

# Terbium Gallium Garnet Based Multi Mode 850nm Optical Isolator

(patents pending)

### **Product Description**

The OIST Series TGG Based 850nm Optical Isolator is a passive device that guides lights at 850nm in the normal direction while minimizing back reflection and back scattering in the reverse direction for any state of polarization. With Agiltron's proprietary magnetic-optics technology and proven advanced micro optics design, the isolator features low insertion loss, high isolation, compact structure, high power handling, and high stability. The excellent characteristics of this product make it an ideal choice for application in fiber amplifier systems, pump laser diodes, and optical fiber sensors.



## Performance Specifications

TGG Based MM Isolator	Min	Typical	Мах	Unit	
Operation Wavelength	845	850	855	nm	
Insertion Loss*, **		1.2	1.5	dB	
Wavelength Dependent Loss*			0.2	dB	
Isolation*, **	20	25		dB	
Return Loss*, **	20	30		dB	
Storage Temperature	-10		60	°C	
Fiber Type	50/125,62.5/125 Multimode				
Package Dimension	L60	mm			

Note(\*):

- 1. Measured using laser with coupled power ratio of categories 5 (CPR). Laser with larger mode fill ratio needs special version.
- 2. Exclude connectors.
- Note(\*\*):

Our device is designed and optimized for certain laser launch condition which is characterized as CPR value. In general, if application exceeds the specified CPR value, optical performance will become worsen.

# Features

- Low Insertion Loss
- High Isolation
- Low PDL
- High Stability
- High Reliability
- Cost Effective

#### Applications

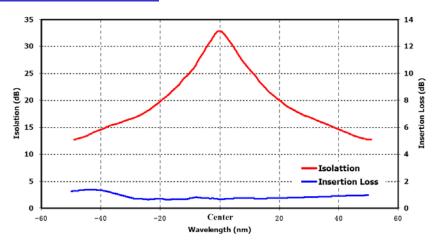
- Optical Fiber Amplifier
- Pump Laser Source
- Fiber Optic Sensor
- Test and Measurement
- Instrumentation

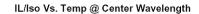
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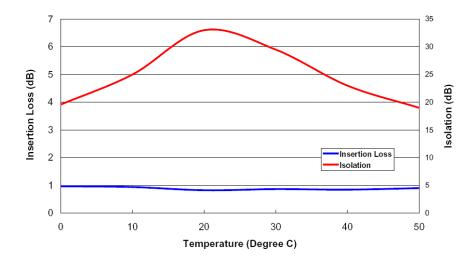


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# **Optical Performance**







## **Ordering Information**

OIST-	1 3	8						
	Туре	Wavelength	Grade	Package	Fiber Type		Fiber Length	Connector
	Multimode=13	850nm=8	Standard=1 Special=0	Standara-1	50/125MM=5 62.5/125MM=6 Special=0	900um Loose Tube=3	0.5m=2 1.0m=3	None=1 FC/PC=2 FC/APC=3 SC/PC=4 SC/APC=5 ST/PC=6 LC=7 Special=0

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