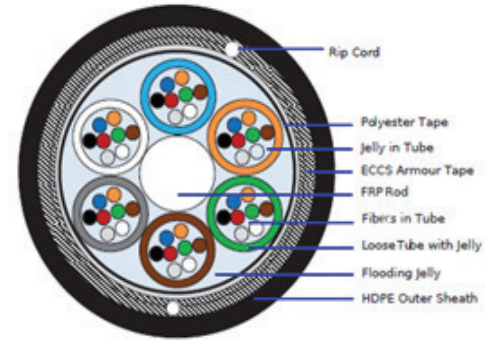


Outdoor Loose Tube Armored 9/125 μ m OS2 Type Optical Cable

Cable containing up to 48 optical fibers in water blocked loose tubes and solid polyethylene fillers, total of 6 elements laid-up around a fiber reinforced plastic (FRP) central strength member, water blocked interstices, taped, corrugated steel tape armored, HDPE overall sheathed.



SPECIFICATIONS

Commercial Standards

Specifications

ISO/IEC 11801 - 2nd Edition, type OS2;
AS/ACIF S008; AS/NZS 3080, EIA/TIA 568.3-D
ITU-T REC G 652D spec for Low Water Peak
fiber; supports 10G + data applications
Complies with Telcordia GR20, IEC-60793-2-
50 and TIA/EIA 492- CAAB standards

RoHS Complaint

Construction Details

Number of elements: 6

Design of Cable: Wet - Wet

No. of Fibers per tube: 1-12 F

Color of Fibers in Tube: Blue, Orange,
Green, Brown, Grey,
White

Color of Tubes: Blue, Orange, Green,
Brown, Grey, White

No. of tubes and dummies: As required

Loose tube diameter: 2.0 \pm 0.1mm

Central Strength Member: Fiber
Reinforced Plastic (FRP)

Armoring: ECCS Tape

Fiber protection (Tubes): Polybutylene

Terephthalate (PBT)

Core Wrapping: Polyester Tape

Water Blocking: Thixotropic Gel (Tube)
Petroleum Jelly
(Interstices)

Outer Sheath: Anti Rodent, Anti
Termite and UV HD
Polyethylene- Black

Outer Sheath thickness: 1.8 mm (nominal)

**Dimensions and Mass Overall Cable
(Nominal):** 11.0 \pm 1mm

Mass (Nominal): 135 \pm 10 kg/km

Standard length: 2 km \pm 5%

Mechanical

Min. Bending Radius (during full load):
20D; D is OD

Max. Tensile Strength- Short Term:
3500N

Max. Tensile Strength- Long Term: 2500N

Min. Crush Resistance: 4400N/10cm

Operating Temperature range:
-40°C to 75°C

Physical

Core Diameter: 9.2 \pm 0.4 μ m

Cladding Diameter: 125 \pm 1.0 μ m

Coating Diameter: 245 \pm 10 μ m

Coating cladding Concentricity Error:
 \leq 12.0 μ m

Optical

Max. Attenuation:

At 1310 nm: 0.34 dB/km

At 1550 nm: 0.20 dB/km

Chromatic Dispersion

1285-1330nm: \leq 3.5 ps/nm.km

1550nm: \leq 18.0 ps/nm.km

Zero Dispersion Wavelength: 1302 to
1322nm

Zero Dispersion Slope: \leq 0.091 ps/nm².km

Cable cut-off wavelength: \leq 1260 nm

Mode Field Diameter at 1310nm:

92 \pm 0.5 μ m

Core clad Concentricity Error: \leq 0.8 μ m

Cladding Non-Circularity: \leq 1 %

Polarization mode dispersion: \leq 0.2ps/km

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SPECIFICATIONS

Cable Test

Tensile Test:	Change in Attenuation ≤ 0.05 dB/km	Temperature Cycling Test:	Change in Attenuation ≤ 0.05 dB/km
Crush Test:	Change in Attenuation ≤ 0.05 dB/km	Cable Aging Test:	Change in Attenuation ≤ 0.05 dB/km
Impact test:	Change in Attenuation ≤ 0.05 dB/km	Flexural Rigidity Test:	Change in Attenuation ≤ 0.05 dB/km
Repeated Bend Test:	Change in Attenuation ≤ 0.05 dB/km	Test of Figure of Eight:	Change in Attenuation ≤ 0.05 dB/km
Torsion Test:	Change in Attenuation ≤ 0.05 dB/km	Static Bend Test:	Change in Attenuation ≤ 0.05 dB/km
Kink Test:	Change in Attenuation ≤ 0.05 dB/km	Water Penetration Test:	No leak at the other end
Cable Bend Test:	Change in Attenuation ≤ 0.05 dB/km		

Fiber Count	Fiber Per tube	Tubes	Fillers
6	6	1	5
12	6	2	4
24	6	4	2
48	8	6	0

ORDERING INFORMATION

Order No.	SAP No.	Description
ZFOAJXXXOS2-BP	Consult Molex	XXX Core, Outdoor, Loose Tube Armored, 9/125μm, OS2 Type Fiber Cable

www.molexces.com/products/fiber/cables/