

# AZ DISPLAYS, INC.

*COMPLETE LCD SOLUTIONS*

## TFT Driver Board

### PRODUCT SPECIFICATIONS

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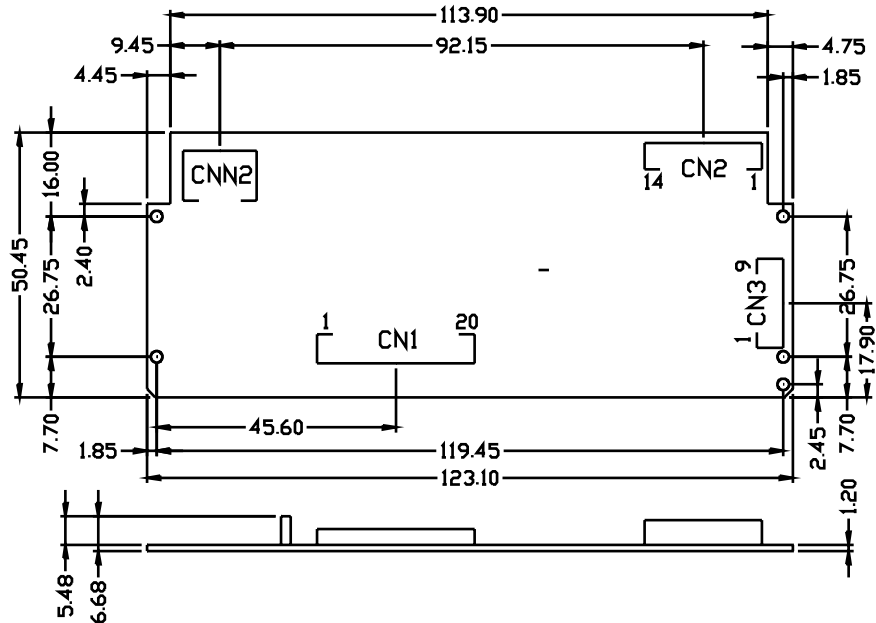
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# AZ DISPLAYS, INC. TFT Driver Board

## FEATURES

Interfaces to TFT LCD Panel: ATM3224C  
Video input compatible with NTSC & PAL systems

## MECHANICAL SPECIFICATIONS AND DRAWING



## VIDEO INPUT SIGNAL

Composite video signal 1.0V p-p 75 ohm

## ELECTRICAL CHARACTERISTICS

Parameter	Symbol	Min.	Typ.	Max.	Unit
Voltage	Vcc	+11.5	+12.0	+12.5	V

## POWER CONSUMPTION

Parameter	Condition	Min.	Typ.	Max.	Unit
Current for V cc	Vcc = +12V	400	450	480	mA

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## INPUT / OUTPUT TERMINALS

### CN1 – Connection to the TFT LCD module ATM3224C

(Details refer to ATM3224C specification)

Pin No	Symbol	I/O	Description
1	/HSY	I/O	Horizontal sync input / output
2	FRP	O	Video polarity alternating signal
3	CSY / HSY	I	Composite sync signal
4	V <sub>GH</sub>	I	Supply voltage for gate driver (Hi level)
5	V <sub>GL</sub>	I	Supply voltage for gate driver (Low level)
6	V <sub>B</sub>	I	Video signal (Blue)
7	V <sub>R</sub>	I	Video signal (Red)
8	V <sub>G</sub>	I	Video signal (Green)
9	GND	I	Ground
10	VDD	I	Supply voltage for controller
11	VCC	I	Supply voltage for source driver
12	GND	I	Ground
13	CKC	I	Control pin for select I/O signal
14	/VSY	I/O	Vertical sync input/output
15	PSI	O	Synchronize pulse for decoder
16	PSC	O	Synchronize pulse for DC-DC converter
17	NC	I	No connection / Vertical sync signal
18	UD	I	Up / Down control
19	RL	I	Right / Left shift control
20	NP	I/O	NTSC / PAL selection signal (Low : PAL, High : NTSC)

### CN2

Pin No	Symbol	Pin No	Symbol
1	Vcc (+12V)	8	Contrast adj
2	GND	9	Color adj
3	GND	10	TINT adj
4	AGND	11	N/P
5	Video in	12	L/R
6	Vcc OUT	13	U/D
7	Brightness adj	14	GND

### CN3

Pin No	Symbol	Pin No	Symbol
1	R_IN	6	SYNC OUT
2	G_IN	7	/HSYNC OUT
3	B_IN	8	/VSYNC OUT
4	SW	9	GND
5	SYNCIN		

### CNN2 – Connection for backlight driving

(For Details refer to ATM3224C specification)

Pin No	Symbol	Description	Remark
1	VL1	Input terminal (Hi voltage side)	Wire color : pink
3	VL2	Input terminal (Lo voltage side)	Wire color : white

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## APPLICATION SCHEMATIC DIAGRAM

Connection for CN2

