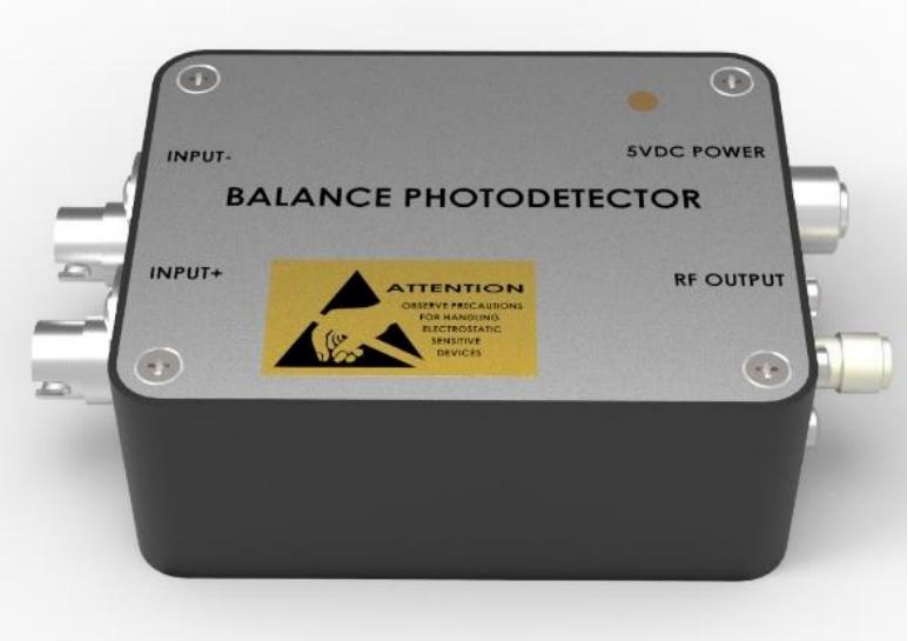
Si Balanced Detector 2GHz 400-1100nm

FC/APC



Product Description

The Si balanced detector module integrates two matched low-noise analog PIN detectors, a low-noise broadband transimpedance amplifier and an ultra-low noise power supply. It has the characteristics of high gain, high sensitivity, high bandwidth, low noise, high common mode rejection ratio, etc. It can effectively reduce the common mode noise of the signal and improve the signal-to-noise ratio of the system.

Product features

Low Noise、 High Gain、 High Bandwidth、 Compact Design、 Built-in Low Noise Isolated Power Supply

Part Number

MP-MBD-2G-B-FC/APC

Application area

Fiber Optic Sensing 、 Fiber Optic Communications 、 Laser Distance Measurement、 Spectral measurement、 Ns-Level Optical Pulse Detection

Core parameters

Wavelength	Bandwidth	Responsivity
400-1100nm	2GHz	0.55A/W@850nm

General Parameters

The main technical parameters of the AUT-MP laser:

Material	Si							
Wavelength	400~1100							nm
Bandwidth	100M	200M	300M	400M	500M	1G	2G	Hz
Detector Responsivity	0.55	0.55	0.55	0.55	0.55	0.55	0.55	A/W@850nm

Transimpedance Gain	30K	30K	30K	10K	5K	30K	15K	V/W
Maximum Input Optical Power	240	240	240	725	1450	240	480	Ω
NEP	11	11	11	14	18	20	20	uW
Output Impedance	50	50	50	50	50	50	50	pW/√(Hz)
Output Coupling	DC/AC	DC/AC	DC/AC	DC/AC	DC	AC	AC	
Supply Voltage	5	5	5	5	5	12	12	V
Supply Current	0.3(max)	0.3(max)	0.3(max)	0.3(max)	0.3(max)	0.3(max)	0.3(max)	A
Optical Input	FC/APC (Free-space optical input optional)							
RF Output	SMA							
Dimensions	62*47*25							mm