



100/140 High-Temperature Graded-Index Optical Fiber

P/N: BF04436

Product Overview

This graded-index 100/140 μm multimode fiber has a 100 μm core diameter and a 140 μm cladding diameter. The fiber is designed for use at 850 nm and/or 1300 nm. It has a 170 μm polyimide coating. The large core diameter and high Numerical Aperture make this fiber suitable for use in applications where high coupling efficiency to a light source is necessary and the fiber will be exposed to high temperatures.

Typical Applications

- High Temperature
- Harsh Environment

Product Specifications	
Product Description	100/140 High-Temperature Optical Fiber
Physical Characteristics	
Coating Material	PYROCOAT® polyimide
Core Diameter	100 ± 4 µm
Cladding Diameter	140 ± 3 µm
Coating Diameter	170 ± 5 µm
Core/Clad Offset	≤ 3 µm
Core Non-Circularity	≤ 5%
Clad Non-Circularity	≤ 2.0%
Crimp & Cleave Compatible	No
Optical Characteristics	
Type	Multimode Graded-Index
Numerical Aperture	0.29
Bandwidth @ 1300 nm	≥ 100 MHz-km
Bandwidth @ 850 nm	≥ 100 MHz-km
Attenuation @ 1300 nm	≤ 3 dB/km
Attenuation @ 850 nm	≤ 5 dB/km
Mechanical and Environmental	
Operating Temperature	-65 to +300 °C
Short-Term Bend Radius	≥ 11 mm
Long-Term Bend Radius	≥ 19 mm
Proof Test Level	100 kpsi (0.689 GPa)
Order by Part Number	BF04436
Product Description Code	TCU-MC100H
OPTIONS	Cabling
NOTE	Lightera polyimide optical fibers are known to operate in environments up to 300 °C. Performance is application dependent. Contact our Technical Sales department to discuss your specific application requirements. 1-860-678-6636
Contact Information	For additional information please contact your sales representative. You can also visit our website at www.lightera.com or call 1-888-FIBERHELP (1-888-342-3743) USA or 1-770-798-5555 outside the USA. For a full list of our certifications, visit our website.
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