Your Gateway Computer

componentguide

FPD 1540 Monitor

Operating | Maintaining | **G** Gateway™

Contents

Using Your FPD 1540 Monitor

The FPD 1540 monitor is a high-resolution color LCD with:

- Over 16 million colors
- Excellent contrast and legibility
- Space-saving and lightweight design
- Reduced power usage
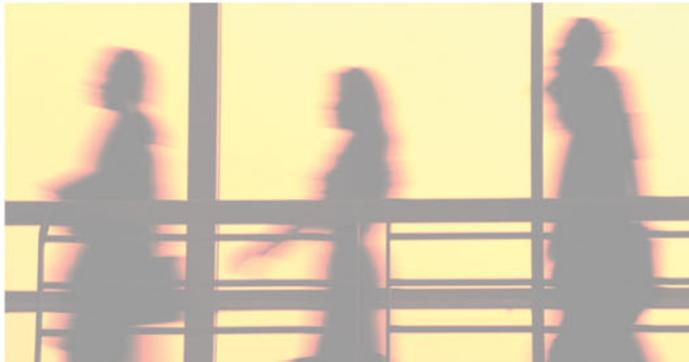
Connecting the monitor

▶ To connect the monitor:

1 Position your computer and the monitor so you can easily reach the back panel of each.

2 Make sure that your computer is turned off.

3 Remove the cable cover on the back of the monitor.
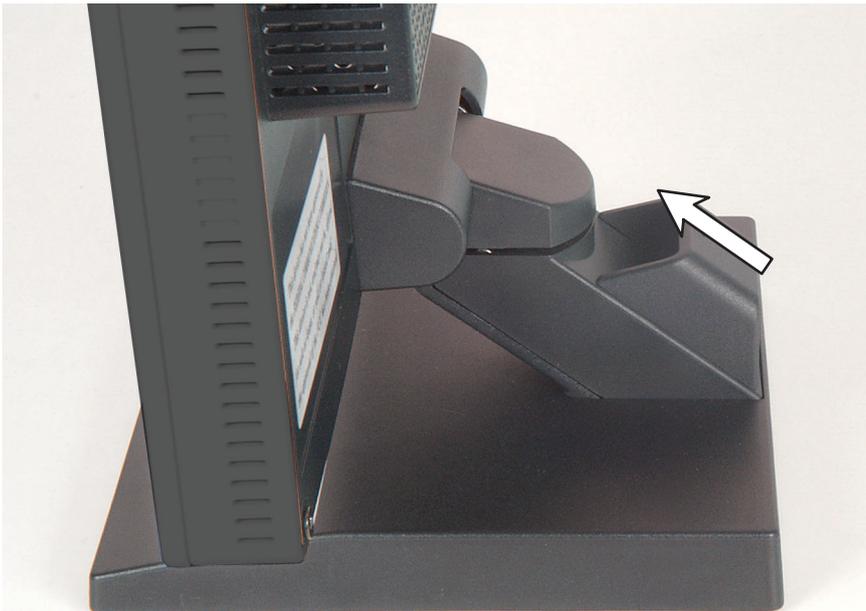
4 Lay the monitor face down. Avoid the scratching the screen by placing it on a towel or other non-abrasive surface.

5 Connect one end of the video cable to the video port on the back of the monitor.

6 Connect the power cord to the power connector on the back of the monitor.
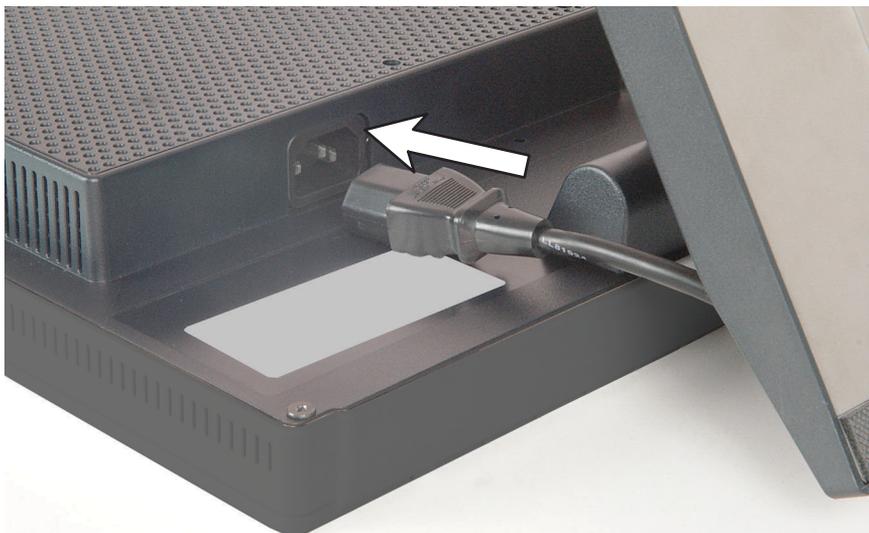
**7** Connect the other end of the video cable to the video port on the back of your computer.
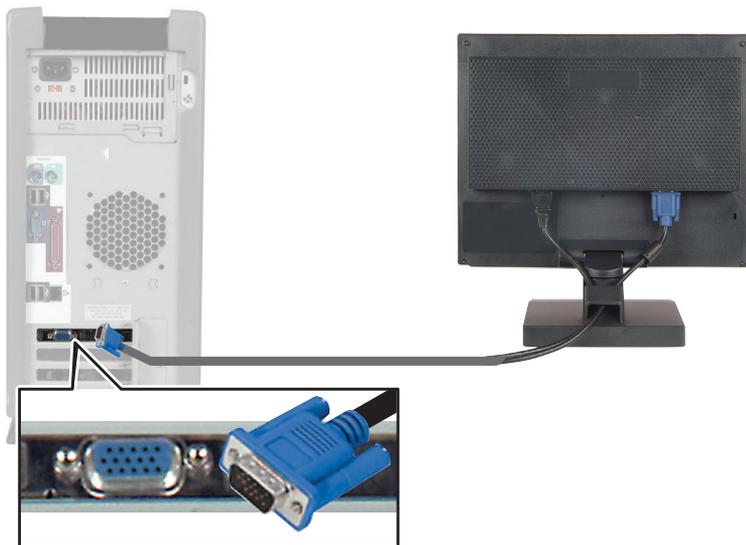
8 Plug the other end of the power cord into a grounded electrical outlet.

9 Thread the video cable and the power cord through the cable cover slot, then replace the cover.
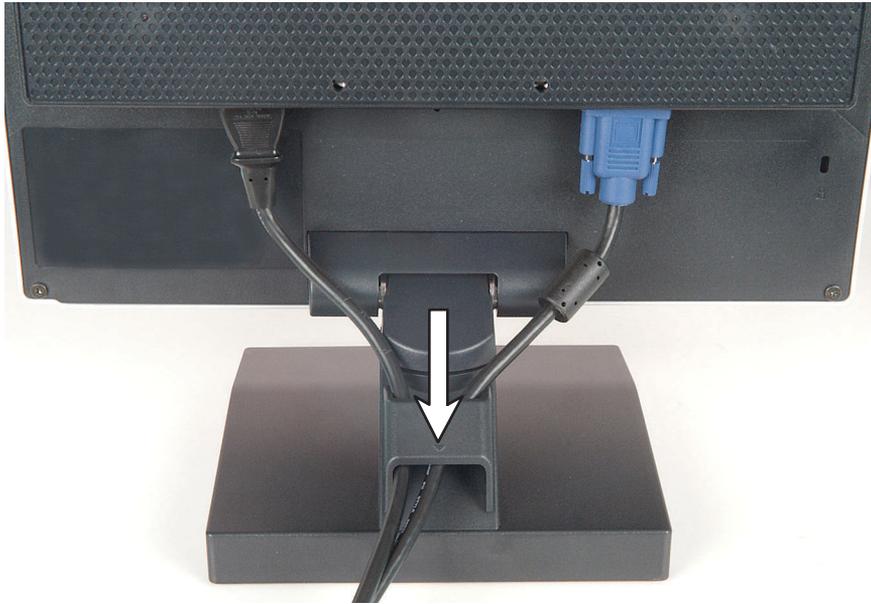
Starting the monitor

▶ **To start the monitor:**

1 Press the power button on the front of the monitor.

Power Button
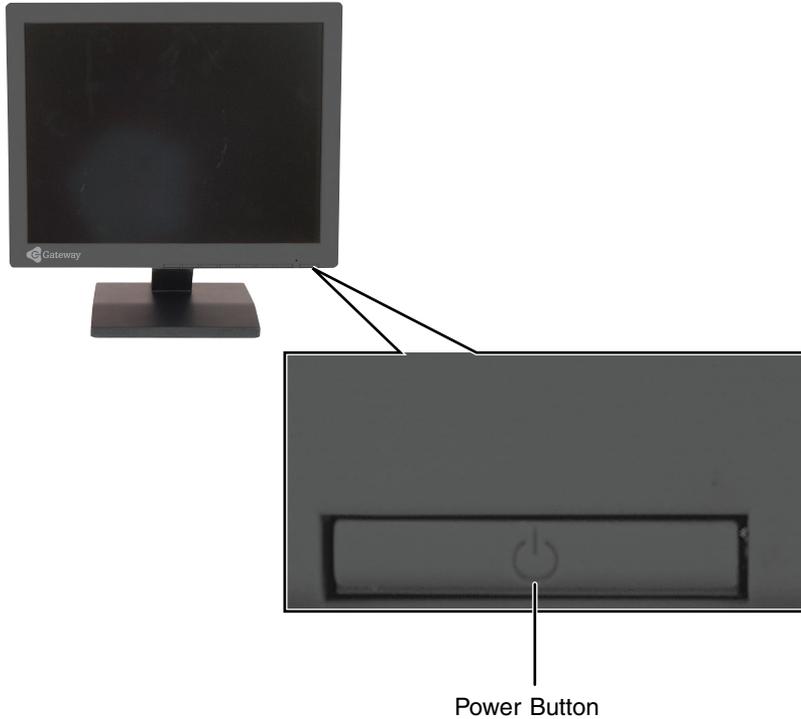
2 Turn on your computer.

3 After your computer is running, the power LED on the monitor should be green.
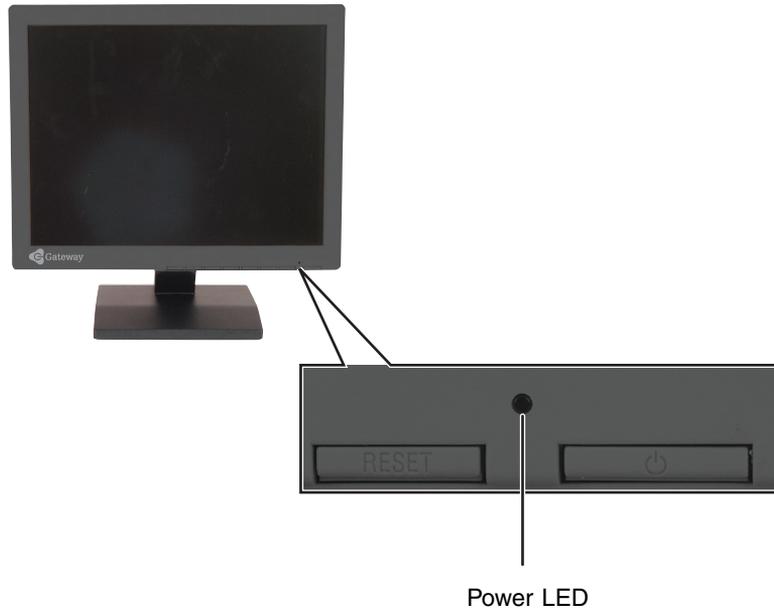
Power LED

Allow about 10 seconds for the display image to appear. If the power LED is not green or you do not see a display image, check the connections. For more troubleshooting information, see "Troubleshooting" on page 21.

4 Adjust the tilt of the monitor for the best viewing angle.

5 Use the on-screen display (OSD) to adjust other monitor settings. For more information, see "Adjusting monitor settings" on page 8.

Adjusting monitor settings

Use the external controls (located on the monitor itself) and software controls (accessible in Windows) to adjust the display image. For more information about software controls, see "Software controls" on page 14.

External controls

This monitor features an on-screen display (OSD) that lets you adjust and save contrast, brightness, and other settings. The monitor saves changes you make to the settings, even if you turn off the monitor.

Menu/Exit

Left
Arrow

Right
Arrow

Minus

Plus

Select

Reset
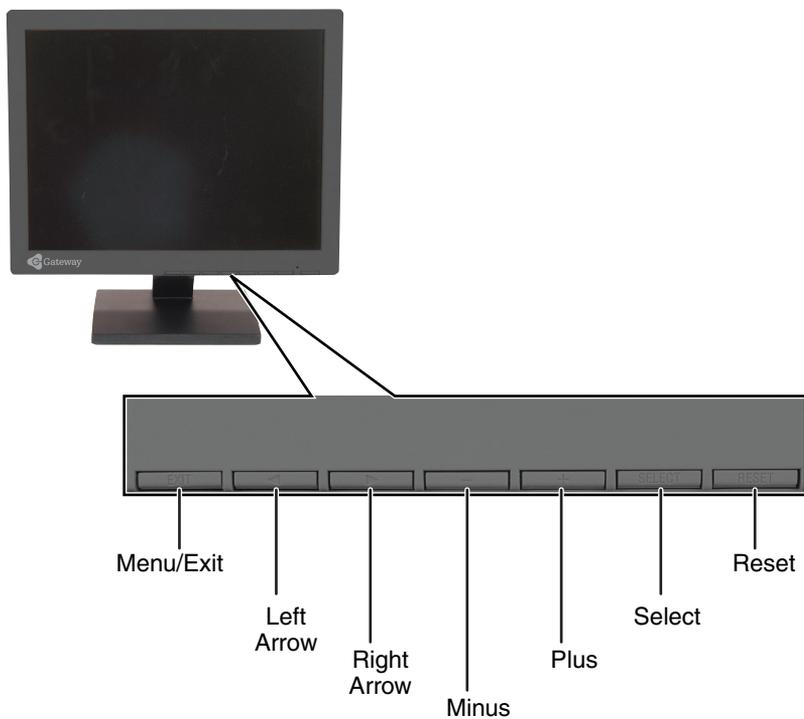
Monitor buttons

- **Arrows**
  OSD active: Press to select OSD menus or controls.
  OSD inactive: If the Hot Key option on the Tools menu is off, press to open the OSD. If the Hot Key option on the Tools menu is on, press to adjust brightness.

- **+ −**
  OSD active: Press to adjust an OSD control.
  OSD inactive: If the Hot Key option on the Tools menu is off, press to open the OSD. If the Hot Key option on the Tools menu is on, press to adjust the contrast.

- **Menu/Exit**
  OSD active: Press to close the OSD.
  OSD inactive: Press to open the OSD.

- **Select**
  OSD active: Press to open an OSD menu.

OSD controls

▶ To adjust the OSD settings:

1 Press the **Menu/Exit** button. The OSD opens at the Brightness/Contrast menu.

2 If you want to go to a different menu, press the **Menu/Exit** button to go to the menu bar at the top of the OSD.

3 Press the left or right arrow button to highlight an OSD menu.

4 Press the **Select** button to open the highlighted menu.

5 Press the left or right arrow button to select a control on the menu.

6 Press the **+** or **−** button to adjust the control.

7 When you have finished making all adjustments, press the **Menu/Exit** button one or more times to close the OSD.

OSD menus

You can access any of these menus in the OSD:

OSD Menu	Description

Brightness/Contrast Controls
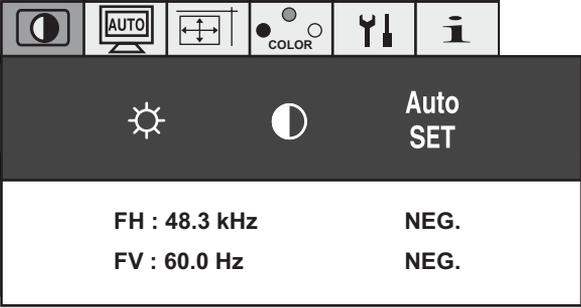
☼ **Brightness**

Adjusts the brightness of the display image. Use the lowest brightness setting you are comfortable with to maximize the life of the monitor backlights.

You may need to readjust brightness after the monitor has warmed up.

◐ **Contrast**

Adjust the contrast of the display image.

Auto SET

Adjusts the display image for a non-standard video input source.

☼	◐	**Auto SET**	
FH : 48.3 kHz		NEG.	
FV : 60.0 Hz		NEG.	

Auto Adjust
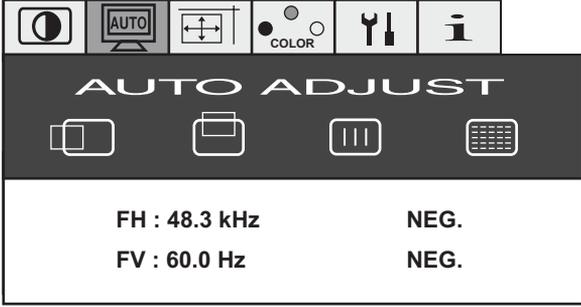
Automatically adjusts the:

▢ **Horizontal image position**

▢ **Vertical image position**

▥ **Horizontal image size**

▦ **Fine-tune image**

AUTO ADJUST

▢	▢	▥	▦
FH : 48.3 kHz		NEG.	
FV : 60.0 Hz		NEG.	

OSD Menu	Description
Image Controls	
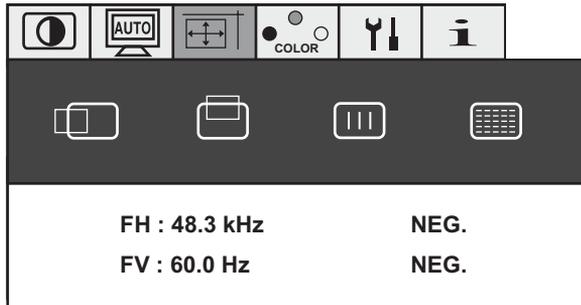
Horizontal image position

Adjusts the horizontal position of the display image.

Vertical image position

Adjusts the vertical position of the display image.

Horizontal image size

Adjusts the horizontal size of the display image.

Fine-tune image

Adjusts the focus, clarity, and image stability.

FH : 48.3 kHz   NEG.
FV : 60.0 Hz   NEG.

Color Control Systems

1 2 3 4 5 NATIVE

FH : 48.3 kHz   NEG.
FV : 60.0 Hz   NEG.
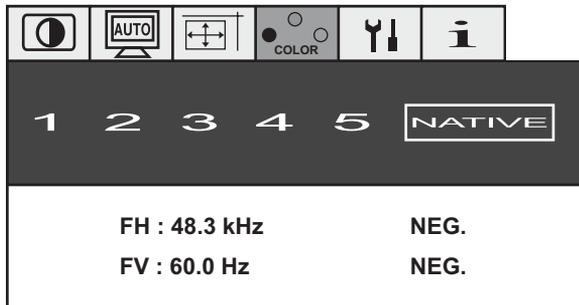
Color Control Systems Select one of six preset color settings. If you want to customize the color settings, use the arrow buttons to select one of the preset settings (1 through 5), then press the **Select** button. Use the arrow buttons to select a color, then use the **+** or **–** button to adjust the color.

NATIVE. Selects the default color setting. You cannot customize this setting.

OSD Menu	Description

Tools

FH : 48.3 kHz   NEG.

FV : 60.0 Hz   NEG.
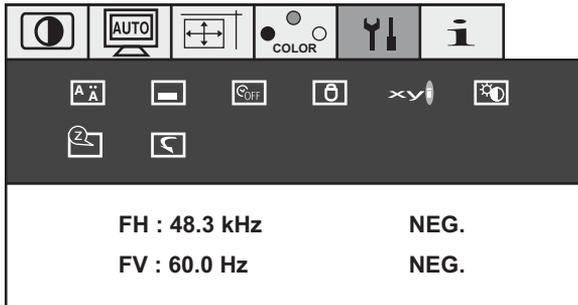
Language

Changes the language on the OSD menus.

OSD Position

Manually adjusts the position of the OSD on the screen.

OSD Turn Off

The OSD automatically closes when it is not being used. Use this control to select the number of seconds the OSD waits before it closes. You can select 10, 20, 30, 45, 60, or 120 seconds.

OSD Lock Out

Prevents access to the OSD. When this control is turned on, press and hold the **Select** button, then press the **+** button to open the OSD. To close the OSD, press and hold the **Select** button, then press the **+** button.

Resolution Notifier

Displays a message when the resolution is not set to the best resolution (1024 × 768).

Hot Key

Manually adjusts the brightness (arrow buttons) and contrast using the control buttons (+ and – buttons) on the front of the monitor.

OSD Menu	Description
Tools (continued)	💤 **Off Timer**
	The monitor turns off automatically when the computer is not being used. If you do not want the monitor to turn off automatically, turn this timer off.
	🔲 **Factory Preset**
	Use this control to activate the Reset button. To reset all settings to the factory default, press and hold the **Reset** button for several seconds. To reset an individual control, select a control, then press and hold the **Reset** button for several seconds.
Information	🖥 **Display Mode**
	This control shows the currently selected display resolution.
	INFO **Monitor Info**
	This control shows the monitor's model number and serial number.
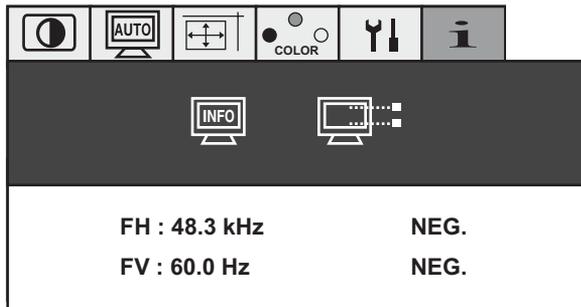
▐	AUTO	⊕	● COLOR	ⵙ	**i**

INFO 🖥

FH : 48.3 kHz	NEG.
FV : 60.0 Hz	NEG.

Software controls

Adjusting the color depth and screen resolution are two of the most basic monitor settings you may need to change.

Adjusting the color depth

Color depth is the number of colors your video card uses. Most images look best displayed with the maximum number of colors available.

Windows lets you choose from several color depth settings for the monitor. We recommend that you use the 32-bit True Color setting or the highest setting available at all times.

If the color in your images seems "false" or "jumpy," especially after you have played a game or run a video-intensive program, check the color depth setting and return it to 32-bit True Color, if necessary.

▶ To change the color depth:

1 In Windows XP, click **Start**, then click **Control Panel**. The *Control Panel* window opens. If your Control Panel is in Category View, click **Appearance and Themes**.

- OR -

In Windows 2000, click **Start**, **Settings**, then click **Control Panel**. The *Control Panel* window opens.

2 Click/Double-click the **Display** icon. The *Display Properties* dialog box opens.

3 Click the **Settings** tab.
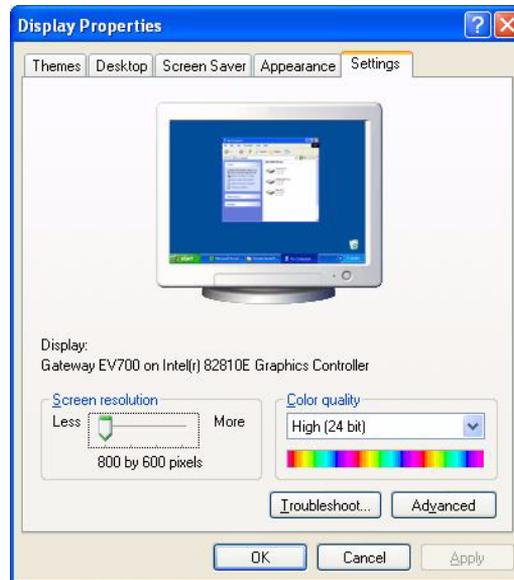
4 Click the arrow button to open the **Color quality** or **Colors** list, then click the color depth you want.

5 To save your changes in Windows XP, click **OK**, then click **Yes**.

   - OR -

   To save your changes in Windows 2000, click **OK**, then click **OK** again.

Help and Support	For more information about adjusting monitor settings in Windows XP, click **Start**, then click **Help and Support**.
	Type the keyword **changing display settings** in the HelpSpot **Search** box Search [ ] ➡, then click the arrow.

Adjusting the screen resolution

You can change the screen resolution. For example, you can increase the resolution to fit more icons on your desktop, or you can decrease the resolution to make reading and identifying objects on the monitor easier. The higher the resolution, the smaller individual components of the screen (such as icons and menu bars) appear.

▶ To change the screen resolution:

1 In Windows XP, click **Start**, then click **Control Panel**. The *Control Panel* window opens. If your Control Panel is in Category View, click **Appearance and Themes**.

- OR -

In Windows 2000, click **Start**, **Settings**, then click **Control Panel**. The *Control Panel* window opens.

2 Click/Double-click the **Display** icon. The *Display Properties* dialog box opens.

3 Click the **Settings** tab.
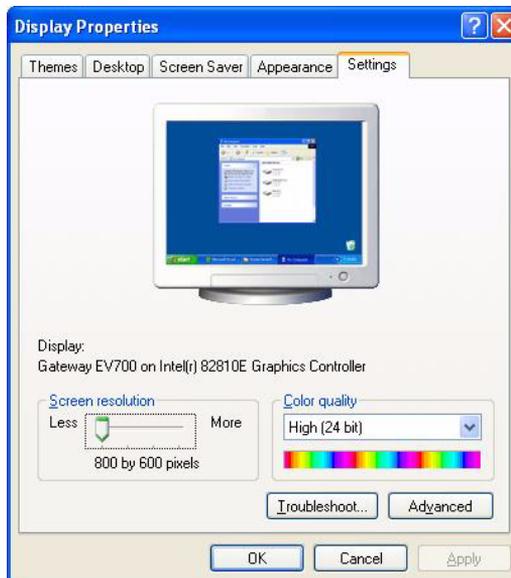
4 Drag the **Screen resolution** or **Screen area** slider to the resolution you prefer.

5 To save your changes in Windows XP, click **OK**, then click **Yes**.

- OR -

To save your changes in Windows 2000, click **OK**, then click **OK** again.

Help and Support	For more information about adjusting screen resolution in Windows XP, click **Start**, then click **Help and Support**.
	Type the keyword **changing screen resolution** in the HelpSpot **Search** box Search [ ] , then click the arrow.

Video modes

The monitor supports several video modes. The best screen resolution is:

■ 1024 × 768

The supported video modes are:

Screen Resolution (display mode)	Horizontal Frequency	Vertical Frequency
640 × 480	31.5 kHz to 37.5 kHz	60 Hz to 75 Hz
800 × 600	37.9 kHz to 46.9 kHz	75 Hz to 60 Hz
1024 × 768	48.4 kHz to 60 kHz	60 Hz to 75 Hz

If you do not use the best mode for the monitor, the display image may look slightly "fuzzy" or may have a black border around the edges.

Power management

ENERGY STAR

As an ENERGY STAR® Partner, Gateway has determined that this product meets the ENERGY STAR guidelines for energy efficiency.

This monitor complies with the EPA's International ENERGY STAR Program, which is a program designed to encourage manufacturers of computer equipment to build circuitry into their products to reduce energy consumption during time of non-use.

Energy declaration

When connected to a computer that supports the VESA Display Power Management Signaling (DPMS) Protocol, this monitor can conserve significant energy by reducing power consumption during periods of non-use. When your computer goes into the energy saving mode, the monitor will then enter the Active Off mode (different from total shut down). In the Active Off mode the Power LED will show orange.

Use these conventions and the power can be reduced to the following levels:

VESA State	LED Indicator	Power Consumption
On	Green	<20 W
Active Off	Orange	2 W

To "wake" the monitor when it is in Active Off mode, move your mouse or press any keyboard key.

Access the power management options in the Control Panel to change the period of time after which the monitor enters these low power states.

Maintenance

To keep the monitor in optimal working order:

- Do not block the ventilation holes.
- Do not expose the monitor to rain or use near water.
- Keep the monitor away from radiators or heat vents.
- Keep the monitor out of direct sunlight.

To clean the monitor, use a soft cloth lightly moistened with water only. Wipe the cabinet, screen, and controls.

Warning	Do not use any type of abrasive pad or glass cleaner. You will permanently scratch the screen.

Troubleshooting

If you have problems with the monitor, the information in this troubleshooting section may help you solve them.

Important   Make sure that the monitor has warmed up for approximately 30 minutes before making any judgments about the picture quality.

No power

■ Make sure that the power cord is connected correctly to both the back of the monitor and the wall outlet. For more information about connecting the power cord, see "Connecting the monitor" on page 2.

■ Make sure that the main power switch on the right side of the monitor is turned on.

■ Make sure that the monitor power button on the front of the monitor is turned on.

No picture

- Make sure that the power cord is connected correctly to both the back of the monitor and the wall outlet. For more information about connecting the power cord, see "Connecting the monitor" on page 2.

- Make sure that the video cable is connected securely to the back of the monitor and your computer. For more information about connecting the video cable, see "Connecting the monitor" on page 2.

- Make sure that the main power switch on the right side of the monitor is turned on.

- Make sure that the monitor power button on the front of the monitor is turned on.

- If the power LED is orange:

    - Make sure that your computer is turned on.

    - Move the mouse or press any key on the keyboard to bring the monitor out of Active Off mode.

    - Restart your computer with the monitor turned on.

    - Make sure that the video cable is not damaged.

    - Check the ends of the video cable for any pins that might be bent or pushed in.

- Turn off the monitor and disconnect the video cable from the back of your computer. Turn the monitor back on and wait for ten seconds. If the monitor is functioning correctly, a self-diagnostic screen appears. For more information about connecting the video cable, see "Connecting the monitor" on page 2.

Power button does not turn on the monitor

- Make sure that the main power switch on the right side of the monitor is turned on.

- Unplug the monitor's power cord from the electrical outlet to reset the monitor.

Image "ghosts"

- If a "ghost" of an image remains on the monitor screen, turn off the monitor for the length of time that the image was displayed on the screen. For example, if the image was displayed for one hour, turn off the monitor for one hour.

- To avoid ghost images, use a screen saver.

Display colors are wrong

- Use the OSD controls to select a preset color setting or to adjust the colors manually. For more information, see "OSD controls" on page 9.

- Restart your computer with the monitor turned on.

- Make sure that the video cable is connected securely to the back of the monitor and your computer. For more information about connecting the video cable, see "Connecting the monitor" on page 2.

- Make sure that the video cable is not damaged.

- Check the ends of the video cable for any pins that might be bent or pushed in.

Picture has shadows

- Turn on the FACTORY PRESET control in the OSD, then press the RESET button for several seconds to return the monitor settings to the ideal settings. For more information, see "OSD controls" on page 9.

- Remove any extension cables or switchboxes.

- Make sure that the video cable is connected securely to the back of the monitor and your computer. For more information about connecting the video cable, see "Connecting the monitor" on page 2.

- Make sure that the video cable is not damaged.

- Check the ends of the video cable for any pins that might be bent or pushed in.

Color is not uniform

■ Turn on the FACTORY PRESET control in the OSD, then press the RESET button for several seconds to return the monitor settings to the ideal settings. For more information, see "OSD controls" on page 9.

Image is not sized or centered correctly

■ Use the OSD controls to adjust the position of the display image. For more information, see "OSD controls" on page 9.

■ Turn on the FACTORY PRESET control in the OSD, then press the RESET button for several seconds to return the monitor settings to the ideal settings. For more information, see "OSD controls" on page 9.

The monitor has pixels that are always dark or too bright

This condition is normal and inherent in the TFT technology used in active-matrix LCD screens. Gateway's inspection standards keep these to a minimum. If you feel these pixels are unacceptably numerous or dense on your display, contact Gateway Technical Support to identify whether a repair or replacement is justified based on the number of pixels affected.

Specifications

Specifications are subject to change without notice or obligation.

Monitor	15-inch active-matrix TFT (Thin Film Transistor) LCD
Best screen resolution	1024 × 768
Active display area	Horizontal: 12.0 in. (304 mm) Vertical: 9.0 in. (228 mm)
Display colors	Over 16 million colors
Input signal	Video: ANALOG 0.7 P-P/75 Ohms Sync: Separate sync TTL Level Horizontal sync: Positive/Negative Vertical sync: Positive/Negative
Synchronization Range	Horizontal: 31.5 kHz to 60.0 kHz (automatic) Vertical: 56.2 HZ to 75.1 Hz (automatic)
Power input	AC 100-240 V 50/60 Hz 0.4 A
Power consumption	Normal operation: <20 W Active Off operation: 2 W
Dimensions	13.6 × 6.5 × 13.6 inches (W × D × H) (344.8 × 166.0 × 344.2 mm) (W × D × H)
Weight	8.2 lbs (3.7 kg)
Power management	Meets EPA ENERGY STAR® and VESA DPMS requirements
Certifications	UL, cUL, EPA, NOM, ICES-003 Class B, and FCC Class B

Many products for Gateway and its subsidiaries are custom engineered by our suppliers to Gateway specifications and may vary from similarly marketed products.

Environmental specifications

Specifications are subject to change without notice or obligation.

Operating temperature	41°F to 95°F (5°C to 35°C) Humidity: 30% to 80% Altitude: 0 to 10,000 ft
Storage Temperature	14°F to 140°F (-10°C to 60°C) Humidity: 10% to 85% Altitude: 0 to 40,000 ft

Many products for Gateway and its subsidiaries are custom engineered by our suppliers to Gateway specifications and may vary from similarly marketed products.

Safety, Regulatory, and Legal Information

Important safety information

Your Gateway system is designed and tested to meet the latest standards for safety of information technology equipment. However, to ensure safe use of this product, it is important that the safety instructions marked on the product and in the documentation are followed.

Warning

Always follow these instructions to help guard against personal injury and damage to your Gateway system.
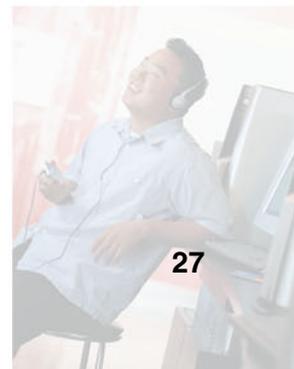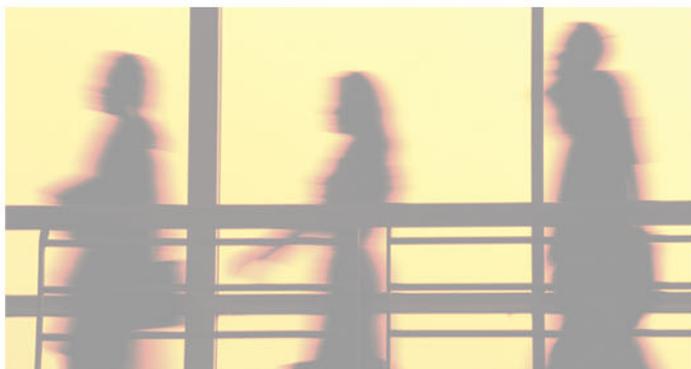
Setting up your system

- Read and follow all instructions marked on the product and in the documentation before you operate your system. Retain all safety and operating instructions for future use.
- Do not use this product near water or a heat source such as a radiator.
- Set up the system on a stable work surface.
- The product should only be operated from the type of power source indicated on the rating label.
- If your product has a voltage selector switch, make sure that the switch is in the proper position for your area. The voltage selector switch is set at the factory to the correct voltage.
- Openings in the monitor case are provided for ventilation. Do not block or cover these openings. Make sure you provide adequate space, at least 6 inches (15 cm), around the system for ventilation when you set up your work area. Never insert objects of any kind into the monitor ventilation openings.
- Some products are equipped with a three-wire power cord to make sure that the product is properly grounded when in use. The plug on this cord will only fit into a grounding-type outlet. This is a safety feature. If you are unable to insert the plug into an outlet, contact an electrician to install the appropriate outlet.
- If you use an extension cord with this system, make sure that the total ampere rating on the products plugged into the extension cord does not exceed the extension cord ampere rating.
- If your system is fitted with a TV Tuner, cable, or satellite receiver card, make sure that the antenna or cable system is electrically grounded to provide some protection against voltage surges and buildup of static charges.

Care during use

- Do not walk on the power cord or allow anything to rest on it.
- Do not spill anything on the system. The best way to avoid spills is to avoid eating and drinking near your system.
- Do not expose the monitor to rain or use near water. If the monitor does get exposed to moisture, unplug it and allow it to dry for 24 hours. Call Gateway Technical Support for advice on whether the monitor is safe to turn back on.
- When the monitor is turned off, a small amount of electrical current still flows through the monitor. To avoid electrical shock, always unplug all power cables and modem cables from the wall outlets before cleaning the system.
- Unplug the system from the wall outlet and refer servicing to qualified personnel if:
  - The power cord or plug is damaged.
  - Liquid has been spilled into the system.
  - The system does not operate properly when the operating instructions are followed.
  - The system was dropped or the cabinet is damaged.
  - The system performance changes.

Warning	To prevent electric shock, never remove the cover. No user serviceable parts inside. Refer servicing to qualified service personnel.

Replacement parts and accessories

Use only replacement parts and accessories recommended by Gateway.

Important	Do not use Gateway products in areas classified as hazardous locations. Such areas include patient care areas of medical and dental facilities, oxygen-laden environments, or industrial facilities.

Regulatory compliance statements

United States of America

Federal Communications Commission (FCC)
Unintentional emitter per FCC Part 15

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

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

Compliance Accessories: The accessories associated with this equipment are: shielded video cable. These accessories are required to be used in order to ensure compliance with FCC rules.

FCC declaration of conformity

Responsible party:

Gateway Companies, Inc.
610 Gateway Drive, North Sioux City, SD 57049
(605) 232-2000   Fax: (605) 232-2023

This device complies with Part 15 of the FCC Rules. Operation of this device is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Caution	Changes or modifications not expressly approved by Gateway could void the FCC compliance and negate your authority to operate the product.

Canada

Industry Canada (IC)
Unintentional emitter per ICES-003

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 Industry Canada.

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 Industrie Canada.

EPA ENERGY STAR

As an ENERGY STAR® Partner, Gateway has determined that this product meets the ENERGY STAR guidelines for energy efficiency when used with a computer equipped with a Display Power Management System.

California Proposition 65 Warning

Warning

This product contains chemicals, including lead, known to the State of California to cause cancer and/or birth defects or reproductive harm.

Notices

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MAN MON NEC 15" LCD GDE R0 4/03

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