

Specification

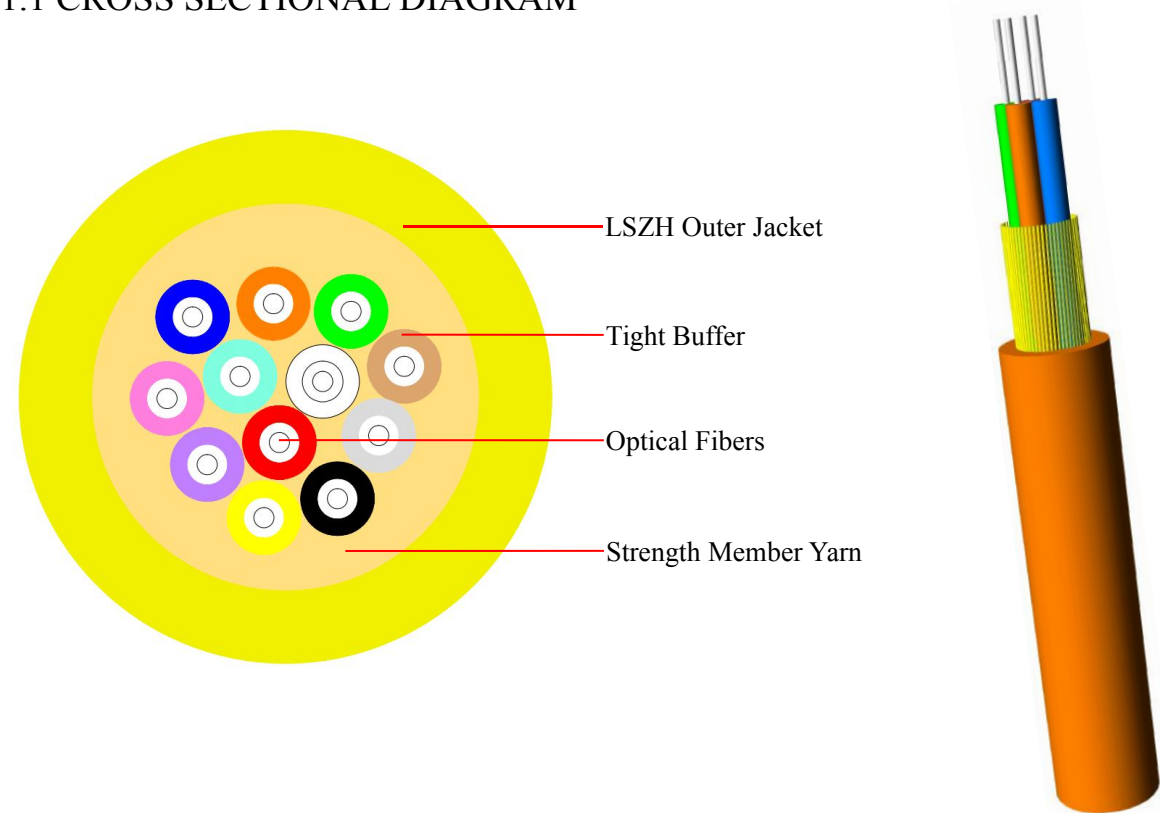
FOR

**Indoor Multi-Core Bundle
Optical Cable**

[GJFJH-4/8/12Core]

1. CABLE CONSTRUCTION

1.1 CROSS SECTIONAL DIAGRAM



2. TECHNICAL SPECIFICATION

2.1 TECHNICAL SPECIFICATION

Fiber Count		4	8	12
Tight Buffer Fibers	Number	4	8	12
	Material	LSZH		
	Diameter ±0.1mm	0.8	0.8	0.8
Strength Member Yarn		Aramid Yarn		
Outer Jacket	Material	LSZH		
	Color	Yellow		
	Thickness(mm) (Nominal)	1.0±0.1mm		
Cable Diameter(mm)(±0.3)		5.2	5.8	6.2
Net weight (kg/km)(±10%)		20	28	34
Static Bending Radius		10 D/mm		
Dynamic Bending Radius		20 D/mm		

2.2 TEMPERATURE RANGE

Operating temperature	- 20℃~+60℃
Store/Transport temperature	- 20℃~+60℃
Installation temperature	- 10℃~+60℃

3. FIBER AND LOOSE BUFFER TUBE IDENTIFICATION

NO.	1	2	3	4	5	6	7	8	9	10	11	12
Tight Buffer Fiber Color	Blue	Yellow	Green	Red	Violet	Brown	Pink	Gray	Black	Orange	White	Aqua

4. OPTICAL FIBER

4.1 The Optical and Geometrical Performance of Single Mode Fiber (ITU -T G.657A1)

ITEMS	UNITS	SPECIFICATION
Fiber Type	-	G657A1
Attenuation	dB/km	1310nm $\leq$ 0.4 1550nm $\leq$ 0.3
Mode Field Diameter	μ m	1310nm $\leq$ 9.0 $\pm$ 0.3 1550nm $\leq$ 10.2 $\pm$ 0.4
Zero Dispersion Slope	ps/nm ² .km	0.090
Zero Dispersion Wavelength	nm	1300 ~ 1324
PMD (M=20, Q=0.01%)	ps/ $\sqrt$ km	$\leq$ 0.06
Cut-off Wavelength (λ_{cc})	nm	$\leq$ 1260
Attenuation vs. Bending (30mm x10turns)	dB	$\leq$ 1.0 at 1625nm
Core-Clad Concentricity	μ m	$\leq$ 0.4
Cladding Diameter	μ m	125 $\pm$ 1
Cladding Non-circularity	%	$\leq$ 0.6
Coating Diameter	μ m	245 $\pm$ 10
Proof Test	Gpa	$\geq$ 1
Temperature Dependence	dB	$\leq$ 0.05 (-60℃ to +85℃)

5. Mechanical and Environmental Performance of the Cable

NO.	ITEMS	TEST METHOD	ACCEPTANCE CRITERIA
1	Tensile Loading Test	#Test method: IEC 60794-1-2-E1 -. Short-tensile load: 400N -. Cable length: ≥ 50 m -.Time: 10 minute	-. Attenuation increment @1550nm : ≤ 0.1 dB -. No jacket cracking and fiber breakage
2	Crush Resistance Test	#Test method: IEC 60794-1-2-E3 -.Long load: 200 N/100mm -.Short load: 1000 N/100mm Load time: 1 minutes	-. Attenuation increment @1550nm : ≤ 0.1 dB -. No jacket cracking and fiber breakage
3	Impact Resistance Test	#Test method: IEC 60794-1-2-E4 -.Impact height: 1 m -.Impact weigh: 100 g -.Impact point: ≥ 3 -.Impact frequency: ≥ 1 /point	-. Attenuation increment @1550nm : ≤ 0.1 dB -. No jacket cracking and fiber breakage
4	Repeated Bending	#Test method: IEC 60794-1-2-E6 -.Mandrel diameter: 20 D (D = cable diameter) -.Subject weight: 150 N -.Bending frequency: 25 times -.Bending speed: 2sec/cycle	-. Attenuation increment @1550nm : ≤ 0.1 dB -. No jacket cracking and fiber breakage
5	Temperature Cycling Test	#Test method: IEC 60794-1-F1 -.Temperature steps: + 20°C、- 40°C、+ 70°C、+ 20°C -.Testing Time: 12 hours/step -.Cycle index: 2	-. Attenuation increment @1550nm : ≤ 0.1 dB -. No jacket cracking and fiber breakage
6	Cable Burning Test	#Test method: IEC 60332-2-1 -.Test Method:The Length 175mm Flames Jet Toward The Cable at an Angle of 45° -.Specimen Length: 60 cm -.Testing Time: 1Minutes	-. The distance between the top of the charred part and the lower part of the fixed end shall not exceed 50mm

6. PACKAGE AND MARK

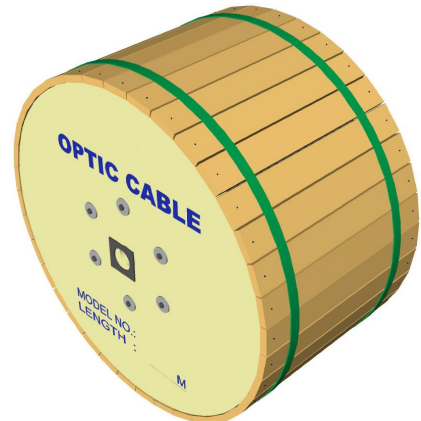
6.1 PACKAGE

Not allowed two length units of cable in one drum, two ends should be sealed, Two ends should be packed inside drum, reserve length of cable not less than 3 meters.

;Fumigation-free Plywood Drum

;Wooden Strip Seal

;Can print Logo、 Model、 length and gross weight



6.2 MARK

Cable shall be permanently marked in English at regular intervals with the following information

- Name of manufacturer
- Type of cable
- Fiber category

