# R-002-ZC-5L-F16

#### Fiber indoor cable, LazrSPEED® 1.6 mm Riser Zipcord, Multimode OM3, Feet jacket marking

#### **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-ZC

#### General Specifications

Cable Type Cordage

Construction Type Non-armored

**Subunit Type** Gel-free

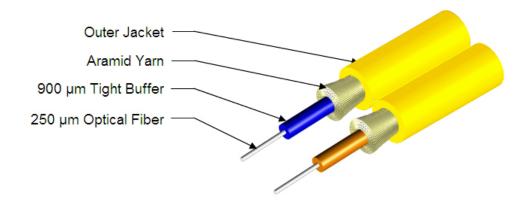
Jacket Marking Feet

**Total Fiber Count** 2

#### **Dimensions**

Height Over Jacket 1.7 mm | 0.067 in Width Over Jacket 3.5 mm | 0.138 in

## Representative Image



## Mechanical Specifications

Minimum Bend Radius, loaded 38 mm | 1.496 in

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Minimum Bend Radius, unloaded15 mm | 0.591 inTensile Load, long term, maximum53 N | 11.915 lbfTensile Load, short term, maximum178 N | 40.016 lbf

**Compression** 10 N/mm | 57.101 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** 500 m | 1,640.42 ft

**Optical Specifications** 

Fiber Type OM3, LazrSPEED® 300 | OM3, LazrSPEED® 300

### **Environmental Specifications**

Installation temperature  $-20 \,^{\circ}\text{C}$  to  $+70 \,^{\circ}\text{C}$  (-4 °F to +158 °F)

Operating Temperature  $-20 \,^{\circ}\text{C}$  to  $+70 \,^{\circ}\text{C}$  (-4 °F to +158 °F)

Storage Temperature  $-40 \,^{\circ}\text{C}$  to  $+70 \,^{\circ}\text{C}$  (-40 °F to +158 °F)

Cable Qualification Standards ANSI/ICEA S-83-596 | Telcordia GR-409

Environmental Space Riser

Flame Test Listing NEC OFNR (ETL) and c(ETL)

Flame Test Method UL 1666

# **Environmental Test Specifications**

**Heat Age**  $-20 \, ^{\circ}\text{C} \text{ to } +85 \, ^{\circ}\text{C} \, (-4 \, ^{\circ}\text{F to } +185 \, ^{\circ}\text{F})$ 

**Heat Age Test Method** IEC 60794-1 F9

**Low High Bend** -20 °C to +70 °C (-4 °F to +158 °F)

**Low High Bend Test Method** FOTP-37 | IEC 60794-1 E11

**Temperature Cycle** -20 °C to +70 °C (-4 °F to +158 °F)

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**Temperature Cycle Test Method** FOTP-3 | IEC 60794-1 F1

Packaging and Weights

**Cable weight** 5.8 kg/km | 3.897 lb/kft

Regulatory Compliance/Certifications

Agency Classification

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



#### Included Products

CS-5L-TB – LazrSPEED® 300 OM3 Bend-Insensitive Multimode

Fiber

#### \* Footnotes

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



### LazrSPEED® 300

#### LazrSPEED® 300 OM3 Bend-Insensitive Multimode Fiber

#### **Product Classification**

 Portfolio
 CommScope®

 Product Type
 Optical fiber

General Specifications

Cladding Diameter 125  $\mu$ m

Cladding Diameter Tolerance  $\pm 0.8 \, \mu$ m

Cladding Non-Circularity, maximum 1 %

Coating Diameter (Colored) 254  $\mu$ m

Coating Diameter (Uncolored) 245  $\mu$ m

Coating Diameter Tolerance (Colored)  $\pm 7 \, \mu$ m

Coating Diameter Tolerance (Uncolored)  $\pm 10 \, \mu$ m

Coating/Cladding Concentricity Error, maximum 12 µm

Core Diameter 50  $\mu m$  2.5  $\mu m$ 

**Proof Test** 689.476 N/mm<sup>2</sup> | 100000 psi

Tight Buffer Diameter900 μmTight Buffer Diameter Tolerance±40 μm

Mechanical Specifications

 Macrobending, 15 mm Ø mandrel, 2 turns
 0.20 dB @ 850 nm | 0.50 dB @ 1,300 nm

 Macrobending, 30 mm Ø mandrel, 2 turns
 0.10 dB @ 850 nm | 0.30 dB @ 1,300 nm

 Macrobending, 75 mm Ø mandrel, 100 turns
 0.50 dB @ 1,300 nm | 0.50 dB @ 850 nm

Coating Strip Force, maximum8.9 N | 2.001 lbfCoating Strip Force, minimum1.3 N | 0.292 lbf

**Dynamic Fatigue Parameter, minimum** 18

**Optical Specifications** 

Numerical Aperture 0.2

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Numerical Aperture Tolerance ±0.015

Point Defects, maximum 0.15 dB

**Zero Dispersion Slope, maximum** 0.105 ps/[km-nm-nm]

**Zero Dispersion Wavelength, maximum** 1316 nm **Zero Dispersion Wavelength, minimum** 1297 nm

#### Optical Specifications, Wavelength Specific

**1 Gbps Ethernet Distance** 1,020 m @ 850 nm | 600 m @ 1,300 nm

**10 Gbps Ethernet Distance** 300 m @ 850 nm

**Attenuation, maximum** 1.00 dB/km @ 1,300 nm | 3.00 dB/km @ 850 nm

**Backscatter Coefficient** -68.0 dB @ 850 nm | -75.7 dB @ 1,300 nm

 Bandwidth, Laser, minimum
 2,000 MHz-km @ 850 nm | 500 MHz-km @ 1,300 nm

 Bandwidth, OFL, minimum
 1,500 MHz-km @ 850 nm | 500 MHz-km @ 1,300 nm

**Differential Mode Delay** 0.70 ps/m @ 850 nm | 0.88 ps/m @ 1,300 nm

**Differential Mode Delay Note**Superior to TIA-492AAAC and IEC 60793-2-10 at 850 nm

**Index of Refraction** 1.479 @ 1,300 nm | 1.483 @ 850 nm

Standards Compliance TIA-492AAAC (OM3)

#### **Environmental Specifications**

**Heat Aging, maximum** 0.20 dB/km @ 85  $^{\circ}$ C

Temperature Dependence, maximum0.1 dB/kmTemperature Humidity Cycling, maximum0.2 dB/km

**Water Immersion, maximum** 0.20 dB/km @ 23 °C

### Regulatory Compliance/Certifications

#### Agency Classification

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

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