

SGX-1920

High Definition LCD Controller Board

Key Features :

- > 10-Bit, 1920 x 1200
- > Dual Digital inputs
- > RS-232 Ethernet Command Control
- > Picture in Picture

The SGX-1920 is a fully buffered multi-sync interface controller for providing analog and digital connection for a wide range of TFT LCD panels up to WUXGA resolution. It is a true 10-bit board that gives 10-bit color deep on a 10-bit panel. The board supports two digital video input and featuring full screen image expansion, on screen PIP, image marker and supports an option 3G HD-SDI converter board (HD-3000/HD-3000S) through digital input port for professional and broadcast video applications.

Panel Connectivity

1920 x 1200	1366 x 768	800 x 600
1920 x 1080	1280 x 1024	800 x 480
1680 x 1050	1280 x 800	640 x 480
1600 x 1200	1280 x 768	
1440 x 900	1024 x 768	

Input

Analog RGB:	60Hz at WUXGA, UXGA 75Hz at SXGA, WXGA, XGA, SVGA, VGA With auto detect of Digital Separate Sync, Sync-On-Green & Composite Sync. Auto detects VGA-WUXGA, interlaced & non-interlaced
DVI-D / HDMI:	60Hz at WUXGA, UXGA 75Hz at SXGA, WXGA, XGA, SVGA, VGA 480p, 576p, 720p, 1080i, 1080p
Video:	NTSC /PAL/SECAM (Interlaced) Composite Video, S-video HD/SD Component (YPbPr / CbCr)

Reliability

Calculated Mean Time Between Failures In excess of 100,000 hours.
Warranty: 3 years.

Custom Engineering Services

Custom input timing, panel timing, splash screen, OSD Menu, conformal coatings, layouts etc

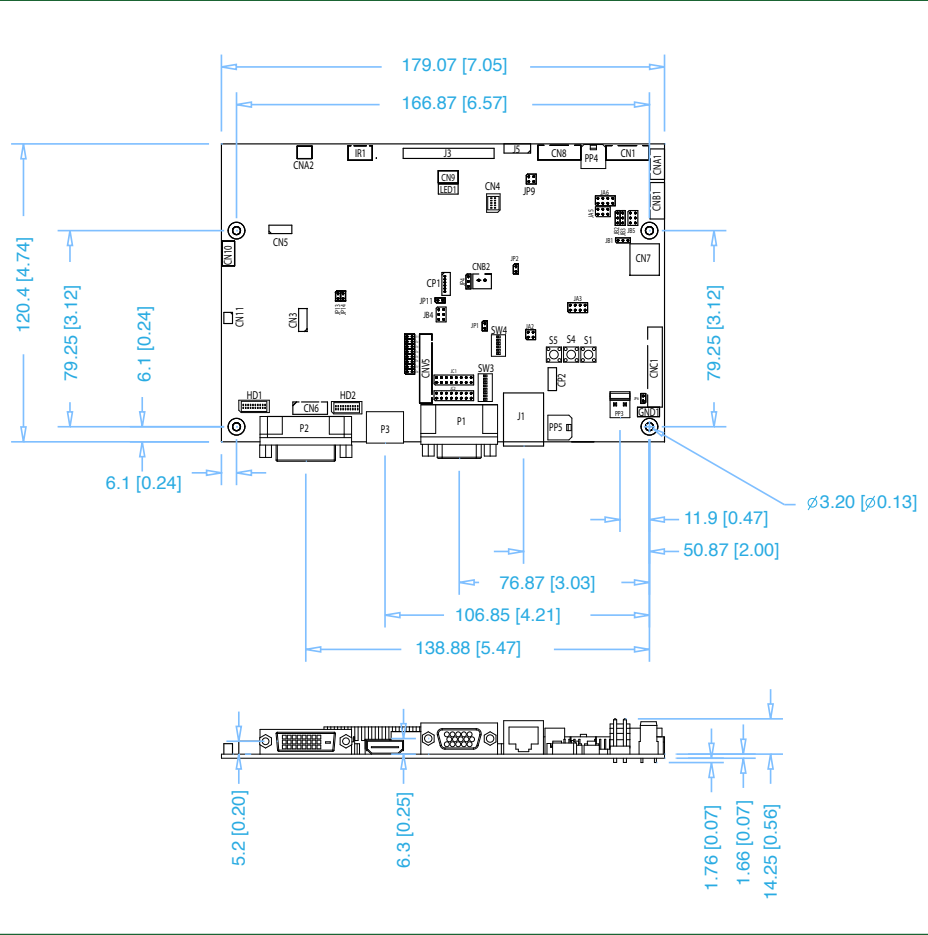
Features

Colors:	Up to 10 bit per color, ie 1.06 Billion colors.
Functions :	On Screen Display (OSD) menu.
Function Controls:	External buttons, Infra-Red controls, Serial Port control, Ethernet Control
Image Scaling :	Up / Down scaling to fit input to panel format.
Image Control :	Auto configuration, Brightness, Contrast, Clock, Phase, Color temperature, Image position, Saturation, Hue, Gamma.
Other Features :	System Information, OSD position, Scaling to fill screen and fill to aspect ratio, OSD timeout, Factory reset, OSD menu transparency, Picture in Picture - variable position with 18 sizes selection and Picture by Picture, Programmable hot keys, Ambient light sensor, Display real time clock.
Power :	+12VDC / +24VDC ±5%,10W
Panel Power :	Supports 3.3V, 5V, 12V & 18V panels.
Panel Signal :	Dual channel LVDS support.
Inverter Support :	DPMS Enable pin (3.3V or 5V)
Plug & Play :	DDC 1,2/b compatible
Status Indicator :	Dual Color LED support.

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Mechanical Drawing



Connector Definitions

CN1	Second RS-232 serial control
CN3	Reserved for factory use
CN4	Panel control signal connector
CN5	Reserved for factory use
CN6	No function
CN7	Audio board connector
CN8	RS-232 serial control
CN9	Ambient light sensor connector
CN10	HDMI audio (Stereo) output
CN11	SPDIF Audio output
CP1	Reserved for factory use
CP2	Reserved for factory use
CNA1	Auxiliary power output
CNA2	Auxiliary +5VDC output
CNB1	Backlight inverter
CNB2	Backlight status input connector
CNC1	OSD controls
CNV5	Auxiliary video input
HD1	Auxiliary digital input connector – HD1
HD2	Auxiliary digital input connector – HD2
J1	Ethernet for network connection
J3	Panel signal for LVDS panel
J5	External panel power output
IR1	Infra-Red sensor connector
LED1	Dual color LED connector
P1	VGA analog input
P2	DVI-D input
P3	HDMI input
PP2/PP3	Power input (alternative)
PP4	External panel power input
PP5	Power input

Ordering Options

SGX-1920 Controller Board	P/N 4172500xx-3
OSD Digital Button Board	Kit 60110-3
OSD Vertical Membrane	Kit 60121-3
OSD Horizontal Membrane	Kit 60125-3
Inverter Interface Board	P/N 416040010-3
Audio Amplifier	P/N 416940020-3
IR Remote Control	P/N 559000106-3

HD-SDI Adaptors :

Single Channel (HD-1000)	P/N 4160134xx-3
Dual Channel (HD-2000)	P/N 4160133xx-3

3G HD-SDI Adaptors :

Single Channel (HD-3000S)	P/N 4160164xx-3
Dual Channel (HD-3000)	P/N 4160160xx-3

3D Drawings (SLDPRT)

Save time and effort for your system volumetric analysis design. Includes jpg file previews.

Please download at www.digitalview.com/products/sgx-1920-lcd-controller

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