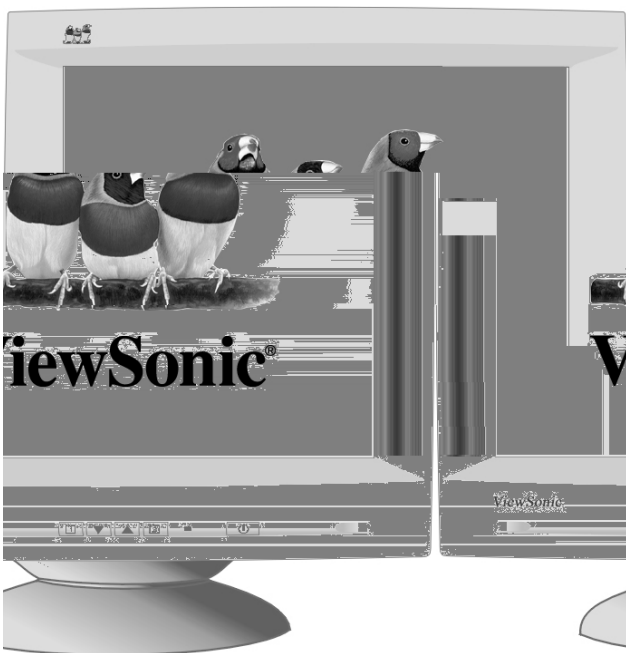


ViewSonic®

G810

Color Monitor



With Plug & Play[™]

21" (20" Viewable Diagonal)

User Guide

Guide de l'utilisateur

Benutzerhandbuch

Guía del usuario

Guida dell'utente

Guia do usuário

Användarhandbok

Käyttöopas

Руководство пользователя

Podręcznik użytkownika

ユーザズ ガイド

使用手冊

使用手冊

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Product Registration

To meet your future needs, and to receive any additional product information as it becomes available, please register your monitor's warranty on the Internet at: www.viewsonic.com

For Your Records

Product Name:	ViewSonic G810
Model Number:	VCDTS23852-M/P/A/E/G
Document Number:	A-CD-G810-6
Serial Number:	_____
Purchase Date:	_____

Getting Started

Congratulations on your purchase of a ViewSonic G810 color monitor.

Important! Save the original box and all packing material for future shipping needs.

NOTE: The word “Windows” in this user guide refers to the following Microsoft operating systems: Windows ‘95, Windows NT, Windows ‘98, Windows 2000, Windows Me (Millennium), and Windows XP.

NOTE: This product was designed for operation in the magnetic fields of the hemisphere where it was purchased.

Package Contents

Your G810 package includes:

- G810 monitor
- DB-15 video cable
- Power cord
- ViewSonic Wizard CD-ROM

NOTE: The CD jacket contains the Quick Start Guide, and the CD includes the User Guide PDF files and INF/ICM display optimization files. The INF file ensures compatibility with Windows operating systems, and the ICM file (Image Color Matching) ensures accurate on-screen colors. ViewSonic recommends that you install both files.

Precautions

-
- For best viewing conditions sit at least 18” from the monitor.
 - **AVOID TOUCHING THE SCREEN WITH YOUR FINGERS.** Oils from the skin are difficult to remove.
 - **NEVER REMOVE THE REAR COVER.** The monitor contains high-voltage parts. You may suffer serious injury if you touch these parts.
 - Avoid exposing the monitor to direct sunlight or another heat source. The monitor should be facing away from direct sunlight to reduce glare.
 - Do not place your monitor near a source of water or moisture.
 - Place your monitor in a well ventilated area. Do not place anything on the monitor that blocks the ventilation slots or prevents adequate dissipation of heat.
 - Do not place heavy objects on the monitor, video cable, or power cord.
 - If smoke, abnormal noise, or strange odor is present, immediately switch the monitor off and call your dealer or ViewSonic. It is dangerous to operate your monitor under these conditions.
 - Keep the monitor away from magnets, motors, transformers and televisions.
-

Quick Installation

1 Connect video cable

Make sure both the monitor and computer are powered OFF.

Connect the video cable to the computer, then to the monitor.

Macintosh users: Models older than G3 require a Macintosh adapter. Attach the adapter to the computer and plug the video cable into the adapter.

To order a ViewSonic® Macintosh adapter, contact ViewSonic. See *Customer Support* in this user guide.

2 Connect power cord

Connect the power cord from the monitor to a properly grounded AC outlet.

3 Power-ON monitor and computer

Power-ON the monitor, then power-ON the computer. This sequence (monitor before computer) is very important.

NOTE: At this point Windows 98 users may receive a message asking them to install the G810 INF file.

4 Install INF and ICM files

For CD-ROM: Insert your auto-start CD-ROM, select “Monitor Drivers,” and follow the on-screen instructions.

For diskette: Insert your diskette and run **install.exe**. Follow the on-screen instructions.

5 Windows users: Set the Timing

Mode (resolution and refresh rate)

Example: 1024 X 768 @ 75Hz.

For instructions on changing the resolution and refresh rate, see the user guide for your computer's graphics card.

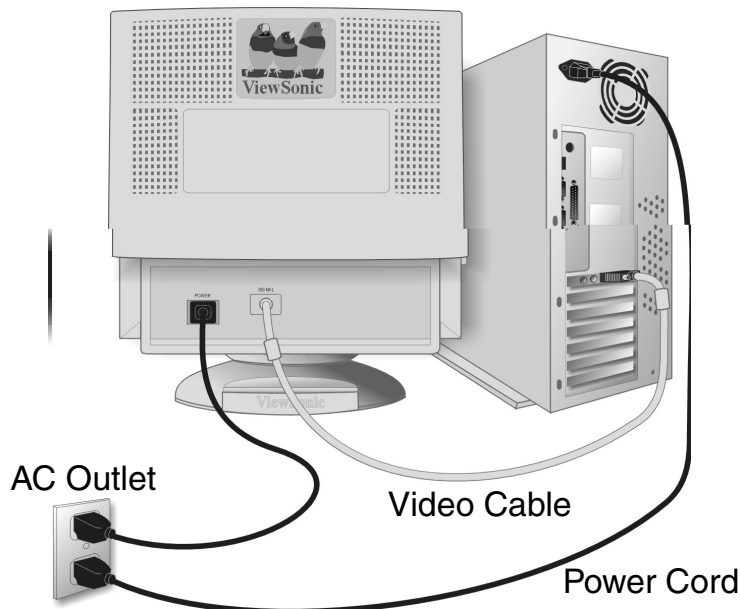
Installation is complete. Enjoy your new G810 monitor!

To be best prepared for any future customer service needs:

Write the serial number (see back of the monitor) in “*For your Records*” on page 1 of this guide.

Register the warranty of your monitor on the Internet at:

www.viewsonic.com/registration/



Using the Monitor

Setting the Timing Mode

Setting the timing mode is important for maximizing the quality of the screen image and minimizing eye strain. The **timing mode** consists of the **resolution** (example 1280 x 1024) and **refresh rate** (or vertical frequency; example 75 Hz). After setting the timing mode, use the OnView® controls to adjust the screen image.

The recommended timing modes for this monitor are:

VESA 1024 x 768 @ 75 Hz and VESA 1600 x 1200 @ 75 Hz.

To set the Timing Mode:

- 1 Set the resolution: Right-click on the Windows® desktop > **Properties** > **Settings** > **Desktop or Screen Area** > set the resolution.
- 2 Set the refresh rate: See your graphic card's user guide for instructions.

NOTE: To minimize the adjustments required for an optimal screen **image**, select a timing mode from the **Preset Timing Modes** table below.

Preset Timing Modes

VGA 640 x 400 @ 70 Hz	VESA 1024 x 768 @ 85 Hz
VGA 640 x 480 @ 60 Hz	VESA 1280 x 1024 @ 75 Hz
VESA® 640 x 480 @ 75 Hz	VESA 1280 x 1024 @ 85 Hz
VESA 800 x 600 @ 75 Hz	VESA 1600 x 1200 @ 75 Hz
VESA 800 x 600 @ 85 Hz	Macintosh 832 x 624 @ 75 Hz
VESA 1024 x 768 @ 60 Hz	Macintosh 1152 x 870 @ 75 Hz
VESA 1024 x 768 @ 75 Hz	Macintosh 640 x 480 @ 67 Hz

WARNING: Do NOT set the graphics card in your computer to exceed the maximum refresh rate for each resolution (see below). Doing so may result in permanent damage to your monitor.

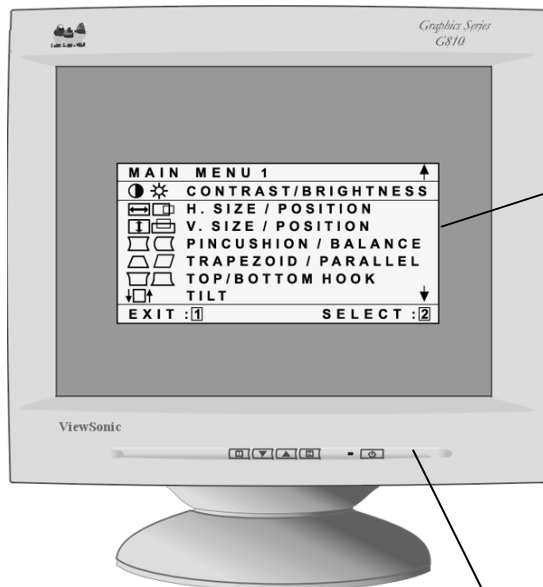
Timing Modes with Maximum Refresh Rates

2048 x 1536 NI @ 60 Hz	1152 x 870 NI @ 105 Hz
1920 x 1440 NI @ 64 Hz	1024 x 768 NI @ 118 Hz
1600 x 1200 NI @ 77 Hz	800 x 600 NI @ 149 Hz
1280 x 1024 NI @ 90 Hz	640 x 480 NI @ 180 Hz

(NI = Non Interlaced)

Adjusting the Screen Image

Beginning with the Main Menu shown below, use the buttons on the front control panel to adjust the OnView® controls which display on the screen. The OnView controls are explained in the four steps at the top of the next page and are further explained on pages 8-11.



Main Menu with OnView controls

Status line at the bottom of the menu shows what to do next: Button [1] EXITS this menu, or Button [2] SELECTs the highlighted control (or pair of controls).

Displays Main Menu; also saves changes/exits Main Menu.

Power Light

Power On/Off



Front Control Panel

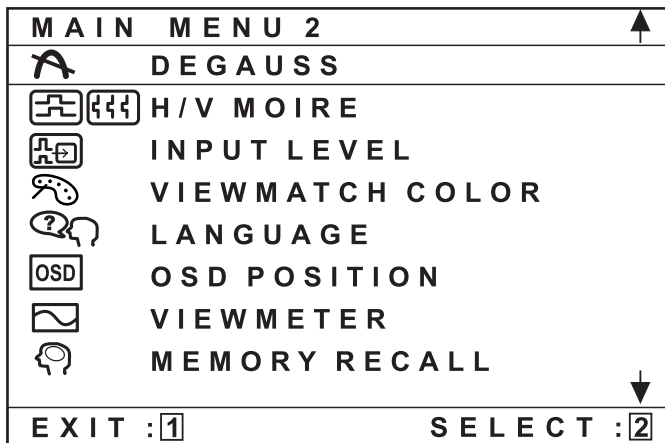
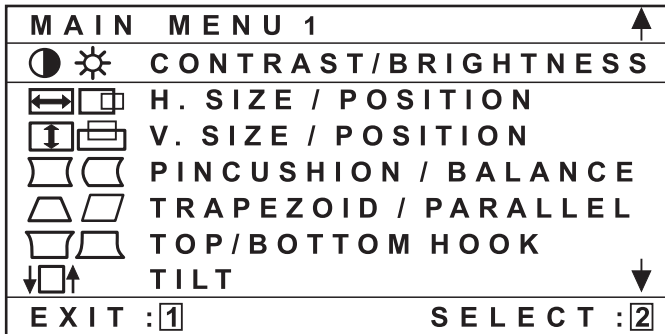
Scroll Up/Down menu options

Displays control screen for highlighted control (or pair of controls). Also, toggles between pair of controls on some control screens.

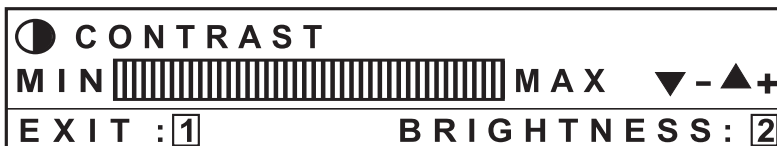
* The monitor automatically degausses each time you turn it on, removing the buildup of magnetic fields that can affect color purity and convergence. To prevent possible damage, if you turn the monitor off, then immediately on again, wait 20 minutes before doing this again. **Do not** turn the **monitor on and off repeatedly**. To manually degauss the monitor, see the instructions on page 9.

To adjust the screen image:

- 1 To display the Main Menu (parts 1 and 2 shown below), press button [1].



- 2 To select a control you want to adjust, press the arrow buttons on the front control panel of your monitor (▼▲) and scroll through the choices. When the control you want to adjust is highlighted, press button [2].
















NOTE: Some controls on the Main Menu are listed in pairs, such as Contrast/Brightness. Press button [2] to toggle between control pairs after displaying a control screen.

- 3 To adjust the selected control, press the arrow buttons (▼▲).
- 4 To save the control setting and Exit the menu, press button [1] *twice*.

Main Menu Controls

The menu items shown below can be adjusted by using the arrow buttons (▲▼) on the front of your monitor.

Control	Explanation
	Contrast adjusts the difference between the image background (black level) and the foreground (white level). <i>Shortcut:</i> Before displaying the Main Menu, press ▼ or ▲ to display the Contrast/Brightness control screen.
	Brightness adjusts the background black level of the screen image. <i>Shortcut:</i> Before displaying the Main Menu, press ▼ or ▲ to display the Contrast/Brightness control screen.
	Horizontal Size adjusts the width of the screen image.
	Horizontal Position moves the screen image left or right.
	Vertical Size adjusts the height of the screen image.
	Vertical Position moves the screen image up or down.
	Pincushion straightens curves along the vertical edges of the screen image that bow inward or outward.
	Pin Balance straightens curves along the vertical edges of the screen image that bow in the same direction.
	Trapezoid makes the vertical edges of the screen image parallel.
	Parallel slants the vertical edges of the screen image.
	Top Hooking straightens the top corners of the screen image.
	Bottom Hooking straightens the bottom corners of the screen image.
	Tilt rotates the entire screen image.

Control

Explanation (Continued)



Degauss removes the build-up of magnetic fields that can cause irregular colors to appear around the edges of screen images. Your monitor will degauss **automatically** each time you power it on.

To degauss your monitor **manually**, select Degauss on the on-screen menu and press button [2].

Important: *Do not degauss repeatedly. Doing so can be harmful to the monitor. Wait at least 20 minutes before using this control again.*



H. Moire (Horizontal Moire) reduces vertical interference patterns that appear as ripples, waves, or unwanted background color textures.

NOTE: Interference patterns of this type are most noticeable when viewing images having closely spaced lines or finely detailed patterns.



V. Moire (Vertical Moire) reduces horizontal interference patterns that appear as ripples, waves, or unwanted background color textures.

NOTE: Interference patterns of this type are most noticeable when viewing images having closely spaced lines or finely detailed patterns.



Input Level displays the voltage level of the video signal.

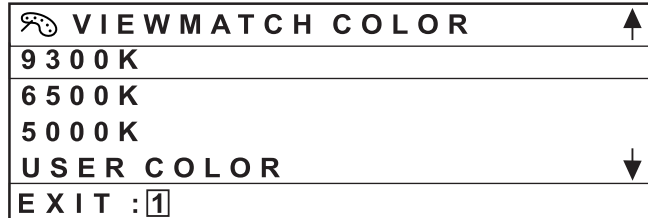
NOTE: the default selection is 0.7 Volts.

Control

Explanation (Continued)



ViewMatch® Color provides several color options: three preset color temperatures and User Color, which allows you to adjust red (R), green (G), and blue (B). The factory setting for this product is 9300K (9300 Kelvin).



9300K — Adds blue to the screen image for cooler white (often used in office settings with fluorescent lighting).

6500K — Adds red to the screen image for warmer white and richer red.

5000K — Adds blue and green to the screen image.

User Color — Individual adjustments for red, green, and blue.



Language allows you to choose from among several languages for the menus and control screens: English, French, German, Italian, and Spanish.



OSD Position allows you to move the OnView menus and control screens horizontally and vertically.



ViewMeter® displays information about the video signal coming from your computer's graphics card. This includes: the **refresh rate** (or Vertical Frequency, displayed as "FV") and the **scan rate** (or Horizontal Frequency, displayed as "FH").



Control	Explanation (Continued)
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Memory Recall returns adjustments to the original factory settings if the product is operating in a Preset Timing Modes (see the table at the bottom of page 12).

Exception: This control does not affect changes made with the **User Color** control.

Other Information

Specifications

CRT	Type	21" (20.0" viewable diagonal area). 0.21mm Horizontal, 0.14 mm Vertical, and 0.25mm diagonal dot pitch, 90° deflection
	Phosphor	RGB, medium-short persistence
	Glass surface	Anti-reflection, anti-glare, anti-static coating Standard light transmission rate = 48.6%
Input Signal	Video Sync	RGB Analog (0.7/1.0Vp-p, 75 Ohms) f _H : 30-97kHz, f _V : 50-180 Hz HV Separate (TTL), Composite
Compatibility	PC Macintosh ¹	VGA up to 1600 x 1200 Power Macintosh (may require Macintosh adapter)
Timing Modes with Maximum Refresh Rates²		2048 x 1536 @ 60 Hz 1152 x 870 @ 105 Hz 1920 x 1440 @ 64 Hz 1024 x 768 @ 118 Hz 1600 x 1200 @ 77 Hz 800 x 600 @ 149 Hz 1280 x 1024 @ 90 Hz 640 x 480 @ 180 Hz
Power	Voltage	AC 90-132V / 198-264V (auto switch) 50/60 Hz
Display Area	Default Full scan	390 mm (H) x 290 mm (V) (Typical) 406 mm (H) x 300 mm (V) (Depends on signal timing)
Operating Conditions	Temperature Humidity Altitude	32° F to 104° F (0° C to +40° C) 5% to 95% (no condensation) To 9,000 feet
Storage Conditions	Temperature Humidity Altitude	-40° F to +140° F (-40° C to +60° C) 5% to 95% (no condensation) To 39,000 feet
Dimensions	Physical (monitor)	500 mm (W) x 442 mm (H) x 401 mm (D) 19.7" (W) x 17.4" (H) x 15.8" (D)
Weight	Net	23.0 kg (50.7 lb) (monitor only)
Regulations		UL, CUL, DHHS, FCC-B, CE, DOC-B, ENERGY STAR®, NOM, TUV/GS, VCCI, BSMI, C-Tick, TUV-Ergo, Nordic, SASO, TCO'03, TCO'99 (Black), CCIB, PCBC, PSB, CB, GOST-R
Power Saving Modes	On Off	< NORMAL (Green LED) < 4 W (Orange LED)

Preset Timing Modes

(Recommended Timing Modes for this monitor are:

VESA 1024 x 768 @ 75 Hz and VESA 1600 x 1200 @ 75 Hz.)¹

VGA 640 x 400 @ 70 Hz	VESA 1024 x 768 @ 85 Hz
VGA 640 x 480 @ 60 Hz	VESA 1280 x 1024 @ 75 Hz
VESA® 640 x 480 @ 75 Hz	VESA 1280 x 1024 @ 85 Hz
VESA 800 x 600 @ 75 Hz	VESA 1600 x 1200 @ 75 Hz
VESA 800 x 600 @ 85 Hz	Macintosh 832 x 624 @ 75 Hz
VESA 1024 x 768 @ 60 Hz	Macintosh 1152 x 870 @ 75 Hz
VESA 1024 x 768 @ 75 Hz	Macintosh 640 x 480 @ 67 Hz

¹ Macintosh models prior to G3 require a Macintosh adapter. To order a Macintosh adapter, contact ViewSonic Customer Support. You will need to provide serial number of the product.

² **Warning:** Do NOT set the graphics card in your computer to exceed these Maximum Refresh Rates; doing so could result in permanent damage to the monitor.

Troubleshooting

No power

- Make sure power button (or switch) is ON.
- Make sure A/C power cord is securely connected to the back of the monitor and to a power outlet.
- Plug another electrical device (like a radio) into the power outlet to verify that the outlet is supplying proper voltage.

Power on but no screen image

- Make sure the video cable supplied with the monitor is tightly secured to the video output port on the back of the computer. If the other end of the video cable is not attached permanently to the monitor, tightly secure it to the monitor.
- Adjust brightness and contrast.
- Verify whether an adapter is required for proper signal continuity between graphics card and monitor.

Flickering

- Not enough power supplied. Connect the monitor to a different outlet. If using a surge protector, reduce the number of devices plugged in.
- Check the ViewMeter® from the main menu to verify the refresh rate (vertical frequency) is 75 Hz or higher. See “Specifications” on page 12.
- Remove any devices from the area around the monitor that emit magnetic fields such as radios, surge protectors, unshielded speakers, fluorescent lights, AC power converters, desk fans, etc.
- Make sure the graphics card in your computer can use non-interlaced mode at the desired frequencies. To enable your graphics card to support higher refresh rates, try selecting fewer colors or running lower resolutions.

Wrong or abnormal colors

- If any colors (red, green, or blue) are missing, check the video cable to make sure it is securely connected. Loose or broken pins in the cable connector could cause an improper connection.
- Connect the monitor to another computer.
- Select Degauss from the Main Menu. Do this only once.
- If you have an older graphics card, contact ViewSonic® Customer Support.

Entire screen image (rolls) vertically

- Make sure video input signals are within the monitor's specified frequency range.
- Try the monitor with another power source, graphics card, or computer system.
- Connect the video cable securely.

Control buttons do not work

- Press only one button at a time.

Customer Support

For technical support or product service, see the table below or contact your reseller.

NOTE: You will need the product serial number.

Country/ Region	Web site	T = Telephone F = FAX	Email
United States	www.viewsonic.com/ support	T: (800) 688-6688 F: (909) 468-1202	service.us@ viewsonic.com
Canada	www.viewsonic.com/ support	T: (800) 688-6688 F: (909) 468-1202	service.ca@ viewsonic.com
United Kingdom	www.viewsoniceurope.com	T: 0800 833 648 F: (01293) 643910	service.eu@ viewsoniceurope.com
Europe, Middle East, Baltic countries, and North Africa	www.viewsoniceurope.com	Contact your reseller	service.eu@ viewsoniceurope.com
Australia and New Zealand	www.viewsonic.com.au	T: +61 2 9906 6277 F: +61 2 9906 6377	service@au. viewsonic.com
Singapore/ Malaysia/Thailand	www.viewsonic.com.sg	T: 65 273 4018 F: 65 273 1566	service@sg. viewsonic.com
South Africa/ Other countries	www.viewsonic.com	T: 886 2 2246 3456 F: 886 2 8242 3668	service@sd. viewsonic.com
Hong Kong	www.hk.viewsonic.com	T: 886 2 2246 3456 F: 886 2 8242 3668	service@hk. viewsonic.com

Cleaning the Monitor

- MAKE SURE THE MONITOR IS TURNED OFF.
- NEVER SPRAY OR POUR ANY LIQUID DIRECTLY ONTO THE SCREEN OR CASE.

To clean the screen:

- 1 Wipe the screen with a clean, soft, lint-free cloth. This removes dust and other particles.
- 2 If still not clean, apply a small amount of non-ammonia, non-alcohol based glass cleaner onto a clean, soft, lint-free cloth, and wipe the screen.

To clean the case:

- 1 Use a soft, dry cloth.
- 2 If still not clean, apply a small amount of a non-ammonia, non-alcohol based, mild non-abrasive detergent onto a clean, soft, lint-free cloth, then wipe the surface.

DISCLAIMER

ViewSonic® does not recommend the use of any ammonia or alcohol-based cleaners on the monitor screen or case. Some chemical cleaners have been reported to damage the screen and/or case of the monitor. ViewSonic will not be liable for damage resulting from use of any ammonia or alcohol-based cleaners.

Limited Warranty

VIEWSONIC CRT MONITORS

What the warranty covers:

ViewSonic warrants its products to be free from defects in material and workmanship during the warranty period. If a product proves to be defective in material or workmanship during the warranty period, **ViewSonic** will, at its sole option, repair or replace the product with a like product. Replacement product or parts may include remanufactured or refurbished parts or components.

How long the warranty is effective:

ViewSonic[®] color CRT monitors, including the display tubes, are warranted for three (3) years for all parts and three (3) years for all labor from the date of the first consumer purchase.

Who the warranty protects:

This warranty is valid only for the first consumer purchaser.

What the warranty does not cover:

1. Any product on which the serial number has been defaced, modified or removed.
2. Damage, deterioration or malfunction resulting from:
 - a. Accident, misuse, neglect, fire, water, lightning, or other acts of nature, unauthorized product modification, or failure to follow instructions supplied with the product.
 - b. Repair or attempted repair by anyone not authorized by **ViewSonic**.
 - c. Any damage of the product due to shipment.
 - d. Removal or installation of the product.
 - e. Causes external to the product, such as electrical power fluctuations or failure.
 - f. Use of supplies or parts not meeting **ViewSonic**'s specifications.
 - g. Normal wear and tear.
 - h. Any other cause which does not relate to a product defect.
3. Removal, installation, and set-up service charges.

How to get service:

1. **For information about receiving service under warranty, contact ViewSonic Customer Support.** You will need to provide your product's serial number.
2. To obtain service under warranty, you will be required to provide (a) the original dated sales slip, (b) your name, (c) your address, (d) a description of the problem, and (e) the serial number of the product.
3. Take or ship the product freight prepaid in the original container to an authorized **ViewSonic** service center or **ViewSonic**.
4. For additional information or the name of the nearest **ViewSonic** service center, contact **ViewSonic**.

Limitation of implied warranties:

THERE ARE NO WARRANTIES, EXPRESS OR IMPLIED, WHICH EXTEND BEYOND THE DESCRIPTION CONTAINED HEREIN INCLUDING THE IMPLIED WARRANTY OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

Exclusion of damages:

VIEWSONIC'S LIABILITY IS LIMITED TO THE COST OF REPAIR OR REPLACEMENT OF THE PRODUCT. VIEWSONIC SHALL NOT BE LIABLE FOR:

1. DAMAGE TO OTHER PROPERTY CAUSED BY ANY DEFECTS IN THE PRODUCT, DAMAGES BASED UPON INCONVENIENCE, LOSS OF USE OF THE PRODUCT, LOSS OF TIME, LOSS OF PROFITS, LOSS OF BUSINESS OPPORTUNITY, LOSS OF GOODWILL, INTERFERENCE WITH BUSINESS RELATIONSHIPS, OR OTHER COMMERCIAL LOSS, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.
2. ANY OTHER DAMAGES, WHETHER INCIDENTAL, CONSEQUENTIAL OR OTHERWISE.
3. ANY CLAIM AGAINST THE CUSTOMER BY ANY OTHER PARTY.

Effect of state law:

This warranty gives you specific legal rights, and you may also have other rights which vary from state to state. Some states do not allow limitations on implied warranties and/or do not allow the exclusion of incidental or consequential damages, so the above limitations and exclusions may not apply to you.

Sales outside the U.S.A. and Canada:

For warranty information and service on **ViewSonic** products sold outside of the U.S.A. and Canada, contact **ViewSonic** or your local **ViewSonic** dealer.

ViewSonic CRT Monitor Warranty (V3.0)

Release Date: 03-26-2002

Appendix

Safety Guidelines

Warning:

Compliance Information for U.S.A.

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

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

FCC Warning

To assure continued FCC compliance, the user must use grounded power supply cord and the provided shielded video interface cable with bonded ferrite cores. If a BNC cable is going to be used, use only a shielded BNC(5) cable. Also, any unauthorized changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this device.

CE Conformity for Europe only



The device complies with the requirements of the EEC directive 89/336/EEC as amended by 92/31/EEC and 93/68/EEC Art.5 with regard to "Electromagnetic compatibility," and 73/23/EEC as amended by 93/68/EEC Art.13 with regard to "Safety."

ViewSonic[®] Corporation