

FOG PM Panda Fiber



Description

We have complete equipment technology and process technology for polarization maintaining fiber, including PCVD equipment, drilling equipment, wire drawing equipment, and testing equipment with independent intellectual property rights. The polarization-maintaining optical fiber is made of invention patented technology, and has a complete set of proprietary technology for drilling the polarization-maintaining core rod, boron stress rod, and mother rod at one time.

Our polarization-maintaining fiber products for gyroscopes are special fibers designed for fiber optic gyroscopes (FOGs). They adopt a panda structure (Panda), which contains a perfect and symmetrical "panda eye" stress unit. The core and the center of the panda eye are in a straight line at three points. This design provides high reliability for high polarization crosstalk.

Working Environment

Fiber optic gyroscope, polarization sensitive Components

Key Optical Specification				
Part No.	PM1310A80/135	PM1310A80/165	PM1550B80/135	PM1550B80/165
Wavelength(nm)	1310	1310	1550	1550
Cut-off Wavelength(nm)	1100~1290	1100~1290	1290~1520	1290~1520
Mode-field diameter (µm)	6.0±1.0	6.0±1.0	6.5±1.0	6.5±1.0
Attenuation (dB/km)	≤0.6	≤0.6	≤0.6	≤0.6
Beat Length (mm)	≤3.0	≤3.0	≤3.5	≤3.5
Polarization crosstalk (dB/km)	≤-22	≤-22	≤-22	≤-22
Key Geometric Specification				
Cladding Outside diameter (µm)	80.0±1.0	80.0±1.0	80.0±1.0	80.0±1.0
Coating Outside diameter (µm)	135.0±3.0	165.0±5.0	135.0±3.0	165.0±5.0
Core-to-cladding Offset(µm)	≤1.0	≤1.0	≤1.0	≤1.0
Working Environment and Mechanical Specification				
Working Temperature $^{\circ}$ C)	-50~85	-50~85	-50~85	-50~85
Proof Test (kpsi)	100	100	100	100

Specification