:

1. Printer Responses: Provides information about the printer, the print server, and the options mode.
2. Details: Provides details about the item selected in the Printer Resources list.

Setting monitoring preferences

To make specific monitoring settings, right-click a printer and select Monitoring Preferences, or select the printer and click Monitoring Preferences on the Settings menu. The Monitoring Preferences window appears.

Note for NT 3.51 & 4.0:
Monitoring Preferences settings made from one computer do not affect the settings made from another computer.



Settings:

1. Monitoring Interval: Determines how often the Status Monitor checks for new printer status information, from short (every 2 seconds) to long (every 60 seconds). The default setting is 10 seconds.

2. Background Monitoring: Select the Monitor this printer check box to monitor the selected printer. A check in the check box means the selected printer is being monitored.

3. Status Alert: Determines under what conditions the Status Alert window will open. See “Status Alert” on page 7-30.

Background Monitoring Icon and Status Alert

When you select the Monitor this printer check box in the Monitoring Preferences dialog box, EPSON Status Monitor 2 monitors the printer. The background monitoring icon changes its color according to the printer's status, and the Status Alert window opens according to the conditions you select in the Monitoring Preferences dialog box.

Background monitoring icon

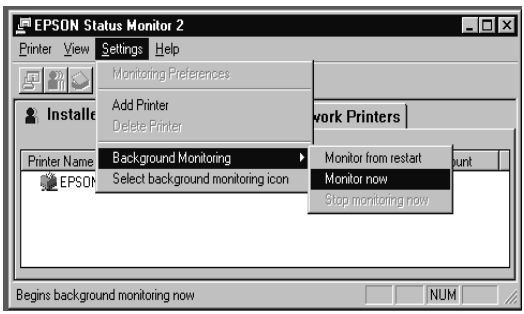
A printer-shaped background monitoring icon appears on the taskbar after you install the EPSON Status Monitor 2.

Double-clicking the background monitoring icon opens the EPSON Status Monitor 2 window. Right-clicking this icon opens a pop-up menu where you can choose to have the Status Alert displayed in front of other windows on the desktop. This pop-up menu also allows you to turn off the background monitoring feature.

The background monitoring icon changes its color according to the printer status:

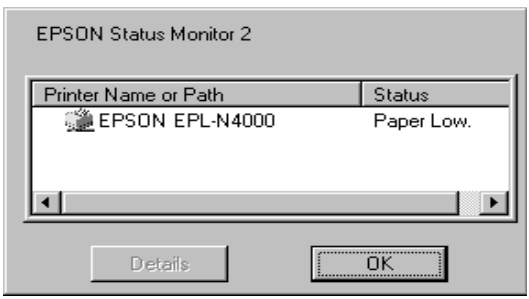
Printer Icon:	**Meaning:**
Green	Ready to print.
Yellow	Ready to print; however the printer has detected something that may become a problem if it isn't fixed.
Red	Cannot print because of a problem.
Gray	Cannot monitor the printer.

Note:
If you turn off the monitoring feature, the background monitoring icon disappears from the taskbar and the Status Alert window will not open. You can restart background monitoring by clicking Monitor now *on the Settings menu (as shown below) and by selecting* Monitor this printer *in the Monitoring Preferences dialog box as explained on page 7-28.*



Status Alert

The Status Alert window opens above the background monitoring icon under the conditions you select in the Monitoring Preferences dialog box. Click the printer name and click Printer Status on the Printer menu to open the Current Status menu.

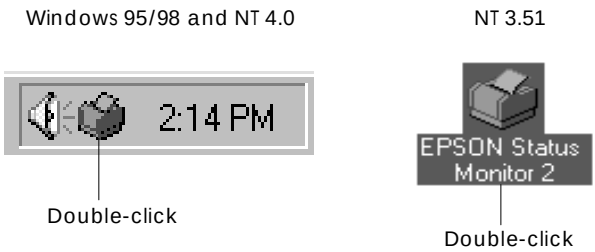


For details about the Current Status menu, see page 7-25.

Stopping Monitoring

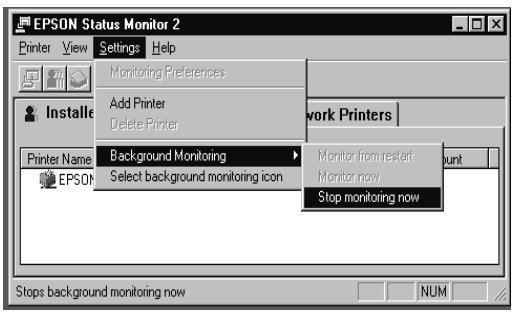
EPSON Status Monitor 2 automatically monitors the printer or printers you designate. To stop monitoring a printer, follow these steps:

1. Double-click the EPSON Status Monitor 2 icon at the bottom of your desktop.

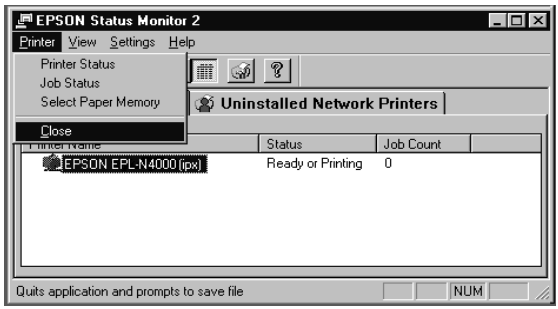


Note:
Windows 95/98 and NT 4.0 users can also stop monitoring by right-clicking the EPSON Status Monitor 2 icon and then click Stop monitoring now.

2. Click Settings, select Background monitoring, and then click Stop monitoring now.



3. Click Printer and click Close.



Note:
You can restart the Status Monitor by clicking Monitor from restart *or* Monitor now *on the Settings menu. If you stop monitoring and close EPSON Status Monitor 2, the background monitoring icon disappears from the taskbar of Windows 95/98 and NT 4.0, but the icon remains on the desktop in Windows NT 3.51. To restart the Status Monitor, see "Starting EPSON Status Monitor 2" on page 7-16.*

Uninstalling EPSON Status Monitor 2

You can remove EPSON Status Monitor 2 from your computer by doing the following:

Caution:
Quit other programs such as virus check programs before removing EPSON Status Monitor 2.

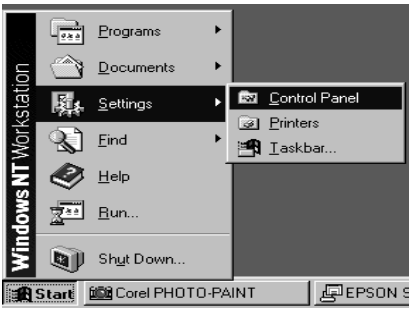
Note for Win 95/98:
If EPSON TCP/IP printing is enabled, disable it as described on page 7-8.

Note for NT 3.51 & 4.0:
You need to log on as an Administrator.

From Windows 95/98 and NT 4.0

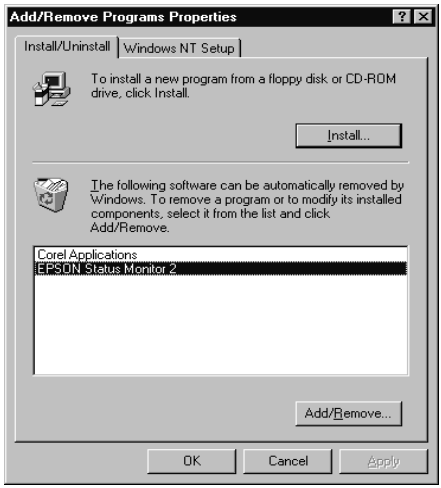
1. Close EPSON Status Monitor 2 as described in “Stopping Monitoring” on page 7-31.

2. Click Start on the taskbar, point to Settings, and then click Control Panel.



3. Double-click Add/Remove Programs.

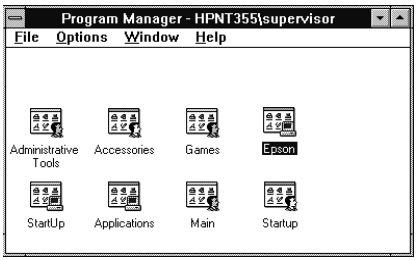
4. Click EPSON Status Monitor 2 and click the Add/Remove button.



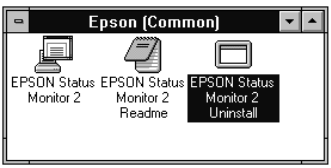
5. Follow the instructions on the screen.

From Windows NT 3.51

1. Double-click Epson in the Program Manager.



2. Double-click EPSON Status Monitor 2 Uninstall.



3. Follow the instructions on the screen.

Note for NT 3.51 & 4.0:
If you try to uninstall EPSON Status Monitor 2 while using IntranetWare Client for NT in Windows NT 3.51/4.0, a message reading "Could not complete Setup because EPSON Status Monitor 2 is running. Quit EPSON Status Monitor 2 and run Setup again" may appear, and the uninstall process may terminate. In this case, delete the following files from the directory where EPSON Status Monitor 2 is installed, and then delete EPSON Status Monitor 2. Deleting these files will cause no errors in the operation of Novel IntranetWare Client for NT.

Files: NETWIN16.DLL, CLNWIN16.DLL, LOCWIN16.DLL, NCPWIN16.DLL, NWIPXSPX.DLL, CLXWIN16.DLL, CALWIN16.DLL

Tips for Using EPSON Status Monitor 2

Controlling the packet traffic on the network

A computer with EPSON Status Monitor 2 communicates with the printer across the network. If there are many monitoring computers and printers to be monitored, packet traffic increases and may slow down the network. Limit the number of monitoring computers and printers to be monitored to control network traffic.

It is a good idea to designate a single printer administrator who can monitor all printers on the network and allow others to monitor only the printer that they usually use. This is one way to decrease network traffic.

The monitoring interval also affects the network traffic. Make the interval longer for printers at a great distance on the network.

Monitoring printers beyond routers

When you monitor NetWare printers located beyond dial-up routers in the wide area network, you are likely to be charged for the line connection. Consider the network configuration and set hops carefully on NetWare networks.

If you set one or more hops for a NetWare network, the search packet travels beyond the router. Even if there are no printers to be monitored beyond dial-up routers, it is likely that the dial-up line will be used and you will be charged more than you expect. If you do not monitor printers beyond routers, set 0 as the number of hops during installation. To reset the number of hops, reinstall the Status Monitor as described on page 7-7.

About uninstalled network printers

The Uninstalled Network Printers menu shows network printers that do not have drivers installed in your computer. Because you can monitor printers without installing printer drivers, this feature is useful for network printer administrators.

Chapter 8

Troubleshooting

General Problems

Failure to configure the network device or failure to print from the network.

Cause	What to do
Printer settings or network settings may be wrong.	First, check if you can print a status sheet, as described on page 2-2. If not, set the interface mode of the printer's control panel to Auto or Option. If you can print a status sheet, check the network settings.

Unable to set the IP address using the arp commands.

Cause	What to do
The network cable may be disconnected.	Connect the network cable. Also, check the network environment.
The address of the router is set as the default gateway.	Set the IP address of your computer for the default gateway temporarily. After setting the IP address, return the IP address to the original value.

How to get an IP address.
In order to acquire your IP address, you need to apply with NIC (Network Information Center) in your country. You may need to ask your system administrator.

Problems Specific to Your Network Environment

Windows NT Environment

Clients cannot print with TCP/IP via Windows NT Server 3.51 (NTFS).

Cause	What to do
You have not changed the type of access.	You need to change the type of access in the \\WINNT35\system32\spool\PRINTERS directory of the NT Server. See "Change the type of access of the spool directory" on page 3-29.

No client except an administrator is able to print via Windows NT Server 3.51/4.0.

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 on the Printer Permissions dialog box, or set CREATOR OWNER to Manage Documents (a default setting).

Dial-up connection dialog box appears when printing with TCP/IP via EPSON Status Monitor 2.

Cause	What to do
You have selected the phone line or the modem (for Internet Explorer 4.0x) for the Internet connection.	Printing will complete normally after you cancel this dialog, but the message appears every time you print until you change this setting.

Cannot print correctly in NDS Print Server mode or Remote Printer mode under Windows 95.

Cause	What to do
You are using NDS queue in Windows 95 (version OSR 2.1, with USB support).	Open the target printer's properties dialog box. Click Capture Printer Port in the Details menu. Set LPT port for the Device name and \\(server name)\(print queue name) for the Path name, then click OK.

Nothing prints even though clients complete sending the data to the printer.

Cause	What to do
Clients may not be registered, or the network device may not be logged in to the NetWare server.	Make sure clients are registered as users of the print queue and the print server. Also, make sure the network device is logged in to the NetWare server. If you need more information about Print Server mode or Remote Printer mode, see Chapter 3 or your NetWare manual.

You are likely to be charged for the line connection depending on the number of hops you set.

Cause	What to do
You haven't set a small number for the hops.	Set hops carefully to prevent a charge for the line connection and to keep network traffic to a minimum.

Printers do not appear in the Chooser.

Cause	What to do
EtherTalk is not selected in the Network or AppleTalk Control Panels.	For models without Open Transport: Make sure to select EtherTalk in the Network of the Control Panel. For models with Open Transport: Make sure to select EtherTalk in the AppleTalk of the Control Panel, and make sure AppleTalk is active in the Chooser. Also, check the network equipment including the hub cable.

Problems Using EPSON Status Monitor 2

The Current Status menu shows "A communication error has occurred."

Cause	What to do
The printer is turned off.	Make sure that the power cord is properly plugged into the electrical outlet. Turn on the printer.
The printer is running a self-test or initializing itself.	Turn off the printer to terminate the self-test, and then turn it on again. Allow the printer enough time to finish initialization.
Multiple computers are monitoring a single printer, and the printer cannot reply to all of them at the same time.	Decrease the number of monitoring computers or make the monitoring interval longer in the Monitoring Preferences dialog box. See "Setting monitoring preferences" on page 7-28 and "Tips for Using EPSON Status Monitor 2" on page 7-36.
The printer is not ready to print.	Make sure the printer is ready to print. For details, see the user's guide of your printer.

The status information does not match the real status of the printer.

Cause	What to do
EPSON Status Monitor 2 monitors the printer at intervals set in the Monitoring Preferences dialog box. A long interval may result in incorrect information.	Click Refresh on the View menu to update the information. Decrease the monitoring interval in the Monitoring Preferences dialog box if you find that the Status Monitor often displays data that is old. Wait until EPSON Status Monitor 2 monitors the printer next time.

NetWare printers cannot be monitored.

Cause	What to do
You are using EPSON Net!2.	You cannot use EPSON Status Monitor 2 and EPSON Net!2 at the same time. Quit EPSON Net!2 and use EPSON Status Monitor 2. If you use EPSON Net!2, quit EPSON Status Monitor 2 in advance.

You can only monitor NetWare printers in Remote Printer mode if the printer port number is set to 0.

Cause	What to do
This is set internally by EPSON Status Monitor 2.	Use the NetWare control tool to set the port number to 0.

NetWare print servers cannot be monitored beyond routers.

Cause	What to do
The number of hops is set to 0.	Change the number of hops according to “Making Status Monitor Settings” on page 7-15. See also “Tips for Using EPSON Status Monitor 2” on page 7-36.

NDS printers cannot be monitored.

Cause	What to do
You are not using Novell's Client.	If you are using Windows NT, use Novell IntranetWare Client for NT. If you are using Windows 95, use Novell IntranetWare Client 32 for Windows 95.

An existing printer cannot be found in Windows NT 3.51.

Cause	What to do
You may have logged on to the network before network modules were completely loaded.	Log on again. To clear this problem immediately after the operating system starts, log on after access to the hard disk drive is completed.

Cannot print when using EPSON TCP/IP in Windows 95.

Cause	What to do
An incompatible or invalid printer name is typed in the Print to the following port box of the printer's Properties dialog box.	Delete the unnecessary printer name. For example, "EPSON_TCPIP_Printers\255.255.255.255 (EPL-N4000)" should be "EPSON_TCPIP_Printers\255.255.255.255".

An application error occurs, and NetWare printers cannot be monitored when Allow monitoring is selected for monitoring Windows shared printers under Windows NT 4.0.

Cause	What to do
There is a known bug in the operating system.	Install Service Pack 2 or higher before monitoring Windows shared printers under Windows NT 4.0.

NetWare printers cannot be monitored when Allow monitoring is selected for monitoring Windows shared printers under Windows NT 3.51/4.0.

Cause	What to do
The specification of EPSON Status Monitor 2.	Double-click Services in the Control Panel and stop the EPSON Printer Status Agent service. Restart EPSON Status Monitor 2 and then restart the service. This procedure must be repeated every time you log on to Windows NT 3.51/4.0.

Windows shared printers cannot be monitored.

Cause	What to do
This is set internally by EPSON Status Monitor 2.	Right-click the Network Neighborhood and then click Properties. Verify that File and printer sharing for Microsoft Networks is shown in the list of installed components. Verify that EPSON Status Monitor 2 is installed in the machine hosting the Windows shared printer, and be sure that the Windows shared printer is set for monitoring. You must set EPSON Status Monitor 2 settings in order to monitor Windows shared printers.

Appendix A

Instructions for Dial-Up Network

This chapter contains explanations and instructions 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:
Because the network device polls the primary server for jobs in Print Server mode, it is not recommended that the primary server be located on a dial-up connection. A permanent connection should be used instead.

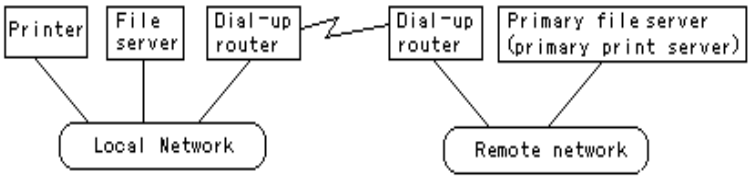
Remote Printer mode:
In Remote Printer mode, it is possible for the network device to operate in this configuration if the router has a proxy reply function. However, unnecessary dial-ups are made when the primary server is down, so it is recommended that a dial-up exclusive connection line is used.

Follow the instructions for using a dial-up line.

When there is a primary server at dial-up destination

Possible problems below are examined for cases where the network device has to operate in this environment. Note a precondition is to use a router which has a NetWare proxy reply function.

When the local network has a file server:



- ❑ At power-up

  Since the local file server is accessed before the primary server, a dial-up is generated. There is no problem since this dial-up is generated only once when the power supply is turned on.

- ❑ When the network device is not correctly configured

  Since the local file server is accessed before the primary server, a dial-up is generated. This dial-up is repeated at intervals of approximately 5 minutes. Configure the network device correctly to avoid this phenomenon.

- ❑ During normal operation (standby)

  A SPX Watchdog packet is sent according to the NetWare protocol rules. Use a router with a proxy response function to avoid 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.

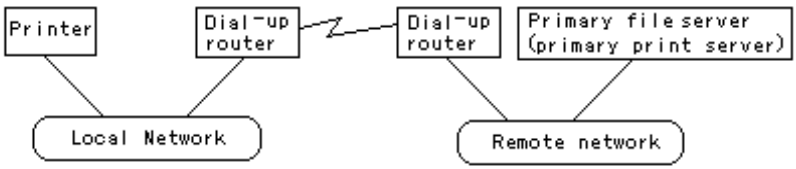
- ❑ When the primary server is down during operation

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

- ❑ When the local network file server is down

  If the local network file server disappears, NetWare may not be able to be used on the local network. In this case, the network device will stop print server or remote printer operation and no further dial-ups are generated.

When the local network has no file server:

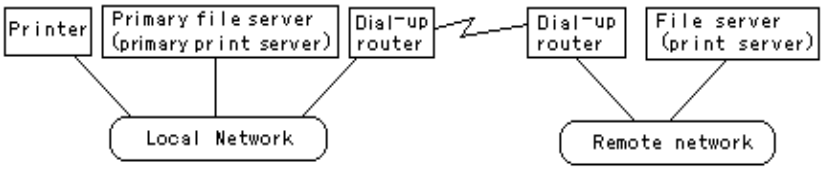


Depending on the router setting, the NetWare protocol can be used without a file server on the local network. This case also follows the first five described above.

A

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 phenomenon are common in both the Print Server mode and the Remote Printer mode.



- ❑ At power-up

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

- ❑ When the network device is not correctly configured

  Since access is made only to the primary server, no dial-up is generated. However, if an incorrect remote network file server or print server is set as the primary server, an unintended dial-up might be generated. Configure the network device correctly to avoid this problem.

- ❑ During normal operation (standby)

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

- ❑ During normal operation (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 unintended dial-up might be generated. To avoid this, turn the printer off and on once, or do not allow the router to pass SAP packets (Find Nearest Server).

Appendix B

Specifications

Network Software

NetWare 3.1x or 4.1x

EtherTalk (AppleTalk)

lpr, ftp over TCP / IP protocol

NetBEUI over TCP / IP protocol

NetBIOS over TCP / IP protocol

Network Connectors

IEEE 802.3 10Base-T / 100Base-TX STP (shielded twisted-pair) cable via RJ-45 connector

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EPSON OVERSEAS MARKETING LOCATIONS

EPSON AMERICA, INC.
20770 Madrona Ave.
P.O. Box 2842
Torrance, CA 90509-2842
Phone: (800) 922-8911
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