



leader  
optec

# PRE-TERMINATED LOOSE TUBE ASSEMBLIES

SM

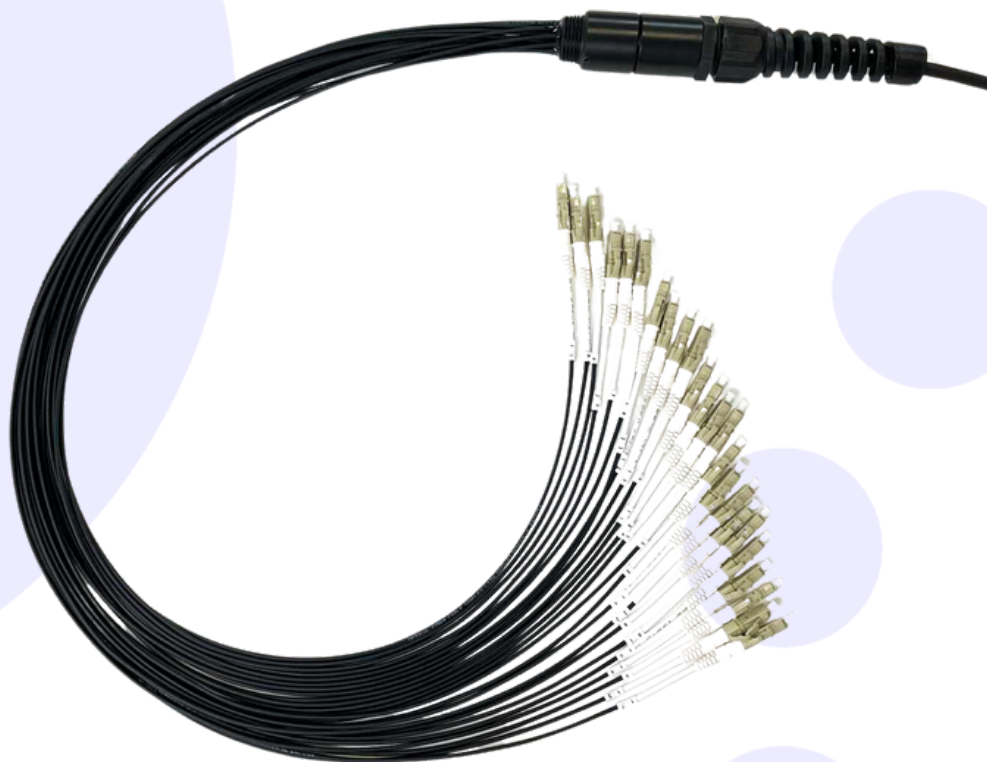
OM1

OM2

OM3

OM4

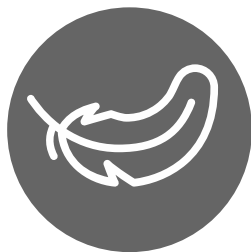
OM5



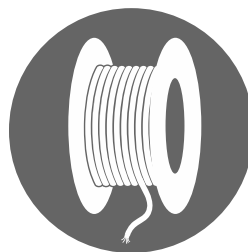
Versatile design offering superior protection, with ruggedised tails to protect fibres against harsh conditions



Bespoke UK  
Manufacture



Lightweight  
Cable Design



Supplied On A Drum  
For Ease of Install



Versatile: Dry/  
Gel Filled Tubes

**fibre optic assembly specialists**

VERSION 1 MARCH 2024

FIBRE OPTIC ASSEMBLIES



sales@leaderoptec.com



www.leaderoptec.com

# PRE-TERMINATED LOOSE TUBE ASSEMBLIES



Built for data centres, outdoor deployments, and industrial settings, our pre-terminated loose tube fibre optic assemblies offer the perfect blend of strength and flexibility. Featuring superior protection for individual fibres, these cables ensure reliable performance in even the most challenging conditions.

With excellent water resistant properties, these assemblies are ideal for outdoor deployments and ducts. Fitted with ruggedised tails and gland for use within panels or direct patching. Suited to campus links where outdoor to indoor transition is required.

Available in Single-mode and Multimode, all of our pre-terminated assemblies are manufactured in our dedicated UK facility, custom made to your specifications.

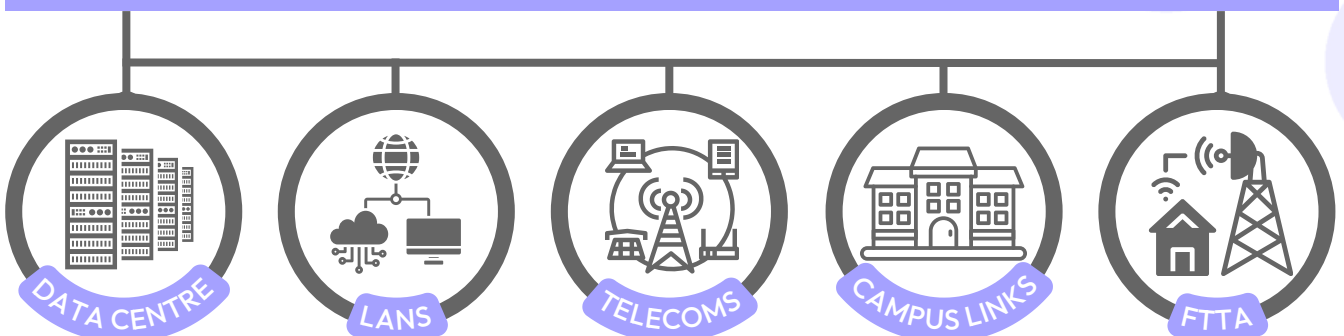
## FEATURES

- ✓ **UK Manufacture:**  
Bespoke design, high precision, consistent quality and fast turnaround.
- ✓ **Ruggedised Tails:**  
Enabling direct point to point patching, or used within a patch panel.
- ✓ **Slim, Water Resistant Cable:**  
Loose Tube cables are slim and lightweight by design, with water resistant properties.
- ✓ **E-Glass Protection:**  
These durable cables offer a good level of protection against rodents.
- ✓ **CPR - Eca to B2ca Rated:**  
Available with fire rated cable.

## BENEFITS

- ✓ **Pre-Terminated Solution:**  
No onsite termination required; enabling for faster, more efficient installation.
- ✓ **Best Suited to Outdoor & Ducts:**  
Loose Tube cables can withstand outdoor application and harsh conditions.
- ✓ **Custom Made & Fast Turnaround:**  
Factory terminated connectors provide lowest guaranteed losses.
- ✓ **Space-Saving:**  
Smaller cable diameter for a high fibre count, compared to a tight buffered cable.
- ✓ **Versatility:**  
Gel filled tubes are ideal for outdoor/duct use & dry tube styles suited to indoor use.

## APPLICATIONS



**fibre optic assembly specialists**

VERSION 1 MARCH 2024



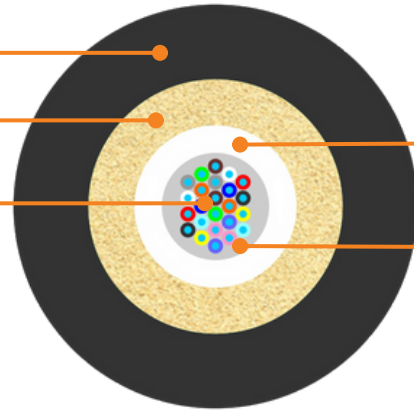
# PRE-TERMINATED LOOSE TUBE ASSEMBLIES



## CABLE CONSTRUCTION

- Central Loose Tube.
- Gel filled & dry tube options.
- Multiple 250µm fibres.
- E-Glass protection.
- 6-6.5mm jacket LSZH.
- PE, PUR & Mil-Tac jackets available.
- CPR - Eca, Dca, Cca, B2ca.

PE/LSZH  
Outer Jacket  
E-Glass  
Optical Fibres



**NB: Construction of a gel filled Loose Tube cable**  
Buffer Tube  
Thixotropic Gel

## SPECIFICATIONS

Element	Characteristic
Fibre Mode	Single-mode Multimode: OM1, OM2, OM3, OM4, OM5
Fibre Count	2, 4, 8, 12, 16, 24
Connector Options	LC, SC, ST, FC, E2000, MU Uniboot: LC, MDC, SN & CS Polish: UPC & APC
Cable (LSZH)	Black Outer Jacket: 6-6.5mm
	Nominal Weight: 64-74 (kg/km)
Crush Resistance	2000N/100mm <sup>2</sup>
Bend Radius	Install: 20D, Static: 10D
Temperature Range	-20°C ~ +70°C

Connector Type	IL Typical	IL Maximum	Return Loss
Single-mode UPC	<0.25dB	<0.35dB	≥50dB
Single-mode APC	<0.25dB	<0.35dB	≥60dB
Multimode UPC & APC	<0.25dB	<0.50dB	≥25dB



# PRE-TERMINATED LOOSE TUBE ASSEMBLIES



FIBRE OPTIC ASSEMBLIES

## FIBRE SPECIFICATIONS

Fibre Mode	Fast Ethernet	1000Base-SX	10GBase-SR	40GBase-SR4	100GBase-SR10
Multimode OM1	2km	275m	33m	n/a	n/a
Multimode OM2	2km	550m	82m	n/a	n/a
Multimode OM3	2km	800m	300m	100m	100m
Multimode OM4	2km	1100m	400m	150m	150m
Multimode OM5	2km	1100m	400m	150m	150m
Single-mode OS1/OS2	40km	100km	40km	40km	40km

Fibre Mode	Core/Cladding (µm)	Wavelength	Maximum Attenuation
Multimode OM1	62.5/125	850-nm	3.5dB/km
		1300-nm	1.5dB/km
Multimode OM2	50/125	850-nm	3.5dB/km
		1300-nm	1.5dB/km
Multimode OM3	50/125	850-nm	3.0dB/km
		1300-nm	1.5dB/km
Multimode OM4	50/125	850-nm	3.0dB/km
		1300-nm	1.5dB/km
Multimode OM5	50/125	850-nm	3.0dB/km
		923-nm	2.3dB/km
		1300-nm	1.5dB/km
Single-mode	9/125	1310-nm	1.0dB/km
		1550-nm	0.5dB/km

**fibre optic assembly specialists**

VERSION 1 MARCH 2024



sales@leaderoptec.com



www.leaderoptec.com

# PRE-TERMINATED LOOSE TUBE ASSEMBLIES



## BREAKOUT STYLES

- S-Line 14mm diameter with 12x 2mm tails.
- M-Line 28mm diameter with 24x 2mm tails.
- Tail lengths from 0.3m to 2.5m.
- Tails contain one or two fibres.
- Staggered tails to fit protection tube.
- Can be staggered in pairs if required.
- Simplex connectors for single fibre tails.
- Uniboot options for two fibre tails.



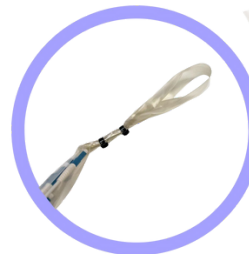
## PROTECTION OPTIONS

Non-Staggered Tails	
Option	Pull Force
Braided sleeve with pulling eye	50N
PVC sleeve with pulling eye	30N

Staggered Tails	
Option	Pull Force
Braided sleeve with pulling eye	50N
PVC sleeve with pulling eye	30N
Clear tube (28mm widest point)	400N
Reinforced tube (35mm widest point)	400N



Braided sleeve



PVC sleeve



Clear tube



Reinforced tube

