# **DATASHEET**

# Butterfly Flat Indoor FTTH Drop Cable patch cord/ pigtail

Best cable Solution in FTTH 's Project





#### Description

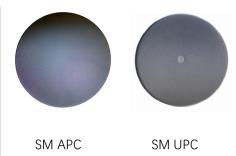
It's a kind of patch cable but assembly with **Butterfly Flat Indoor FTTH Drop Cable**. This is a last cable in FTTH project. Used widely between Fact plate, terminal box, ONU tec. With easy accessibility to the fiber and simple installation, FTTH cable can be directly connected to the homes. It is suitable for connecting with communication equipment and used as access building cable in premises distribution system. The optical fibers are positioned in the center of cable and two parallel Fiber Reinforce Plastic (FRP/KFRP) strength members are placed at the two sides. Then, the cable is completed with LSZH sheath. Also, customers can specify your required connectors.

### Optical performance.

Test Item		Test Condition	Value(dB)			
		rest condition	UPC	APC		
Optical Perfor-	Insertion Loss	1310nm LED light source	<0.3	<0.3		
mance	Return Loss	1310nm LED light source	>50	>60		
	High temperature	+85°C168 hours	<0.2			
Environmental Performance	Temperature Cycle	-40-+75°C, 21 Cycles 168 hours	<0.2			
(Max. Insertion Loss change)	Humidity Aging	+75°C, 95%R.H,168 hours	<0.2			
	Humidity/ Condensation Cycling	-10°C-+65°C, 90%~100%RH, 14 cycles 168 hours	<0.2			
	Vibration	10-55Hz, 1.5mm(p-p)	<0.2			
	Flex	$0.9$ kg,- $90^{\circ}$ ~+ $90^{\circ}$ repeat for 100 cycles	<0.2			
Mechanical Performance (Max. Insertion Loss change)	Torsion	1.35kg,90°~+90°,10times	<0.2			
	Withstand tensile	90N,10min	<0.2			
	Drop	H=1.5M,Total of 8 drops	<0.2			
	Exchangeability	Randomly	<0.2			
	Durability	500 times	<0.2			

### **End-face Quality (SM)**

Zone	Range (µm)	Scratches	Defects	Reference		
A: Core	0 to 25	None	None			
B: Cladding	25 to 115	None	None			
C: Adhesive	115 to 135	None	None	IEC 61300-3- 35:2015		
D: Contact	135 to 250	None	None			
E: Rest of ferrule		None	None			



## OMC (TITH Butterfly Flat Indoor FTTH Drop Cable patch cord/pigtail

#### Connector's Standard:

SC: TIA/EIA, FOCIS3, GR-326.NTT-SC IEC61754-4 and JIS C5973.

LC: TIA/EIA, FOCIS10, GR-326 EIA/TIA-604-10, IEC61754-20 and JIS C5973.

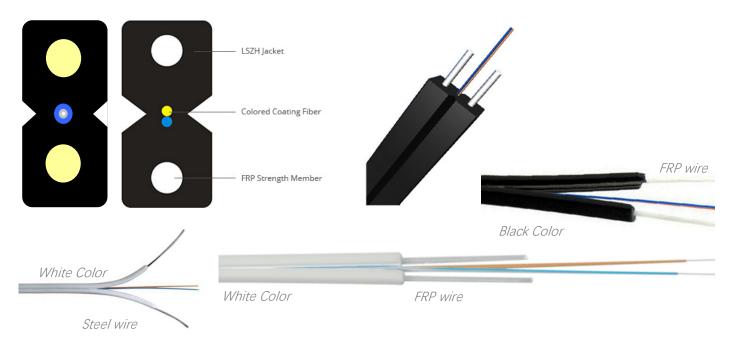


High quality SM Ceramic ferrule, Good concentricity<0.5um



#### Cable structure

FTTH Indoor Drop Cable uses butterfly flat structure, whose optical fiber unit is positioned in the center. Two parallel Fiber Reinforced Plastic (FRP) or Steel wire strength members are placed at the two sides. Then, the cable is completed with LSZH sheath. FTTH indoor cable has a much greater bandwidth to carry data and less susceptible to interference than common indoor fiber cables. With small diameter, water-resistant, soft and bendable characteristics, it's easy to deploy and maintenance. In addition, the non-metallic strength member can provide lightning protection and anti-electromagnetic interference. FTTH cables are ideal for indoor cabling, end users directly cabling, and access network.



#### **Technical Data:**

Fiber Count	1F	2F	4F/6F				
Ctronath mambar	FRP/KFRP/ Solid Steel wire						
Strength member	0.45-0.52mm	0.45-0.52mm	0.45-0.52mm				
Cable diameter(mm) Approx.	2.0*3.0(±0.1)	2.0*3.0(±0.1)	2.0*3.0(±0.1)				
Cable weight(kg/km) Approx	7/10	7.5/10.5	8.5/11.5				
Tensile Strength Short/ Long Term (N)	200/100 for steel wire strength member						
rensile strength short/ Long Term (N)	80/40 for KFRP wire strength member						
Crush resistance short/long term (N/100mm)	1000/500						
Operating temperature range(°C)	-40°C ~+70°C						



#### Feature:

Good mechanical and environmental characteristic

Simple structure, light weight and high practicability

Low smoke zero halogen and flame retardant sheath

Novel flute design, easily strip and splice, simple installation and maintenance

Two parallel FRP strength members ensure good performance of anti-electromagnetic and crush resistance Special low-bend-sensitivity fiber provides high bandwidth and excellent communication transmission property

#### **Application**

Access Networks

LAN (Local Area Network)

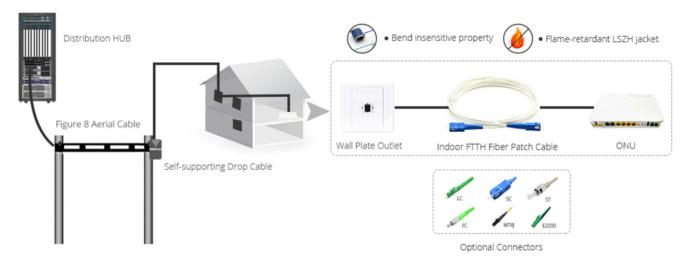
Fiber Optic Communication System

FTTH (Fiber to The Home) Indoor Building

Optical fiber connected and transmitted equipment

#### Ideal Solution by FTTH Indoor Fiber Patch Cable

Butterfly Flat Indoor Drop Cable is widely used in fiber to the home (FTTH) network system, which can directly connect the communication line from the LAN to the end users. Butterfly flat drop cable uses special low-bend-sensitivity fiber to provide high bandwidth and excellent communication transmission, it's very suitable for indoor cabling, end users directly cabling, and access network.



#### **Packaging**

This easily taken and well-protected fiber patch cable package has been labelled and marked by OMC as default .Standard carton size: 34\*22\*15 cm; 44\*34\*24 cm; 54\*39\*34 cm. Which carton to be used depends on goods Qty. Packing can be customized.







1,Film wrap

2, Paper Carton

3, fumig-free Pallet



- OME service

  1. Cable color, princing

  2. OEM Label, Identify ring, cable's label, box, shipping marks

  3. Different quality Level. 1. Cable color, printing word, material of cable jacket, connector's color

#### **Order Instruction**

Products	- Fiber Count	Fiber Mode -		Connector A	-	Connector B	-		Strength Member	Color	-	length
C -	1- 1 core	1 - G657A1	Α	LC UPC	0	Open(pigtail)		1	2 x FRP Wire	A- Blue		
Drop cabe	2 -2 cores	2- G657A2/B2	В	SC UPC	Α	LC UPC		2	2 x KFRP Wire	B- Orange		
patch cord	4-4cores	3 - G657B3	С	LC APC	В	SC UPC		3	2 x Steel Wire	C- Green		
and pigtail	6-cores	4-OM1	D	SC APC	С	LC APC		Α	1 x Solid Steel Wire+2 x FRP Wire	D- Brown		
	8-cores	5-OM2	E	FC UPC	D	SC APC		В	1 x stranded Steel Wire+2 x FRP Wire	E- Grey		
	T-12cores	6-OM3	F	FC APC	Ε	FC UPC		С	1 x Solid Steel Wire+2 x KFRP Wire	F- White		
		7-OM4	G	SC APC+SC UPC	F	FC APC		D	1 x stranded Steel Wire+2 x KFRP Wire	G- Red		
		8-OM5	Н	SC APC+LC UPC	G	SC APC+SC UPC		Ε	1 x Solid Steel Wire+2 x Solid Steel Wire	H- Black		
			- 1	SC APC+LC APC	Н	SC APC+LC UPC		F	1 x stranded Steel Wire+2 x Solid Steel W	I- Yellow		50=50M
			J	SC APC+SC APC	- 1	SC APC+LC APC				J- Purple		
			K	SC UPC+LC UPC	J	SC APC+SC APC				K- Pink		
			L	SC UPC+LC APC	K	SC UPC+LC UPC				L- Aqua		
			M	SC UPC+SC APC	L	SC UPC+LC APC				M-Magenta		
			0	SC UPC+SC UPC	M	SC UPC+SC APC						
			P	LC UPC +LC UPC	0	SC UPC+SC UPC						
			Q	LC UPC +LC APC	Р	LC UPC +LC UPC						
					Q	LC UPC +LC APC						