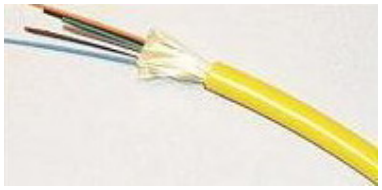
Fiber Optic Distribution Cable (PVC, ≦12 Fibers)

Designs for indoor applications

Standard color-coding on fibers and buffer tubes for easy identification.
Fiber types and grades available:

Singlemode: 9.0/125um
Multimode: 62.5/125um
50/125um



Single jacket
2 - 12 Fiber

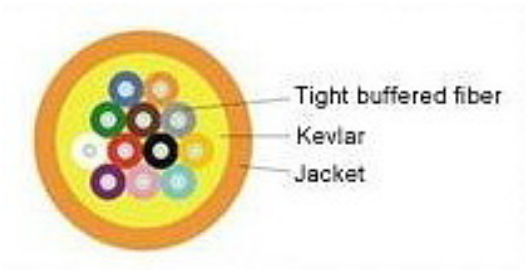
Model Number	Outer Dia. Mm	Min. Band Radius		Installation Loading newtons	Crush Resistance N/cm	Impact Resistance 25 Impacts
		Loaded cm	Unloaded cm			
GJPF JV-XXOP	≦6.5	20 x Diameter	10 x Diameter	1000	200	2.9 N m

Variables in the Model number:

XX= Total Fiber Count

OP= Fiber Grade

8H (9.0/125um)
6F (62.5/125um)
5H (50/125um)



Mechanical Properties

Description	Specification
Operation Temp.	-40 to 70℃ single jacket
Installation Temp.	-20 to 70℃
Storage Temp.	-40 to 70℃ single jacket
Max. Long Term Load	200N
Crush Resistance	＞Bellcore GR20
Impact Resistance	＞Bellcore GR20
Flexing	＞Bellcore GR20
Twist/Bend	＞Bellcore GR20

Specifications subject to change without notice

Singlemode Fiber Specifications

A variety of fiber types for your applications

Available in all Cabletech cable types

8H (9.0/125um singlemode/High-performance grade)

8H Fiber - 9.0/125 um High-performance Singlemode		
Attenuation Coefficient		
Maximum Attenuation - Outside Plant Loose and Central Tube Designs	0.35 dB/km @ 1310 nm	0.25 dB/km @ 1550 nm
Maximum Attenuation - Indoor/Outdoor Loose and Central Tube Designs	0.5 dB/km @ 1310 nm	0.5 dB/km @ 1550 nm
Maximum Attenuation - Tight Buffered Cables	0.7 dB/km @ 1310 nm	0.7 dB/km @1550 nm
Maximum Dispersion @ 1285 - 1330 nm	＜3.2 ps/nm-km	
Maximum Dispersion @ 1550 nm	18 ps/nm-km	
Cut-off Wavelength	1260 um ± 100 um	
Core Diameter	9.0 um (concentricity error of ＜0.6 um)	
Cladding Diameter	125 ± 2.0 um	
Cooling Diameter	245 ± 10 um	
Zero Dispersion Range	1310 um ± 10 um	
Index of Refraction	1.464 @ 1310nm	1.465 @ 1550nm
Proof test	＞100 kpsi	
Optical Characteristics		
Attenuation 1310 nm	0.35 dB/km max.	
Attenuation 1380 nm	0.32 dB/km max.	
Attenuation 1550 nm	0.25 dB/km max.	
Attenuation 1285-1310 nm	0.40 dB/km max.	
Attenuation 1310-1330 nm	0.40 dB/km max.	
Attenuation 1525-1575 nm	0.30 dB/km max.	
Cutoff (Uncabled)	1150-1330 nm	
OTDR Point Defects	0.07 dB max.	
Zero Dispersion Wavelength	1310 ± 10um	
Zero Dispersion Slope	0.092 ps/km nm² max.	
Dispersion 1285-1330 nm	3.2 ps/km nm max.	
Dispersion @ 1550 nm	18 ps/km nm max.	
Geometric Characteristics		
Core Ovality	5% max.	
Clad/Core offset	0.6um max.	
Cladding Diameter	125 ± 1um	
Fiber Ovality	1% max.	
Coat/Clad Concentricity Error	12um max.	
Coating Diameter	245 ± 10um	
Environmental Characteristics		
Temperature Sensitivity (-60℃ to +85℃)		
1310nm and 1550nm	0.05dB increase max.	
Heat Aging, 85℃	0.05dB increase max.	
Water Immersion, 1310nm & 1550nm, 30 day	0.05dB increase max.	
Mechanical Characteristics		
Macrobend 100 wraps, 60mm mandrel		
@ 1310nm	0.05dB max.	
@ 1550nm	0.1dB max.	
Macrobend 1 wrap, 32mm mandrel		
@1550nm	0.1dB max.	
Prooftest	100kpsi	

Fiber Color

Cabletech's standard singlemode fiber is treated with a new fiber coating process which provides permanent color to the fiber. This process improves color consistency from fiber to fiber and cable to cable and has excellent aveage splice loss performance. This technique is fully LID system and susion splice compatible. The strength and mechanical performance of the colored fibers are guaranteed.

Multimode Fiber Specifications

A variety of fiber types for your applications

Available in all Cabletech cable types
50/125, 62.5/125um multi-mode fiber

Parameter of Multimode fiber(core/cladding: 50/125, 62.5/125um)

	5H	6F
Refractive index distribution	Grade Index	
Core diameter (um)	50	62.5
Core tolerance (um)	±3.0	±3.0
Cladding diameter (um)	125.0	
Cladding tolerance (um)	±3.0	
Core non-circularity	≦6.0%	
Cladding non-circularity	≦1.0%	
Core/Cladding concentricity error	≦3.0um	
Coating diameter	245±10um	
Attenuation (dB/km)		
@850nm	≦2.3	≦2.6
@1300nm	≦0.5	≦0.6
Bandwidth (MHz. km)		
@850nm	≧500	≧400
@1300nm	≧1000	≧1000
Numerical operture	0.20±0.02	0.275±0.015
Proof test	≧100Kpsi	
Dynamic fatigue	≧25	