

# 1550nm Benchtop Single-Mode SLD Light

## Source 25mW



### ● Product Description

Idealphotonics' Ultra-Width series 1550nm high-stability single-mode pump source utilizes a TEC-stabilized single-mode semiconductor laser, offering wavelength stability and high output power. Based on an advanced microprocessor control system combined with high-precision ATC and ACC (APC) control circuits, it achieves highly stable laser output while ensuring quick and intuitive operation of the light source. We can also provide corresponding communication interfaces and control software based on

user requirements to enable computer control. This light source features a Turn-Key pump laser protection function to effectively prevent user errors. It supports coarse power adjustment (1mW steps) and fine power adjustment (0.1mW steps). 1550nm single-mode pump source is a highly integrated desktop system light source with a high-definition LCD display, continuously adjustable output power, and synchronous current and voltage display, making it ideal for experimental scientific research and production testing. Additionally, the company can provide modular packaging based on user needs for easy system integration.

## ● Product features

Single-mode high-power output: up to 25mW、 Spectral width up to 80nm、 ASE optical isolation protection design、 Stable and continuously adjustable output power、 LCD status display、 High-precision ACC and ATC control circuits、 Optional built-in isolator

## ● Part Number

MP-SLDS-1550-25-80-SM-B

## ● Application area

Fiber Optic Gyroscopes 、 Optical Coherence Testing 、 Test and Measurement 、 Nonlinear Effect Studies

## ● Core parameters

Center Wavelength	Spectral Width	Output Power
1550nm	80nm	25mW

## ● General Parameters

### Parameters

Parameters	Unit	Specs		
		Min.	Typ.	Max.
Output Power <sup>1</sup>	mW	3	-	35
Peak Operating Wavelength <sup>2</sup>	nm	1540	1550	1560
Spectral Width (FWHM)	nm	25	40	80
Output Side Mode Suppression Ratio (SMSR)	dB	20	-	-
Output Isolation <sup>3</sup>	dB	-	30	-
Output Power Stability (15 minutes) <sup>4</sup>	%	-	±0.5	± 1.0
Output Power Stability (8 hours) <sup>4</sup>	%	-	±1.0	±2.0
Output Power Adjustable Range	%	0	-	100
Output Power Adjustment Mode		Coarse/Fine Adjustment		
TEC Stability	°C	-	±0.1	±0.2
TEC Operating Range	°C	25	30	35
Operating Voltage	VAC	100	220	240
Electrical Power Consumption <sup>5</sup>	W	-	-	30
Operating Temperature	°C	0	-	50
Storage Temperature	°C	-40	-	85



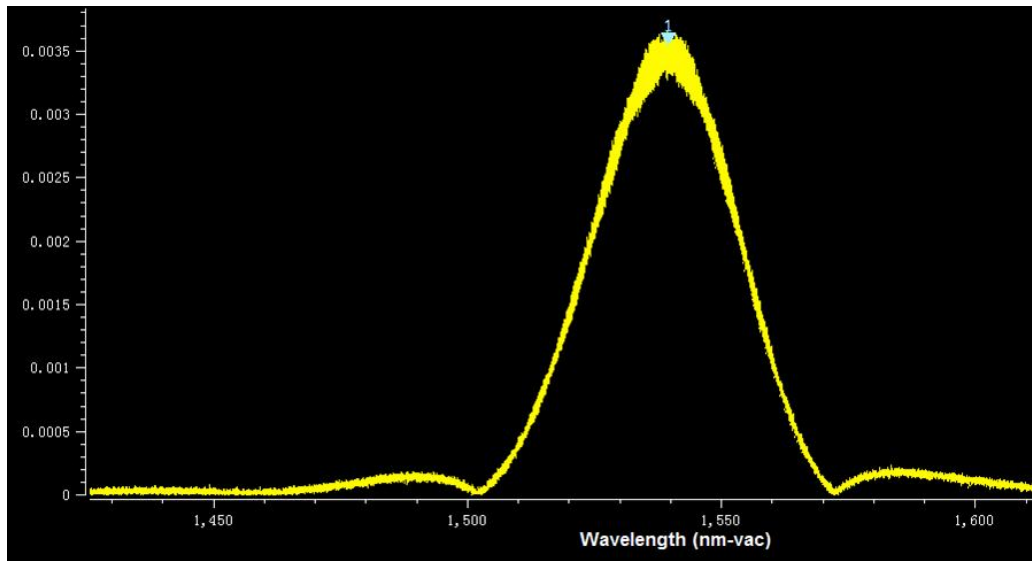
Parameters	Unit	Specs		
		Min.	Typ.	Max.
Output Fiber Type		SM/PM		
Output Fiber Length	m	>1		
Output Fiber Connector		FC/APC, other models optional		
Dimensions	mm	340(L) × 240(W) × 100(H) Benchtop		
		150(L) × 125(W) × 25(H) Module		

### Technical Specification Notes

\*Software remote control optional

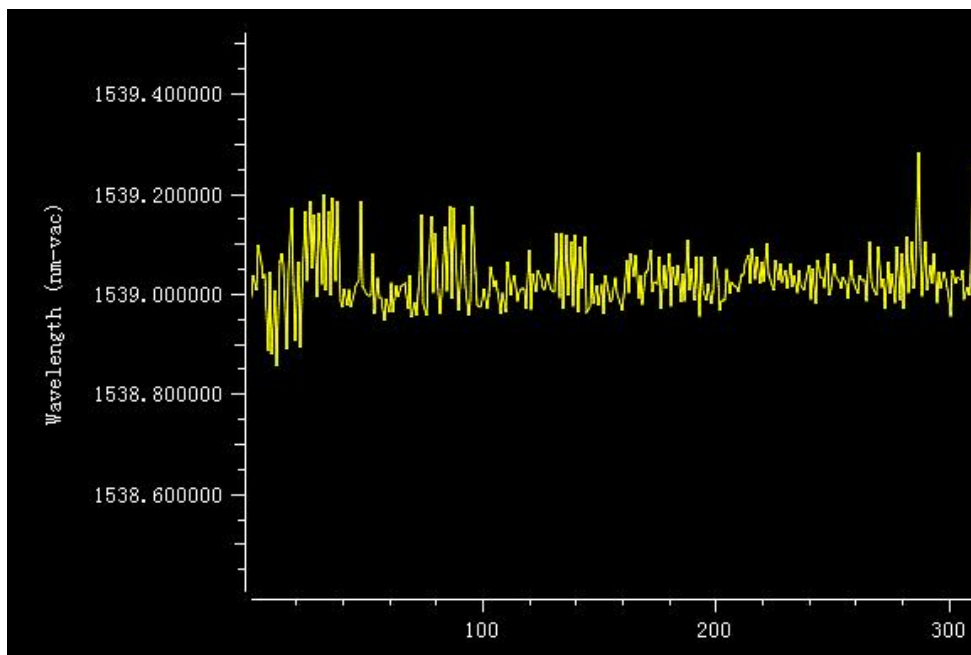
1. Output power selectable;
2. Peak operating wavelength customizable;
3. Isolation refers to the isolation against ASE light;
4. Output power stability test conditions: 25°C, tested after a 30-minute warm-up;
5. Maximum power consumption refers to the overall power consumption under extreme operating conditions.

## Spectrum Graph



Cursors				
	Position (nm-vac)	FWHM (nm-vac)	Intensity (linear)	OSNR (dB)
1	1539.43892	1539.46425	0.00e+00	-127

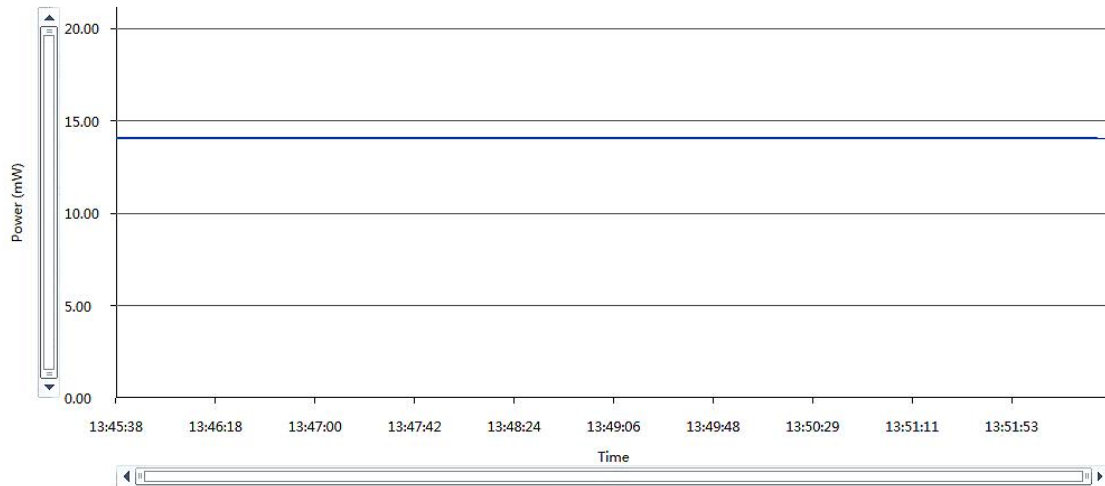
## Wavelength Stability Test



## Beam Quality



## Power Test Table



Most Recent Value	Samples	Time
14.07 mW	100000	00:06:56



## SLD light source power stability test curve



### Ordering info

**MP-SLD-1550-PG-**

**PG: Packaging Type**

**B: Benchtop**

**M: Module**

**OPP (Output Power): Output power in mW. For example: 10-10mW, 50-50mW**

**BWD: 25:25nm, 40:40nm, 50:50nm, 60:60nm, 80:80nm, 100:100nm**

**FT: Fiber Type**

**SM=SMF-28E+**

**PM=PM1550**