

OTDR Launch Leads

General

Description

A launch lead is a passive optical component, complementary to O.T.D.R. (Optical Time Domain Reflectometer) for the testing of a fibre optic link. It is made of a coiled optical fiber and it helps eliminate the O.T.D.R. "dead zone area". These high-quality armoured fibre launch leads are designed, produced and patented by FIBERNET, who we've partnered with.

An innovative solution thought to facilitate the activities of fibre installers. This design guarantees high cable protection and an easy maneuverability. This product is 100% tested and certified before leaving the factory and come with connectors that provide a low insertion loss.

- When using an OTDR on long networks, the dead zone of the OTDR becomes longer because a wider Pulse Width is used to launch more light into the fibre. If a launch cable is not used the longer dead zone of the OTDR can overlap and mask events at the beginning of the fibre under test.
- A 500m Launch lead is commonly used for testing.
- A one-metre hybrid cable interface from the OTDR to the Launch Lead will add scratch protection to the costly Launch Lead and the OTDR as well as allow connector options on different OTDRs.
- A forty-metre hybrid cable interface from the Launch lead to network will allow you to change network connection connector types, offer protection to the Launch lead and enable you to clearly see the first connector of the network.
- It is imperative that all connectors are cleaned and inspected so as to avoid contaminated and or damage. (Damaged connectors will be more reflective and cause a longer dead zone).
- Pulse Widths are the real determining factor used when measuring with an OTDR. Wider Pulse Widths are used when measuring longer fibres and of course this means Smaller Pulse Widths are used on shorter fibres.
- Without the launch cable, the reflection/loss of the input connector of the fibre under test would not be measurable as it would be too close to the OTDR to be accurately measured with Wide Pulse widths.
- The dead zone of an OTDR is specified at the shortest pulse width. The IEC specification, is a pulse width of 5ns while measuring an event of -45dBm reflectivity. (More reflective events will cause longer dead zones. Contaminated and or damaged connectors will be more reflective and cause a longer dead zone).
- atg Technology also offers a One-day OTDR training course, contact us for more information on this .

LI-FLR-SM-XX-XX-500



FN-FLR-SM-XX-XX-500



EX-LAUNCHLEAD-KIT



Singlemode Fibre Properties

ITEMS	UNITS	SPECIFICATION	
		ITU-T G.652.D	ITU-T G.657.A2
Attenuation	dB/km	≤ 0.334 at 1310nm ≤ 0.31 at 1383 ± 3 nm ≤ 0.194 at 1550nm	≤ 0.36 at 1310nm ≤ 0.36 at 1383nm ≤ 0.25 at 1550nm ≤ 0.28 at 1625nm
Chromatic Dispersion	ps/nm.km	≤ 3.5 at 1285nm ~ 1330nm ≤ 18 at 1550nm ≤ 22 at 1625nm	≤ 3.5 at 1285nm ~ 1330nm ≤ 18 at 1550nm ≤ 22 at 1625nm
Zero Dispersion Wavelength	nm	1302 ~ 1322nm	1300 ~ 1324nm
Zero Dispersion Slope	ps/nm ² .km	≤ 0.090	≤ 0.092
PMD Individual Fiber @ 1550 nm	ps/vkm	≤ 0.15	≤ 0.10
Cut-off Wavelength (λ_{cc} , Cabled fibre)	nm	≤ 1260	≤ 1260
Attenuation vs. Bending (15mm radius x 10turns)	dB		≤ 0.03 at 1550nm ≤ 0.1 at 1625nm
Attenuation vs. Bending (10mm radius x 1turn)	dB		≤ 0.1 at 1550nm ≤ 0.2 at 1625nm
Attenuation vs. Bending (7.5mm radius x 1turn)	dB		≤ 0.5 at 1550nm ≤ 1.0 at 1625nm
Mode Field Diameter	um	9.2um ± 0.4 at 1310nm 10.4um ± 0.4 at 1550nm	8.6um ± 0.4 at 1310nm
Core/Cladding Concentricity Error	um	≤ 0.5	≤ 0.5
Cladding Diameter	um	125 ± 0.7	125 ± 0.7
Cladding Non-circularity	%	≤ 0.7	≤ 0.7
Coating Diameter	um	242 ± 5 (uncoloured) 250 ± 10 (coloured)	242 ± 7
Proof Test	Gpa	≥ 0.69	≥ 0.7

Please contact atg for more detail and delivery times