

ATTACHMENT J – USER'S MANUAL

Color Monitor

StudioWorks

563N

User's Guide
Manuel d'utilisation
Guia del Usuario
Manual do proprietário

Please read this manual carefully before operating your set.
Retain it for future reference.
Record model number and serial number of the set.
See the label attached on the back cover and quote this
information to your dealer when you require service.



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ENGLISH

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FCC Warning

Class B Computing Device

Information to the User

This equipment has been tested and found to comply with the limits for a class B digital device pursuant to part 15 of 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 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 and for additional suggestions.

The user may find the following booklet prepared by the Federal Communications Commission helpful: "How to Identify and Resolve Radio-TV Interference Problems." This booklet is available from the U.S. Government Printing Office, Washington, D.C. 20402, Stock No. 004-000-00345-4.

FCC Warning

The user is cautioned that changes or modifications not expressly approved by the manufacturer could void the user's authority to operate the equipment.

NOTE: In order for an installation of this product to maintain compliance with the limits for a Class B device, **shielded** cables must be used.

Introduction

Thank you for purchasing a high resolution monitor. It will give you high resolution performance and convenient reliable operation in a variety of video operating modes.

ENGLISH

Features

- The monitor is a 15 inches (14.0 inches viewable) intelligent, microprocessor based monitor compatible with most analog RGB (Red, Green, Blue) display standards, including IBM PC[®], PS/2[®], Apple[®], Macintosh[®], Centris[®], Quadra[®], and Macintosh II family.
- The monitor provides crisp text and vivid color graphics with VGA, SVGA, XGA, and VESA Ergonomic modes (non-interfaced), and most Macintosh compatible color video cards when used with the appropriate adaptor. The monitor's wide compatibility makes it possible to upgrade video cards or software without purchasing a new monitor.
- Digitally controlled auto-scanning is done with the micro-processor for horizontal scan frequencies between 30 and 61kHz, and vertical scan frequencies between 50-120Hz.
- This monitor is capable of producing a maximum horizontal resolution of 1024 dots and a maximum vertical resolution of 768 lines.
- The microprocessor-based digital controls allow you to adjust conveniently a variety of image controls by using the OSD (On Screen Display).
- On Screen Display(OSD) adjustments in seven languages: English, Deutsch, Français, Español, Italiano, Português, Korean for ease of setup and screen optimization
- Plug and play capability if supported by your system.
- This monitor has DDC 2B function.*
- Compliant with the following regulated specifications :*
 - EPA ENERGY STAR
 - MPR II

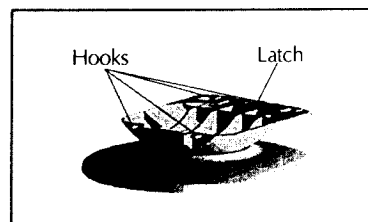
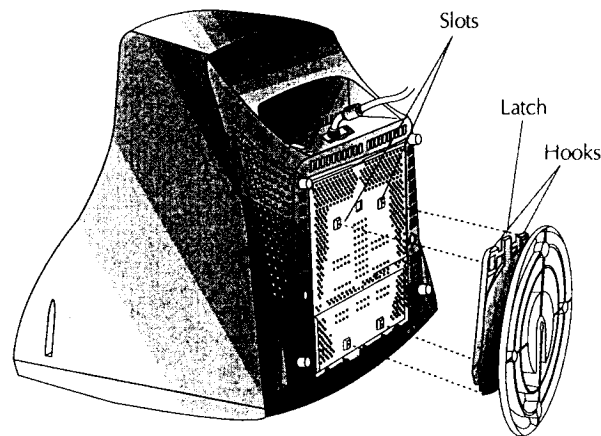
*For detailed information, please refer to the *Reference Guide* provided.

Connecting the Monitor

- Turn off the equipment and all attached options.
- Carefully set the monitor face-down with the underside facing you.

Installation the monitor

1. Align the hooks on the tilt/swivel stand with the matching slots in the base of the monitor.
2. Insert the hooks into slots.
3. Slide the tilt/swivel stand toward the front of the monitor until the latches click into the locked position.



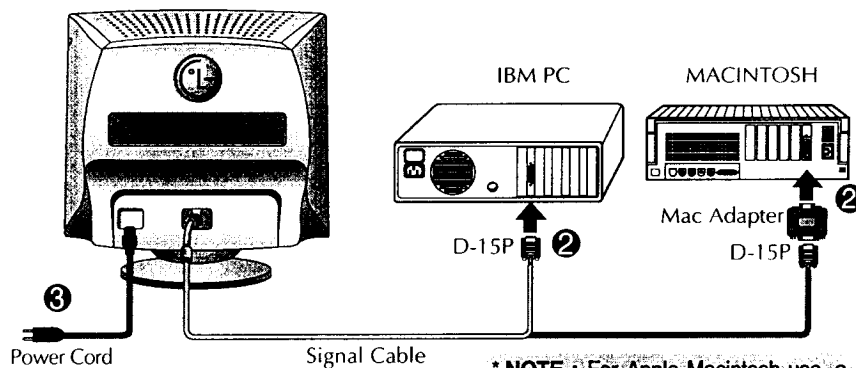
Connecting the Monitor

On the back of the monitor are two plug-in connections; one for the AC power cord, and the other for the signal cable from the video card.

- 1 Power off both the monitor and PC.
- 2 Connect the 15 pin VGA connector of the supplied signal cable to the output VGA video connector on the PC and the matching input connector on the rear of the monitor. The connectors will mate only one way. If you cannot attach the cable easily, turn the connector upside down and try again. When mated, tighten the thumbscrews to secure the connection.
- 2 Locate the appropriate MAC to VGA adapter block at your local computer store. This adapter changes the high density 3 row 15 pin VGA connector to the correct 15 pin 2 row connection to mate with your MAC. Attach the other end of the signal cable to the side of the adapter block with 3 rows.

Connect the attached adapter block/signal cable to the video output on your MAC.

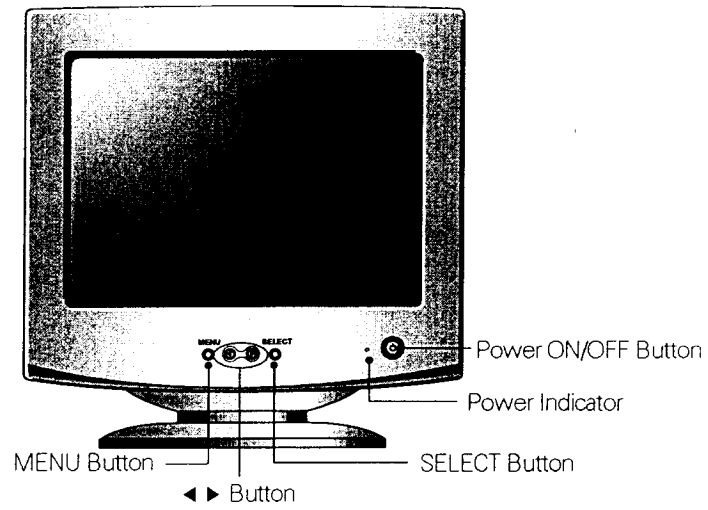
- 3 One end of the AC power cord is connected into the AC power connector on the back of the monitor. The other end is plugged into a properly grounded three-prong AC outlet.
- 4 Power ON the PC, then the monitor.
- 5 If you see the **SELF DIAGNOSTICS** message, check the signal cable and connectors.
- 6 After using the system, power OFF the monitor, then the PC.



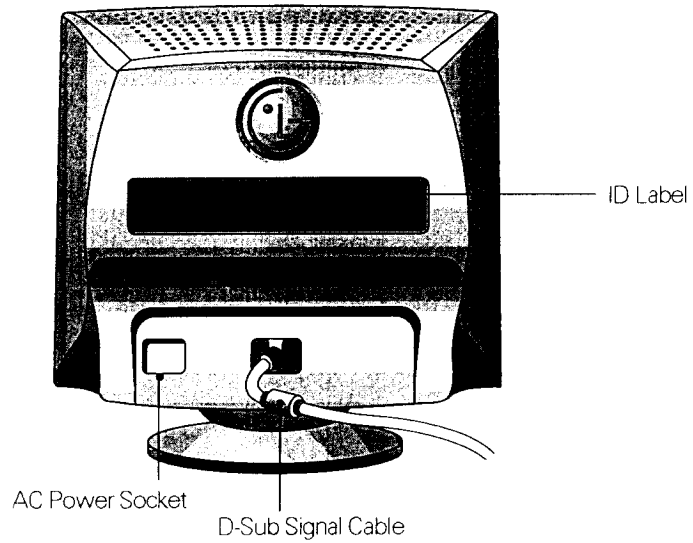
*NOTE : For Apple Macintosh use, a separate plug adapter is needed to change the 15 pin high density (3 row) D-sub VGA connector on the supplied cable to a 15 pin 2 row connector.

Location and Function of Controls

Front View

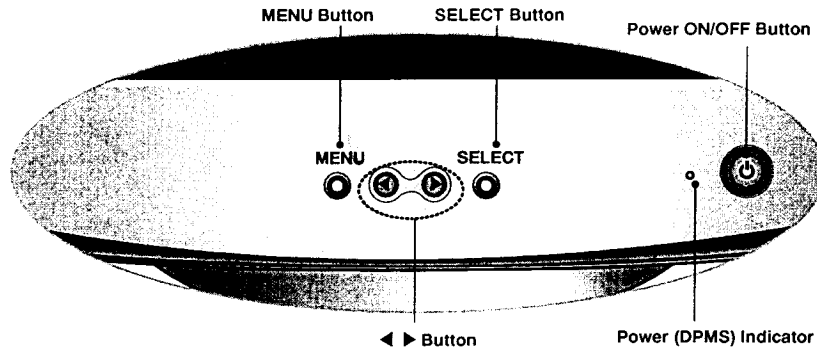







Rear View



Control Panel Function

Front Panel Controls



Control	Function
 MENU Button	Use this button to enter or exit the on screen display.
 < > Button	Use these buttons to choose or adjust items in the on screen display.
 SELECT Button	Use this button to enter a selection in the on screen display.
 Power ON/OFF Button	Use this button to turn the monitor on or off.
 Power (DPMS) Indicator	This Indicator lights up green when the monitor operates normally. If the monitor is in DPM (Energy Saving) mode (stand-by/suspend/power off), this indicator color changes to amber.

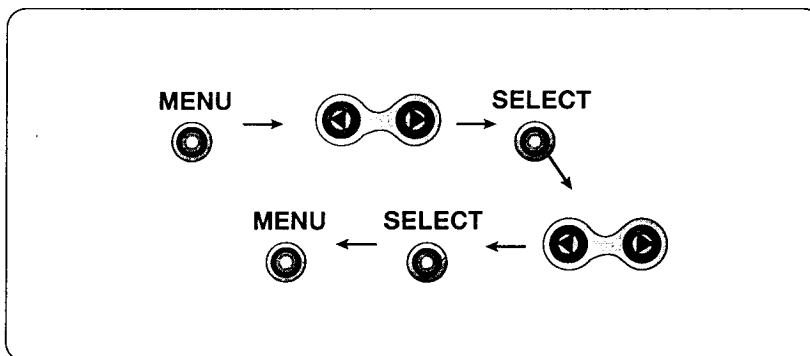
On Screen Display (OSD) Control Adjustment

Making adjustments to the image size, position and operating parameters of the monitor are quick and easy with the On Screen Display Control system. A quick example is given below to familiarize you with the use of the controls. Following section is an outline of the available adjustments and selections you can make using the OSD.

NOTE

Allow the monitor to stabilize for at least 30 minutes before making any adjustments.


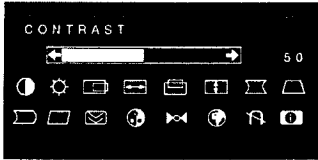



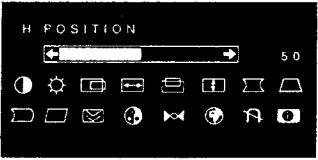

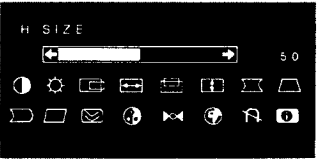


To make adjustments in the On Screen Display, follow these steps:



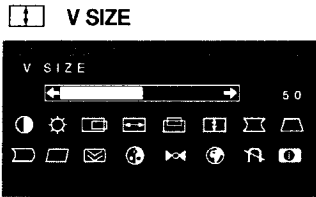





- 1** Press the **MENU Button**, then the main menu of the OSD appears.
- 2** To access a control, use the **◀** or **▶** **Buttons**. When the icon you want becomes highlighted, press the **SELECT Button**.
- 3** Use the **◀ ▶ Buttons** to adjust the item to the desired level.
- 4** Accept the changes by pressing the **SELECT Button**.
- 5** Exit the OSD by Pressing the **MENU Button**.

On Screen Display(OSD) Selection and Adjustment



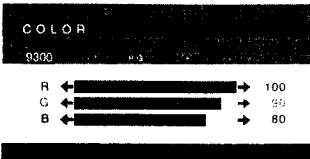








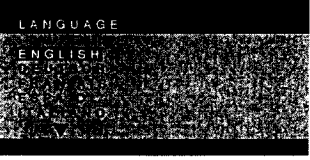
You were introduced to the procedure of selection and adjusting an item using the OSD system. Listed below are the icons, icon names, and icon descriptions of the items that are shown on the Menu.

OSD Adjust	Description
<p> CONTRAST</p> 	Adjust the display to the contrast desired.
<p> BRIGHTNESS</p> 	Used to adjust the brightness of the screen.
<p> H POSITION</p> 	<p>To move picture image left and right.</p> <ul style="list-style-type: none"> ◀ Moves the screen image left. ▶ Moves the screen image right.
<p> H SIZE</p> 	<p>To adjust image width.</p> <ul style="list-style-type: none"> ◀ Decreases the size of the screen image. ▶ Increases the size of the screen image.
<p> V POSITION</p> 	<p>To move image up and down.</p> <ul style="list-style-type: none"> ◀ Moves the screen image down. ▶ Moves the screen image up.




On Screen Display(OSD) Selection and Adjustment

OSD Adjust	Description
 <p>V SIZE</p> <p>V SIZE</p> <p>◀ [Slider] ▶ 50</p> <p>⊙ ⚙ ⏪ ⏩ ⏴ ⏵ ⏶ ⏷</p> <p>⏸ ⏹ ⏺ ⏻ ⏼ ⏽ ⏾ ⏿</p>	<p>To adjust image height.</p> <ul style="list-style-type: none"> ◀ Decreases the size of the screen image. ▶ Increases the size of the screen image.
 <p>PINCUSHION</p> <p>PINCUSHION</p> <p>◀ [Slider] ▶ 50</p> <p>⊙ ⚙ ⏪ ⏩ ⏴ ⏵ ⏶ ⏷</p> <p>⏸ ⏹ ⏺ ⏻ ⏼ ⏽ ⏾ ⏿</p>	<p>To correct the bowing in and out of the image.</p> <ul style="list-style-type: none"> ◀ Curves the image's edges inwards. ▶ Curves the image's edges outwards.
 <p>TRAPEZOID</p> <p>TRAPEZOID</p> <p>◀ [Slider] ▶ 50</p> <p>⊙ ⚙ ⏪ ⏩ ⏴ ⏵ ⏶ ⏷</p> <p>⏸ ⏹ ⏺ ⏻ ⏼ ⏽ ⏾ ⏿</p>	<p>To correct geometric distortion.</p> <ul style="list-style-type: none"> ◀ Makes the screen image narrower at the top. ▶ Moves the screen image wider at the top.
 <p>PIN BALANCE</p> <p>PIN BALANCE</p> <p>◀ [Slider] ▶ 50</p> <p>⊙ ⚙ ⏪ ⏩ ⏴ ⏵ ⏶ ⏷</p> <p>⏸ ⏹ ⏺ ⏻ ⏼ ⏽ ⏾ ⏿</p>	<p>To correct the balance of both sides bowing.</p> <ul style="list-style-type: none"> ◀ Curvature of the sides to the right. ▶ Curvature of the sides to the left.
 <p>PARALLELOGRAM</p> <p>PARALLELOGRAM</p> <p>◀ [Slider] ▶ 50</p> <p>⊙ ⚙ ⏪ ⏩ ⏴ ⏵ ⏶ ⏷</p> <p>⏸ ⏹ ⏺ ⏻ ⏼ ⏽ ⏾ ⏿</p>	<p>This control adjusts for a skewing of the screen image.</p> <ul style="list-style-type: none"> ◀ Tilts the screen image leftward. ▶ Tilts the screen image rightward.
 <p>V MOIRE</p> <p>V MOIRE</p> <p>◀ [Slider] ▶ 0</p> <p>⊙ ⚙ ⏪ ⏩ ⏴ ⏵ ⏶ ⏷</p> <p>⏸ ⏹ ⏺ ⏻ ⏼ ⏽ ⏾ ⏿</p>	<p>Reduce vertical moire when interference patterns of dark steady wavy lines appear on your screen. The moire adjustments may affect the focus of the screen.</p>

On Screen Display(OSD) Selection and Adjustment

OSD Adjust	Description
<p> COLOR</p>  	<p>Select the desired color temperature (9300K, 6500K) or select user to set your own color levels(R/G/B).</p> <ul style="list-style-type: none"> • 9300 : Slightly bluish white. • 6500 : Slightly reddish white. • R/G/B : To set your own color levels. Allow for specific adjustments to Red, Green, Blue (R/G/B). <p>◀ Decreases the amount of color in the image. ▶ Increases the amount of color in the image.</p> <p>◀ : To exit the COLOR OSD</p>
<p> RECALL</p> 	<p>You can use this function when you want to go back to the screen display of the time you purchased the product after adjusting to modify it in the Preset Mode. When you are in the User mode, you can recall only , , ,  items. After using Recall, adjust the screen display again if necessary.</p> <p>If you want more information on the Preset Mode, refer to A11 page.</p>
<p> LANGUAGE</p>  	<p>To choose the language in which the control names are displayed. OSD Menus are available in seven languages : English, German, French, Spanish, Italian, Portuguese and Korean.</p>

On Screen Display(OSD) Selection and Adjustment

OSD Adjust	Description
 <p>The image shows the DEGAUSS OSD menu. At the top, it says "DEGAUSS" with a small icon of a magnet with a slash through it. Below the title is a grid of 18 icons: a circle with a dot, a gear, a rectangle with a horizontal line, a rectangle with a vertical line, a rectangle with a diagonal line, a rectangle with a horizontal line and a vertical line, a rectangle with a horizontal line and a diagonal line, a trapezoid, a rectangle with a horizontal line and a vertical line, a rectangle with a horizontal line and a diagonal line, a circle with a dot, a square with a diagonal line, a circle with a dot, a square with a diagonal line, a square with a diagonal line, a square with a diagonal line, and a square with a diagonal line.</p>	Used to demagnetize the picture to give a more accurate image and color.
 <p>The image shows the INFORMATION OSD menu. At the top, it says "INFORMATION" with an information icon. Below the title is a grid of 18 icons, identical to the DEGAUSS menu.</p>	To inform users of preset and user mode data.
 <p>The image shows the INFORMATION OSD menu with a noisy background. At the top, it says "INFORMATION" with an information icon. Below the title is a grid of 18 icons, identical to the DEGAUSS menu.</p>	

Video Memory Modes

The monitor has 16 memory locations for display modes, 7 of which are factory preset to popular video modes.

Display Modes (Resolution)

	Display Modes (Resolution)	Horizontal Freq.(kHz)	Vertical Freq.(Hz)
1	VESA 640 x 480	31.47	60
2	VESA 720 x 400	31.47	70
3	VESA 640 x 480	37.50	75
4	VESA 640 x 480	43.27	85
5	VESA 800 x 600	46.88	75
6	VESA 800 x 600	53.67	85
7	VESA 1024 x 768	60.02	75

User Modes

- Modes 8 - 16 are empty and can accept new video data. If the monitor detects a new video mode that has not been present before or is not one of the preset modes, it stores the new mode automatically in one of the empty modes starting with mode 8.

If you use up the 9 blank modes and still have more new video modes, the monitor replaces the information in the user modes starting with mode 8.

Recalling Display Modes

- When your monitor detects a mode it has seen before, it automatically recalls the image settings you may have made the last time you used that mode.

You may, however, manually force a recall of each of the 7 preset modes by pressing the Recall button. All preset modes are automatically recalled as the monitor senses the incoming signal.

The ability to recall the preset modes is dependent on the signal coming from your PC's video card or system. If this signal does not match any of the factory modes, the monitor automatically sets itself to display the image.

Troubleshooting

Check the following before calling for service.

SELF DIAGNOSTICS message.

- The signal cable is not connected, or is loose. Check and secure the connection.

OUT OF FREQUENCY message appears.

- The frequency of the signal from the video card is outside the operating range of the monitor.

* Horizontal Frequency : 30-61kHz

* Vertical Frequency : 50-120Hz

Use the graphics board's utility software to change the frequency setting (Refer to the manual for graphics board).

The power LED is illuminated amber.

- Display power management mode.
- There is no active signal coming from the PC.
- The signal cable is not fastened securely.
- Check the computer power and graphics adapter configuration.

The image on the SCREEN is not centered, or too small, or not a rectangle shape.

- Image adjustment not been done yet in the current operating mode. Use the MENU, SELECT and ◀ ▶ buttons to set the image to your liking.

The monitor doesn't enter the power saving off mode (Amber).

- Computer video signal is not VESA DPMS standard. Either the PC or the video controller card is not using the VESA DPMS power management function.

An abnormal picture is displayed on the screen. For example, the upper part of the picture may be missing or dark.

- If using certain non-VESA Standard video card, an abnormal picture may be displayed. Try setting it to one of the factory preset modes, or selecting to a resolution and refresh rate within the specification limits of the monitor.

NOTE
■ Amber power LED indicates that signal is abnormal, display is normal condition of the monitor.
■ Then press power OFF button or use remote panel control and call your service technician for more information.

Specifications

Picture Tube	15 inch (14.0 inches viewable)	
	90 degree deflection	
	0.28mm Dot pitch	
	ARAS(Anti-Reflective Anti-Static) coating	
Sync Input	Horizontal Freq. 30 - 61kHz (Automatic)	
	Vertical Freq. 50 - 120Hz (Automatic)	
	Input Form Separate TTL, Positive/Negative	
	Signal Input 15 pin D-Sub Connector	
Video Input	Input Form Separate, RGB Analog, 0.7Vp-p/75 ohm, Positive	
	Resolution(max) 1024 x 768@75Hz	
Power Consumption	Normal(Max.) ≤ 80W	
	Stand-by/Suspend ≤ 15W	
	Power Off ≤ 5W	
Dimensions (with tilt/swivel stand)	Width 35.6 cm / 14.02 inches	
	Height 37.1 cm / 14.6 inches	
	Depth 39.5 cm / 15.5 inches	
Power Input	AC 100-240V 50/60Hz 2.0A	
Weight	Net 12.6 kg (34.17 lbs)	
Environmental Conditions	Operating Condition	
	Temperature	10 °C to 40 °C
	Humidity	10 % to 90 % non-Condensing
	Storage Condition	
	Temperature	0 °C to 60 °C
	Humidity	5 % to 90 % non-Condensing

NOTE

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