

## Splitters, Couplers and WDM Solutions

### DESCRIPTION

Coarse wavelength division multiplexing (CWDM) is a method of combining multiple signals on laser beams at various wavelengths for transmission along fiber optic cables, such that the number of channels is fewer than in dense wavelength division multiplexing (DWDM) but more than in standard wavelength division multiplexing (WDM).

### FEATURES:

- Low Insertion Loss
- High Isolation
- Low PDL
- Compact Design
- Good channel-to-channel uniformity
- Wide Operating Wavelength: From 1260nm to 1620nm
- Operating Temperature: From -40°C to 85°C
- High Reliability and Stability



### APPLICATIONS

- CWDM System
- PON Networks
- CATV Links

### COMPLIANCE

- Telcordia GR-1209-CORE-2001
- Telcordia GR-1221-CORE-1999
- RoHS

### SPECIFICATIONS

#### OPTICAL SPECIFICATION

Item	Parameters	Min	Typical	Max	Unit	Note	
1	Operating Wavelength Range, $\lambda_{OP}$		1260~1650 nm				
2	Configuration See		P/N				
3	Split Ratio		even		%		
4	Insertion Loss		See Table 1		dB		
5	Uniformity dB						
6	PDL					dB	
7	Directivity 55				dB		
8	Return Loss	50			dB		
9	Power Handling			300	mW		

**TABLE 1**

Configuration	Max IL	Uniformity	Max PDL
1x2	4.3	0.5	0.2
2x2	4.3	0.8	0.2
1x4	7.4	0.8	0.3
2x4	7.6	1.0	0.3
1x8	10.7	1.0	0.3
2x8	11.0	1.2	0.3
1x16	13.9	1.4	0.3
2x16	14.8	1.5	0.3
1x24	16.5	1.5	0.3
1x32	17.2	1.6	0.3
2x32	17.9	1.8	0.3
1x64	21.5	2.0	0.5
2x64	21.5	2.0	0.5



### ENVIRONMENT CONDITIONS

Item	Parameters	Min	Typical	Max	Units	Note
1	Operating Temperature	0		75	°C	
2	Storage Temperature	-40		85	°C	
3	Operating Relative Humidity	0		93	%	[1]
4	Storage Relative Humidity	0		93	%	

**Note**

[1] Not to exceed industrial standard of 0.024 kg water per kg of dry air. Under Non-condensing Conditions. Operation standard: GR-1209 and GR-1221

### MECHANICAL SPECIFICATIONS

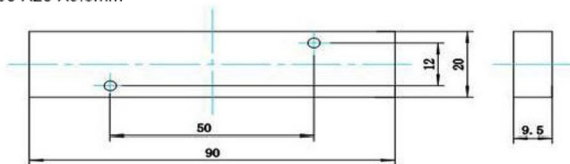
Item	Parameters Specifications		Units	Note
1	Packaging Dimensions	See Table 2 (ABS Box)	mm	
2	Fiber Type	See P/N		
3	Fiber Length	See P/N	m	
4	Connector Type	See P/N		

### TABLE 2

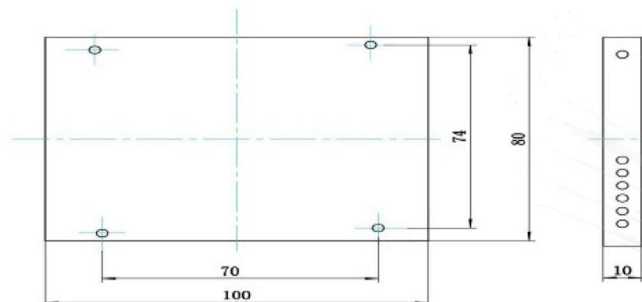
Configuration	Package Dimension		
	900µm Loose Tube	2.0mm Cable	3.0mm Cable
1x2 / 2x2	90x20x9.5 mm	90x20x9.5 mm	90x20x9.5 mm
1x4 / 2x2	100x80x10 mm	100x80x10 mm	100x80x10 mm
1x8 / 2x8	100x80x10 mm	100x80x10 mm	100x80x10 mm
1x16 / 2x16	120x80x18 mm	120x80x18 mm	141x115x18 mm
1x32 / 2x32	141x115x18 mm	120x80x18 mm	141x115x18 mm
1x64 / 2x64	141x115x18 mm	141x115x18 mm	-

**Drawing**

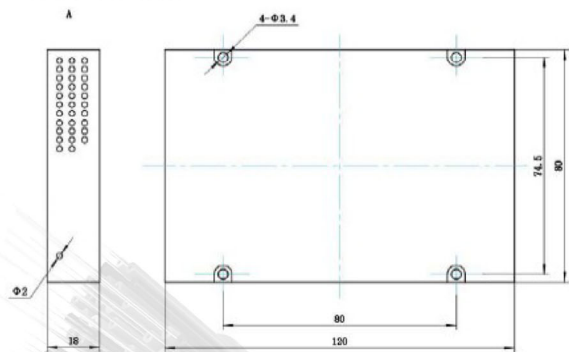
90 X20 X9.5mm



100 X80 X10mm



120 X80 X18mm



141 X115 X18mm

