

Multi-tube FRP Rod Armoured Cable (2-144 F)

Multi Loose Tube Design
Suitable For Direct Burial Installation



Water blocked



Rodent resistant



Outdoor



Underground



Metro



Impact resistant

Applications

- Direct burial / Inside duct
- In areas where high pulling force is required
- In areas where complex cable run is required

Cable Construction

- Singlemode fibre in full compliance with ITU-T G.652D
- Non-metallic and anti-buckling element FRP rod used as Central Strength Member.
- Loose buffer tubes fully filled Thixotropic Jelly
- Cable core is fully filled with Thixotropic Jelly
- Cable core is wrapped with Polyester Tape
- Loose buffer tubes S-Z Stranded
- S-Z core wrapped with polyester tape
- UV Stabilized HDPE inner sheath, black
- FRP rods for armouring
- UV Stabilized HDPE outer sheath, black

Special Features

- Single layer stranded construction.
- Completely dielectric construction
- Rugged & robust design

Mechanical Characteristics

Temperature Range (IEC 60794-1-2-F1)

Laying and Installation	-30° to +70° C
Operation	-30° to +70° C
Transport and Storage	-30° to +70° C

Cable Bending Radius (IEC 60794-1-2-E11)

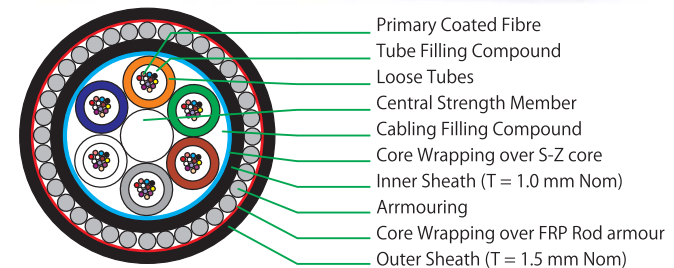
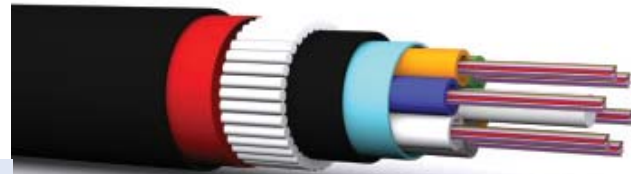
During Installation (Full Load)	20 x D, D = Cable D
Installed (No Load)	15 x D, D = Cable D
Repeated Bending (IEC 60794-1-2-E6)	30 Cycle, 20 X D, 5 Kg Load, D = Cable D

Tensile Force (IEC 60794-1-2-E1)

During Installation	5000 N
Installed	2500 N
Torsion Resistance (IEC 60794-1-2-E7)	10 Cycle (± 180°) 5 Kg Weight, L= 2 Mtr
Crush Resistance (IEC 60794-1-2-E3)	5000 N (100 X 100 mm) for 60 sec
Impact Resistance (IEC 60794-1-2-E4)	Height 500 mm, Weight = 5 Kg, 10 Nos at Different Place
Kink Resistance (IEC 60794-1-2-E10)	20 x D, D = Cable D
Water Penetration (IEC 60794-1-2-F5)	1 Mtr Water Head, 3 Meter Cable Sample, 24 Hours

Variants*

- *Cable can be supplied with singlemode (ITU-T G652, G655, G656, G657) & Multimode (50µ, 62.5µ & OM3) or combination of these
- *Cable construction can be dry core or jelly filled
- *Outer jacket can be of PVC, Nylon, LSZH, HDPE
- *Strength member can be Steel or FRP
- *Rip cord can be of aramid or polyester
- *These are general characteristics, customized designs are available as per requirements



MULTI TUBE DESIGN

FIBRE COUNT	DIAMETER (mm) Nominal	WEIGHT (Kg./Km) Nominal	TENSILE STRENGTH (N)		BENDING RADIUS (mm)	
			Installation	Operating	Temporary	Permanent
UPTO 48F	14	180	5000	2500	20D	15D
UPTO 72F	15	210	5000	2500	20D	15D
UPTO 96F	16.5	240	5000	2500	20D	15D
UPTO 144F	19.5	340	5000	2500	20D	15D

Drum Length

2000/ 3000/ 4000 meters ± 5%

Cable Sheath Marking

Cable sheath shall be marked in white colour with hot foil indentation method. Marking details can be customized. Below mentioned details are generally marked on the cable sheath.

Telephone Symbol, Laser Symbol, Number of Fibres, Type of Fibre (G 652 D), Unarm, Month & Year of Manufacturing, Manufacturer's Name, Customer Name, Sequential Meter Marking & Drum Number

Cable Drum Packing

Every length will be delivered on non-returnable wooden drums. Generally the cable drum flange will be marked with following: These details can also be customised.

- Arrow showing rolling direction of the drum.
- Country of origin.
- Manufacturer's name/ Customised
- Number of fibers.
- Nominal cable length in meters
- Net and gross weight.
- Drum number
- Caution - Optical Fibre Cable Not to be Laid Flat
- Customer's name and destination

Both ends of the cable shall be sealed to prevent the ingress of moisture during transportation and storage, physical damage.