

2000nm Mid-Infrared Benchtop ASE Light Source 30mW



● Product Description

IdealPhotonics' Ultra-Width series 2000nm ASE light source is an Amplified Spontaneous Emission (ASE) light source operating around 1900 nm, offering one-touch operation and single-mode fiber output for testing and measurement applications. It is based on thulium-doped fluoride fiber to maximize ASE, with a typical maximum optical output power of 10 mW. An integrated isolator minimizes back reflections into the light source to enhance output power stability. The nominal center wavelength of the emitted light is 1920 nm and is non-polarized. The spectral width measured 20 dB below the peak is 100 nm. 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.

● Part Number

LP-FP-2000-B-30-80-SM

● Product features

Single-mode high-power output: up to 10mW、 Spectral width up to 120nm、
 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

● Application area

Test and measurement 、 Spectroscopy 、 Gas sensing 、 Biomedical
 applications、 Other scientific research

Parameters

Driver Parameters

Parameters	Unit	Specs		
		Min.	Typ.	Max.
PN#		LP-ASE-2000-B LP-ASE-2000-M*		
Output Power	mW	10	-	35
Peak Operating Wavelength	nm	1920	2000	2100
Spectral Width (FWHM)	nm	10	15	20
Output Side Mode Suppression Ratio (SMSR)	dB	20	-	-
Output Isolation	dB	-	30	-
Output Power Stability (15 minutes)	%	-	±0.5	±0.1

Output Power Stability (8 hours)	%	-	± 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	W	-	-	30
Operating Temperature	°C	0	-	50
Storage Temperature	°C	-40	-	85
Output Fiber Type		SMF1950		
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;

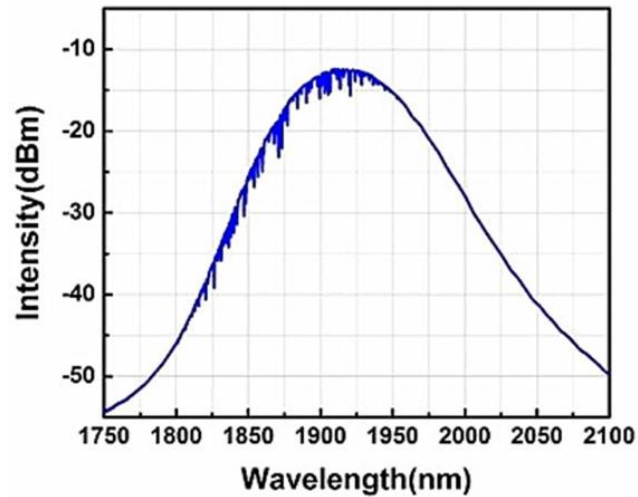
4.Output power stability test conditions: 25° C, tested after a 30-minute warm-up;

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

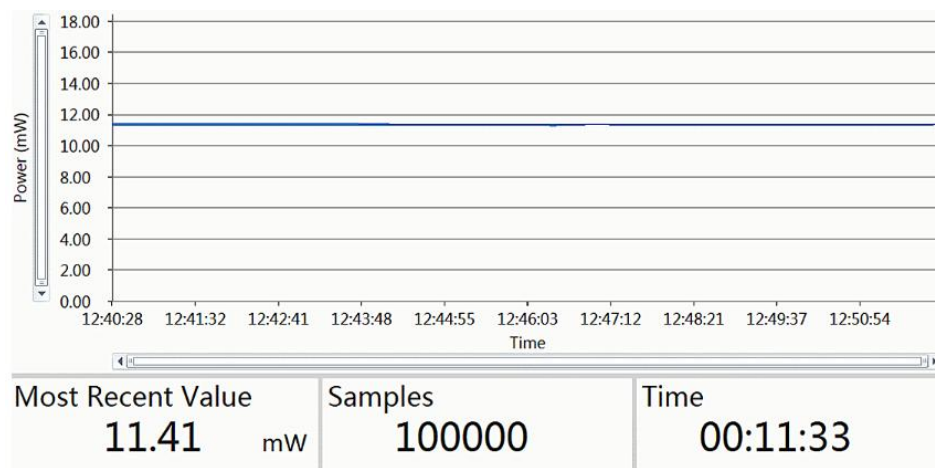
Typical output spectrum



Beam Quality



Power Test Table (@280mA) & Power Stability



Ordering Information:

LP-FP-2000-PG-OPP-BWD-FT

PG: Packaging Type

B: Benchtop

M: Module

OPP (Output Power): Output power in mW. For example: 10-10mW, 25-25mW, 50:50mW

BWD: 30:30nm, 50:50nm, 100:100nm

FT: Fiber Type

SM=SMF1950

PM=PM1950