2000nm 10mW Mid-Infrared Benchtop FP Light Source

Product Description

Idealphotonics' Ultra-Width series 2000nm 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). 2000nm 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 20nm、 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-FPS-2000-10-15-SM-B

Application area

Fiber optic gyroscope、 Optical coherence testing、 Test and measurement、 Nonlinear effect research

Core parameters

Wavelength	Spectral Width	Output Power
2000nm	15nm	10mW

General Parameters

Driver Parameters

Parameters	Unit	Specs		
		Min.	Typ.	Max.
Output Power[1]	mW	10	-	35
Peak Operating Wavelength[2]	nm	1940	2000	2100
Spectral Width (FWHM)	nm	10	15	20
Output Side Mode Suppression Ratio (SMSR)	dB	20	-	-
Output Isolation[3]	dB	-	30	-
Output Power Stability (15 minutes)[4]	%	-	±0.5	±1.0
Output Power Stability (8 hours)[4]	%	-	±1.0	±2.0
Output Power Adjustable Range	%	0	-	100
Output Power Adjustment Mode		Coarse/Fine Adjustment		
TEC Stability	℃	-	±0.1	±0.2
TEC Operating Range	℃	25	30	35
Operating Voltage	VAC	100	220	240

Electrical Power Consumption[5]	W	-	-	30
Operating Temperature	℃	0	-	50
Storage Temperature	℃	-40	-	85
Output Fiber Type		SMF2000		
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;

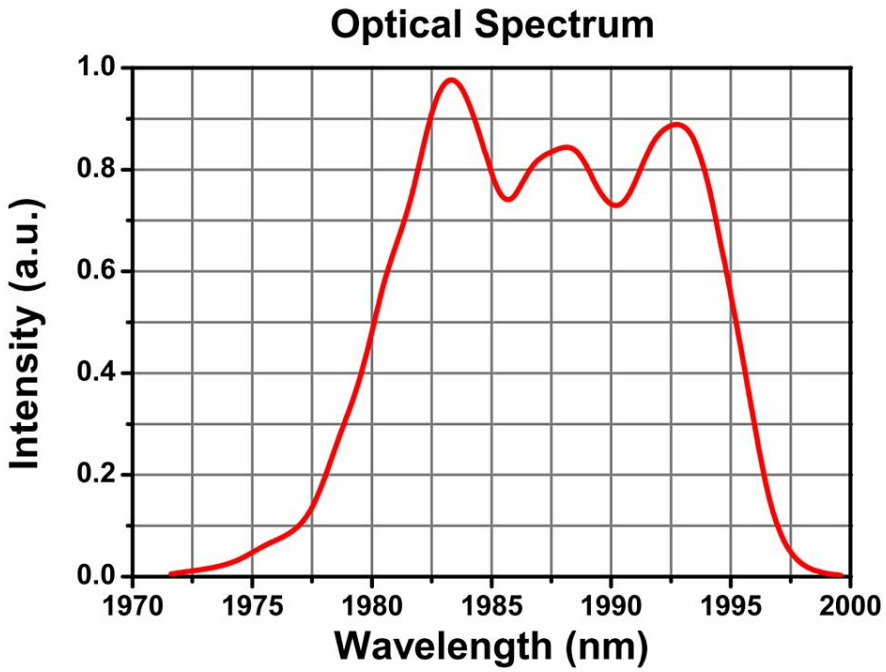
3.Isolation refers to the isolation against ASE light;

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.

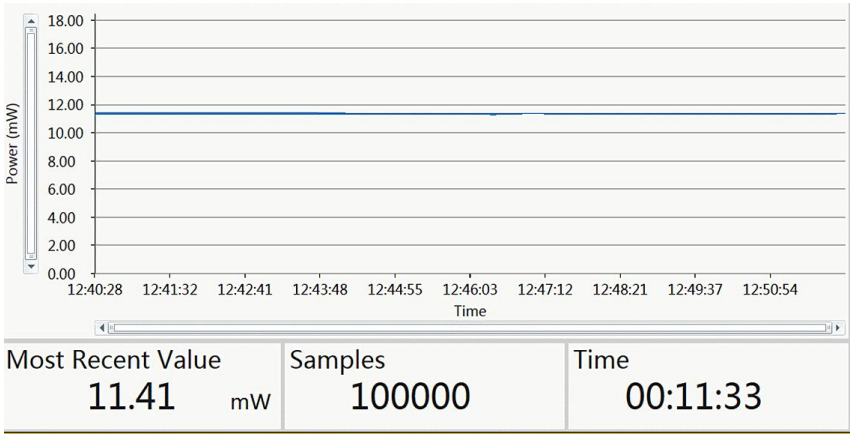
Test Spectrum Graph

Test Conditions: Test temperature: 25°C; Test current: 280mA



Beam Quality

Power Test Meter (@ 280mA) Power Stability



Order Information

MP-FP-2000-PG-OPP-BWD-FT

PG:Packaging

B：Benchtop

M：Module

OPP（Output power）：Output Power， Unit:mW

E.g.:

10-10mW

25-25mW

BWD:

10:10nm

20:20nm

FT:Fiber type

SM=SMF2000