## **Optical Splitter**

# 08

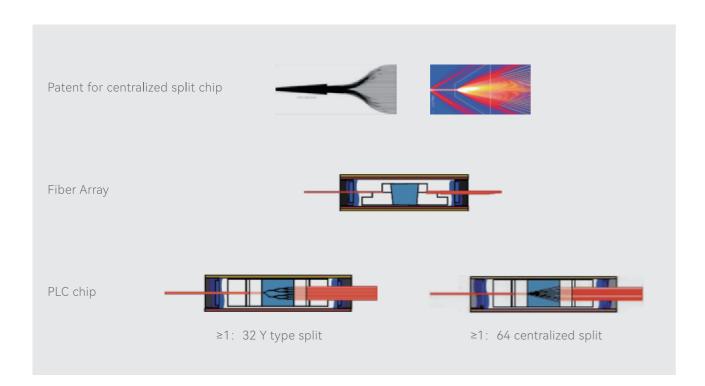
- · Low insertion loss
- · Low polarization dependence
- · Environmentally stable
- · High mechanical reliability
- · Excellent uniformity
- · Configurations from 1x2 to 1x128, and 2x4 to 2x64
- · Using low loss patent technology(centralized split chip) with high split ratio of 1x128 PLC splitter
- Qualified to Telcordia GR-1209 and GR-1221 standards and RoHS compliant materials

- · Can be connectorized with many different connector types such as SC, FC, LC and others as request.
- · Can be supplied with many different components module such as M-type, LGX-B, LGX-M, 19 inch rack, and S-type etc.
- · G657A single-mode fiber in/output
- All connectors are supplied with ceramic ferrules
- Pre-installation of splitter modules for ODN equipment is possible

### **Application**

- $\cdot$  FTTx
- · LAN, WAN & Metro

- · CATV
- · Test and measurement



#### **Optical properties**

Parameter	Specification						
Operating wavelength	1260 ~ 1650 nm	1260 ~ 1650 nm					
Maximum input power	>300mW	>300mW					
Directivity	>55dB						
WDL	1x2 to 1x16, 2x4 to 2x16		1x32 to 1x64, 2x32 to 2x64				
	<0.8dB		<1.0dB				
PDL	1x2 to 1x16, 2x4 to 2x16		1x32 to 1x64, 2x32 to 2x64				
	<0.3dB		<0.3dB				
Return loss	without connector	with UF	C type connector	with UPC type connector			
	> 55dB	> 50dB		> 50dB			

#### Insertion loss and uniformity [1][2]

Split ratio	1×2	1×4	1×8	1×16	1×32	1×64
Insertion loss (dB)	≤4.1	≤7.4	≤10.5	≤13.8	≤17.1	≤20.4
Uniformity (dB)	<0.4	<0.8	<0.8	<1.2	<1.2	<1.5
2xN split ratio						
Split ratio	2×4	2×8	2×16	2×32		
Insertion loss (dB)	≤7.7	≤10.8	≤14.1	≤17.4		
Uniformity (dB)	<0.8	<0.8	<1.2	<1.5		

[1]Insertion loss test are taken at room temperature at 1310nm, 1490nm and 1550nm, connectors loss has been included. [2]Above are PLC insertion loss with connector.

#### Temperature and humidity

Parameter	Specification
Operation temp	-40 to +85°C
Transport and storage	-40 to +85°C
Storage rel. humidity	20~95 (%RH)

43 | Products | 44

#### M-style splitter

Split ratio	NxM [5]	Nx32	Nx64		
Dimension (mm)	105x68x8	128x78x15	128x78x20		
Package material	Plastic (black)				
Port description	φ2.0mm pigtail, with or without SC, LC or FC connector				

[5] N=1,2;M=2, 4, 8, 16, 32, 64

- · φ2.0mm pigtail wtih or without SC, LC or FC connector
- · Adopts G.657A optical fiber
- · Cassette package size
- · Provides split ratio from 1x2 to 1x64, and 2x4 to 2x64





#### LGX-M style compact size splitter

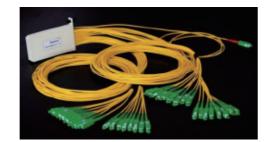
Split ratio	NxM [6]	Nx64
Dimension (mm)	100x68.8x12.5	115x68.8x25.8
Package material	Plastic (faint yellow)	
Port description [7]	φ2.0mm loose tube pigta	il with or without SC, LC or FC connector
[6] N=1,2;M=2, 4, 8, 16, 32, 64		

[7] Custumized optical fiber length is available

- · Adopts G.657A optical fber
- · Compact cassette package stze
- · Good compatbilitl and iterchangeabilly , easy installation

φ2 0mm pigtail with or without sC, LC or FC connectorction

· Provides split ratio from 1x2 to 1x32, and 2x4 to 2x32



#### S-style splitter

Split ratio (NxM [8])	1x2	Nx4/Nx8	Nx4/Nx8	Nx64	Nx4/Nx8		
Dimension (mm)	40x4x4	55x7x4	60x12x4	80x20x6	100x40x6		
Package material	60x12x4						
Port description [9]	φ0.9mm loose tube pigtail with or without SC, LC or FC connector						

- [8] N=1,2;M=2, 4, 8, 16, 32, 64
- [9] Cusomized fiber length is available
- $\cdot$   $\varphi 0.$  9mm loose tube pigtal with or without SC, LC or FC connector
- · Adopts G .657A optical fiber
- · Micro encapsulation
- · Provides split ratio from 1x2 to 1x64, and 2x4 to 2x64

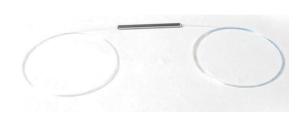


#### **FBT Optical splitter**

Split ratio	50/50	45/55	40/60	35/65	30/70	25/75	
Insertion loss (dB)	≤4.0	≤4.65/3.65	≤5.3/3.3	≤5.95/2.90	≤6.7/2.5	≤7.65/2.2	
PDL(dB)		≤0.2					
Split ratio	20/80	15/85	10/90	5/95	2/98	1/99	
Insertion loss (dB)	≤8.8/1.8	≤10.1/1.50	≤11.50/1.25	≤14.80/0.9	≤19.40/0.8	≤22.70/0.75	
PDL(dB)		≤0.2					

Above are FBT insertion loss without connector

- · Low insertion loss
- · Environmentally stable
- · High mechanical reliability
- · RoHS compliant materials
- Can be connectorized with many different connector types such as SC, FC, LC and others as request.
- · G657A singlemode fiber in/output



45 | Products | 46