IBM

ThinkPad 600
Guide for Windows 98

This book provides updates and additions to the information in the *ThinkPad 600 User's Reference*. For complete information about your ThinkPad 600 computer, read the *ThinkPad 600 User's Reference* (P/N 05L2160) with this book.

> **Note**
>
> Before using this information and the product it supports, be sure to read the "Safety Information," "Using Your Computer Comfortably and Safely," and "Notices" sections of the *ThinkPad 600 User's Reference*.

> **Note for Using ThinkPad in Japan**
>
> When you use modem function in Japan, set the country to "Japan". Using the modem functions with another country's setting is against the Japanese Telecommunications Business Low.
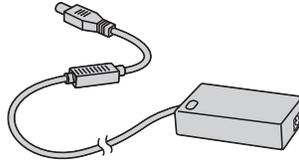>
> The AC Adapter complies with the following Japanese standards:
>
> **Input:** AC 100 V 50/60 Hz
> **Output:** DC 16 V
> ▽ 91-56055

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Contents

Chapter 1.
Updates and Corrections

This chapter updates and corrects the information in the *ThinkPad 600 User's Reference* as follows:

Using the ThinkPad Configuration program
Using a PC Card
Using power management
Using modem features
Using Windows 98

Using the ThinkPad Configuration Program

Some features of the ThinkPad Configuration program are updated. For information about the ThinkPad Configuration program, read this book rather than the *ThinkPad 600 User's Reference*.

The ThinkPad Configuration program allows you to set up and customize to your needs the computer's built-in devices. For example, you can enable or disable a port, switch between your computer's LCD and an external monitor, and set the power management mode.

Updates and Corrections

> **NOTE**
> You can also start ThinkPad Configuration as follows:
>
> 1. Click on **Start**.
>
> 2. Move the cursor to **Programs**, **ThinkPad** and click on **ThinkPad Configuration**.

To start the **ThinkPad Configuration** program for Windows 98, find the ThinkPad icon on the right side of the taskbar; then double-click on the icon. The following window appears:
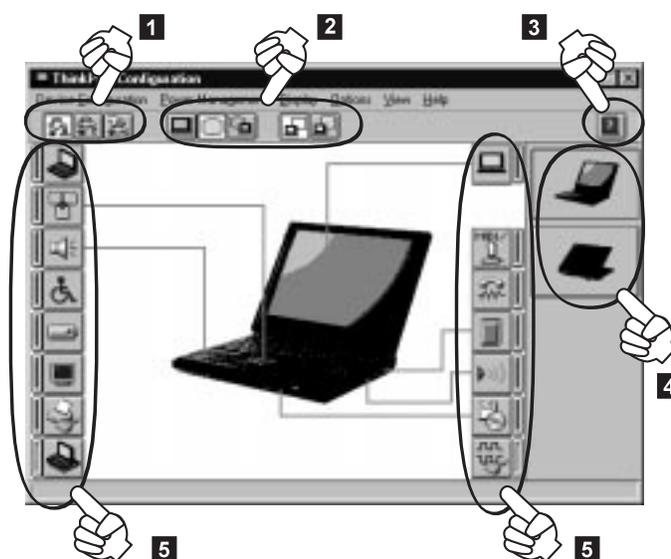
1 Click on one of these buttons to set the power mode to High Performance mode, Automatic mode, or Customized mode.

2 The **Display Device** buttons. Click on one of these buttons to set the display output type to the LCD, the external monitor, or both.

3 The **Help** button displays online help.

4 The **View Angle** buttons. Click on the front view or rear view (with or without the port replicator) buttons to display the hardware feature locations.

5 The **Device** buttons. Click on the button of your choice from the window. If the device is enabled, the red indicator next to the button is lit. Otherwise, it stays off.

Corrections of the User's Reference

Note the following corrections:

The Recovery CD does support Windows 98.

The Diskette Factory program does support Windows 98.

Using a PC Card

You can use a PC Card without PC Card support software (CardWizard). For details on how to use a PC Card, see the manual for Windows 98.

> **NOTE** Your ThinkPad computer does not include the PC Card support software (CardWizard), so references to it in the *ThinkPad 600 User's Reference* do not apply to your computer.

In addition, if you are communicating with a PC Card modem or inserting a network PC Card in a PC Card slot, you should not put your computer into suspend mode or hibernation mode, nor should you click on **Stand by** in the "Shut Down Window" window.

> **NOTE** If you want to put your computer into suspend mode, first stop the PC Card in the "PC Card (PCMCIA) Properties" window as follows:
>
> *1.* Click on **Start**, move the cursor to **Settings**, and click on **Control Panel**.
> *2.* Double-click on **PC Card (PCMCIA)**.
> *3.* From the list, select the card you are stopping.
> *4.* Click on the **Stop** button.

If you remove a communication PC Card from the PC Card slot and then reinsert it later, it might not work correctly. You need to reboot your computer.

Using Modem Features

For information about modem features in the *Online User's Guide*, same description as Windows 95 applies to Windows 98.

Using Power Management

For information about power management, follow the same instructions for Windows 98 as for Windows 95.

> **NOTE** The word **Stand by** on the Windows 98 screen has a different meaning from the word **standby** in the *Online User's Guide*.

Updates and Corrections

In addition, note the following:

Suppose you activate the alarm action as follows:

Notification: Display message
Power level: When the alarm goes off, the computer will **Standby**.

Now, if your computer goes into suspend or hibernation mode when the battery is low before the alarm message appears, you will see the message when the computer resumes. To resume normal operation, press **OK**.

You can set the alarm action as follows:

1. Start the ThinkPad Configuration program.

2. Click on **Power Management**.

3. Click on the **Alarm** tab.

4. Put a check mark in the **Low Battery Alarm** check box, the **Critical Low Battery Alarm** check box, or both.

5. Set the percentage of the power level.

6. Click on the **Alarm Action...** button. You can set the alarm action in the next window.

NOTE
Even if you don't set the low battery alarm, the charge indicator will let you know that the battery is low, and then the ThinkPad will automatically enter the power-saving mode. This default low-battery behavior is independent of the operating system, so the computer might behave differently from your setting if you set the low battery alarm. The computer chooses appropriately between your setting and the default setting.

Using Windows 98

In Windows 98, it takes longer to enter suspend mode and resume normal operation than it does in Windows 95. This performance difference is caused by Windows 98, not the ThinkPad features.

For more information about Windows 98, see the following Web site: **http://www.ibm.com/thinkpad**

See the following site for technical support information: **http://www.pc.ibm.com/support**

Chapter 2.
Solving Computer Problems

Frequently Asked Questions

This section answers some frequently asked questions. Read this section rather than the corresponding information in the *ThinkPad 600 User's Reference*. Go to the page indicated in the following chart and take the specified action.

Questions	Page
How can I stop the screen from blanking?	6
How can I set the infrared port?	6
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How can I switch the TrackPoint and mouse?	8
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How can I set the external monitor?	10
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Solving Computer Problems

To solve the problems discussed in this section, you need to use the ThinkPad Configuration program. To start the ThinkPad Configuration program, find the ThinkPad icon on the taskbar and then double-click on the icon.

The ThinkPad Configuration program window appears:

NOTE You can also open the ThinkPad Configuration program as follows:

1. Click on **Start**.
2. Move the cursor on **Programs** and **ThinkPad**; then click on **ThinkPad Configuration**.
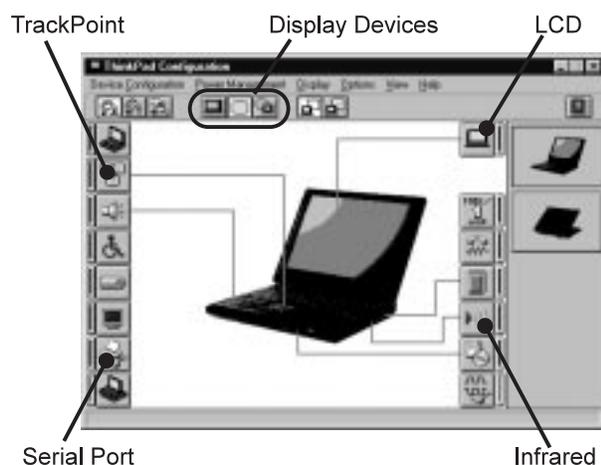
My screen keeps blanking when I do not want it to. How can I stop this?

You can disable any system timers, such as the LCD turnoff timer or the system standby timer, with the ThinkPad Configuration program.

1 Start the ThinkPad Configuration program.

2 Click on the **Power Management** button, and then click on the **Power Schemes** tab.

You can disable the system timers by selecting **Never** rather than a specific time.

How can I use my infrared port as a communication port?

If the infrared port is disabled, you must enable it before you can use it again. To enable your infrared port, do as follows:

1 Save your work and quit any program you are using.

2 Start the ThinkPad Configuration program.

3 Click on the **Infrared** button.

4 Click on **Enable**.

A "Warning" might appear that the hardware resource is being used by another communication port.

5 Click on **Disable Device**.

Another "Warning" window prompts you to restart your computer.

6 Click on **OK**. The computer restarts.

NOTE

If you check your infrared port and it is already enabled, you can use it immediately without changing any settings.

You can disable your computer's serial port to free resources for another communication device, such as the infrared port.

After your infrared port is enabled, you can use it as a communication port. If it does not work properly, you might have a problem with your communication software or the device that you are trying to communicate with. Check the online help system for your communication software if the other device appears to be working properly.

How can I use my serial port as a communication port?

If the serial port is disabled, you must enable it before you can use it again. To enable your serial port.

1 Save your work and any program you are using.

2 Start the ThinkPad Configuration program.

3 Click on the **Serial Port** button.

4 Click on **Enable**.

A "Warning" might appear that the hardware resource is being used by another communication port.

5 Click on **Disable Device**.

Another "Warning" window prompts you to restart your computer.

6 Click on **OK**. The computer restarts.

Solving Computer Problems

NOTE

If you check your serial port and it is already enabled, you can use it immediately without changing any settings.

You can disable your computer's infrared port to free resources for another communication device, such as the serial port.

After your serial port is enabled, you can use it as a communication port. If it does not work properly, you might have a problem with the communication software application or the cable or device attached to the serial port. Check the online help for your communication software if the cable and attached device appear to be working properly.

How can I use an external mouse when I am at my desk, but then use the TrackPoint when I am away from my desk?

The TrackPoint has an "Auto-Disable" setting that disables it when you power on or restart the computer with an external mouse attached. When you want to enable the TrackPoint, remove the external mouse and then restart the computer.

NOTE

You can set up the TrackPoint manually with the ThinkPad Configuration program as follows:

1 Start the ThinkPad Configuration program.

2 Click on the **TrackPoint** button.

3 Select **Enable**, **Disable**, or **Auto-Disable**.

4 Click on **OK**.

Why do I not get the highest possible resolution out of my external monitor when I am using the LCD and external monitor at the same time?

You can set any resolution for either the ThinkPad LCD or the external monitor. When you use both at the same time, the resolution of both is the same. If you set a higher resolution for the ThinkPad LCD, you can see only one part of the screen at a time. You can see other parts by moving the image with the TrackPoint or other pointing device. You can change the display output type to the LCD, external monitor, or both with the **Display Device** buttons of the ThinkPad Configuration program or by pressing **Fn**+**F7**.

You can set up the external monitor as follows:

1 Double-click on **My Computer**, **Control Panel**, and then **Display**. The "Display Properties" window appears.

2 Click on the **Settings** tab.

3 Click on the **Advanced...** button.

4 Click on the **Monitor** tab.

5 Click on the **Change...** button. The "Update Device Driver Wizard" window appears.

6 Follow the instructions on the screen by selecting **Display a list of all he drivers in a specific location, so you can select the driver you want**, and then **Show all hardware**.

7 Select **Manufacturers** and **Models**

8 Click on **Next**.

9 Set **Color palette** and **Desktop area** in the "Display Properties" window.

10 Click on **OK**.

How can I set up the external monitor if the Windows plug-and-play feature does not detect it?

Do as follows:

1 Double-click on **My Computer**, **Control Panel**, and **Display**. The "Display Properties" window appears.

2 Click on the **Settings** tab.

3 Click on the **Advanced...** button.

4 Click on the **Monitor** tab.

5 Make sure that **Automatically detect Plug & Play monitors** is checked.

6 If the option is checked and your monitor is still not recognized after you restart the computer, click on the **Change...** button. The "Update Device Driver Wizard" window appears.

7 Select the monitor type that you have attached and then click on **OK**.

8 Click on **Close**.

How can I maximize battery life?

To maximize battery life:

Use the battery until the charge is completely depleted (until the battery and power LEDs flash in unison).

Recharge the battery completely before use (the battery is fully charged when the AC Adapter is plugged in and the battery LED is green).

For a new battery or a battery that you have not used recently:

1. Use the battery until the charge is completely depleted (until the battery and power LEDs flash in unison).

2. Recharge completely before use (the battery is fully charged when the AC Adapter is plugged in and the battery LED is green).

3. Repeat these steps three times.

Always use power management features such as power schemes, standby, and hibernation.

How can I get ThinkPad device drivers for Windows 98?

You can get the ThinkPad device drivers by using the Diskette Factory. ➡ "Using the Diskette Factory" section in Chapter 4 of the *ThinkPad 600 User's Reference*.

How to install the software ➡ Chapter 3 of this book.

How can I use the Recovery CD to reload my factory-installed ThinkPad operating system and applications?

See the "Using the Recovery CD" section in Chapter 4 of the *ThinkPad 600 User's Reference*. Even though the *ThinkPad 600 User's Reference* describes procedures applicable to Windows 95, those same procedures apply to Windows 98.

Troubleshooting Guide

The following chart shows how to find or solve a problem.

If a beep sounds, if a message appears, or if a function-related problem occurs:

1 Find your symptom in the table and try solving the problem.

➡ "Troubleshooting Charts" on page 13
 —Or—
 ThinkPad 600 User's Reference

2 If you can't solve the problem, run the test and make sure the hardware and the device drivers are OK.

➡ "Testing Your Computer" section of the *ThinkPad 600 User's Reference*

3 Note the error code and have the computer serviced.

➡ "Getting Service" section of the *ThinkPad 600 User's Reference*.

If you accidentally lose or damage software in your computer:

Recover it by using the Recovery CD or the Diskette Factory.

➡ "Recovering Lost or Damaged Software" section of the *ThinkPad 600 User's Reference*.

Troubleshooting Charts

If your computer has an error, it typically displays a message or an error code, or a beep sounds when you power it on. See both the *ThinkPad 600 User's Reference* and this book, go through the charts and look for your problem.

Troubleshooting Chart	See
Error codes or screen messages	*ThinkPad 600 User's Reference*
No error codes or screen messages	*ThinkPad 600 User's Reference*
Input problems	*ThinkPad 600 User's Reference*
Suspend or hibernation problems	Page 14
LCD problems	Page 15
An indicator problem	*ThinkPad 600 User's Reference*
Battery problems	*ThinkPad 600 User's Reference*
CD-ROM drive problems	*ThinkPad 600 User's Reference*
Infrared communication problems	*ThinkPad 600 User's Reference*
Audio and telephony problem	*ThinkPad 600 User's Reference*
An universal serial bus (USB) problem	*ThinkPad 600 User's Reference*
Modem problems	*ThinkPad 600 User's Reference*
PC Card problems	Page 15
Docking station problems	*ThinkPad 600 User's Reference*
A printer problem	Page 16
External monitor problems	Page 16
Port replicator problems	Page 19
Other option problems	Page 20
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Suspend or Hibernation Problems

Problem	Action
The computer enters suspend mode automatically.	The computer enters suspend mode automatically when the processor temperature reaches a certain level. This is not a defect.
The computer enters suspend mode immediately after POST (the suspend indicator goes on).	Make sure that: The battery pack is charged. The operating temperature is within the acceptable range. Refer to Appendix A in the *ThinkPad 600 User's Reference*. If these items are correct, have the computer serviced.
Error 19 appears and the computer immediately switches off.	The battery pack power is getting low. Connect the AC Adapter to the computer, or replace the battery pack with a fully charged one.
The computer does not return from suspend mode, or the suspend lamp stays on and the computer does not work.	The computer automatically enters suspend or hibernation mode when the battery power is empty. Do one of the following: Replace the battery pack with a fully charged one and then press **Fn**. Connect the AC Adapter to the computer and then press **Fn**.
The LCD is blank after resuming.	Check whether an external monitor was connected before the computer entered suspend mode. **Do not disconnect the external monitor while the computer is in suspend mode or hibernation mode. If no external monitor is attached when the computer resumes, the LCD remains blank and output is not displayed. This restriction does not depend on the resolution value.**
Your computer does not enter suspend or hibernation mode.	Check whether the any option has been selected to disable your computer from entering suspend or hibernation mode. For more information ➡ *Online User's Guide*.
The computer does not enter hibernation mode with the **Fn**+**F12** key combination.	Enable hibernation mode as follows: 1. Start the ThinkPad Configuration program. 2. Click on **Power Management** ( ). 3. Click on the **Hibernation** tab. 4. Click on **Enable Hibernation**. **Note:** If you have already created the hibernation file, this button is displayed in gray and you cannot click on it. 5. Click on **Create Now**. 6. Click on **OK**.

LCD Problems

Problem	Action
The screen is unreadable or distorted.	Make sure that: The display driver is installed correctly by doing the following: 1. Start the ThinkPad Configuration program. 2. Click on **LCD** ( ). 3. Click on the **Properties...** button. 4. Click on **Settings** tab. 5. Click on the **Advanced...** button. 6. Click on the **Adapter** tab. Make sure the display driver shows "NeoMagic MagicGraph 128XD." 7. Click on **Monitor** tab. Make sure that the information is correct.
Incorrect characters appear on the screen.	Did you install the operating system and application program correctly? If they are installed and configured correctly, have the computer serviced.
The screen stays on even after you power off your computer.	Press the power shutdown switch with the tip of a pen and power off your computer; then power it on again.
Missing, discolored, or bright dots appear on the screen every time you power on your computer.	This is not a problem. It is an intrinsic characteristic of the TFT technology. Your computer display contains multiple thin-film transistors (TFTs). A small number of missing, discolored, or bright dots on the screen might exist all the time.

PC Card Problems

Problem	Action
The PC Card is installed and configured, but it does not work.	**Modem card:** Make sure all settings in the "Modem Control" panel and in your communication application correspond and are correct. **SCSI card:** Make sure the correct driver for the SCSI card is installed. **Note:** You can insert a SCSI card while you are operating your computer; however, it is recommended that you insert it at boot time. **Network card:** Make sure all network components are correctly installed. **Combo card:** Make sure the correct driver for the Combo card is installed. Reboot the system, and then insert the Combo card.

Problem	Action
Your PC Card modem does not work.	Make sure that the infrared port is disabled and the modem is set up correctly.
	Make sure that the COM port you set for the modem with the ThinkPad Configuration program is the same as in the following procedure and that there is no resource conflict.

A Printer Problem

Problem	Action
The printer does not work.	Make sure that:
	The parallel connector is enabled.
	1. Start the ThinkPad Configuration program.
	2. Click on **Parallel Port** ().
	3. Select **Enable**.
	4. Click on **OK**.
	The printer is turned on and ready to print.
	The printer signal cable is connected to the correct connector of your computer.
	If these items are correct and the printer still does not work, run the tests described in the printer manual. If the tests show that the printer is OK, have the computer serviced.

External Monitor Problems

Problem	Action
The external monitor is blank.	Do the following:
	1. Connect the external monitor to another computer to make sure it works.
	2. Reconnect the external monitor to your computer.
	3. Start the ThinkPad Configuration program.
	4. Click on **External Display** () or **LCD + External Display** ().
	If nothing appears on the external monitor, have it serviced.

Problem	Action
You cannot set a higher resolution than the present one on your external monitor.	Make sure that: The ThinkPad display driver is installed correctly. 1. Start the ThinkPad Configuration program. 2. Click on **LCD** (). 3. Click on **Properties...** 4. Click on the **Settings** tab. 5. Click on the **Advanced...** button. Make sure that the display driver shows "NeoMagic MagicGraph 128XD." If you are not sure that the ThinkPad display driver is installed correctly, reinstall it. An appropriate display type is selected. 1. Start the ThinkPad Configuration program. 2. Click on **LCD** (). 3. Click on **Properties...**. 4. Click on the **Settings** tab. 5. Click on the **Advanced** button. 6. Click on the **Monitor** tab. Make sure the setting in the next window is correct. If it is not correct, continue the following steps. 7. Click on the **Change** button. 8. Follow the instructions on the screen by selecting **Display a list of all he drivers in a specific location, so you can select the driver you want**, and then **Show all hardware**. 9. Select **Manufactures** and **Models** for your monitor. 10. Click on **Next**. 11. Set **Color** and **Screen area** in the "Display Properties" windows 12. Click on **OK** to close the window.

Solving Computer Problems

Problem	Action

The screen is unreadable or distorted.	Make sure that:
	
	The ThinkPad display driver is installed correctly by doing the following:
	
	1. Start the ThinkPad Configuration program.
	2. Click on **LCD** ().
	3. Click on **Properties...**
	4. Click on the **Settings** tab.
	5. Click on the **Advanced** button.
	6. Click on the **Adapter** tab.
	
	   Make sure the display driver shows NeoMagic MagicGraph 128XD.
	7. Click on **OK** to close the window.
	
	The monitor is set correctly by doing the following:
	
	1. Start the ThinkPad Configuration program.
	2. Click on **LCD** ().
	3. Click on **Properties...**
	4. Click on the **Settings** tab.
	5. Click on the **Monitor** tab.
	
	   Make sure you choose the correct monitor.
	6. Click on **OK** to close the window.
	
	   Select an appreciate refresh rate by doing the following:
	7. Click on the **Adapter** tab.
	8. Select the refresh rate for your monitor. If you are not sure, select **Optimal**.
	9. Click on **OK** to close the window.
	
	If the settings are correct, run the tests described in the manual supplied with the external monitor. If the tests show that the external monitor is OK, have the computer serviced.

Wrong characters appear on the screen.	Did you install the operating system or application program with the correct procedure? If you did, have the external monitor serviced.

Docking Station Problems

Problem	Action

The computer hangs when you power on or resume operation.	Make sure that:
	
	    The AC Adapter is connected to the docking station according to the user's guide for the docking station.
	    The power-on indicator of the docking station is on.
	    The computer is securely attached to the connector of the docking station.
	
	If there is still a problem, see the user's guide for the docking station.

The MIDI connector of the docking station does not work.	To enable the MIDI connector of the docking station, use the ThinkPad Configuration program. Make sure that the MIDI connector is enabled by doing the following: 1. Start the ThinkPad Configuration program. 2. Click on **MIDI/Joystick Port** ( ). 3. Confirm that the MIDI connector is enabled. If not, click on **Enable**; then click on **OK**. 4. Close the ThinkPad Configuration program and restart the computer. **Note:** When you restart the computer, the installation of a MIDI device driver might be required. Follow the instructions on the screen and install the device driver for your computer's operating system.

The PC Card installed in a docking station is not recognized and the PC Card slots are unusable.	Make sure that:
	
	    The AC Adapter is connected to the docking station according to the user's guide of the docking station.
	    The power-on indicator of the docking station is on.
	    The computer is securely attached to the docking station.
	
	This problem might happen when you reinstall Windows 98, or when you initialize the system with Easy-Setup.

Other Option Problems

Problem	Action
An IBM option that you just installed does not work.	Make sure that: The option is designed for your computer. The option was installed according to the instructions supplied with it. Other installed options or cables are not loose. There is no I/O address or interrupt-level (IRQ) DMA channel conflict. To see the system resource status, start the ThinkPad Configuration program and click on the respective device buttons. If the test program for the option did not find the problem, have the computer and option serviced.
An IBM option that used to work no longer works.	Make sure that: The option is securely connected to your computer. The option passes its own test. If the option came with its own test instructions, use those instructions to test the option. If these items are correct and the test program did not find the problem, have the computer and option serviced.
The serial connector does not work.	Make sure that the serial connector is enabled by doing the following: 1. Start the ThinkPad Configuration program. 2. Click on **Serial Port** (). 3. Select **Enable**. 4. Click on **Device Manager**. 5. Make sure the setting of the **Ports (COM & LPT)** in the "Device Manager" window is correct. 6. Click on **OK**.

Software Problems

Problem	Action
An application program does not run correctly.	Check the following to make sure that the problem is not being caused by the application program: Your computer has the minimum required memory to run the application. Refer to the manuals supplied with the application. The application is designed to operate with your operating system. Other applications run correctly on your computer. The necessary device drivers are installed (see the *Online User's Guide*). The application works OK when it is run on some other computer. If an error message appears when you are using the application program, refer to the manuals supplied with the application. If these items are correct and you still have a problem, contact your place of purchase or the service representative for help.

Other Problems

Problem	Cause or Action
CD-ROM cannot be read.	Make sure that the CD-ROM is correctly placed in the tray. Fit your CD-ROM on the center pivot. Firmly pressed the CD-ROM down until you hear it click into place.
The computer locks or does not accept any input.	Your computer might lock when it enters suspend mode during a communication operation. You should disable the suspend timer when you are working on the network. To power off the computer, press the power shutdown switch with the tip of a ballpoint pen.
The computer does not power off with the power switch.	If the suspend lamp is on and you are working under battery power, change the battery to a fully charged one or change your power source to AC power. If you still have a problem, press the power shutdown switch using the tip of a ballpoint pen.
The computer does not start from a diskette.	Make sure that the startup sequence in Easy-Setup is set so that the computer boots from the diskette drive (see the "ThinkPad Utilities" section of the *ThinkPad 600 User's Reference*).

Solving Computer Problems

Problem	Cause or Action
Performance drops when the computer gets hot during use.	The processor speed might decrease under the following conditions: Use in a hot environment Intensive processing that requires high power consumption This is not a defect.

Chapter 3.
Reinstalling the Software for Windows 98

This chapter describes the procedures for reinstalling Windows 98 and its associated device drivers on your computer if the original, preloaded operating system and device drivers have been deleted. You can reinstall the software either by using the Recovery CD or by using the Windows 98 package and device driver diskettes created with the Diskette Factory.

Using the Recovery CD: Using the Recovery CD, you can reinstall Windows 98 by restoring the original preloaded image. Refer to the *ThinkPad 600 User's Reference* for details of how to use the Recovery CD.

Overall Procedure of Using Windows 98 Package

1 Have the Windows 98 installation package in hand.

2 Back up your software and personal data files on the hard disk.

3 Create the Windows 98 Startup Disk from the preloaded Windows 98 as follows:

   a) Double-click on **Add/Remove Program** in the Control Panel.
   b) Click on the **Startup Disk** tab.
   c) Follow the instructions on the screen.

4 Create installation diskettes for the device drivers, using the Diskette Factory program. You need to create at least the following device driver diskettes:

Device Driver	Diskette Name
ThinkPad Configuration program	Utility Diskette for Windows 95 Utility Diskette for DOS, Personalization Data Diskette I
Display driver	Video Features Diskette (NM2160) for Windows 95/98
Audio device driver	Audio Features Diskette for Windows 95/98
TrackPoint driver	TrackPoint Driver Diskette for Win95/NT
ThinkPad Modem driver	ThinkPad Modem for Windows 95/98
Note: For some device drivers, Windows 95 drivers are available for Windows 98.	

5 Reinstall Windows 98 and the software.

Note: The Windows 98 Startup Disk includes real-mode CD-ROM drivers, so that you can use the built-in CD-ROM drive when you start the system with the CD-ROM.

Reinstalling Microsoft Windows 98

If you are reinstalling Windows 98 on a drive other than the C drive, more than 25 MB is required on the C drive.

1 Insert the Windows 98 CD into the CD-ROM drive.

2 In the CD, serch for and run SETUP.EXE. Enter the following:

```
src_cd:\tgt_dir\SETUP.EXE
```

where `src_cd` is the drive letter of the CD-ROM drive (D, E...) and `tgt_dir` is the directory that SETUP.EXE is in.

For more information, refer to SETUP.TXT on the Windows 98 CD.

Note:

Depending on the optional applications you install with Windows 98, your required disk space varies. The following information applies to reinstalling only Windows 98 in your computer:

Full reinstall on a FAT 16 drive:
About 225 MB of disk space is required. Depending on your system configuration and the options you select, the required space ranges from 165 MB to 355 MB.

Full reinstall on a FAT 32 drive:
About 175 MB of disk space is required. Depending on your system configuration and the options you select, the required space ranges from 140 MB to 225 MB.

Reinstalling the ThinkPad Configuration Program for Windows 98

Note: You can assign the directory in which the ThinkPad Configuration program is installed. The ThinkPad Configuration program installer does not support the use of a long name for the directory in which the program is installed.

To reinstall the ThinkPad Configuration program for Windows 98:

1 Start Windows 98.

2 Insert the Utility Diskette for Windows 95 into the diskette drive.

3 Click on **Start**.

4 Click on **Run...**.

5 Type `A:\SETUP` and click on **OK**.

Follow the instructions on the screen. After the reinstallation is finished, restart the system.

Reinstalling the Display Driver for Windows 98

To reinstall the display driver for Windows 98:

1 Start Windows 98.

2 Click on **Start**.

3 Move the cursor to **Settings** and then click on **Control Panel**.

4 Double-click on **Display** and then click on the **Settings** tab.

5 Click on the **Advanced...** button.

6 Click on the **Adapter** tab.

7 Click on the **Change...** button.

The "Update Device Driver Wizard" window appears.

8 Click on the **Next** button.

9 Select **Search for a better driver than the one your device is using now. (Recommended)** by clicking on it. Then click on **Next**.

10 Put a check mark in the **Floppy disk drive** check box by clicking on it.

11 Insert the Video Features Diskette (NM2160) for Windows 95/98 into the diskette drive and click on **Next**.

12 When a message appears saying that Windows has found **NeoMagic MagicGraph 128XD**, click on the **Next** button.

13 Click on the **Finish** button.

14 Remove the Video Features Diskette (NM2160) for Windows 95/98 from the diskette drive, and click on **Yes** to reboot the computer.

15 Click on **Start**.

16 Move the cursor to **Settings** and then click on **Control Panel**.

17 Double-click on **Display**.

18 Click on the **Settings** tab.

19 Choose the correct resolution and color depth in the "Display Properties" window.

Reinstalling the Audio Device Driver for Windows 98

To reinstall the audio support software for Windows 98:

1 Start Windows 98.

2 Insert the Audio Features Diskette for Windows 95/98 into the diskette drive.

3 Click on **Start**.

4 Click on **Run...**.

5 Type A:\SETUP and click on **OK**.

6 Click on the **Uninstall Crystal Drivers** button.

The setup program removes the previous driver if there is one, and prepares for the new registration.

7 When you are prompted to restart the computer, remove the Audio Features Diskette for Windows 95/98 from the diskette drive and restart the computer.

8 When the computer prompts you to install the manufacturer's diskette during the startup of Windows 98, reinsert the Audio Features Diskette for Windows 95/98 into the diskette drive.

Follow the instructions on the screen.

Note: The MIDI connector is available if your computer is attached to a docking station (option). The MIDI connector is disabled as a default, so you need to enable it with the ThinkPad Configuration program.

Reinstalling the IBM TrackPoint Driver for Windows 98

The TrackPoint Driver Diskette for Win95/NT is intended for use with the IBM PS/2 TrackPoint Version 4.0 or later.

To install the TrackPoint driver for Windows 98:

1 Start Windows 98.

2 Insert the TrackPoint Driver Diskette for Win95/NT into the diskette drive.

3 Click on **Start**.

4 Move the cursor to **Settings**; then click on **Control Panel**.

5 Double-click on the **System** icon.

6 Click on the **Device Manager** tab at the top of the "System Properties" window.

7 Double-click on **Mouse**.

8 Double-click on either **PS/2 Compatible Mouse Port** or **PS/2 TrackPoint**, whichever appears in the list.

9 Click on the **Driver** tab.

10 Click on the **Update Driver...** button.

The "Update Device Driver Wizard" runs.

11 Click on **Next**.

12 Click on **Display a list of all the drivers in a specific location**.

13 Click on **Next**.

14 Click on **Have Disk**.

15 Make sure that the source drive is A:\ and click on **OK**.

16 Click on **PS/2 TrackPoint** in the list.

17 Click on **Next**.

18 Click on **Next**.

19 Click on **Finish** in the "Update Device Driver Wizard" window.

20 Remove the TrackPoint Driver Diskette for Win95/NT from the diskette drive, and restart your computer to make the new settings are effective.

Reinstalling the ThinkPad Modem Driver for Windows 98

The modem function of your computer is supported by a digital signal processor (DSP) called the IBM Advanced Communications Processor. You must install the ThinkPad Modem software for Windows 98 to use the modem function. The Wave Table MIDISynth function is available in the ThinkPad Modem software for Windows 98.

To install the ThinkPad Modem software for Windows 98:

1 Start Windows 98.

2 Insert the ThinkPad Modem for Windows 95/98 into the diskette drive.

3 Click on **Start**, and then **Run...**.

4 Type `A:\SETUP` and click on **OK**.

The ThinkPad Modem setup program removes the previous driver if there is one, and prepares for the new registration. After you restart your computer, you see the message "Windows 98 found an unknown device." Insert the ThinkPad Modem for Windows 95/98, and follow the instructions on the screen.

The ThinkPad Modem installation window appears and prompts you to enter the destination directory for the software. If the default directory is OK, press **Enter**. Otherwise, type a directory name and press **Enter**.

Follow the instructions on the screen.

Note: You need to set the dialing properties when using the ThinkPad Modem functions. Click on **Control Panel**, **Modems**, and then the **Dialing Properties** button.

If you want to use the Wave Table MIDISynth function, open **Multimedia** in **Control Panel**, and select the **MIDI** tab. Then select **Wave Table MIDISynth Device** as a single instrument. For IRQ-sharing information, refer to the *Online User's Guide*.

Reinstalling the Software for Windows 98

IBM