# **MHAPHIT®** GLOBAL ©+ PHOTONICS SOLUTIONS

# 1045nm PM BP/Partial Mirror Hybrid for Pulse Power

#### **FEATURES**

- High Isolation
- Low Insertion Loss
- High Reliability and Stability
- Various Bandwidth
- High Optical Power

### **APPLICATIONS**

- **Broadband Systems**
- **Optical Amplifying Systems**
- Telecommunication Networks
- Laser Systems
- Research Labs



Compliant

#### **SPECIFICATIONS**

Parameters		Unit	Standard	High ER Type				
Center Wavelength		nm	1045					
Min. Bandwidth@0.5dB			2.0, 5.0					
Excess Loss		dB	≤1.3 ≤1.5					
Stop wavelength	2nm Bandwidth	nm	960~1041&1049~1120					
(ASE)	5nm Bandwidth	nm	960~1038&1052~1120					
Stop Wavelength	Standard	dB	≥25					
(ASE) Isolation	High Isolation	dB	≥45					
Reflective Ratio		%	1±0.6, 2±0.8, 5±1, 10, 20, 30, 40, 50, 80, 90					
DD Dooition	Forward	-	Bandpass is before the Mirror					
BP Position	Backward	-	Bandpass is after the Mirror					
Configuration		-	D: 2-port, Y: 3-port, (Forward/Backward ASE Guide Out)					
Optical Return Loss		dB	≥45					
Extinction Ratio		dB	≥18 ≥20					
		-	PM980 Fiber, PM1060L Fiber (E) or PM1060L-FA Fiber (L)					
File and Transa	Input&Output		10/125um PMDC Fiber (O), 15/130um PMDC Fiber (W)					
Fiber Type			20/130um PMDC Fiber (Q) or 25/250um PMDC Fiber (R)					
	ASE Guide Out (Y/X Type)	-	Same Fiber, Corr. SM Fiber or MM Fiber					
Fiber Tensile Load		N	5					
Max. Average Optical Power			0.3, 0.5, 1, 2, 3, 5, 10, 15, 20, 30, 50, 60, 80, 100					
Max. Peak Power for pulse			0.1, 1, 2, 3, 5, 10, 15, 20					
Max. ASE Average Power			0.3, 0.5, 1, 2, 3, 4, 5, 10					
Operating Temperature			0~50					
Storage Temperature			-40~85					
Darella and D'	Stainless Steel Tube (SST)	mm	<sup>∅</sup> 5.5x <sup>L</sup> 35 (≤5W); <sup>∅</sup> 6.0x <sup>L</sup> 50 (5~10W)					
Package Dimension	Metal Box	Metal Box mm H: L90xW12xH10 (>10W);M: L120xW12xH10						

Note: 1. Specifications are for device without connectors; Specifications may change without notice.

- 2. To add connectors, IL is 0.5dB higher, RL is 5dB lower, ER is 2dB Lower, Connector key is aligned to slow axis.
- 3. High ER type can only work in slow axis at pass port; Suggest to use Y type if blocked optical power is >1W.
- 4. Only guarantee 1W continuous wave (CW) power thru testing for connectors added.
- 5. Devices for higher optical power or with other type fiber or consigned fiber are also available; Devices can only work in the core of Double Cladding (DC) Fiber, Cladding Power must be stripped before connecting the device.
  - 6. Package size may be different for different optical power and configurations.

## **ORDERING INFORMATION (PN)**

FPHR-NN	INN- I	NN (C	) NN	(C)	- ( <mark>C</mark> )	(C) -	H NN P	NN -	(NN)	- ( <mark>C</mark> )	С	С	NN -	CC/CCC
Center Wavelength	Bandwidth	ASE Iso	Ref. Ratio	Туре	BP Position	3rd Port Fiber	Average Power	Peak Power	ASE Power	Package	Fiber Type	Fiber Sleeve	Fiber Length	Connector Type
1045 = 1045nm	<b>20</b> =2nm	I=High	01- 1%	R=High ER	B=Backward	Y=Same Fiber	<mark>03</mark> =300mW	01-100W	<mark>1-</mark> 1W	M=Metal Box	2=PM980Fiber	B= Bare fiber	05=0.5m	N=Without Connector
	<b>50-</b> 5nm	Isolation	<b>05=5</b> %	<i>Blank</i> for	<i>Blank</i> for	S=Corr. SM Fiber	1- 1W	1- 1kW	5= 5W	H=H Box	E=PM1060L Fiber	L= Loose Tube	10-1.0m	FC/APC=FC/APC Connector
		<i>Blank</i> for	<del>50=</del> 50%	Standard	Forward	5=50/125um Fiber	5= 5W	5= 5kW	10-10W	<i>Blank</i> for SST	Q=20/130 PMDC Fiber	2= 2mm Cable	15=1.5m	LC/PC=LC/PC Connector
		Standard	90-90%			<i>Blank</i> for D Type	10-10W	10-10kW <i>Bi</i>	<i>lank</i> for300n	ıW	R=25/250 PMDC Fiber	3= 3mm Cable	<b>20-</b> 2.0m	SC/UPC=SC/UPC Connector

