

# 7244-05-56 MultiSource Laser Controller



- 5A / 56V output
- 2U Rackmountable
- Ethernet and USB
- 4 independent channels

## Overview

The 7244-05-56 Laser MultiSource is an excellent multi-channel solution for driving strings of laser diodes. Each of the four output channels provides a fully independent, isolated output with individual analog modulation control.

## Standard Computer Interfaces

The MultiSource includes both Ethernet and USB computer interfaces, allowing for quick and easy connection to a PC for remote operation. In addition, the command set is compatible with other Arroyo Instruments controllers, as well as those from ILX and Newport, allowing you to leverage any existing software you may have already developed.

## Simple Local Control

While intended to be primarily operated from a PC, the display on the MultiSource allows you to locally monitor status and turn channels on and off.

## Specifications

Number of Channels	4
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### Per Channel Specifications

<b>LASER CURRENT</b>	
Range (mA)	0 – 5,000
Resolution (mA)	0.1
Accuracy ( $\pm$ [% set+mA])	0.05% + 1.25
Stability (ppm, time)	< 10, 1 hour
Temperature Coeff (ppm/°C)	50
Noise/Ripple (mA rms)	< 5
Transients (mA)	20
Compliance Voltage (V)	56
<b>PHOTODIODE CURRENT</b>	
Range ( $\mu$ A)	25 – 20000
Resolution ( $\mu$ A)	1
Accuracy ( $\pm$ [% set+ $\mu$ A])	0.05% + 2
Stability (ppm, time)	< 200, 24 hours
Temperature Coeff (ppm/°C)	< 200
PD Bias (V)	-3V, Fixed
<b>LASER VOLTAGE</b>	
Range (V)	0 – 56
Resolution (V)	0.001
Accuracy ( $\pm$ [% set+V])	0.05% + 0.005
<b>EXTERNAL MODULATION</b>	
Input Range (V)	0 - 10
Modulation Bandwidth (kHz)	18
<b>LIMITS/SAFETY</b>	
Current Limit Accuracy ( $\pm$ % FS)	1
Voltage Limit Accuracy ( $\pm$ % FS)	2.5%
Safety Features	Safety interlocks, adjustable hardware voltage & current limits, output shorting relays, slow turn on / off circuits.

### GENERAL

Display Type	2x20 VFD
Laser Connector	4 x 13W3, female
Computer Interface	USB 2.0 Full Speed (Type B), Ethernet (RJ45)
Input Power	90-250V, 50 / 60Hz
Size (H x W x D) [inches (mm)]	3.50 (89) x 19 (483) x 14.76 (375)
Weight (lbs [kg])	16.2 [7.4]
Operating Temperature	+10°C to +40°C
Storage Temperature	-20°C to +60°C