

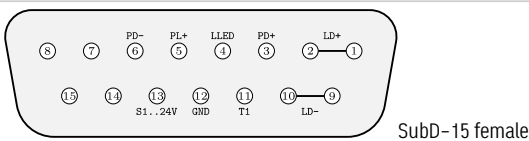
OEM Laser Controller

type: ls01-la1.5v20-o4400-v2-186



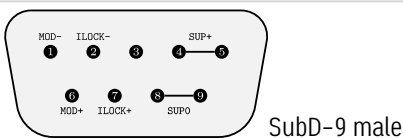
- Laser max.: 1.5A, 20V
- trise-tfall < 10us (optional < 2us)
- Supply Voltage: 24VDC
- External, Analog and Digital Modulation
- Internal Pulse Generator
- Pulses and Bursts internally and externally triggered
- Bias Current option
- Pilot Laser Supply
- External Fan Support
- optional additional TEC-stages

Laser Connector



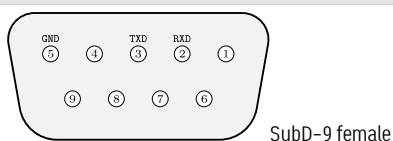
PIN.No	Abbr.	Function
1;2	LD+	Laser Diode Anode(+)
3	PD+	Photo Diode Anode (+)
4	LLED	Laser Active LED – Anode (+), 5V over 470R, v.s. GND
5	PL+	Pilot Laser (+), v.s. GND
6	PD-	Photo Diode Cathode (-)
9;10	LD-	Laser Diode Kathode (-)
11	T1	Temperature Sensor 1 Input, default NTC10kΩ, v.s. GND
12	GND	Common Ground
13	1-24V	1 to 24V Supply, max. 500mA, vs. GND, supports fan etc.

Power and Support Connector for o44 devices



PIN.No	Abbr.	Function
4;5	SUP+	Power Supply typ. +24V DC
8;9	SUP0	Power Supply typ. 0V DC
3	ILOCK+	ca. 5mA over 2V
2	ILOCK-	Laser runs only on closed Interlock
6	MOD+	Digital and Analog Modulation Input; positiv Pin
1	MOD-	Digital and Analog Modulation Input; negativ Pin

RS232 Connector

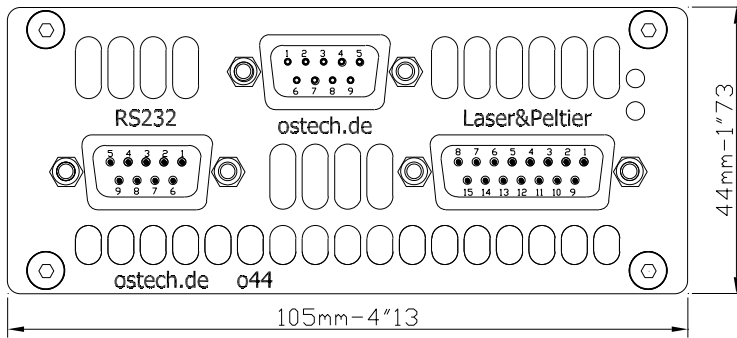


Standard RS232-Connector
(No Null-Modem Cable !)
9600-Baud-8N1

PIN.No	Abbr.
2	RXD
3	TXD
5	GND



OEM Laser Controller



Revision overview:

2017.10.10: "v0" - derived from type-501
 2012.05.28: max. Voltage increased from 6V to 8V
 2012.09.13: "v1" - Voltage increased from 8V to 14V
 2021.01.01: "v2" - Voltage increased from 14V to 20V

References:

<http://www.ostech.de/en/products/laser-drivers/ds01-o44>
<http://www.ostech.de/en/downloads/manuals/ds-en.pdf>
<http://www.ostech.de/en/downloads/labview>

Accessories

- kab-lpa08-16pol-subd15m-oe-1.5m-39
 cable 16x0.35qmm SUBD15-Gold-6,5A/Pin to open end length 1m5
- acc-converter-usb-to-rs232-1m5-iso-417
 RS232 to USB converter optical isolated with FTDI-Chip cable 1.5m
- nt-90w-24vdc-oem-82
 power-supply vout-24V-3.8A-90W for-OsTech-OEM
 subd9-plug-for-ds01-o44-devices, vin-90~230AC"