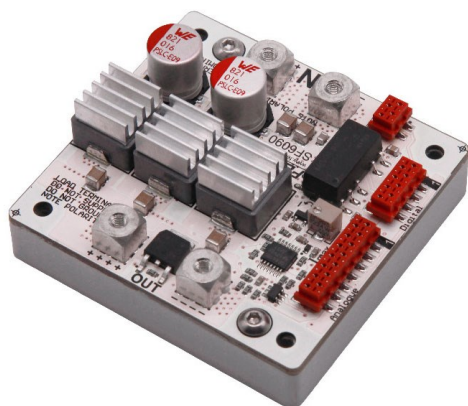


Laser Diode Driver (CW)



www.maimanelectronics.com

Overview

SF6XXX is the series of high power, compact OEM constant current laser diode drivers. Unique laser driver circuit solutions allows to achieve high efficiency (up to 97%) and high power density. Aluminum base plate provides effective remove heat from laser diode driver module with the water or air cooling. The main fields of application for high power laser drivers SF6XXX is laser marking, welding, soldering, and cutting applications, medical equipment, laser measurement equipment, spectrometers, lidar, range finders and laboratory test set-ups.

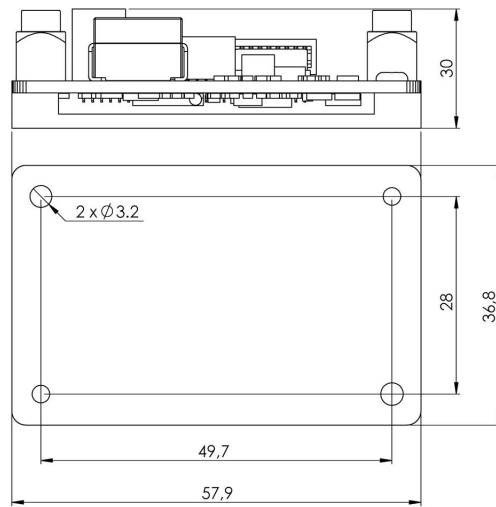
Key Features

- Very High efficiency up to 98%
- ULTRA-COMPACT (1 kW on size 60*58 mm)
- Analog Control Signal/RS-232
- Interlock
- Over-Current Protection Shutdown
- Over-Temperature Warning & Shut-Down
- Soft-Start Current Ramp to User Set-Point
- NTC thermistor input
- User Set Current Limit
- No need to adjust voltage

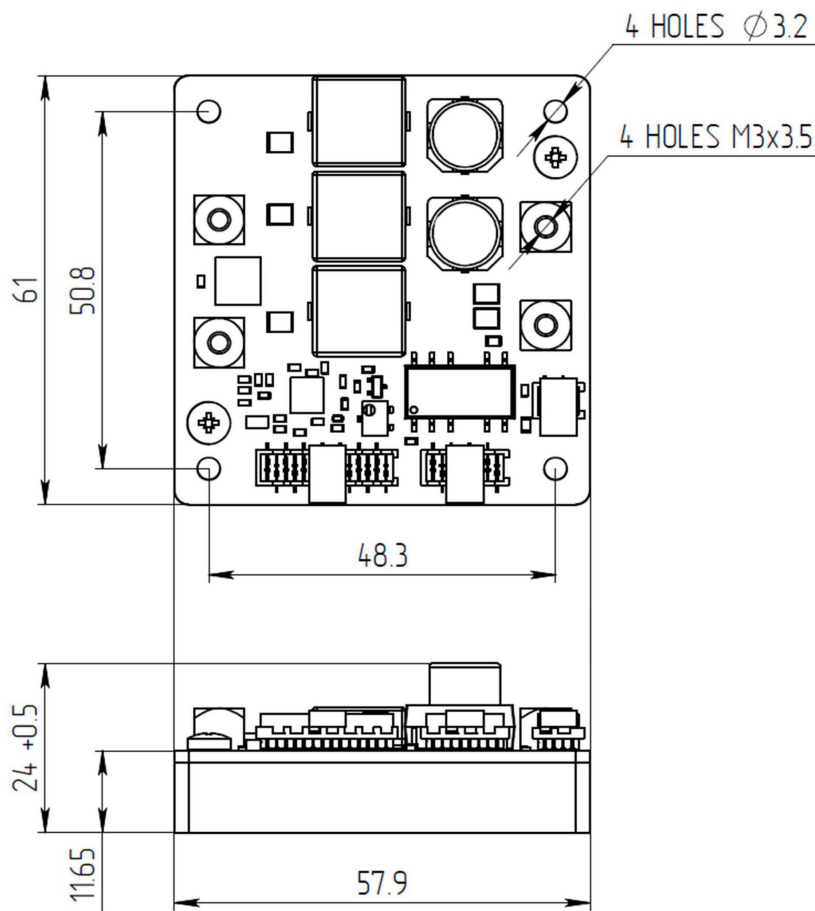
Technical Description

	SF6015	SF6030	SF6040	SF6090	SF6100	SF6250 coming soon
Operation mode	CW	CW	CW	CW	CW	CW
Output voltage (V)	1-10 V (0,8*Vin max)	1-10 V (0,8*Vin max)	5-40 V (0,73*Vin max)	1-10 V (0,8*Vin max)	5-40 V (0,73*Vin max)	1-10 V (0,8*Vin max)
Output current (I)	0-15A	0-30A	0-10A	0-100 A	0-25 A	0-250 A
Pumping current changing step	0,01 A	0,01 A	0,01 A	0,03 A	0,01 A	0,1 A
Rise Time: (50%*Iout)	min - 150µs; max - 500µs	min - 300µs; max - 700µs	min - 60µs; max - 100µs	min - 800µs; max - 1200µs	min - 140µs; max - 300µs	min - 800µs; max - 1200µs
Rise Time: (100%*Iout)	min - 140µs; max - 500µs	min - 300µs; max - 600µs	min - 60µs; max - 100µs	min - 700µs; max - 1000µs	min - 130µs; max - 250µs	min - 700µs; max - 1000µs
Fall time	min - 250µs; max - 1200µs	min - 300µs; max - 1500µs	min - 20µs; max - 80µs	min - 1000µs; max - 1800µs	min - 10µs; max - 50µs	min - 1000µs; max - 1800µs
Current stability	0,2 %	0,2 %	0,2 %	0,2 %	0,2 %	0,2 %
Current set accuracy	1%	1%	1%	1%	1%	1%
Input voltage range (Vin)	10-14V	10-14V	12-55V	10-14V	12-55V	10-14V
Control	analog; digital RS-232/UART	analog; digital RS-232/UART	analog; digital RS-232/UART	analog; digital RS-232/UART	analog; digital RS-232/UART	analog; digital RS-232/UART
Dimensions	37*58*30	37*58*30	37*58*30	61*58*30	61*58*30	61*116,8*30

Dimensions



SF6015 / SF6030 / SF6040



SF6090 / SF6100