

Fiber indoor/outdoor drop cable, All-Dielectric, 1 fiber Tight Buffer construction, riser, drop all-dielectric, Singlemode G.657.A2/B2, Gel-free, Feet jacket marking, White jacket color

- \*Product complies with the Build America, Buy America Act (BABAA) requirements of the Infrastructure Investment and Jobs Act of 2021 (Pub. L. 117- 58, §§ 70901-70953), or is the subject of a waiver approved by the Secretary of Commerce or designee. Compliance requirements and waiver applicability vary based on government funding program. Check the laws and regulations for your specific program.

### Product Classification

Regional Availability	Asia   Australia/New Zealand   EMEA   Latin America   North America
Portfolio	CommScope®
Product Type	Fiber indoor/outdoor cable
Product Series	R-DN
Government Requirements	Build America Buy America (BABA) compliant*

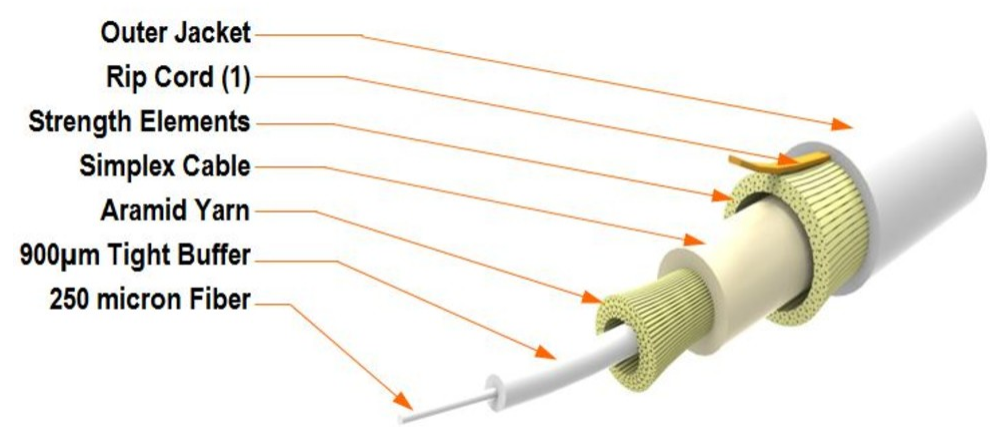
### General Specifications

Cable Type	Drop
Construction Type	Non-armored
Subunit Type	Gel-free
Jacket Color	White
Jacket Marking	Feet
Location of Manufacturing	Claremont, North Carolina
Subunit, quantity	1
Fibers per Subunit, quantity	1
Total Fiber Count	1

### Dimensions

Buffer Tube/Subunit Diameter	2.9 mm   0.114 in
Diameter Over Jacket	4.9 mm   0.193 in

### Representative Image



Mechanical Specifications

Minimum Bend Radius, loaded	98 mm   3.858 in
Minimum Bend Radius, unloaded	49 mm   1.929 in
Tensile Load, long term, maximum	180 N   40.466 lbf
Tensile Load, short term, maximum	601 N   135.11 lbf
Compression	10 N/mm   57.101 lb/in
Compression Test Method	FOTP-41   IEC 60794-1 E3
Flex	25 cycles
Flex Test Method	FOTP-104   IEC 60794-1 E6
Impact	2.94 N-m   26.021 in lb
Impact Test Method	FOTP-25   IEC 60794-1 E4
Strain	See long and short term tensile loads
Strain Test Method	FOTP-33   IEC 60794-1 E1
Twist	10 cycles
Twist Test Method	FOTP-85   IEC 60794-1 E7
Vertical Rise, maximum	695 m   2,280.184 ft

Optical Specifications

Fiber Type	G.657.A2/B2   G.657.A2/B2
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Environmental Specifications

Installation temperature	-10 °C to +60 °C (+14 °F to +140 °F)
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Operating Temperature	-40 °C to +70 °C (-40 °F to +158 °F)
Storage Temperature	-40 °C to +70 °C (-40 °F to +158 °F)
Cable Qualification Standards	ANSI/ICEA S-110-717
Environmental Space	Riser
Flame Test Listing	NEC OFNR (ETL) and c(ETL)
Flame Test Method	CSA FT4   IEEE 1202   UL 1666
Jacket UV Resistance	UV stabilized
Water Penetration	24 h
Water Penetration Test Method	FOTP-82   IEC 60794-1 F5

### Environmental Test Specifications

Cable Freeze	-2 °C   28.4 °F
Cable Freeze Test Method	FOTP-98   IEC 60794-1 F15
Drip	70 °C   158 °F
Drip Test Method	FOTP-81   IEC 60794-1 E14
Heat Age	-40 °C to +85 °C (-40 °F to +185 °F)
Heat Age Test Method	IEC 60794-1 F9
Low High Bend	-30 °C to +60 °C (-22 °F to +140 °F)
Low High Bend Test Method	FOTP-37   IEC 60794-1 E11
Temperature Cycle	-40 °C to +70 °C (-40 °F to +158 °F)
Temperature Cycle Test Method	FOTP-3   IEC 60794-1 F1

### Packaging and Weights

Cable weight	26.5 kg/km   17.807 lb/kft
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### Regulatory Compliance/Certifications

Agency	Classification
ISO 9001:2015	Designed, manufactured and/or distributed under this quality management system

### Included Products

CS-8G-TB	–	Enhanced Low Macrobending, Zero Water Peak, Dispersion-Unshifted Singlemode Fiber (ITU-T G.657.A2, B2)
R-001-SP-8G-F29IV/WB	–	Fiber indoor cable, All-Dielectric Indoor Riser Simplex, Singlemode G.657.A2/B2, Feet jacket marking, Ivory jacket color

## \* Footnotes

**Operating Temperature** Specification applicable to non-terminated bulk fiber cable

# CS-8G-TB

Enhanced Low Macrobending, Zero Water Peak, Dispersion-Unshifted Singlemode Fiber (ITU-T G. 657.A2, B2)

## Product Classification

Portfolio	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 Tensile Stress	100,000 psi (0.69 GPa)

## Dimensions

Fiber Curl, minimum	4 m   13.123 ft
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## Mechanical Specifications

Macrobending, 15 mm Ø mandrel, 1 turn	0.50 dB @ 1,550 nm   1.00 dB @ 1,625 nm
Macrobending, 20 mm Ø mandrel, 1 turn	0.10 dB @ 1,550 nm   0.20 dB @ 1,625 nm
Macrobending, 30 mm Ø mandrel, 10 turns	0.03 dB @ 1,550 nm   0.10 dB @ 1,625 nm
Coating Strip Force, maximum	8.9 N   2.001 lbf
Coating Strip Force, minimum	1.3 N   0.292 lbf
Dynamic Fatigue Parameter, minimum	20

## Optical Specifications

Cabled Cutoff Wavelength, maximum	1260 nm
Point Defects, maximum	0.1 dB

# CS-8G-TB

Zero Dispersion Slope, maximum	0.092 ps/[km-nm-nm]
Zero Dispersion Wavelength, maximum	1324 nm
Zero Dispersion Wavelength, minimum	1302 nm
Optical Specifications, Wavelength Specific	
Attenuation, maximum	0.50 dB/km @ 1,310 nm   0.50 dB/km @ 1,385 nm   0.50 dB/km @ 1,550 nm
Dispersion, maximum	18 ps(nm-km) at 1550 nm   3.5 ps(nm-km) from 1285 nm to 1330 nm at 1310 nm
Index of Refraction	1.467 @ 1,310 nm   1.467 @ 1,385 nm   1.468 @ 1,550 nm
Mode Field Diameter	8.6 μm @ 1,310 nm   9.8 μm @ 1,550 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.657.A2   ITU-T G.657.B2

## 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

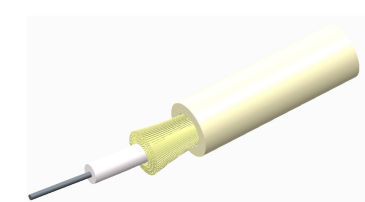
## Regulatory Compliance/Certifications

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ISO 9001:2015	Designed, manufactured and/or distributed under this quality management system

## \* 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

# R-001-SP-8G-F29IV/WB



Fiber indoor cable, All-Dielectric Indoor Riser Simplex, Singlemode G.657.  
A2/B2, Feet jacket marking, Ivory jacket color

## Product Classification

Regional Availability	Asia   Australia/New Zealand   Latin America   Middle East/Africa   North America
Portfolio	CommScope®
Product Type	Fiber indoor cable
Product Series	R-SP

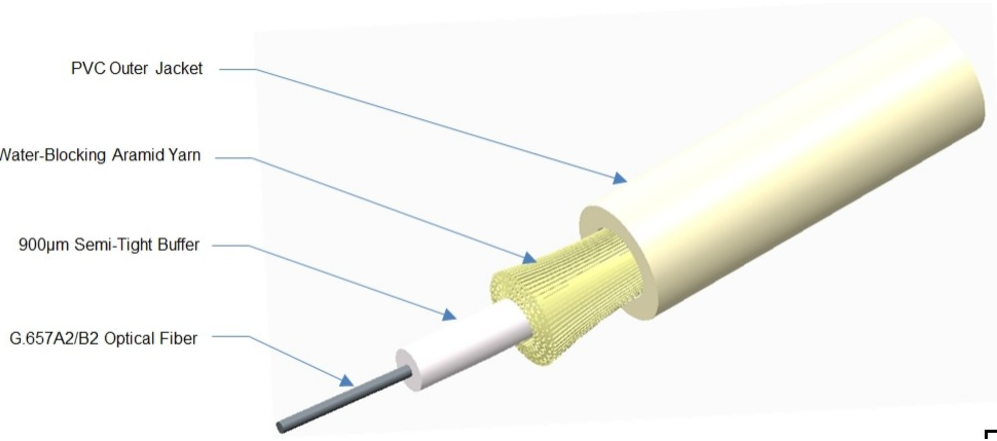
## General Specifications

Cable Type	Cordage
Construction Type	Non-armored
Subunit Type	Gel-free
Jacket Color	Ivory
Jacket Marking	Feet
Total Fiber Count	1

## Dimensions

Diameter Over Jacket	2.9 mm   0.114 in
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## Representative Image



# R-001-SP-8G-F29IV/WB

## Mechanical Specifications

Minimum Bend Radius, loaded	50 mm   1.969 in
Minimum Bend Radius, unloaded	30 mm   1.181 in
Tensile Load, long term, maximum	30 N   6.744 lbf
Tensile Load, short term, maximum	100 N   22.481 lbf
Compression	22 N/mm   125.623 lb/in
Compression Test Method	FOTP-41   IEC 60794-1 E3
Flex	300 cycles
Flex Test Method	FOTP-104   IEC 60794-1 E6
Impact	0.74 N-m   6.55 in lb
Impact Test Method	FOTP-25   IEC 60794-1 E4
Strain	See long and short term tensile loads
Strain Test Method	FOTP-33   IEC 60794-1 E1
Twist	10 cycles
Twist Test Method	FOTP-85   IEC 60794-1 E7
Vertical Rise, maximum	334 m   1,095.801 ft

## Optical Specifications

Fiber Type	G.657.A2/B2   G.657.A2/B2
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## Environmental Specifications

Installation temperature	-20 °C to +60 °C (-4 °F to +140 °F)
Operating Temperature	-40 °C to +70 °C (-40 °F to +158 °F)
Storage Temperature	-40 °C to +75 °C (-40 °F to +167 °F)
Cable Qualification Standards	ANSI/ICEA S-104-696   Telcordia GR-409
Environmental Space	Riser
Flame Test Listing	NEC OFNR (ETL) and c(ETL)
Flame Test Method	CSA FT4   UL 1666
Jacket UV Resistance	UV stabilized
Water Penetration	24 h
Water Penetration Test Method	FOTP-82   IEC 60794-1 F5



# R-001-SP-8G-F29IV/WB

## Environmental Test Specifications

Cable Freeze	-2 °C   28.4 °F
Cable Freeze Test Method	FOTP-98   IEC 60794-1 F15
Heat Age	-40 °C to +85 °C (-40 °F to +185 °F)
Heat Age Test Method	IEC 60794-1 F9
Low High Bend	-30 °C to +60 °C (-22 °F to +140 °F)
Low High Bend Test Method	FOTP-37   IEC 60794-1 E11
Temperature Cycle	-40 °C to +70 °C (-40 °F to +158 °F)
Temperature Cycle Test Method	FOTP-3   IEC 60794-1 F1

## Packaging and Weights

Cable weight	7.9 kg/km   5.309 lb/kft
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## Regulatory Compliance/Certifications

Agency	Classification
ISO 9001:2015	Designed, manufactured and/or distributed under this quality management system

### \* Footnotes

**Operating Temperature** Specification applicable to non-terminated bulk fiber cable