VITEK
INDUSTRIAL VIDEO PRODUCTS, INC.

VTM-LCD143
14" Professional LCD Monitor

VITEK

• 14" LCD Display Panel
• VGA, S-Video, and Component Video In/Out
• Resolution up to 1024 x 768
• Front Panel Controls
• OSD Menu Programming
• VESA 75

WARNING – To Prevent Fire or Shock Hazard, Do Not Expose This Monitor To Rain or Moisture.

PRECAUTION

Graphic Symbol Explanation
The lightning flash with arrowhead symbol, within an equilateral triangle, is intended to alert the user to the presence of uninsulated 'dangerous voltage' within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.

The exclamation point within an equilateral triangle is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

SCOPE
The information in this instruction manual covers the installation and operation of the color monitor. This unit should be installed with approved materials and wiring practices in accordance with the National Electrical Cord and applicable local wiring ordinances.

SAFETY PRECAUTION

All the safety and operating instructions should be read before the device is operated.

1. Retain instructions.
The safety and operating instructions should be retained for future reference.

2. Heed Warnings
All warnings on the monitor and in the operating instructions should be adhered to.

3. Follow Instructions
All operating and use instructions should be followed.

4. Cleaning
Unplug the monitor from the wall outlet before cleaning. Do not use liquid cleaners or aerosol cleaners. Use a damp cloth for cleaning.

5. Attachments
Do not use attachments not recommended by the manufacturer as they may cause hazards.

6. Water and Moisture
Do not use this monitor near water – for example, a bath tub, wash bowl, kitchen sink, or laundry tub, in a wet basement, or a swimming pool, and the like.

7. Accessories
Do not place this monitor on an unstable cart, stand, tripod, bracket, or table. The monitor may fall, causing serious injury to a child or adult and serious damage to the device. Use only with a cart, stand, tripod, bracket, or table recommended by the manufacturer, or sold with the monitor. Any mounting of the monitor should follow the manufacturer's instructions and recommendations.

8. Ventilation
Slots and openings in the cabinet are provided for ventilation and to ensure reliable operation of the monitor and to protect it from overheating, and these openings should never be blocked by placing the monitor on a bed, sofa, rug, or other similar surface. This monitor should never be placed near or over a radiator or heat register. This monitor should not be placed in a built in installation such as a bookcase or rack unless proper ventilation is provided or the manufacturer instructions have been adhered to.

9. Power Source
This monitor should be operated only from the type of power source indicated on the rear label. If you are not sure the type of power supply to use, consult with your dealer.

10. Grounding or Polarization

For monitors equipped with a 3-wire grounding type plug with a third (grounding) pin. This plug will only fit into a grounding-type power outlet. This is a safety feature. If you are unable to insert the plug into the outlet, contact your electrician to replace the obsolete outlet. Do not defeat the safety purpose of the grounding-type plug.

11. Power

Power supply cords should be routed well so that they are not likely to be walked on or pinched by items placed upon or against them, paying particular attention to cords at plugs, convenience receptacles, and the point where they exit from the monitor.

12. Lightning

For added protection for this monitor during a lightning storm, or when it is left unattended and unused for a long period of time, unplug it from the wall outlet and disconnect the cable system. This will prevent damage to the monitor due to lightning and power-line surges.

13. Overloading

Do not overload wall outlets and extension cords as this can result in a risk of fire or electric shock.

14. Objects and Liquid Entry

Never push objects of any kind into this monitor through openings as they may touch dangerous voltage points or short-out parts that could result in a fire or electric shock. Never spill liquid of any kind on the monitor.

15. Servicing

Do not attempt to service this monitor yourself as opening or removing covers may expose you to dangerous voltage or other hazards. Refer all servicing to qualified service personnel.

16. Damage Requiring Service

Unplug this monitor from the wall outlet and refer servicing to qualified service personnel under the following conditions:

    a. When the power-supply cord or plug is damaged.
    b. If liquid has been spilled, or objects have fallen into the monitor.
    c. If the monitor has been exposed to rain or water.
    d. If the monitor does not operate normally by following the operating instructions. Adjust only those controls that are covered by the operating instructions as an improper adjustment or other controls may result in damage and will often require extensive work by a qualified technician to restore the monitor to is normal operation.
    e. If the monitor has been dropped or the cabinet has been damaged.
    f. When the monitor exhibits a distinct change in performance.

17. Replacement Parts

When replacement parts are required, be sure the service technician has used replacement parts specified by the manufacturer or have the same characteristics as the original parts. Unauthorized substitutions may result in fire, electric shock or other hazards.

18. Safety Check

Upon completion of any service or repairs to this monitor, ask the service technician to perform safety checks to determine that the monitor is in proper operating condition.

TABLE OF CONTENTS

INTRODUCTION

This color video LCD monitor features versatile functions and produces crisp and high quality video images for any discreet installation purpose. For industrial applications, this monitor accepts a standard NTSC or PAL color input signals and loop-through connectors. All of the controls are located on the front panel for easy access. Furthermore, a regulated power supply maintains excellent performance during fluctuation in line voltage. This monitor is suitable for specialized and industrial CCTV surveillance applications where clear, high quality pictures and proven system reliability are required.

Main Features:

- Wide auto-scanning compatibility range.
- Internal Microprocessor for digitally controlled auto scan. In each frequency mode, the horizontal scan frequencies between 31.5 KHz to 60.2KHz and the vertical scan frequencies between 56.3Hz to 75Hz. The microprocessor-based circuitry allows the monitor to function at the precision of a fixed frequency.
- The resident memory allows user to adjust the parameters of the default settings according to user's demand.
- Compact and sleek cabinet design to save work space.
- VESA-DPMS compliant power management and VESA standard mount compatibility.

CONTENT VERIFICATION

1. Video Cable with 15-pin D-Sub connector.
2. Power Cable.
3. 48-Watt Adapter.
4. Audio Cable.
5. User Manual.

I. FRONT BUTTON LAYOUT

1   2   3 4   5   6
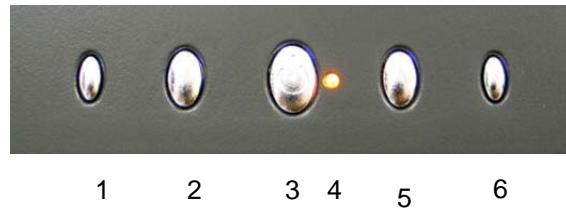
1. Menu Button
Pressing this button displays the On Screen Display (OSD) interface.

2. Up Button
Move up to the desired submenu or adjust the values of selected submenu.

3. Power Button
Press this button to power on or off the monitor.

4. Select Button
Execute a selected function or feature in the OSD menu.

5. Power Indicator
Green light indicates the monitor power on, amber light indicates the monitor is in power save mode.

6. Down Button
Move down to the desired submenu or adjust the values of selected submenu.

*The Left or Right buttons can be used to adjust the volume when the OSD is not displayed.

II. INPUT/OUTPUT PORTS
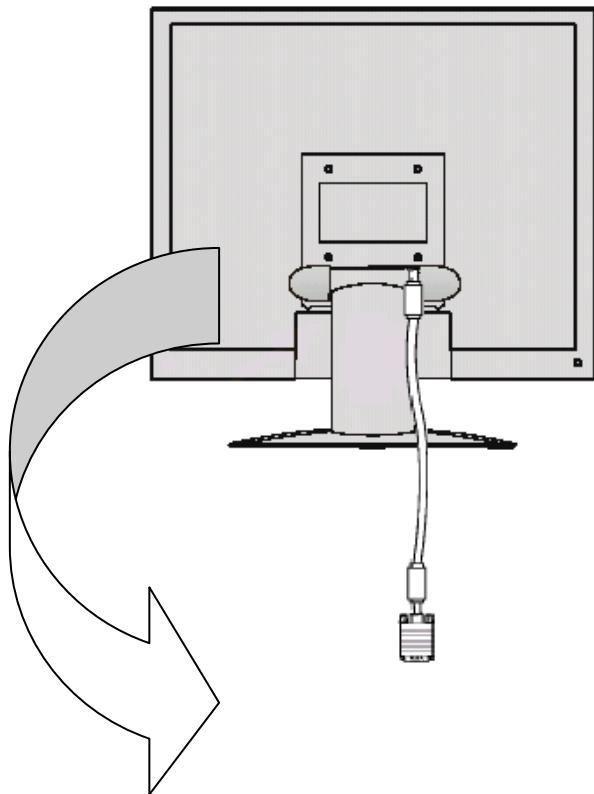
Earphone Jack   PC Audio In   L - Audio - R   S-Video Looping Video DC 12V   Signal Cable
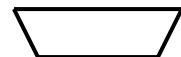
III. INSTALLATION

1. Turn off the power switch of the PC and disconnect the power cord from the main supply.
2. Connect the Signal Cable to the output port on PC. Tighten the thumbscrews for good grounding.
3. Connect the DC 12V output jack on the adapter to the 12V DC input socket on the LCD monitor.
4. Check all the connections one by one, then connect the power cord to the main supply and turn on the PC's power switch.
5. Press the LCD monitors power switch.
6. Turn on the PC system for image adjustment.

IV. PROGRAMMING THE MONITOR

There are five separate submenus in the On Screen Display (OSD).

1.   Color: Adjust the color tones of the image.

2.   Picture: Adjust the horizontal and vertical position and size of the video.

3.   Function: Automatically adjust various parameters for optimum adjustment.

4.   On Screen Display: Adjust various OSD options.

5.   Misc: Adjust other monitor related features such as video source, mode selection and volume.

1. COLOR

a. ◐   Contrast

Adjust the contrast to your preference.

☼   Brightness

Adjust the brightness for the best background picture.

c. ∟⁄   Gamma Correction

Select between 0 ~ 3 to choose the appropriate gamma correction level.

d. ⌣   Color Adjustment

Use the directional buttons to select from the following three options:

- 6500K
- 9300K
- Color Adj

Custom color adjustment is available if "Color Adj" is selected:

☼ Red   ☼ Green   ☼ Blue

2. PICTURE

a.   Horizontal Position

Shift the position of the image on screen horizontally.

b.   Vertical Position

Shift the position of the image on screen vertically.

c.   Sharpness

Select the sharpness level of the picture on screen. 1 is the lowest setting (dull) and 5 is the highest setting (sharp).

d.   Phase

Shift the phase value of the image. Phase is usually used to correct the focus of text or lines.

e.   Clock

Shift the clock value of the image. Clock is also used to correct the focus of text or lines.

3. FUNCTION

a.　　　☐　　Auto Adjust

Automatically adjust the screen image.

b.　　　⬓　　Auto Position

Automatically adjust the image position.

c.　　　⑂　　Auto Phase

Automatically adjust the phase of the image.

d.　　　▥　　Auto Clock

Automatically adjust the clock of the image.

e.　　　🎨　　Auto Color

Automatically adjust the color of the image.

4. OSD MENU

a.   ◐   Language

Select from six available languages, English, German (Deutsch), Spanish (Espanol), Chinese Standard, Chinese Simplified and Japanese.

b.   ◻   OSD Horizontal Position

Adjust the horizontal position of the OSD.

c.   ◻   OSD Vertical Position

Adjust the vertical position of the OSD.

d.   ⌛   OSD Timer

Adjust the duration of the OSD display time.

e.   AA   Transparency

Adjust the transparency level of the OSD menu.

5. MISCELLANEOUS

a. ⬚⁒   Signal Source

There are three video sources to select from:

- D-Sub: Select to display video through the 15-pin D-sub (VGA) connector.
- CVBS: Select to display video through composite (BNC) connector.
- S-Video: Select this item to display through S-Video connector.

1☑
2☐   Mode Select

Select the desired display mode.

b. ⓘ   Reset

Reverts to the factory default settings. Use the directional buttons to select between "YES" and "NO".

c. ◁◀   Volume

Adjust the volume of the audio.

V. TIMING MODE

* Preset

Mode	Resolution	V. freq.	Band Width (MHz)	Polarity		Mode	Resolution	V. Freq.	Band width (MHz)	Polarity	
				H	V					H	V
1	VESA 640 x 350	70	25.175	+	-	11	VESA 800 x 600	75	49.000	+	+
2	**VESA 640 x 400**	70	25.175	-	+	12	VESA 1024 x 768	60	65.000	-	-
3	VESA 640 x 480	60	25.175	-	-	13	VESA 1024 x 768	70	75.000	-	-
4	VESA 640 x 480	72	31.500	-	-	14	VESA 1024 x 768	75	78.750	+	+
5	VESA 640 x 480	75	31.500	-	-						
6	MAC II 640 x 480	67	30.240	-	-						
7	VESA 720 x 400	70	28.322	-	+						
8	VESA 800 x 600	56	36.000	+	+						
9	VESA 800 x 600	60	40.000	+	+						
10	VESA 800 x 600	72	50.000	+	+						

*User Timing Mode Setup

The table above displays mostly commonly and frequently used timing modes. The monitor automatically adjusts the picture size and image centering based upon the video signal. For optimal performance, Auto Setup is recommended.

VI. POWER MANAGEMENT

The monitor is Energy Star compliant, and has four different power modes

State	Hor. Sync	Vert. Sync	Power Consumption	LED Light
ON	ON	ON	< 36 Watts	Green
Standby	OFF	ON	< 5 Watts	Amber
Suspend	ON	OFF	< 5 Watts	Amber
OFF	OFF	OFF	< 3 Watts	Off

*DDC (Display Data Channel):
The monitor is compatible with DDC Plug and Play protocol if your PC is DDC compatible. The monitor supports DDC1 and DDC2B standards.

VII. SPECIFICATIONS

Display Features	Size	14" TFT LCD
	Power Input	AC 90 ~ 264 V, 50~60 Hz.
	Display Area	285 mm x 214 mm.
	Contrast Ratio	300 : 1
	Viewing Angle	**Hori: - 80 ~ + 85 ; Vert: - 65 ~ +55(Optional.)**
Operation Features	Resolution	1,024x 768 75Hz (Max)
	Brightness	160 cd/m2
	Response Time	Tr: 8 ms ; Tf: 15 ms.
	Interface	Analog RGB, C-Video ,S-Video
	Connectors	R/L Audio, Earphone Jack, Looping Video, S-Video
User's Control	Front Panel Controls	Power on/off, Menu, Select, Up/Down, Auto.
Physical Specification	Dimension	360mm x 360mm x 150mm
	Net Weight	2.4 Kg
Power	Power Saving	VESA DMPS Standard.
	Power Consumption	Less than 24 Watts.

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