











Contrast 800:1

11-bit display



**2048** 







# Flat Display Systems for Medical Imaging

TOTOKU's ME511L combines ultra-high resolution, contrast ratio and brightness in a new 5 megapixel monochrome LCD.



# Flat Display Systems for Medical Imaging $\,ME511L\,$



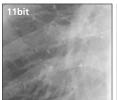


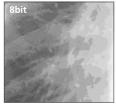
#### 5mega pixel, super high-resolution, monochrome LCD

A large (213") super high-resolution monochrome LCD panel provides fine images of 2560 x 2048 pixels. Clear images with high luminance and contrast (maximum luminance: 750 cd/m<sup>2</sup>, contrast: 800:1) are displayed.

#### 11 bit displayable grayscale

Up to 2048 (11-bit) shades of gray are displayable from a palette of 3826 (11.9 bits) using a proprietary driving algorithm. This permits a more accurate image to be diplayed for critical diagnostic work.

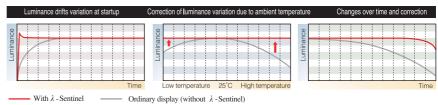




# $\lambda$ -Sentinel

## **Built-in luminance stabilizing circuit**

The  $\lambda$  -Sentinel brings the backlight to the preset (calibrated) luminance within seconds and keeps it there with a multisensor, feedback control circuit, thereby maintaining calibration through backlight aging and temperature variations.



# Hardware pivot function

ME511L comes standard with a hardware pivot function. When used in conjunction with a TOTOKU graphics card, high speed operation is achieved in either landscape or portrait orientation.



Graphics card

## Color/monochrome conversion function

Because of the color/monochrome conversion function, clear monochrome images can be displayed on a system that handles color video signals. A multi-monitor is possible by using color displays.

# Gamma data is stored in the display

Gamma curve data is stored within the display during calibration. This enables smooth grayscale display that is independent of the graphics card. The display is compatible with DICOM Part 14 standard\*1 and other gamma curves.

\*1 DICOM Part14: Standards for grayscale standard display function on digital images and communications for medical purposes

# Calibration kit (optional)

Included software (Medivisor Grayscale) and the calibration kit (luminance sensor and fittings) can correct luminance and gamma.



## Structure

- Sturdy base allows for height and tilting adjustment.
- VESA mounting points for arm or wall mount capabilities. (The attaching part meets the VESA standard \*2
- Optional AR protective filter "MF003" protects the liquid crystal panel from damage due to minor impact.
- Slim bezel for optimum viewing of multi-display installations.





### Compliancy with standards

■ The display is certified to UL, CSA, and TÜV medical standards.



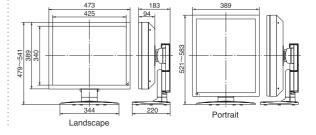




### Clear or blue base liquid crystal panel

Clear and blue base liquid crystal panels are available to emulate preferred film base.

Model name	ME511L/C (clear base), ME511L/B (blue base)
LCD panel	21.3" TFT monochrome LCD
	Viewing angle 170° (vertically and horizontally)
	Contrast 800:1
Screen display size	Horizontal: 422.4mm, vertical: 337.9mm (when used width wise)
Input signal	Digital: In conformity with DVI Rev 1.0 Connector: DVI-D
Resolution	640 x 480 (VGA), 2560 x 2048 (QSXGA)
Grayscale display	3826-step gradation to 256 gradation display When linked with Viewer, simultaneous display of 11bit(2048) grayscale is possible
Maximum luminance (typical)	750 cd/m² (410 cd/m² when using calibration)
Safety standards	Medical Safety: UL2601-1, CSA C22.2 No.601.1, MDD/CE, TŪV/GM, FDA510(K EMC: FCC-A, VCCI-A, BSMI, MIC
Dimensions (including the tilting base)	Landscape: 473(W) x 479-541(H) x 220(D)mm Portrait: 389(W) x 521-583(H) x 220(D)mm
Weight	Appr. 12.4 kg
Input power supply	AC100 - 240 V 50/60 Hz
Power consumption	80 W Typical (with power management feature)
Calibration control	Luminance, gamma (optional)
Tilting base	Tilting/swiveling base with a vertically/horizontally rotating feature
Other features	DDC2B, RS232C, USB hub
Accessories	AC adapter, power cord, operation manual, DVI cable, serial cable, CD-ROM (Medivisor Grayscale)







TOTOKU has obtained ISO14001 and ISO9001 certification which are international standards concerning environment management and quality control respectively.



# Safety precautions

To ensure safe use of the products, read the Operation Manual / Safety before using them.

Do not install the products in areas where they may be affected by water, dust, humidity, or oily smoke. Storing the products in such conditions could cause a fire, equipment failure or electrical shock.

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Please contact the distributor below with inquiries and orders

<sup>\*2</sup> VESA: Abbreviation of Video Electronics Standards Association. The association determines standardsconcerning displays