

# 1103nm High Power PM Optical Isolator

### **FEATURES**

### **ÅPPLICATIONS**

- High Isolation 0
- Low Insertion Loss
- Epoxy-Free Optical Path
- High Reliability and Stability
- Low Profile Packaging 0
- Metro Networks 0 CATV Networks

Broadband Systems

Optical Amplifying Systems

**Telecommunication Networks** 

O

0

#### **SPECIFICATIONS**

Parameter	Unit	Single Stage	Dual Stage D Type	Dual Stage L Type			
Center Wavelength (λc)		nm	1103				
Operating Wavelength Range		nm	+/-10				
Peak Isolation (Typ.)		dB	28	46			
Min. Isolation (23°C)		dB	22	40			
Typical Insertion Loss (λc, 23°C)		dB	1.0	1.3	1.5		
Max. Insertion Loss (λc, 23°C)		dB	1.6	1.8			
Optical Return Loss (Input/Output)		dB	50/50				
Extinction Ratio (Min.)		dB	18				
Working Mode	S Type	-	Can only work in Slow Axis				
	F Туре	-	Can work both in Slow Axis and Fast Axis				
Configuration		-	Standard: 2-Port; Y Type: 3-Port, Backward Power Guide Out				
Fiber Type	Input&Output	-	PM980 Fiber, PM1060L Fiber (E) or PM1060L-FA Fiber (L)				
			10/125um PMDC Fiber (O), 15/130um PMDC Fiber (W)				
			20/130um PMDC Fiber (Q) or 25/250um PMDC Fiber (R)				
	3 <sup>rd</sup> Port (Y Type)	-	Same Fiber or 105/125um MM Fiber				
Fiber Tensile Load		Ν	5				
Maximum Optical Power (CW)		W	1, 2, 3, 5, 10, 15, 20, 30, 50, 60, 80, 100, 150, 200				
Max. Backward Optical Power (CW)		W	0.3, 0.5, 1, 2, 3, 5, 10				
Operating Temperature		°C	0~50				
Storage Temperature		°C	-20~75				

Note: 1. Specifications are for device without connectors; Specifications may change without notice.

2. To add connectors, IL is 0.5dB higher, RL is 5dB lower, ER is 2dB Lower, Connector key is aligned to slow axis.

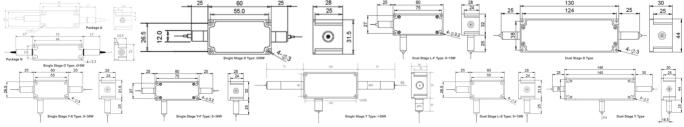
3. Only guarantee 1W continuous wave (CW) power thru testing for connectors added.

4. Suggest to use Y type for >20W Optical Power or continuous backward power of  $\geq$ 2W.

5. Devices for higher optical power or with other type fiber or consigned fiber are also available; Devices can only work in the core of Double Cladding (DC) Fiber, Cladding Power must be stripped before connecting the device.

6. Package dimensions may be different for different fiber type, configuration and optical power.

**PACKAGE DIMENSION** 



## **ORDERING INFORMATION (PN)**

FPIS-NNNN	- ( <mark>C</mark> )	С	( <mark>C</mark> )	HP NN	- (NN)	- <b>C</b>	С	NN	- CC/CCC
Center Wavelength	Stage	Туре	3 <sup>4</sup> Port Fiber	Optical Power	Backward Power	Fiber Type	Fiber Sleeve	Fiber Length	Connector Type
<mark>1103-</mark> 1103nm	D=D Type	<mark>S=</mark> S Type	Y= Same Fiber	<mark>1-</mark> 1W	<mark>05=</mark> 500mW	2-PM980Fiber	<mark>B=</mark> Bare Fiber	<mark>05=</mark> 0.5m	N–Without Connector
	L=L Type	F= F Type	A=105/125um Fiber	<mark>3</mark> =3W	<mark>1</mark> -1W	E=PM1060L Fiber	L= Loose Tube	<mark>10</mark> =1.0m	FC/APC=FC/APC Connector
	N= Package N		<mark>S=</mark> Corr. SM Fiber	10-10W	<mark>10-</mark> 10W	Q=20/130 PMDC Fiber	<mark>2=</mark> 2mm Cable	<mark>15=</mark> 1.5m	LC/PC=LC/PC Connector
	<i>Blank</i> for Single		<i>Blank</i> for Standard	100-100W	<i>Blank</i> for 300mW	R=25/250 PMDC Fiber	<mark>3</mark> = 3mm Cable	<mark>20</mark> =2.0m	SC/UPC-SC/UPC Connector

