FICHA TÉCNICA

DROP 1H G657A2 MENSAJERO ACERO 0.5MM GFRP LSZH 1KM

MODELO GJYXFCH-1B6A2

Product Description

This specification covers the general requirements and performance of cable,which LANLY offered including optical characteristics, mechanical characteristics andgeometrical characteristics and etc.

Optical Fiber

Optical fiber characteristics

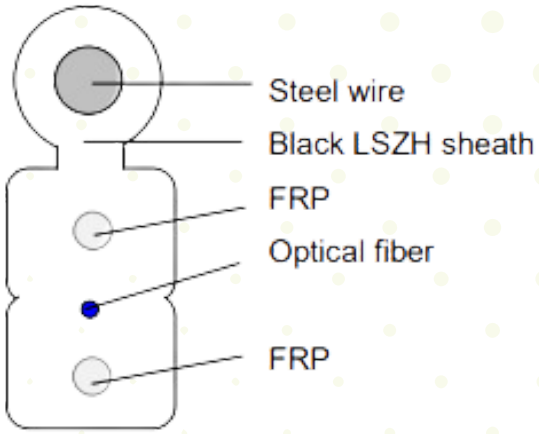
Category	Description		Specifications G.657A2
Optical Specifications	Attenuation	@1310nm	≤0.35dB/km
		@1383nm	≤0.35dB/km
		@1460nm	≤0.25dB/km
		@1550nm	≤0.21dB/km
		@1625nm	≤0.23dB/km
	Attenuation vs. Wavelength	@1285~1330nm relative to@1310	≤0.08 dB/km
		@1525~1575nm relative to@1550	≤0.05 dB/km
	Zero Dispersion Wavelength		1300~1324nm
	Zero Dispersion Slope		≤0.092ps/(nm^2.km)
	Dispersion	@1310nm	≤3 ps/nm.km
		@1550nm	≤18.0 ps/nm.km
		@1625nm	≤22.0 ps/nm.km
	PMD		≤0.1 ps/√km
	Cable Cutoff Wavelength(λcc)		≤1260nm
	Macro-bend induced attention R15mm/10turns/1550nm		≤0.03dB
	Macro-bend induced attention R10mm/1turn/1550nm		≤0.1dB
Geometric Specifications	Mode Field Diameter	@1310nm	8.6~9.2(±0.4)μm
	Cladding Diameter		125±1μm
	Cladding Non-Circularity		≤1.0%
	Coating Diameter		243±7μm
	Coating/Cladding Concentricity Error		≤8μm

	Core/Cladding Concentricity Error	≤0.5μm
Mechanical Specifications	Proof Test level	≥1.0%
	Fiber Curl Radius	≥4.0m
	Peak Coating Strip Force	1.3~8.9N

Other parameters meet standard ITU-T G.657

1. OPTICAL CABLE

1.1 Construction of cable



-Color Identification

Fibers color: Blue

Sheath color: Black

2. Cable Specification

2.1 Introduction The optical fiber unit is positioned in the center. Two parallel FRPs are placed at two sides. LSZHouter sheath with messenger wire combined.

2.2 Cable structure and parameter

Item	Contents	Unit	Value
Optical Fiber	/	/	1
Strength member	Material	/	FRP
Messenger wire	Material	/	1.2 ± 0.1 mm
	Diameter	mm	Nominal 1.0
Outer jacket	Dimension	mm	5.3(±0.1)*2.0(±0.1) Without messenger wire: 3.0(±0.1)*2.0(±0.1)
	Material	/	LSZH
	Color	/	Black
Max span	/	m	100
Tensile performance	Short term	N	600

Crush	Short term	N/100mm	2200
MAX Spam	/	m	100
Cable attenuation		dB/km	≤ 0.4 at 1310nm, ≤ 0.3 at 1550nm
Cable weight (Approx.)		kg/km	19
Protection Level		/	Non-flammable thermoplastic material UV resistant
Applicable standards		/	G.657A, CEI 60793-2-50, ISO/IEC 11801,EN 50173, Telcordia GR-20-CORE y ANSI/ICEA S-87-640.

Note: sizes and values without tolerances are nominal values.

3. Characteristic of Optical Cable

3.1 Min. bending radius without messenger wire

Static: 20mm

Dynamic: 40mm

3.2 Application temperature range

Operation: – 20℃ ~ +70℃

Installation: –10℃ ~ +60℃

Storage/transportation: – 20℃ ~ +70℃

3.3 Main mechanical & environmental performance test

Item	Test Method	Acceptance Condition
Tensile Strength IEC 60794-1-21-E1	- Load: Short term tension - Length of cable: ≥ 50m - Load time: 1min	- Loss change ≤ 0.1dB@1550nm after test. - No fiber break and no sheath damage.
Crush Test IEC 60794-1-21-E3	- Load: Short term crush - Load time: 1min	- Loss change ≤ 0.1dB@1550nm after test. - No fiber break and no sheath damage.
Temperature Cycling IEC 60794-1-22-F1	- Temperature: -20℃~+70℃ - Time of each step: 8h - Number of cycle: 2	- Loss change ≤ 0.4dB/km@1550nm. - No fiber break and no sheath damage.