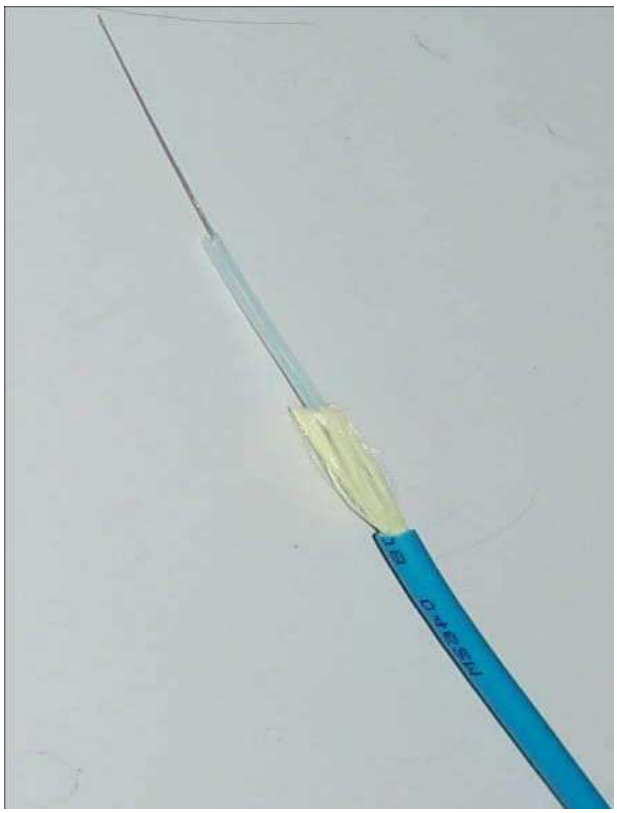
Bandweaver

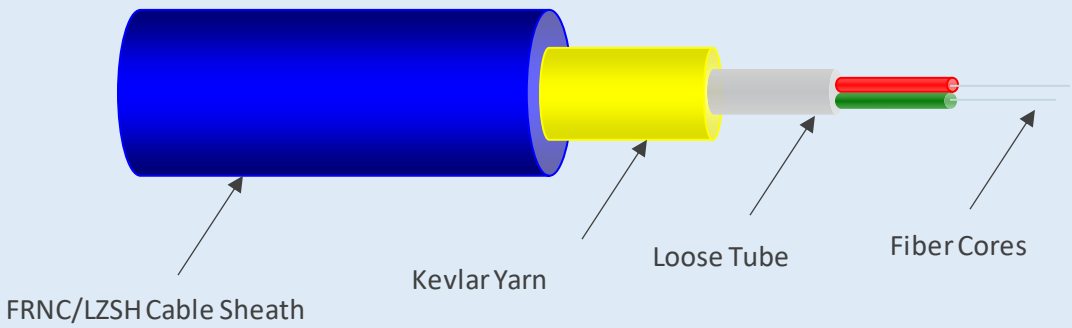
DATASHEET

FireFiber TT (Thermoplastic Tube) **Sensing Cable**

The FireFiber Thermoplastic Tube (TT) sensing cable is a Flame Retardant Non-Corrosive (FRNC) and Low Smoke Zero Halogen (LSZH) sensing cable which is widely used in application such as Linear Heat Detection, and used in a wide variety of scenarios and is optimised to work with Bandweaver's range of Distributed Temperature Sensing (DTS) systems. This cable is typically deployed in areas where a non-metal cable is required (e.g. high levels of EMC activity)



The central member of the cable consists of a gel filled thermoplastic loose tube construction. Kevlar (aramid) strength members surround the loose tube. The outer jacket of flexible thermoplastic ensure the cable is protected and completely electrically insulated.



Monitored | Secured | Safe

Technical Information

Fiber Type	Multimode, Graded Index, 62.5/125 acrylate coated multimode fiber as standard (50/125 fiber also available on request)	
Number of Cores	2 fibers as standard	
Effective Refractive Index	1.496 (850nm), 1.491 (1300nm)	
Attenuation	<3.0dB/Km@850nm, <1.0dB/Km@1300nm	
Bandwidth	>600MHz-km	
Material Construction	1 Outer Protection 2 Longitudinal Strength member 3 Pressure resistance	Polyolefin LSZH FRNC Kevlar/aramid strands Thermoplastic gel filled tube
Weight	30 kg/km	
Outer Diameter	LSZH sheath: 5.0 mm +/- 0.2mm (High strength version 5.0mm*)	
IP Rating	IP68	
Tensile Resistance	Long Term: 400N (High strength 500N*)	Short Term: 800N (High strength 1000N*)
Pressure Resistance	Long Term: 300N/100mm	Short Term: 1000N/100mm
Permitted Bend Radius	Static: 50mm	Dynamic: 100mm
Temperature Range	Long Term: -40°C to 85°C	Short Term: -40°C to 750°C *(120 minutes according to IEC60331-25 conditions)*
Standards and Certifications	RoHS (GB/T 7424.2-2008) – FO spec & test procedures EN 187000-1994 /GB16280-2014 IEC60754-1:1994 & IEC60754-2:1991 (JB/T 10707-2007) – Low smoke, zero halogen testing IEC61304-2:1997 (GB/T 17651.2) – Measurement of smoke density	
Packaging	Wooden reel as standard	
Reel Length	Minimum 1km / Maximum reel length 2km as standard Longer reel lengths available on request but will incur additional cost and lead times	
Part number	CAB-MM625-TT-02 *(Internal ref: SCTKXH-2A1b-5.0-B)*	

**High strength version of cable incorporates additional aramid strength members which increases tensile strength to 1000N*