



## 2 in 1 Polarization Insensitive Isolator

(TPI Series)

The Twin Isolator integrates two independent isolators into one standard isolator package and is excellently suited for EDFA or instrumentation designs where two or more isolators are used. The Twin Isolator offers excellent temperature stability, low IL loss, high isolation, low temperature dependence and great space saving.



### Specifications

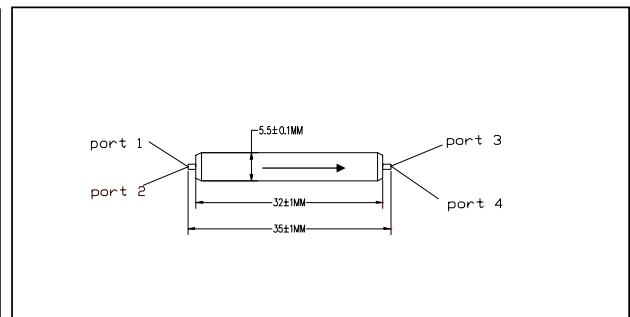
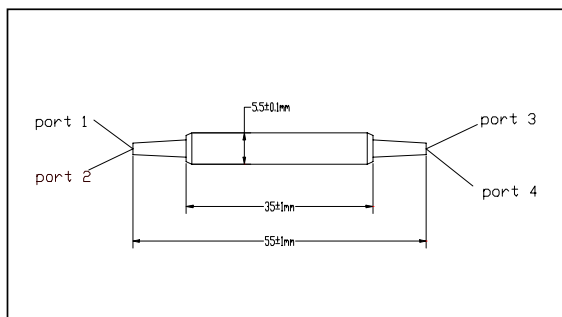
Parameters	Unit	Single Stage		Dual Stage	
		Grade P	Grade A	Grade P	Grade A
Center Wavelength ( $\lambda_c$ )	nm		1310, 1480 or 1550		
Typ. Peak Isolation( port 4 to port 1, port 3 to port 2)	dB	42	40	58	55
Min. Isolation (port 4 to port 1, port 3 to port 2) at 23 °C; $\lambda_c \pm 15\text{nm}$ , all polarization states	dB	32	30	46	45
Typ. Insertion Loss (port 1 to port 4, port 2 to port 3) at 23 °C; $\lambda_c \pm 20\text{nm}$ , all polarization states	dB	0.4	0.5	0.5	0.7
Max. Insertion Loss (port 1 to port 4, port 2 to port 3) at -5 °C to -70 °C; $\lambda_c \pm 20\text{nm}$ , all polarization states	dB	0.6	0.7	0.7	0.9
Min. Return Loss(input/output)	dB	55 / 55	55 / 55	55 / 55	55 / 55
Directivity Loss (port 1 to port 2, port 3 to port 4), at 23 °C; $\lambda_c$	dB	>55	>55	>55	>55
Min. Crosstalk ( port 1 to port 3, port 2 to port 4), at 23 °C; $\lambda_c \pm 20\text{nm}$	dB	50	50	55	55
Max. PDL at 23 °C	dB	0.05	0.1	0.05	0.15
Max. PMD <sup>1</sup>	ps	0.2 <sup>1</sup>	0.25 <sup>1</sup>	0.05	0.07
Max. Optical Power	mW		300		
Max. Tensile Load	N		5		
Operation Temperature			-5 to +70		
Storage Temperature			-40 to +85		

<sup>1</sup> Low PMD version is available. PMD < 0.05ps

\*Above specification are for device without connector.

\*For devices with connectors, insertion loss will be 0.3dB higher, RL will be 5dB lower.

### Package Dimensions



### Ordering Information

TPI- - - - -

: Stage

1 - Single stage

2 - Dual stage

: PMD

1 - 0.05ps max

2 - Refer to above spec.

: Fiber Type

B - 250um bare fiber

L - 900um loose tube

: Wavelength

31 - 1310nm

48 - 1480nm

55 - 1550nm

SS - Specify

: Connector Type

1 - FC/UPC

2 - ST/UPC

3 - LC/UPC

4 - FC/APC

5 - SCAPC

6 - SC/UPC

S - Specify

N - None

: Fiber Length

1 - 1.0 m

S - Specify

: Package Length

1 - 55mm

2 - 32mm

: Grade

P - Premium grade

A - A grade