



## Multimode Pump Protector (MMPP Series)

Rev 11

### Description

The Multimode Pump Protector is a micro optic device based on environmentally stable thin-film filter technology. It is used to block out unwanted noise signals in multimode fiber communication systems. The components are characterized with high isolation, low insertion loss, high return loss, excellent environmental stability and high power handling capability.

### Key Features

- Low Insertion Loss
- High Isolation

### Applications

- Fiber Lasers
- Equipment

### Specifications

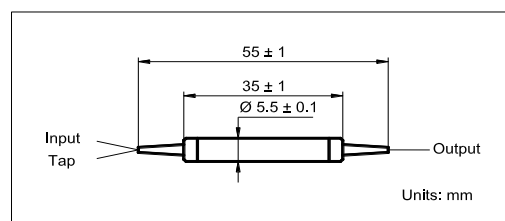
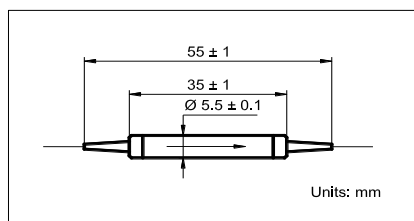
| Parameter                            | Unit  | Value                                             |
|--------------------------------------|-------|---------------------------------------------------|
| Pass Wavelength Range                | nm    | 900 - 1000 or specify                             |
| Max. Insertion Loss                  | dB    | 0.7                                               |
| Blocked Wavelength Range             | nm    | 1020 - 1120, 1500 - 1600 or specify               |
| Min. Isolation                       | dB    | 25                                                |
| Min. Return Loss                     | dB    | 30                                                |
| Max. Polarization Dependent Loss     | dB    | 0.1                                               |
| Thermal Stability                    | dB/°C | 0.003                                             |
| Max. Optical Power (Continuous Wave) | W     | 10                                                |
| Max. Tensile Load                    | N     | 5                                                 |
| Fiber Type                           | -     | Multimode fiber 105/125, 62.5/125, 50/125 $\mu$ m |
| Operating Temperature                | °C    | - 5 to + 70                                       |
| Storage Temperature                  | °C    | - 40 to + 85                                      |

<sup>1</sup>IL is 0.5 dB higher, RL is 10 dB lower for each connector added.

<sup>2</sup>Above specifications are measured at low order modes.

<sup>3</sup>If the optical power outside the passband exceeds 1 W, a third port should be added to guide it.

### Package Dimensions



### Ordering Information

**MMPP-①①①①-②-③-④-⑤-⑥**

①①①①: Wavelength

②: Port

③: Fiber Core

④: Connector Type

9806 - 980 Pass/1060 Block

2 - 2 Ports

1 - 50  $\mu$ m

1 - FC/UPC

9855 - 980 Pass/1550 Block

3 - 3 Ports

2 - 62.5  $\mu$ m

2 - FC/APC

SSSS - Specify

3 - 105  $\mu$ m 0.15 NA

3 - SC/UPC

4 - 105  $\mu$ m 0.22 NA

4 - SC/APC

S - Specify

N - None

S - Specify

⑤: Fiber Jacket

B - 250  $\mu\text{m}$  Bare Fiber

L - 900  $\mu\text{m}$  Loose Tube

S - Specify

⑥: Fiber length

1 - 1.0 m

S - Specify