

**High Performance High Fidelity High Reliability** 

# The Display Engineers



### **Product Description**

The simulated CH-46 HHSI (AMLCD) is a highperformance 4.00-inch x 4.00-inch color active matrix liquid crystal display in a 5ATI package for avionics simulation applications. RS170-type video interface can be sync-on-green or separate/composite video sync. This display features:

- § Complete remote adjustment, calibration and diagnostics using a standard PC.
- § High-brightness, wide dimming range backlight creating a display capable of being viewed from direct sunlight down to NVG requirements.
- § Same functional controls and form-factor as the flight display.
- § Built for durability and low life-span cost in simulator applications only, including full motion platforms. Cannot be used in aircraft.

# **Simulated** CH-46 HHSI **Horizontal Hover Situation Indicator**



CH-46E Sea Knight



**HHSI Rear View** 

Precision Display Technologies § 4635 Longley Lane, Building 109, Reno, NV 89502 Phone (775) 825-4488 § Fax (775) 825-4489 § www.pdt-usa.com § CAGE Code 1KMZ5



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## **Simulated CH-46 HHSI Horizontal Hover Situation Indicator**

#### **Performance Specifications**

Resolution: Total lines per frame: 537 Total pixels per line: 640 Active lines per frame: 480

Active pixels per line: 640 (480 vis)

Frames per second: 60 Fields per frame:

20.6208 MHz, 48.4947 nsec Pixel clock:

Line -

Length: els, 31.0366 msec 32.22 KHz, 31.0366 msec Frequency: Horizontal Sync: 64 pix els, 3.10366 msec Horizontal Back porch: 56 pix els, 2.7157 msec Horizontal Active: 512 pix els, 24.8293 msec Horizontal Front porch: 7.99999 pix els, 387.957 nsec

Field

343680 pix els, 537 lines, **Duration**: 16.6667 msec

Vertical Sync: 1920 pix els, 3 lines, 93.1099 msec

Vertical Sync Pulse: 1984 pix 96.2135 msec

Vertical Back Porch: 121160 pix

589.696 msec

Vertical Active: 327680 pix els, 512 lines, 15.8908 msec

Vertical Front porch: 1920 pix els, 3 lines, 93.1099 msec

### **Operating Specifications**

Power Requirement: 85-264 V AC, 50 watts maximum

consumption, 50 w (Depending on Brightness Setting)

Temperature: ° to 40° C operating, -20° to 70°

C non-oper ating

Altitude: 0 to 10,000 ft oper ating, 0 to 40,000 ft non-oper ating Relative Humidity: up to 90% (non-condensing)

ating, up to 95% (non-condensing) non-oper

#### **Mechanical Specifications**

Enclosure Height: 5.70" Enclosure Width: 5.70" Enclosure Depth: 10"

Enclosure Material: Black anodiz ed aluminum orced air, intake fan, rear vents Cooling:

Video - R, G, B (75 Ohm) I/O:

ontal/Vertical Sync - (HDD 15 Horiz

VGA connector)

Dim Control I/O: 9-pin Male DB9 Bezel Control I/O: 37-pin Male DB37

#### **Remote Adjustments**

- Luminance limits

#### Warranty

These units are offered with the standard Precision Display Technologies (PDT) warranty of one (1) year on parts and labor for design and/or manufacturing defects in PDT supplied components only (original manufacturers' warranties apply to all CRTs, HUD optics, AMLCDs and bezels). Warranty specifically does not include customer-induced failures or damage caused by shippers.



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