# P-072-MP-6F-F12

Fiber indoor cable, OptiSPEED® Plenum MPO Trunk, 72 fiber multi-unit with 12 fiber subunits, Multimode OM1, Gel-free, 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** P-MP

General Specifications

Cable Type MPO trunk cable

Construction Type Non-armored

Fiber Type, quantity 72

Fibers per Subunit, quantity 12

Jacket Marking Feet

Subunit Type Gel-free

Subunit, quantity 6

Total Fiber Count 72

**Dimensions** 

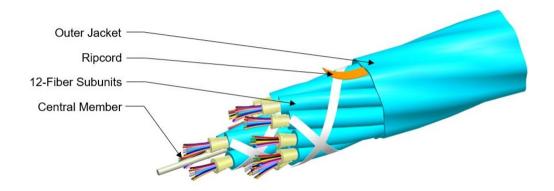
**Buffer Tube/Subunit Diameter** 3 mm | 0.118 in

**Diameter Over Jacket** 10.7 mm | 0.421 in

Representative Image



# P-072-MP-6F-F12



## Mechanical Specifications

Minimum Bend Radius, loaded 161 mm | 6.339 in

Minimum Bend Radius, unloaded 107 mm | 4.213 in

**Tensile Load, long term, maximum** 400 N | 89.924 lbf

Tensile Load, short term, maximum 1335 N | 300.12 lbf

**Compression** 10 N/mm | 57.101 lb/in

**Compression Test Method** FOTP-41 | IEC 60794-1 E3

Flex 300 cycles

FIEX 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** 368 m | 1,207.349 ft

Optical Specifications

Fiber Type OM1, OptiSPEED® | OM1, OptiSPEED®

## **Environmental Specifications**

Installation temperature0 °C to +70 °C (+32 °F to +158 °F)Operating Temperature0 °C to +70 °C (+32 °F to +158 °F)Storage Temperature-40 °C to +70 °C (-40 °F to +158 °F)

Page 2 of 5



## P-072-MP-6F-F12

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

Environmental Space Plenum

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

Flame Test Method NFPA 262

**Environmental Test Specifications** 

**Heat Age** 0 °C to +85 °C (+32 °F to +185 °F)

Heat Age Test Method IEC 60794-1 F9

**Low High Bend** 0 °C to +70 °C (+32 °F to +158 °F)

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

**Temperature Cycle**  $0 \,^{\circ}\text{C to } +70 \,^{\circ}\text{C (+32 °F to } +158 \,^{\circ}\text{F)}$ 

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

Packaging and Weights

**Cable weight** 111 kg/km | 74.589 lb/kft

Regulatory Compliance/Certifications

Agency Classification

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



#### Included Products

CS-6F-MP - OptiSPEED® OM1 Multimode Fiber

#### \* Footnotes

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



## OptiSPEED® OM1 Multimode Fiber

# OptiSPEED®

#### **Product Classification**

Portfolio CommScope®
Product Type Optical fiber

General Specifications

Cladding Non-Circularity, maximum 1 %

Coating Diameter (Colored) 254 µm

Coating Diameter (Uncolored) 245 µm

**Coating Diameter Tolerance (Colored)** ±7 μm

**Coating Diameter Tolerance (Uncolored)** ±10 μm

Coating/Cladding Concentricity Error, maximum 12 µm

**Core Diameter** 62.5 μm

**Core Diameter Tolerance** ±2.5 µm

Core/Clad Offset, maximum 1 µm

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

## Mechanical Specifications

**Macrobending, 75 mm 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**



# CS-6F-MP

Numerical Aperture 0.275

Numerical Aperture Tolerance ±0.015

Point Defects, maximum 0.15 dB

**Zero Dispersion Slope, maximum** 0.097 ps/[km-nm-nm]

Zero Dispersion Wavelength, maximum1365 nmZero Dispersion Wavelength, minimum1320 nm

## Optical Specifications, Wavelength Specific

**1 Gbps Ethernet Distance** 300 m @ 850 nm | 550 m @ 1,300 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, OFL, minimum** 220 MHz-km @ 850 nm | 500 MHz-km @ 1,300 nm

**Index of Refraction** 1.491 @ 1,300 nm | 1.496 @ 850 nm

Standards Compliance TIA-492AAAA (OM1)

## **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

COMMSCOPE®