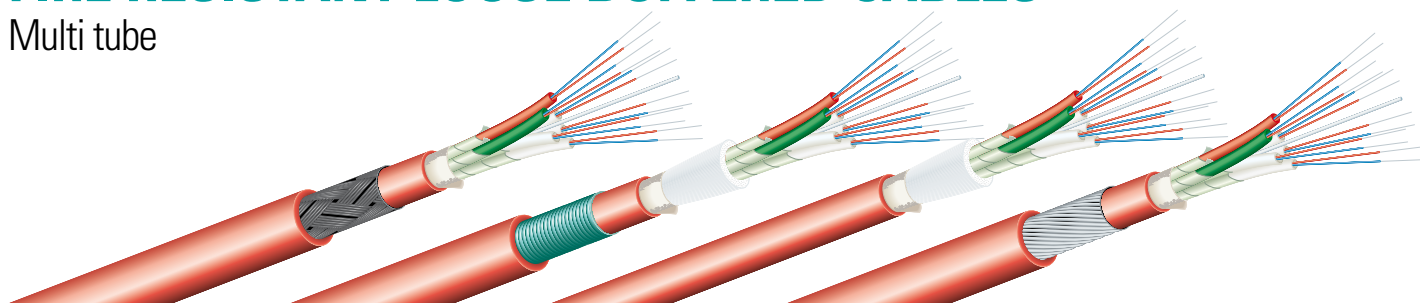


FIRE RESISTANT LOOSE BUFFERED CABLES

Multi tube



MLO-000-**-M1-A1-FR
MLO-000-**-M1-A3-FR
MLO-000-**-M1-A5-FR
MLO-000-**-M1-A7-FR

FEATURES & APPLICATIONS

- Safety Systems, Critical Connections and Fire Fighting Systems
- Indoor and outdoor installation
- Tunnels and closed areas in general

TEMPERATURE RANGE

-40/+70°C (operating)
-40/+70°C (storage)
-10/+60°C (installation)

MINIMUM BENDING RADIUS

20 times overall diameter (dynamic)
10 times overall diameter (static)

CABLE CONSTRUCTION

Fibres

Singlemode and multimode fibres, with loose technology coating.

Structure

The jelly filled tubes containing the fibres are individually wound with a mica tape and are cabled around a central steel or FRP (fibreglass reinforced plastic) element. When necessary glass yarn is the traction element. A flame resistant tape improves fire resistance.

Inner sheath

LSZH (M1) compound (only for A1, A3 and A7 armoured cables)

Armouring

A1 Galvanized steel wire braid
A3 Corrugated steel tape
A5 Anti-rodent glass yarns
A7 Steel wire armour

Outer sheath

LSZH (M1) compound

APPLICABLE STANDARDS

Optical fibre characteristics IIEC 60793-1

Optical fibre cable characteristics IEC 60794-1

Fire resistant IEC 60331-25

Fire retardant IEC 60332-3 EN 60332-3

Flame retardant IEC 60332-1 EN 60332-1

Test on gases evolved during combustion IEC 60744-2 EN 60754-2

Low smoke emission IEC 61034-2 EN 61034-2

| Type | Fibre (n° max) | Tube Diameter (mm) | Diameter (mm) | Weight (kg/km) | Tension load (N) | Crush (N/100mm) |
|-------------------------------|----------------|--------------------|---------------|----------------|------------------|-----------------|
| A1 METALLIC ARMoured | | | | | | |
| MLO-000-**(n)-M1-A1-FR | 72 | 2.0 | 15.0 | 280 | 2000 | 3000 |
| MLO-000-**(n)-M1-A1-FR | 96 | 2.0 | 17.5 | 310 | 2000 | 3000 |
| MLO-000-**(n)-M1-A1-FR | 144 | 2.0 | 21.5 | 350 | 2000 | 3000 |
| A3 METALLIC ARMoured | | | | | | |
| MLO-000-**(n)-M1-A3-FR | 72 | 2.0 | 14.8 | 270 | 3000 | 3500 |
| MLO-000-**(n)-M1-A3-FR | 96 | 2.0 | 18.5 | 350 | 3000 | 3500 |
| MLO-000-**(n)-M1-A3-FR | 144 | 2.0 | 22.5 | 450 | 3500 | 3500 |
| A5 DIELECTRIC ARMoured | | | | | | |
| MLO-000-**(n)-M1-A5-FR | 72 | 2.0 | 15.0 | 230 | 3000 | 2500 |
| MLO-000-**(n)-M1-A5-FR | 96 | 2.0 | 16.5 | 250 | 3000 | 2500 |
| MLO-000-**(n)-M1-A5-FR | 144 | 2.0 | 20.5 | 280 | 3000 | 2500 |
| A7 METALLIC ARMoured | | | | | | |
| MLO-000-**(n)-M1-A7-FR | 72 | 2.0 | 15.0 | 360 | 3500 | 4000 |
| MLO-000-**(n)-M1-A7-FR | 96 | 2.0 | 16.5 | 390 | 4000 | 4000 |
| MLO-000-**(n)-M1-A7-FR | 144 | 2.0 | 18.5 | 430 | 4000 | 4000 |

approximate values