

IBM Notebook (R series)

Front



1- Think Light™



Use the ThinkPad(R) computer under less than perfect lighting conditions. The ThinkLight(TM) device illuminates the keyboard.

Because your ThinkPad(R) computer can travel with you, you might need to use it in less than perfect lighting conditions. To illuminate the keyboard by turning on the ThinkLight(TM) keyboard light, press Fn+PgUp.

2- Computer Display



The high-resolution, thin-film transistor (TFT) display provides clear and brilliant text and graphics.

3- System and Power-status indicator



Your computer has system and power status indicators: Wireless status, *Bluetooth* status, Numeric lock, Caps lock, Drive in use, Power on, Battery status, and Standby status.

4- Power Switch



Use the power switch to turn on the computer. To turn off your computer, use the Start menu shutdown options. The power switch can also be programmed to shut down the computer or put it into standby, sleep, or hibernation.

If you cannot turn off the computer by this method, press and hold the power switch for 2 seconds.

If your computer stops responding, and you cannot turn it off, press and hold the power switch for 4 seconds or more. If the system is still not reset, remove the ac adapter and the battery.

5- Forward and Back Keys



The Forward and Back keys on your keyboard near the cursor-control keys are used with your Internet browser, such as Netscape Navigator and Internet Explorer. They function like the forward and back arrows in the browser that move you back and forward to pages you have viewed in the order that you opened them.

6- UltraNav(TM)



6. TrackPoint(R) pointing stick

7. TrackPoint buttons

8. Touch pad

9. Touch pad buttons

The keyboard contains the unique TrackPoint pointing device. Pointing, selecting, and dragging are all part of a single process that you can perform without moving your fingers from typing position.

Move your fingertip across the UltraNav touch pad to move the pointer.

The TrackPoint and touch pad buttons provide functions similar to those of a mouse and its buttons.

10. Mini-PCI Card slot



Your computer might include a Mini-PCI card in the Mini-PCI Card slot which enables wireless LAN communication.

11. Fn+Spacebar



Press Fn+Spacebar to start the FullScreen Magnifier and enlarge the active window.

Some ThinkPad(R) models support the FullScreen Magnifier function, which enlarges the active window and makes it easier for you to use the computer display.

To enable the FullScreen Magnifier function, press Fn+Spacebar.

The active window is magnified and the FullScreen Magnifier icon is displayed in the system tray at bottom right of your screen.

Now you can change the zoom resolution. Click the FullScreen Magnifier icon and make your choice.

To disable the FullScreen Magnifier function, click **Exit**.

Note: Another way to disable the FullScreen Magnifier function is to press Fn+Spacebar.

12. Fn key



Use the Fn key to take advantage of ThinkPad(R) functions, such as turning on the ThinkLight(TM). To use ThinkPad functions, press Fn + the required function key marked in blue.

By setting the function keys, you can change operational features instantly. To use this function, press and hold the Fn key (1); then press one of the function keys (2).

The following describes the features of each function key:

Power conservation

- **Fn + F3:** Turn off the computer display, leaving the screen blank. To turn the computer display on again, press any key or press the TrackPoint(R) pointing stick. The computer display is also turned on if you attach the ac adapter to the computer, or detach it.
- **Fn + F4:** Put your computer in standby mode. To return to normal operation, press the Fn key only, without pressing a function key.

Note: This combination of buttons functions as a sleep button. You can change the settings so that pressing it puts the computer into hibernation mode or even shuts the computer down.

- **Fn + F12:** Put your computer in hibernation mode. To return to normal operation, press the power button for less than four seconds.

Note: To use Fn+F12 for hibernation, you must have the IBM PM device driver installed on your computer.

Applying a presentation scheme

- **Fn + F7:** Apply a presentation scheme directly, with no need to start Presentation Director.

To disable this function and use the Fn+F7 key combination for switching a display output location, press the following button to start Presentation Director, and change the settings.

Switching a display output location

- **Fn + F7:** Switch between the computer display and an external monitor. If an external monitor is attached, computer output is displayed in the following three patterns by turns:
 - External monitor (CRT display)
 - Computer display and external monitor (LCD + CRT display)
 - Computer display (LCD)

Note: This function is not supported if different desktop images are displayed on the computer display and the external monitor (the Extend desktop function).

Note: This function does not work while a DVD movie or a video clip is playing.

To enable this function, do as follows when you log on to Windows XP or Windows 2000:

Note: In Windows XP or Windows 2000, multiple users can log on to a single operating system by using different user IDs. Each user needs to do the following:

1. Start Windows XP or 2000, and log on to the system.
2. Click this button, and start Presentation Director.
3. Change the Fn+F7 Settings.

Enabling or disabling the wireless features

- **Fn + F5:** Enable or disable the built-in wireless networking features (the IEEE 802.11 standard) and the *Bluetooth* features. If you press Fn+F5, a list of wireless features is displayed in the Wireless Radio Control window. You can quickly change the power state of each feature in the list.

Launching EasyEject Utility

- **Fn + F9:** Open the IBM(R) ThinkPad(R) EasyEject Utility screen. Buttons for the following choices are displayed:
 - **Eject ThinkPad PC from Dock:** This button is displayed only if you have attached your ThinkPad computer to a ThinkPad Dock II. You can detach the computer from the ThinkPad Dock II.
 - **Eject ThinkPad PC from Mini Dock:** This button is displayed only if you have attached your ThinkPad computer to a ThinkPad Mini Dock and either connected a diskette drive to the external-diskette-drive connector

of the ThinkPad Mini Dock, or attached one or more USB devices to the ThinkPad Mini Dock. If you click the button, you can stop all the USB devices and remove them safely.

Note: If a diskette drive is connected to the external-diskette-drive connector of the ThinkPad Mini Dock, you cannot connect a USB diskette drive.

- **Run EasyEject Actions:** You can select, stop, and remove external devices connected to your ThinkPad computer.
- **Configure EasyEject Actions:** You can open the IBM ThinkPad EasyEject Utility main window.
- **Fn+F9 Settings:** You can configure the settings for the Fn+F9 function.

Note: Use this Utility to stop and remove all ejectable devices connected to your ThinkPad computer, the ThinkPad Mini Dock, and the ThinkPad Port Replicator II. You cannot use it to detach your computer from the ThinkPad Mini Dock or the ThinkPad Port Replicator II.

Other functions

- **Fn + PgUp:** Turn the ThinkLight(TM) on. To turn it off, press Fn+PgUp again.

Note: This function is supported only on ThinkPad computers that have the ThinkLight. The on or off status of the ThinkLight is shown on the screen for a few seconds when you press **Fn + PgUp**.

- **Fn + Home:** The computer display becomes brighter
- **Fn + End:** The computer display becomes dimmer.
- **Fn + Spacebar:** Enable the FullScreen Magnifier function.

Fn key lock function

The Fn key lock function gives the same effect as pressing and holding the Fn key and then pressing a function key. Start the ThinkPad Configuration Program. Click the **Accessibility Options** button, and click **Enable** for Fn key lock. You can also set up by typing PS2 FNS E at the command prompt.

If the Fn key is not locked, you must press and hold the Fn key while pressing a function key in order to perform certain tasks. If the Fn key is locked, you can use the function keys as follows:

- Press the Fn key once. Then press a function key. You can get the same effect as if you had held the Fn key down while pressing the function key. The Fn key has to be pressed again each time you want to use the function.

- Press the Fn key twice. Then, for the rest of your session, you can press any function key without pressing the Fn key again.

13. Access IBM(R) button



Press the Access IBM(R) button to open your on-board help system, which helps answer questions and provides quick access to software tools and key IBM Web sites.

Whenever you have a question about your computer, need to configure IBM(R) preloaded features and tools, or wish to view IBM Web sites, simply press the Access IBM button. The Access IBM window opens.

Access IBM provides an integrated user interface, and works as a portal to the ThinkPad(R) computer. It is the comprehensive, on-board help and information center for the computer. It travels with you, eliminating the need to carry reference manuals.

15. Built-in microphone



The built-in microphone captures sound and voice when it is used with an application program capable of handling audio.

16. Volume control buttons



The built-in volume buttons enable you to quickly adjust the volume or mute the sound from your ThinkPad(R) computer.

17. *Bluetooth* antenna



Some ThinkPad(R) models have Integrated *Bluetooth* features.

Right side view



1. UltraConnect(TM) wireless antennas



Some ThinkPad(R) models feature an integrated dual diversity antenna system built into the display for optimal reception, enabling wireless communication wherever you are.

You can connect to the Internet without connecting a wire to your computer by setting up a wireless access point or residential gateway. A wireless access point does not connect you to the Internet directly. Instead, it connects to a wired connection such as a cable modem, a DSL modem, or a phone line.

Certain wireless technologies are being used to connect to an access point. Wireless LAN (the IEEE 802.11 standard) and *Bluetooth* technologies work similarly for wireless networking.

To connect to an access point, you will need several pieces of information. You will need to know the network name (obtain this from your administrator), and your MAC address (which should have come with your computer or wireless networking card). You may also need to set up encryption. Contact your administrator for your network name and encryption settings. You may need to register your MAC address with your network administrator before connecting to your company network. A residential gateway is the consumer version of an access point. Consult your residential gateway instructions for setup.

Be careful to disable the wireless function when you are not using it because it uses power even when you are not connected to the network. Some models have an integrated Wireless LAN and/or *Bluetooth* antenna and hardware. If your computer did not come with integrated wireless, you can purchase a PC Card as an option. Wireless LAN gives you a high-speed connection to an access point.

2. Hard disk drive



Your computer has a large-capacity, customer-upgradable hard disk drive that can meet a variety of storage demands. To keep the drive safe, the IBM(R) Hard Drive Active Protection System is installed on your computer

If you wish, you can purchase another hard disk drive and install it in the Ultrabay(TM) Enhanced.

3. Ultrabay(TM) Enhanced



Your ThinkPad(R) computer has a bay for Ultrabay devices. The drive that comes with the computer--a CD drive, a DVD drive, or a CD-RW/DVD drive--is installed in the bay.

Note: You can install either an Ultrabay Slim device or an Ultrabay Enhanced device in the Ultrabay Enhanced. You cannot install an Ultrabay 2000 device or an Ultrabay Plus device.

4. Monitor connector



You can attach an external monitor or a projector to your ThinkPad(R) computer to display computer information.

Note: If you attach your computer to the ThinkPad Dock II, the ThinkPad Port Replicator II, or the ThinkPad Mini Dock and use a monitor connector, use the monitor connector on the ThinkPad Dock II, the ThinkPad Port Replicator II, or the ThinkPad Mini Dock, not the one on the computer.

Left side



1. Security keyhole



Your ThinkPad(R) computer comes with a security keyhole. You can purchase a security cable and lock to fit this keyhole.

You can attach a mechanical lock to your computer to help prevent it from being removed without your permission.

Secure the chain on the lock to a stationary object; then attach a mechanical lock to the keyhole of the computer. Refer to the instructions shipped with the mechanical lock.

2. USB connectors



The Universal Serial Bus (USB) connectors are used for connecting USB interface-compatible devices, such as a printer or digital camera.

When you attach a USB cable to the connector, make sure that the mark shown in the picture above is to the upper side. Otherwise the connector might be damaged

3. Video-out connector



Your ThinkPad(R) Computer has a video-out connector, with which you can attach a television

Attaching a Television

You can attach a television receiver (NTSC or PAL) to the video-out connector of your computer and display the output of your computer on it. You will need an S-Video cable, available in an electronics store.

If you purchase an S-Video cable, you can use it to directly connect your computer to a television receiver.

To connect the audio cable to the television receiver, connect one end of it to the headphone jack on the computer; then connect the other end of the cable to the audio-input connectors of your television receiver.

If you use video equipment that has only one audio-input connector, use the left-audio connector of the audio cable.

Considerations for using the Video-out function

To display the image on the television receiver, set the screen resolution as follows:

- NTSC: 640 x 480
- PAL: 800 x 600

The image can be displayed at higher resolutions, up to 1024 x 768. At 1024 x 768, the image quality is slightly degraded.

4. Modem connector

At a screen resolution over 1024 x 768, panning starts.



Connect your computer to a telephone line with the modem connector.

Connecting to the Internet

Some ThinkPad(R) models have a built-in modem, Ethernet feature, or wireless feature, so if you have not already accessed the Internet and the World Wide Web, you are almost there now.

Establish an account with an Internet service provider (ISP), connect your computer to a phone line, DSL line, or cable line. Then set up your modem, Ethernet connection, or wireless connection, and you are on your way to the information highway.

5. Ethernet connector



Connect your computer to a LAN with the Ethernet connector.

Attention: The Ethernet connector and the modem connector may adjoin each other. Be sure to connect your communication cable to the proper connector. If you connect the telephone cable to the Ethernet connector, the Ethernet connector might be damaged.

Two indicators, to the upper right and the lower right of the connector, show the status of the network connection. When your computer connects to a LAN and a session with the network is available, the upper right indicator is solid green. While data is being transmitted, the lower right indicator blinks yellow.

Audio jacks

6. Stereo headphone jack

7. Microphone jack



Experience sounds by connecting a headphone or speakers to the headphone jack. Capture sound by connecting an external audio device (microphone) to the microphone jack

8. Fan louvers



The internal fan and louvers enable air to circulate in the computer and cool the central processor.

Note: To avoid impeding exhalation and inhalation, do not place any obstacle in front of the fan.

9. IEEE1394 connector



Some ThinkPad(R) models have the IEEE1394 connector, which is used for connecting devices that are compatible with the IEEE1394 interface, such as digital video cameras, external hard disk drives, video conferencing cameras, Jaz and Zip drives, and scanners.

10. PC Card slot



You can insert numerous types of PC Card into the PC Card slot, such as modem, data storage, network, and SCSI connector cards. It supports the following cards:

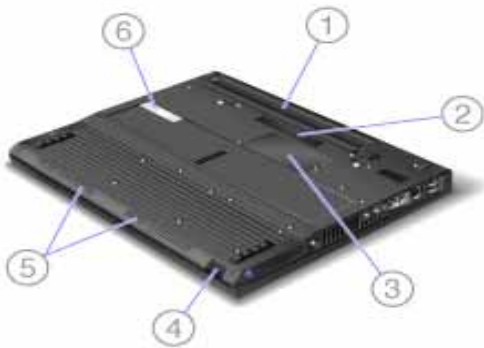
Physical characteristics:

PC Card type I, II, or III

Electrical characteristics:

- 16-bit PC Card
- CardBus Card

Bottom



1. Battery



Use your computer with battery power whenever ac power is unavailable.

By installing a second battery, available as an option, in the Ultrabay(TM) Enhanced, you can extend the operating time of the computer. You can also use the Battery MaxiMiser wizard to adjust your power setting as needed.

Your computer may come with a ThinkPad(R) T40/R50 Series High Capacity Li-Ion Battery for longer battery life. If it does not, you can purchase one and install it.

2. Docking connector



With a ThinkPad(R) Dock II, a ThinkPad Mini Dock, or a ThinkPad Port Replicator II, you can extend the computer capabilities when you are in your office or home.

Note: A ThinkPad Dock II has an Ultrabay(TM) 2000 with connectors.

3. Memory-upgrade slot



You can increase the amount of memory in your computer by installing a memory module in the memory bay. Memory modules are available as options.

4. Infrared port



The infrared port enables the computer to communicate with other devices that have infrared data-transfer capability, such as some personal digital assistants (PDAs) and mobile computers.

5. Built-in stereo speakers



The stereo speakers are built into your computer.

Rear



1. Power jack



The ac adapter cable connects to the computer power jack to provide power to the computer and charge the battery.



2. Parallel connector

The parallel connector can be used to connect a printer or other parallel device, and to transfer data between devices.