1×N MEMS Polarization Maintaining Optical Switch (MEMS PMOS)

Description

The 1×N MEMS PM OS is a type of optical switch based on Micro-Electro-Mechanical Systems technology, which allows channel selection between a single input optical signal and N output optical signals. It can control the transmission of optical signals while maintaining the polarization state of the light signal. With characteristics such as small size, long lifespan, and stable reliability, it is widely used in optical network fields such as OADM, OXC, and OPM.

Key Features

- Mini Size
- Fast Switching Time
- Low Insertion Loss
- Enhanced Reliability and Exceptional Stability

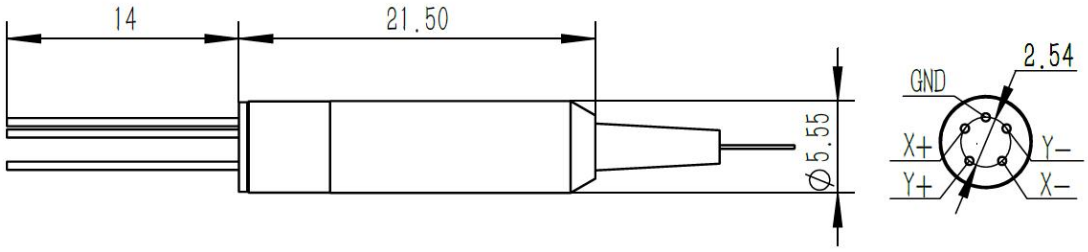
Applications

- Metropolitan Area Network
- Data Center
- Fiber Optic Sensing and Monitoring
- Instruments

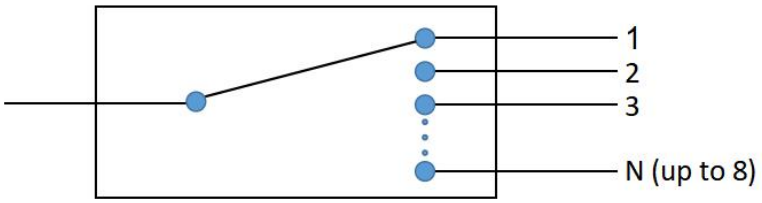
Follow the Standards

- Telcordia GR-1221
- Telcordia GR-1073

Mechanical Dimension



Optical Path Diagram



Specifications

Parameter \ Type	Unit	1×N (N≤8) MEMS PMOS
Center Wavelength	nm	1310/1550
Insertion Loss	dB	≤0.8
Extinction Ratio	dB	≥18
Wavelength Dependent Loss	dB	≤0.3
Temperature Dependent Loss	dB	≤0.3
Return Loss	dB	≥50
Cross Talk	dB	≥50
Repeatability	dB	≤0.05
Response Time	ms	≤8
Switching Mode	/	Non-Latching
Handling Power	mW	≤500
Drive Voltage	V	≤60
Working Axis	/	Both the axis working
Fiber Type	/	PM fiber
Operating Temperature	℃	-5~+70
Storage Temperature	℃	-40~+85
Operating Humidity	%	5~95
Dimensions	mm	Φ5.55× L21.5

1. **Specifications are without connectors. IL is 0.2dB higher, RL is 5dB lower and ER is 2dB lower for each connector added. The default connector key is aligned to slow axis.**
2. **IL is measured at CWL, 23℃.**
3. **IL is for single-band. Dual-band adds 0.1dB.**
4. **Power off isolation is same as crosstalk.**
5. **WDL is measured in a +/- 20nm range at 23°C.**
6. **Repeatability is defined after 100 cycles.**

Ordering Information

MEMS-PMOS-1*N-XXXX-XX-XXX-XX/XX-XX*XX

- Dimensions: 5.55*21.5 etc.
- Connector: FC/UPC, FC/APC etc.
- Fiber code:
- Pigtail Type: 0=250μm, 1=900μm etc.
- Operating Wavelength: 1550=1550nm etc.
- N≤8 etc.