# MIC® Plenum Cables, 2-24 Fibers

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## Features and Benefits

**900 µm TBII® Buffered Fibers**
Easy, consistent stripping

**All-dielectric cable construction**
Requires no grounding or bonding

**Flame-retardant jacket**
Rugged and durable

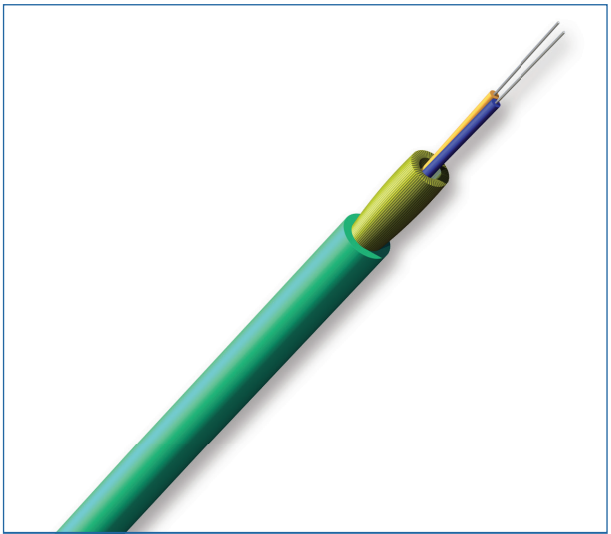
## Standards

| | |
|---|---|
| Approvals and Listings | National Electrical Code® (NEC®) OFNP, CSA FT-6, ICEA S-83-596 |
| Flame Resistance | NFPA 262 (for plenum, riser and general building applications) |

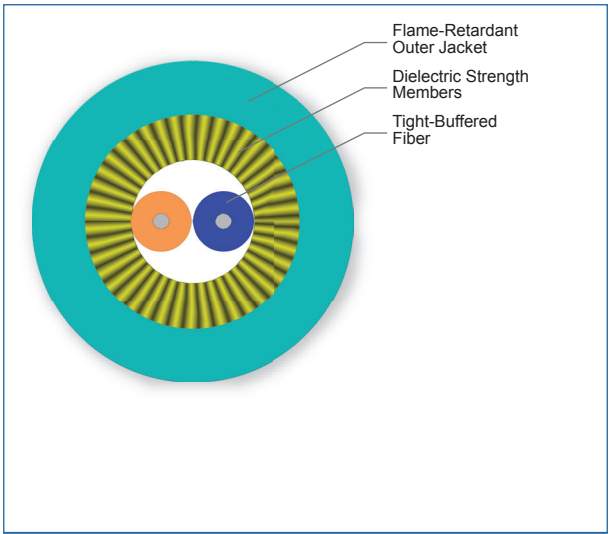
Corning MIC® plenum cables are designed for use in plenum, riser and general purpose environments for intrabuilding backbone and horizontal installations. These multifiber cables use 900 µm TBII® buffered fibers to allow easy, consistent stripping and to facilitate termination. The fibers are surrounded by dielectric strength members and protected by a flame-retardant outer jacket.

The all-dielectric cable construction requires no grounding or bonding. MIC plenum cables are ideal for routing inside buildings, within plenum areas and riser shafts, to the telecommunications rooms and workstations. The MIC plenum cables meet the application requirements of the National Electrical Code® (NEC®) Article 770 and are OFNP and FT-6 listed.

*This cable is available in 12 different jacket colors – blue, orange, green, brown, slate, white, red, black, yellow, violet, rose and aqua. The colored jacket allows for easy visual identification of the cables. The standard jacket color will be determined by the dominant fiber type in the cable and will use the standard part numbers shown here. Contact Customer Care at 1-800-743-2675 to order other color options.*



**MIC Plenum Cables, 2 Fibers**
| Photo PIM0879




**MIC Plenum Cables, 2 Fibers**
| Photo PIM1779



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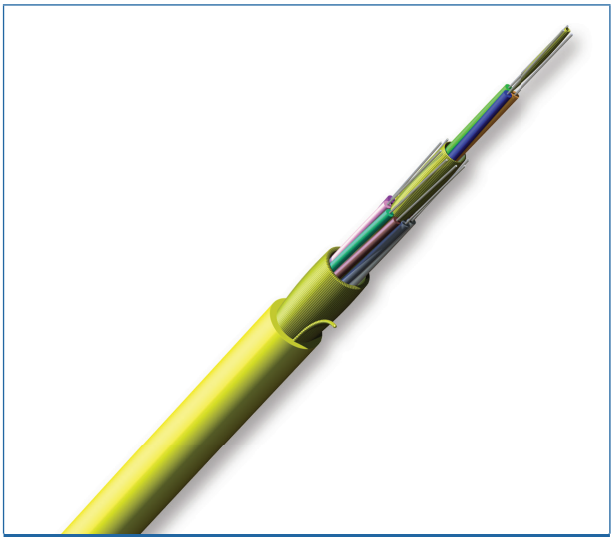
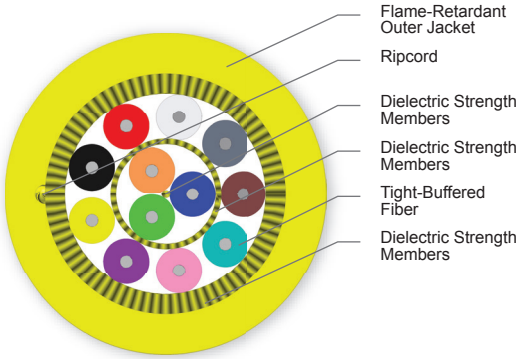


**MIC Plenum Cables, 12 Fibers** | Photo PIM0889




**MIC Plenum Cables, 12 Fibers** | Photo PIMtbd

## Specifications

| Temperature Range | |
|---|---|
| Storage | -40 °C to 70 °C (-40 °F to 158 °F) |
| Installation | 0 °C to 60 °C (32 °F to 140 °F) |
| Operation | 0 °C to 70 °C (32 °F to 158 °F) |

** Note: Corning recommends storing cable in a proper temperature environment prior to installation to allow the cable temperature to meet installation temperature range specifications for best installation results.*

| | |
|---|---|
| Max. Tensile Strength, Short-Term | 440 N (100 lbf) |
| Max. Tensile Strength, Long-Term | 132 N (30 lbf) |

| Mechanical Characteristics Cable | | | | | | |
|---|---|---|---|---|---|---|
| Fiber Count | Central Element | Nominal Outer Diameter | Min. Bend Radius Installation | Min. Bend Radius Operation | Weight | Product Type |
| Dual-Layer | | | | | | |
| 12 | Yarn | 6.1 mm (0.24 in) | 92 mm (3.6 in) | 31 mm (1.2 in) | 37 kg/km (26 lb/1000 ft) | Distribution |
| 18 | Yarn | 7.4 mm (0.29 in) | 111 mm (4.4 in) | 74 mm (2.9 in) | 56 kg/km (40 lb/1000 ft) | Distribution |
| 24 | Yarn | 7.8 mm (0.31 in) | 117 mm (4.6 in) | 78 mm (3.1 in) | 64 kg/km (45 lb/1000 ft) | Distribution |



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| Mechanical Characteristics Cable | | | | | | |
|---|---|---|---|---|---|---|
| Fiber Count | Central Element | Nominal Outer Diameter | Min. Bend Radius Installation | Min. Bend Radius Operation | Weight | Product Type |
| Multimode | | | | | | |
| 4 | Yarn | 5.3 mm (0.21 in) | 80 mm (3.2 in) | 27 mm (1.1 in) | 25 kg/km (17 lb/1000 ft) | Distribution |
| Single-Layer | | | | | | |
| 2 | Yarn | 5 mm (0.2 in) | 75 mm (3 in) | 25 mm (1 in) | 21 kg/km (15 lb/1000 ft) | Distribution |
| 4 | Yarn | 5.3 mm (0.21 in) | 80 mm (3.2 in) | 27 mm (1.1 in) | 25 kg/km (17 lb/1000 ft) | Distribution |
| 6 | Yarn | 5.3 mm (0.21 in) | 80 mm (3.2 in) | 27 mm (1.1 in) | 27 kg/km (19 lb/1000 ft) | Distribution |
| 8 | Jacketed GRP | 5.9 mm (0.23 in) | 89 mm (3.5 in) | 59 mm (2.3 in) | 35 kg/km (25 lb/1000 ft) | Distribution |

## Transmission Performance

| Multimode | | | | | |
|---|---|---|---|---|---|
| Fiber Core Diameter (µm) | 62.5 | 50 | 50 | 50 | 50 |
| Fiber Category | OM1 | OM2 | OM3 | OM4 | OM4 Extended Distance |
| Fiber Code | K | T | T | T | T |
| Performance Option Code | 30 | 31 | 80 | 90 | 91 |
| Wavelengths (nm) | 850/1300 | 850/1300 | 850/1300 | 850/1300 | 850/1300 |
| Maximum Attenuation (dB/km) | 3.4/1.0 | 2.8/1.0 | 2.8/1.0 | 2.8/1.0 | 2.8/1.0 |
| Serial 1 Gigabit Ethernet (m) | 200/500 | 750/600 | 1000/600 | 1100/600 | 1100/600 |
| Serial 10 Gigabit Ethernet (m) | 220/- | 150/- | 300/- | 550/- | 600/- |
| Min. Overfilled Launch (OFL) Bandwidth (MHz*km) | 300/550 | 700/500 | 1500/500 | 3500/500 | 3500/500 |
| Minimum Effective Modal Bandwidth (EMB) (MHz*km) | 33/- | 950/- | 2000/- | 4700/- | 5350/- |

** Assumes 1.0 dB maximum total connector/splice loss.*
** Assumes 0.7 dB maximum total connector/splice loss.*
** Meets 0.75 ns optical skew when used in all Corning Plug and Play™/Pretium EDGE® systems solutions.*
** ITU-T G.652 D compliant.*

*Notes:* 1) *Improved attenuation and bandwidth options available.*
2) *Bend-insensitive single-mode fibers available on request.*
3) *Contact a Corning Customer Care Representative for additional information.*
4) *50 µm multimode fiber macrobend loss ≤ 0.2 dB at 850 nm for two turns around 7.5 mm radius mandrel.*



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| Single-mode | | |
|---|---|---|
| Fiber Name | SMF-28e® fiber | ClearCurve® XB** |
| Fiber Category | G.652.D | G.652.D/G.657.A1 |
| Fiber Code | E | H |
| Performance Option Code | 31 | 31 |
| Wavelengths (nm) | 1310/1383/1550 | 1310/1383/1550 |
| Maximum Attenuation (dB/km) | 0.65/0.65/0.50 | 0.65/0.65/0.5 |

## Ordering Information | *Note: Contact Customer Care at 1-800-743-2675 for other options.*

□ □ □ □ 8 8 - 3 □ 1 □ □ - 2 9

1 2 3 4 5 6 7 8 9 10

**1** Select fiber count.
Standard offerings:
002 006 012 024
004 008 018

**2** Select fiber code.
K = 62.5 µm multimode (OM1)
T = 50 µm multimode (OM2/OM3/OM4/OM4+)
E = Single-mode (OS2) SMF-28e+® fiber
H = ClearCurve® XB Single-mode (OS2)

**3** Defines cable type.
8 = Standard for MIC® cable

**4** Defines outer jacket.
8 = Standard for plenum

**5** Defines fiber placement.
3 = Standard

**6** Select length markings.
1 = Markings in ft (fiber count ≤ 10)
3 = Markings in ft (fiber count > 10)

**7** Defines tensile strength.
1 = See specifications

**8** Select performance option code.
30 = 62.5 µm multimode (OM1)
31 = 50 µm multimode (OM2)
80 = 50 µm multimode (OM3)
90 = 50 µm multimode (OM4)
91 = 50 µm multimode (OM4+)
31 = Single-mode (OS2)
(Max. attenuation .65 / .65 / 0.5 dB/km)

**9** Defines cable type.
- = Standard for MIC cable

**10** Defines special requirements.
29 = Standard for MIC plenum cable

*Note: This cable is available in 12 different jacket colors – blue, orange, green, brown, slate, white, red, black, yellow, violet, rose and aqua. The colored jacket allows for easy visual identification of the cables while still providing all of the required environmental protection of an indoor/outdoor cable jacket. Black is the standard jacket color using the part numbers shown here. Contact Customer Care at 1-800-743-2675 to order other color options.*



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## *Notes*

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