
NEC PowerMate® VT 300 Series Release Notes

The *PowerMate VT 300 Series Release Notes* provide up-to-date information on installing the applications that come with your computer. These notes also provide additional valuable information about your computer that was not included in the printed user's guide or online NEC Help Center.

Please read these notes in their entirety.

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Applications and Online Documentation

The system comes with the operating system preloaded. Microsoft® Internet Explorer® 5.0 also comes preinstalled on systems with the Windows® 98 operating system. Install all other applications and online documentation from the NEC Application and Driver CD.

Launch the NEC Application and Driver CD as follows:

- In systems running the Windows NT operating system, insert the NEC Application and Driver CD after the system reboots and you have chosen the Windows NT Workstation Version 4.00 operating system. Be sure to insert the CD before Windows NT actually completes its boot and displays the NT logon screen.

 **Note:** Install the optional software located on the NEC Application and Driver CD after your first logon to Windows NT.

- For systems running the Windows 95 or Windows 98 operating system, insert the NEC Application and Driver CD after the system reboots.

The CD autorun feature loads the NEC Application and Driver Installation Utility program.

Follow these guidelines when you install applications and the NEC Help Center online documentation:

- For systems with the Windows 95 or Windows NT operating system, install Microsoft Internet Explorer 5.0 or 4.01 *first* and alone, *before* installing any other application from the NEC Application and Driver CD.

Internet Explorer 5.0 already comes preinstalled on systems with the Windows 98 operating system.

Both Internet Explorer 5.0 and Internet Explorer 4.01 versions come on the NEC Application and Driver CD.

- The installation and operation of the NEC Help Center requires the installation of Microsoft Internet Explorer version 4.01 or 5.0.

 **Note:** If you attempt to install the NEC Help Center without either version of Internet Explorer on your system, the Help Center setup program prompts you to install Internet Explorer 4.01. The NEC Help Center is designed to work with Internet Explorer version 4.01 *or higher*.

See “NEC Application and Driver CD” in Chapter 3 of the *PowerMate VT 300 Series User’s Guide* for detailed information about installing applications from the NEC Application and Driver CD.

Installing PartitionMagic

Install PartitionMagic™ files from the NEC Application and Driver CD. Select the PartitionMagic software from the Applications tab in the Installation utility menu. The utility loads files from the NEC Application and Driver CD to **C:\Program Files\PowerQuest\PartitionMagic4**. You can find setup and documentation files in the following folders:

- Btmagic
- Diskette
- Setup
- Userinfo.

If the PartitionMagic setup program asks you for a serial number, enter the following number:

PM400ENOEMCD-673785

See the documentation in the Userinfo folder for information about using PartitionMagic, BootMagic™, and the recovery diskette program. Reading the Userinfo files requires the Adobe® Acrobat reader. Install the Adobe Acrobat reader from the NEC Application and Driver CD.

 **Note:** If you are installing BootMagic in a system with the Windows NT operating system, see “Installing BootMagic in a System with Windows NT” at the end of this document.

Using the LS-120 SuperDisk Copy Utility

Using the LS-120 SuperDisk™ Copy utility on 1.44-MB or 120-MB media intermittently causes system lockups and diskette eject failures. This condition only occurs when you use the SuperDisk Copy utility supplied with the SuperDisk Tools diskette shipped with the system.

To safely copy a 1.44-MB diskette, NEC recommends using the standard Microsoft® Disk Copy program supplied with the Microsoft Windows® operating system. You can find the Microsoft Disk Copy program by double clicking **My Computer** and right clicking the **LS-120** icon. The context menu displays Copy Disk as one of the available items. Using this Copy Disk program allows the LS-120 SuperDisk drive to copy 1.44-MB diskettes without system lockups and allows the drive to eject the 1.44-MB diskette. However, this utility does not copy 120-MB media.

If you need to duplicate 120-MB media, you must use the SuperDisk Copy utility. To avoid data loss, make sure you save all data and close all applications before you attempt to copy 120-MB diskettes with the SuperDisk Copy utility. To recover from a diskette eject failure or a system lockup after completing the SuperDisk Copy, restart the system by pressing the power button to turn off the system. Then press the power button again to turn on system power.

Please call NEC Technical Support Services at 800-632-4525 for the updated SuperDisk Copy utility.

Installing Internet Explorer 4.01 Add-On Components

Choosing the Installing Internet Explorer 4.01 Add-On Components option on the NEC Application and Driver CD results in a file opening error message. Due to the space these components require, the component files are not included on the CD. NEC recommends that you run Internet Explorer 4.01, click the Help menu, and select Product Update. This procedure takes you to the Microsoft Internet Explorer 4.01 website where you can install these components.

System Configuration

See the following sections for information about configuring your system.

Configuring the System for Microsoft Internet Explorer

TCP/IP must be enabled before you can use Microsoft Internet Explorer 4.01 or higher. See the next section, “Changing Network Settings,” for instructions on enabling TCP/IP. Install Internet Explorer 5.0 or 4.01 from the NEC Application and Driver CD.

 **Note:** Internet Explorer 5.0 comes preinstalled on systems with the Windows 98 operating system.

Changing Network Settings

All systems are configured with the NetBEUI and NWLink protocols enabled. However, before you connect a system to your network you might need to:

- enable a different network protocol
- disable unneeded protocols for enhanced system performance
- add or change network, domain, and gateway information.

The following procedure describes how to disable the NetBEUI and NWLink protocols, enable TCP/IP, and provide network, domain, and gateway information. (If a different protocol is enabled, the menu choices might differ from those described in the procedure.)

1. From the Windows desktop, click **Start** on the taskbar, point to **Settings**, and click **Control Panel**.

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2. Double click the **Network** icon in the Control Panel window.
 3. Click the **Configuration** tab. In the Configuration display, the following protocols are loaded:
 - NetBEUI Protocol
 - NWLink IPXSPX-Compatible Transport
 - NWLink NetBIOS
 4. Highlight **NWLink IPXSPX-Compatible Transport** and click **Remove**. A warning window appears asking for confirmation to continue.
 5. Click **Yes**. The NWLink IPXSPX-Compatible Transport and NWLink NetBIOS lines disappear from the Configuration display.
 6. Repeat steps 4 and 5 to remove the **NetBEUI** Protocol.
 7. In the Configuration tab display, click **Add**. Highlight **Protocol** and click **Add**.
 8. Highlight **Microsoft** and then **TCP/IP** and click **OK**. The TCP/IP Setup window appears. If there is a DHCP server on the network, click **Yes**; otherwise click **No**.
 9. Change the path in the window to **C:\I386**. Click **Continue**. The Network window appears. If Yes was clicked in step 8, skip to step 16. If No was clicked in step 8, the Windows Setup window appears.
 10. Click **Close**. The Microsoft TCP/IP Properties Box appears.
 11. Fill in the **IP Address**, the **Subnet Mask**, and the **Default Gateway** in the "Specify an IP address" area.
 12. Click the **DNS** tab and enter the host and domain name in the DNS display.
 13. Click the **Identification** tab and change the Computer Name if appropriate.
 14. Click the **WINS** tab and enter the WINS address if appropriate.
 15. Click the **Routing** tab and enable IP forwarding if appropriate.
 16. Click **OK**. When prompted to restart the system, click **Yes**.

Setting Boot Order in BIOS

To use the CD-ROM drive as a boot device, the BIOS must list it before the hard drive and/or before the network.

The system does not boot from a Zip[®] drive if it is listed as the first boot device.

Finding New System Board Jumper Settings

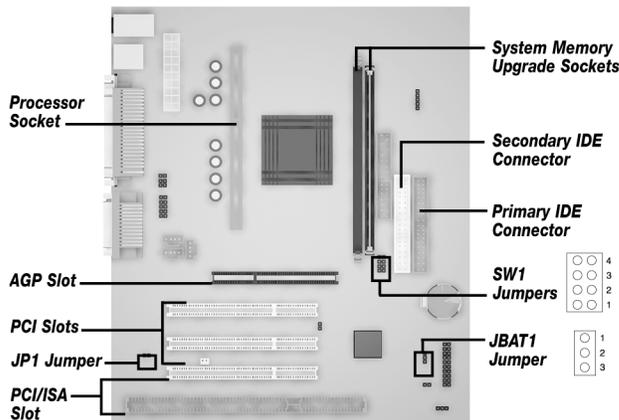
The system board configuration label attached to the system chassis might not contain a complete listing of jumper settings for this system. See the following figure for updated jumper settings.

PowerMate® VT 300 Series System Board Configuration

⚠ WARNING

Turn off and unplug the system unit before adding options or changing jumper settings.

Note: See your *PowerMate VT 300 Series User's Guide* for detailed option installation information.



Memory Upgrade

- Maximum memory supported: 512 MB; minimum memory required: 32 MB.
 - Memory type and size can vary between sockets.
- Note:** Memory speed must match or exceed processor bus speed.
- System supports 168-pin, 66-MHz or 100-MHz (recommended) non-ECC SDRAM modules in 32-MB, 64-MB, 128-MB and 256-MB configurations.
- Use NEC memory upgrade kits for the best compatibility with your system. For memory compatibility information, call NEC Technical Support.
- Single- or double-sided DIMMS are supported.
 - No jumper setting required.

Jumper Settings

Power On Mode



Factory setting. Boots up system when power button is pressed.



Boots up system immediately when power cable is connected. Returns system power to its state (power on or power off) before an AC power loss.

CMOS Clear



Factory setting. Maintains system board configuration in CMOS RAM with onboard battery.



Clears CMOS while system power is off. Return jumper to pins 1 and 2 before powering system on.

Caution: To prevent damage to the system board, avoid clearing CMOS while power is on.

Processor/Bus Speed



233 MHz/66 MHz
350 MHz/100 MHz



266 MHz/66 MHz
400 MHz/100 MHz



300 MHz/66 MHz
450 MHz/100 MHz



333 MHz/66 MHz
500 MHz/100 MHz



366 MHz/66 MHz
550 MHz/100 MHz



400 MHz/66 MHz
600 MHz/100 MHz



433 MHz/66 MHz



466 MHz/66 MHz



500 MHz/66 MHz

NEC Website: <http://www.nec-computers.com>
NEC Technical Support: 800-632-4525

NEC

409-00018-003

Identifying the Pentium III Processor

NEC computer systems with the Intel® Pentium® III processor come equipped with the most advanced Intel Pentium processor available.

Because the new Pentium III processor was introduced after the release of Microsoft® Windows® 98, Windows 95, and Windows NT® operating systems, these operating systems are not able to correctly identify the processor. These operating systems might identify the Pentium III processor as a Pentium II or Pentium Pro processor.

Windows identifies the processor on the General tab of the Windows System Properties sheet. You can get to System Properties in either of the following ways:

- Right click the My Computer icon on the Windows desktop and select **Properties** from the drop-down menu.
- Select **Settings** from the Windows Start menu, click **Control Panel**, double click the System icon.

The Windows System Properties processor identification does not effect in any way the performance of your Pentium III processor. At bootup, the system BIOS detects the Pentium III processor.

You can obtain a patch to fix the Windows processor identification once Microsoft releases the patch. Check for the patch on the Microsoft website (www.microsoft.com) or NEC website (www.nec-computers.com).

Celeron Processor Information

The new Intel® Celeron™ 500-MHz and 466-MHz processors shipping in some PowerMate VT 300 Series models are Socket 370 type Celeron processors. A converter board in the system board processor Slot 1 supports the new Socket 370 Celeron processors.



CAUTION

The processor upgrade information in the *NEC PowerMate VT 300 Series User's Guide* is for Slot 1 type Celeron processors and is *not* for Socket 370 type Celeron processors.

User-installed upgrades for the Socket 370 type Celeron processors are not supported in the PowerMate VT 300 Series system.

The 500-MHz and 466-MHz Celeron processors include 128 kilobytes of integrated L2 cache and a 66-MHz front side bus (FSB).

Intel Processor Serial Number Control Utility

The Intel® Processor Serial Number Control utility is a Windows® program that enables or disables the reading of the Pentium® III processor serial number by software. This function lets you control which software programs or websites have permission to read the processor serial number. When installed, the utility runs automatically each time the system powers on.

This utility places an icon in the Windows system tray. The icon provides a visual status of the processor serial number. You have the option of hiding the system tray icon. You can disable the processor serial number at any time. However, enabling the serial number requires restarting the system.

The following information describes:

- system requirements
- installation procedures
- processor serial number features
- answers to frequently asked questions
- Intel technical support.

Identifying System Requirements

The Intel Processor Serial Number Control utility requires:

- a Pentium III processor-based system
- Windows 95, Windows 98, or Windows NT® 4.0 (or later)
- 2 megabytes of hard drive space.

Installing the Utility

The Intel Processor Serial Number Control Utility (version 1.0) comes on the NEC Application and Driver CD. See your *PowerMate VT 300 Series User's Guide* for information about using the NEC Application and Driver CD.

Run **setup.exe** from the directory where you unzip the file.

 **Note:** Installing this utility on a system which does not contain a Pentium III processor generates an error message.

Looking at Serial Number Features

The Intel processor serial number, a new feature of the Pentium III processor, is an identifier for the processor. The processor serial number is designed to be unique, and when used in conjunction with other identification methods, can be used to identify the system or user. This number can be used in a wide variety of applications which benefit from stronger forms of system and user identification.

The processor serial number is analogous to a conventional serial number, with these important differences:

- A software application can read the processor serial number.
- You can disable the reading of the serial number via utility programs such as this one, or via the BIOS, depending on the system configuration.

For additional information about the Pentium III processor and the processor serial number, please visit www.intel.com/pentiumiii.

Getting Answers to FAQs

See the following answers to questions about the processor serial number.

What are the benefits of the processor serial number?

You can use the processor serial number in applications which benefit from stronger forms of system and user identification.

Why would I want to turn off my processor serial number?

Intel believes the processor serial number can provide compelling benefits to users. They are developing features in conjunction with the processor serial number to allow responsible service providers to provide services which maintain your privacy. However, if you are concerned that a given application/service using your processor number might impact your privacy, you can turn off the processor serial number using the utility.

What is the default state of the processor serial number?

The default state of the processor serial number is on, until the Processor Serial Number Control utility is installed. Once the Processor Serial Number Control utility is installed, it turns the processor serial number off by default. You can use the utility to turn on the processor serial number.

Can a website read my serial number without my knowledge?

No, generally not. Websites cannot read serial numbers unless you allow them to download a program which can read the processor serial number. Almost all browsers are configured to warn users whenever they download executable software. Unless you disable the warning in the browser, you should receive a notification.

Does Intel track serial numbers?

Generally not, other than related to the manufacturing process. Intel does not, in the absence of advance and express consent of a user, collect serial number data which is otherwise identified with a user.

Which programs and/or websites currently use the processor serial number?

You can find a complete list of programs which can take advantage of the processor serial number and other new capabilities of the Pentium III processor at <http://www.intel.com/pentiumiii/utility.htm>.

How can I tell if my processor serial number is turned on?

The control utility allows you to check the status by:

- Viewing the icon itself. The disabled icon shows a red circle with a white “x.”
- Clicking the task tray icon and selecting the “Status” menu item. Or you can select the menu from the tool tip shown when you position the mouse over the task tray icon.

Getting Intel Technical Support

For world wide 7 days a week, 24 hours a day technical support, please visit the Intel support website at <http://support.intel.com>.

Email: support@intel.com.

In the United States, call **800-628-8686** from 5:00 a.m. to 5:00 p.m. Pacific Standard Time.

For world wide phone contacts, please see <http://support.intel.com/support/feedback.htm>.

SCSI Drive Limitations

The following procedures and operating limitations apply to systems whose only hard drive is a SCSI device.

Booting from a CD

In systems with only a SCSI hard drive, it is not possible to boot from an IDE CD-ROM drive.

Using the NEC OS Restore CD with a SCSI Drive

If a situation arises in which a full operating system restore must be performed using the NEC OS Restore CD, first boot the system from the bootable diskette. (This might be necessary, for example, if the system does not boot from the hard drive.) The bootable diskette comes with all systems that have a SCSI hard drive. After the system boots, proceed with the NEC OS Restore procedure.

Windows 95 Issues

The following material describes information specific to systems running the Microsoft® Windows 95® operating system.

Controlling CD Audio

CD audio volume is not controlled by the Windows 95 taskbar Volume Control. To control CD audio volume, access your CD player program. Move the volume slider bars up or down to increase or decrease CD audio volume.

Configuring the System for PIIX4 Support

The following support limitations apply to PIIX4 (PCI ISA IDE Xcelerator).

Reconfiguring Ultra DMA Support

The PCI IDE interface on the PowerMate VT 300 Series system supports the ATA ULTRA DMA/33 interface. NEC configured the system with the PIIX4 component released from Intel Corporation. However, standard versions of Windows® 95 released prior to the release of PIIX4 do not recognize the PIIX4 as capable of supporting ULTRA DMA/33.

Standard versions of Windows 95 require the addition of several information files (.INF files) for the support of PIIX4 features. NEC already includes these .INF files in the preinstalled software that comes with your system. NEC recommends that customers use the version of Windows 95 that is included with their system.

 **Note:** NEC recommends that customers use the version of Windows 95 that is included with their system because this version is already configured for Ultra DMA/33.

When users install their own version of Windows 95, ULTRA DMA/33 does not function without the addition of these files. These .INF files can be added to a new install of Windows 95 by using the NEC OS Restore CD. This results in full ULTRA DMA/33 support. To add the files, run the OS Restore program in the Windows operating system. Select the option to install PIIX4 support.

Determining IDE Device Compatibility

The new PIIX4 component contains a small change in the IDE interface. This change to lower voltage levels on one signal has no effect on most of the IDE hard drives on the market. A small number of older drives fail to function with this new setting.

Restoring Software with a US Robotics 56K V.90 Modem Installed

If your system has a US Robotics 56K V.90 Modem installed and you restore the Windows 95 operating system, the system might display a message indicating it cannot load the Modem.inf file. If this message appears, follow the instructions in “Applications and Online Documentation” in this document. Select the US Robotics 56K modem from the appropriate Operating System section of the NEC Application and Driver CD.

Clicking the Product Catalog Button

When a computer running the Windows 95 operating system is first booted, a Welcome screen appears. If the **Product Catalog** button is clicked, the user is prompted to insert the Windows 95 CD. This CD is not included with the system. Click **Cancel** to clear the message.

Windows 98 Issues

The following material describes information specific to systems running the Microsoft® Windows 98® operating system.

Ejecting the NEC Application and Driver CD from a DVD-ROM Drive

If your system has a Hitachi DVD-ROM drive (4X GD-2500) and you manually load applications or drivers from the NEC Application and Driver CD, a dialog box appears with the message “Reminder: Please remove CD-ROM.”

Pressing the eject button on the DVD-ROM drive displays another dialog box with the message: “Eject request to Drive in Use: An Eject request was received for a drive that is in use, continue with eject operation?”

Click **OK** to eject the CD from the DVD-ROM drive. The first dialog box is displayed. Click **OK** to complete the software loading operation.

Finding Tape Device Icons

Windows 98 displays tape device detection icons in Control Panel and Device Manager when no tape devices are installed in the system. This is normal for the chipset used on the PowerMate VT 300 Series system board. The Windows 98 operating system indicates that support for a tape device is available.

Finding the 3Com Diagnostic Program

The 3Com Windows user diagnostic program is available on the Windows Start/Programs menu. If you need to run the 3Com Diagnostics program, use the MS-DOS-based programs on the Driver CD that comes with your system.

Finding No Network Neighborhood Icon on the Desktop

The Windows 98 desktop does not display a Network Neighborhood icon when you boot the system into Windows 98. The 3Com 3C905B-TX drivers are preinstalled on the system and no protocols are loaded. This configuration does not display the Network Neighborhood icon on the desktop. See “Changing Network Settings” in this document to configure your system.

Windows NT Issues

The following material describes information specific to systems running the Microsoft® Windows NT® operating system.

Installing TCP/IP Protocol

Use the following procedure to correctly install TCP/IP in Windows NT 4.0 Workstation.

1. Right click the **Network Neighborhood** icon on the Windows desktop.
2. In the Network dialog box, left click the **Protocols** tab. Click **Add**.
3. Click **yes** or **no** in the TCP/IP Setup Dialog Box depending on whether or not you choose DHCP.

The Windows Setup dialog box appears, indicating Windows will look for files to copy in the location below, which is G:\I386, or that you can type in the location for Windows to look for it.

4. DO NOT choose G:\I386. Instead, TYPE **C:\I386** and click **continue**.
5. Continue with the TCP/IP installation in the normal way.

Restoring Network Card Drivers

If you are running a system with the Windows NT operating system, use the following procedure to install either the **Intel® Pro 100** or **3Com® 3C905B-TX** drivers from the NEC Application and Driver CD.

1. Locate the entire directory for the network card you are installing in your system. Copy the entire directory to a local temporary directory.
2. In the Windows NT Control Panel, select **network** and click **adapters**.
3. Select **ADD** and click the **HaveDisk** button. A dialog box is displayed.
4. In the Path windows, type the name of the temporary directory for the network card files you copied. Click **OK**. Windows NT installs the driver files for the network card.

Installing BootMagic in a System with Windows NT

BootMagic™ is a utility included in the PowerQuest PartitionMagic™ software. See “Installing PartitionMagic” earlier in this document for general installation information.

If you have a Windows NT operating system, use the information in the following section to correctly configure BootMagic.

If you already installed BootMagic and the configuration resulted in an error message, see “Correcting the BootMagic Configuration” later in this document.

Configuring BootMagic

If you have a system with the Windows NT operating system, use the following procedure to correctly configure BootMagic.

1. Follow the instructions in the PartitionMagic Userinfo folder to install BootMagic. When the “BootMagic Configuration” box appears at the end of the installation, continue to the next step.
2. Configure BootMagic.
 - If you want to use BootMagic:
Click the **ENABLE BOOTMAGIC** button. The BootMagic menu appears during the next bootup sequence and lets you select Windows NT as the operating system.
 - If you do not want to use BootMagic:
Do *not* select the **ENABLE BOOTMAGIC** button. The BootMagic menu does not appear at bootup.
3. Select **SAVE/EXIT** in the BootMagic Configuration box to complete the configuration process. Either choice, to enable BootMagic or to not enable BootMagic, requires the SAVE/EXIT selection.

CAUTION

To correctly complete the BootMagic configuration, you must select **SAVE/EXIT** from the BootMagic Configuration box, even if you do not want to use BootMagic. Omitting this step results in an error message.

Correcting the BootMagic Configuration

If you installed BootMagic in a system with the Windows NT operating system and the installation resulted in an error message, use the following procedure to correct the configuration information.

1. In the Windows Start menu, select **Programs, PowerQuest BootMagic, and BootMagic Configuration**. The BootMagic Configuration box appears.
Nothing should be listed under the MENU NAME heading in the center of the box.
2. Click **ADD**. The “Bootmagic Add OS” box appears. This is the only option listed and it is already highlighted.
3. Click **OK**. Click **OK** again. The main BootMagic Configuration screen appears with “Windows NT” listed under MENU NAME.
4. Check the BootMagic configuration.
 - If you want to use BootMagic:
Click the **ENABLE BOOTMAGIC** button. The BootMagic menu appears during the next bootup sequence and lets you select Windows NT as the operating system.
 - If you do not want to use BootMagic:
Do *not* select the **ENABLE BOOTMAGIC** button. The BootMagic menu does not appear at bootup.
5. Select **SAVE/EXIT** in the BootMagic Configuration box. Either choice, to enable BootMagic or to not enable BootMagic, requires the SAVE/EXIT selection.



CAUTION

To correctly complete the BootMagic configuration, you must select **SAVE/EXIT** from the BootMagic Configuration box, even if you do not want to use BootMagic. Omitting this step results in an error message.
