810010227/DB | C-006-DN-8W-M06BK/28G/AY /D



Fiber indoor/outdoor cable, LightScope® ZWP, Gel-Filled loose tube, Singlemode G.652.D, 6 fiber, meters jacket marking, Black jacket color, Dca flame rating

Product Classification

Portfolio CommScope®
Product Type Fiber indoor/outdoor cable
Product Series C-DN
General Specifications
Cable Type Central loose tube
Construction Type Non-armored
Subunit Type Gel-filled
Jacket Color Yellow
Jacket Marking Meters
Fibers per Subunit, quantity6
Total Fiber Count 6
Dimensions
Cable Length 1000 m 3,280.84 ft
Buffer Tube/Subunit Diameter2.8 mm 0.11 in
Diameter Over Jacket6.4 mm 0.252 in

Representative Image

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810010227/DB | C-006-DN-8W-M06BK/28G/AY /D

LSZH Outer Jacket Aramid Strength Elements Gel Filled Buffer Tube

Mechanical Specifications

Minimum Bend Radius, loaded	130 mm 5.118 in
Minimum Bend Radius, unloaded	75 mm 2.953 in
Tensile Load, long term, maximum	400 N 89.924 lbf
Tensile Load, short term, maximum	530 N 119.149 lbf
Cable Crush Resistance, maximum	20 N/mm 114.203 lb/in
Compression Test Method	IEC 60794-1-2 E3
Impact	5 N-m 44.254 in lb
Impact Test Method	IEC 60794-1 E4

Optical Specifications

Fiber Type

G.652.D | OS2

Optical Specifications, Wavelength Specific

Attenuation, maximum

0.35 dB/km @ 1,300 nm

Environmental Specifications

Installation temperature	-20 °C to +70 °C (-4 °F to +158 °F)
Operating Temperature	-20 °C to +70 °C (-4 °F to +158 °F)

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Storage Temperature	-20 °C to +70 °C (-4 °F to +158 °F)
EN50575 CPR Cable EuroClass Fire Performance	Dca
EN50575 CPR Cable EuroClass Smoke Rating	s2
EN50575 CPR Cable EuroClass Droplets Rating	d2
EN50575 CPR Cable EuroClass Acidity Rating	a2
Environmental Space	Universal Low Smoke Zero Halogen (ULSZH)
Flame Test Listing	EN 50399
Flame Test Method	EN 50399 IEC 60332-1-2 IEC 60754-2 IEC 61034-2
Water Penetration	24 h
Environmental Test Specifications	
Temperature Cycle	-20 °C to +70 °C (-4 °F to +158 °F)
Temperature Cycle Test Method	IEC 60794-1-2 F1
Packaging and Weights	
Cable weight	44 kg/km 29.567 lb/kft
Included Products CS-8W-250-EMEA – LightScope® ZWP Singlemode Fibe 250um	r

* Footnotes

/D

Operating Temperature Specification applicable to non-terminated bulk fiber cable

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CS-8W-250-EMEA | 250um

LightScope® ZWP Singlemode Fiber



Product Classification

Portfolio	CommCoonce
	CommScope®
Product Type	Optical fiber
General Specifications	
Cladding Diameter	125 µm
Cladding Diameter Tolerance	±0.7 μm
Cladding Non-Circularity, maximum	0.7 %
Coating Diameter (Colored)	249 µm
Coating Diameter (Uncolored)	242 µm
Coating Diameter Tolerance (Colored)	±13 μm
Coating Diameter Tolerance (Uncolored)	±5 µm
Coating/Cladding Concentricity Error, maximum	12 µm
Core/Clad Offset, maximum	0.5 μm
Proof Test	689.476 N/mm ² 100000 psi
Dimensions	
Fiber Curl, minimum	4 m 13.123 ft
Mechanical Specifications	
Macrobending, 20 mm Ø mandrel, 1 turn	0.75 dB @ 1,550 nm 1.50 dB @ 1,625 nm
Macrobending, 30 mm Ø mandrel, 10 turns	0.25 dB @ 1,550 nm 1.00 dB @ 1,625 nm
Macrobending, 60 mm Ø mandrel, 100 turns	0.05 dB @ 1,550 nm 0.05 dB @ 1,625 nm
Coating Strip Force, maximum	8.9 N 2.001 lbf
Coating Strip Force, minimum	1.3 N 0.292 lbf

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COMMSCOPE°

CS-8W-250-EMEA | 250um

Dynamic Fatigue Parameter, minimum	20
Optical Specifications	
Cabled Cutoff Wavelength, maximum	1250 nm
Point Defects, maximum	0.05 dB
Zero Dispersion Slope, maximum	0.092 ps/[km-nm-nm]
Zero Dispersion Wavelength, maximum	1324 nm
Zero Dispersion Wavelength, minimum	1300 nm
Optical Specifications, Wavelength Specific	
Attenuation, maximum	0.21 dB/km @ 1,550 nm 0.24 dB/km @ 1625 nm 0.25 dB/km @ 1,490 nm 0.35 dB/km @ 1,310 nm 0.35 dB/km @ 1,385 nm
Dispersion, maximum	18 ps(nm-km) at 1550 nm (2.2 ps(nm-km) at 1625 nm (3.5 ps(nm-km) from 1285 nm to 1330 nm at 1310 nm
Index of Refraction	1.467 @ 1,310 nm 1.468 @ 1,550 nm
Mode Field Diameter	10.4 μm @ 1,550 nm 9.2 μm @ 1,310 nm
Mode Field Diameter Tolerance	±0.4 μm @ 1310 nm ±0.5 μm @ 1550 nm
Polarization Mode Dispersion Link Design Value, maximum	0.06 ps/sqrt(km)
Standards Compliance	ITU-T G.652.D ITU-T G.657.A1

Environmental Specifications

Heat Aging, maximum	0.05 dB/km @ 85 °C
Temperature Dependence, maximum	0.05 dB/km
Temperature Humidity Cycling, maximum	0.05 dB/km
Water Immersion, maximum	0.05 dB/km @ 23 °C

* Footnotes

Temperature Dependence, maximum	Temperature dependence is conducted at -60 °C to +85 °C (-76 °F to +185 °F)
Temperature Humidity Cycling, maximum	Temperature humidity cycling is conducted at -10 °C to +85 °C (+14 °F to +185 °F) up to 95% relative humidity

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