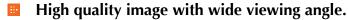


HARDWARE SOLUTIONS FOR SOFTWARE COMPANIES

MTV-1000 TUFFVIEW 26cm (10.4") LCD

Rugged Monitor



■ -20°C to +60°C operating temperature range.

Sunlight readable screen and touch-screen.

Real backlight control, to overcome night blindness.

7V to 36V input voltage, with transient protection.

Designed for continuous vibration environments.

IP-65 sealed against dust and water.

Standard VESA mount.

Specifications

Display Characteristics

Viewable area: 10.4-inch (diagonal). 4:3 aspect ratio.

210.4mm wide x 157.8mm high.

Native resolution: $1,024 \times 768$.

Dot pitch: 0.2025mm x 0.2025mm.

Contrast ratio: 1,200:1 typ. 900:1 min. **Colours:** 24-bit (16.7 million).

Response time: Ton: 30ms typ. Toff: 10ms typ.

Brightness: 500 nits typ.

Viewing angle: Horizontal: 176° typ, 160° min.

Vertical: 176° typ, 160° min.

LCD Controller

Video input interface: VGA: Analog RGB, 0.7Vp-p.

Input resolutions: 640x480, 800x600, 1,024x768 and

1,280x1,024.

The LCD monitor automatically scales the input

signal.

Vertical frequency: 60Hz, 70Hz. 60Hz is recommended for most

applications.

Configuration: On-Screen Display (OSD). Includes Contrast

Ratio, Brightness, H-position, V-position, Clock

Phase and Colour Balance.

User Interface

Monitor controls: Front panel buttons are: Power On/Off, Backlight

Brightness Adjustment Up and Down, OSD

Menu.

OSD: (On Screen Display) menu controls OSD menu

control buttons are: Menu/Select, Left and Right.

Audio

Speaker: Front panel mounted speaker, with internal

fixed-gain amplifier. The speaker is intended for connection to a PC, for operator feedback and warning tones. This is a high quality speaker,

not a low-cost piezo.

Microphone: Optional front panel mounted microphone, with

internal pre-amplifier. The microphone is intended for connection to a PC, for audio

recording or use in emergencies.

Specifications cont'd

Touch Screen

Glass thickness: 1.85mm.

Operation force: <50g with a stylus of 0.8mm radius.
Linearity: <= 1.5% for both X-axis and Y-axis.

No damage with a 9g steel ball dropp

No damage with a 9g steel ball dropped into the centre of the panel, from a height of 30cm. Static load: 5kg load over a

10mm area for 10 seconds.

Hardness: >=3H. 3H pencil pressure, 1n @ 45°.

Touch Screen Controller

Resolution: 2,048 x 2,048.

Report rate: Maximum 160 points/second (RS232).

Resolution: $2,048 \times 2,048$.

Response time: 20ms.

Data rate: 9,600 bps 8N1.

Interface: RS232 (EIA/TIA-232-F) or USB.

Both interfaces are transient protected.

Touch Screen Driver

Calibration: 4, 9 or 25 point.

Mouse emulation: Right and left button emulation.Sound notification: Beep on touch down, up. Or none.

Physical Characteristics

Dimensions: 264mm W x 225mm H x 49mm D.

Weight: 1.5 Kg typical.

Temperature: Operating: -20°C to $+60^{\circ}\text{C}$.

Storage: -40° C to $+80^{\circ}$ C.

Humidity: 10% to 90% RH, non condensing.

Certification: C-tick, FCC, CE.

Power

Input voltage: 7V DC to 36V DC.

Power consumption: 13W typ with full brightness.

Digital input: Controls power on off. This signal does

not place the product into a low power state, it turns the main voltage regulator off, resulting in uA power consumption.

Transient protection: Load dump and other transients specified

in ISO-7367.

