

**PRE-SFP10G-Bxx-80, PRE-SFP10G-Bxx-80I**  
 SFP+, 1490nm/1550nm, BIDI, SMF, 80km, 10Gbps



**Product Features:**

- 1490 or 1550nm EML Transmitter
- APD Receiver
- SMF Transmission Medium
- LC-UPC Connector Type
- Digital Diagnostics Monitoring (DDM)
- C-Temp and I-Temp Available
- Supports bit rates up to 11.3Gbps
- <1.8W Power Dissipation



**Product Applications:**

- 10G Ethernet
- SONET SDH
- OTN Transport

**General Specifications**

Parameter	Symbol	Min	Typ	Max	Unit
Case Operating Temperature (Commercial)	$T_{op}$	0	-	70	°C
Case Operating Temperature (Industrial)	$T_{op}$	-40	-	85	°C
Power Consumption (Commercial)	$P_w$	-	-	1.5	W
Power Consumption (Industrial)	$P_w$	-	-	1.8	W
Power Supply Current (Commercial)	$I_{cc}$	-	-	450	mA
Power Supply Current (Industrial)	$I_{cc}$	-	-	550	mA
Power Supply Voltage	$V_{cc}$	3.14	3.3	3.46	V
Storage Humidity	$H_s$	5	-	95	%
Storage Temperature	$T_s$	-40	-	85	°C
Transmission Distance	TD	-	-	80	km
Data Rate (Total)	$DR_T$	-	10.3125	11.3	Gbps

### Optical Characteristics: Transmitter

Parameter	Symbol	Min	Typ	Max	Unit
Center Wavelength (B45)	$\lambda_c$	1480	1490	1500	nm
Center Wavelength (B54)	$\lambda_{c2}$	1540	1550	1560	nm
Transmit Power (B45)	$P_{OUT}$	0	-	4	dBm
Transmit Power (B54)	$P_{OUT}$	-1	-	3	dBm
Spectral Width	$\sigma$	-	-	0.3	nm
Side Mode Suppression Ratio	SMSR	30	-	-	dB
Extinction Ratio	ER	7.5	-	-	dB
Transmitter OFF Output Power	$P_{OFF}$	-	-	-30	dBm

### Optical Characteristics: Receiver

Parameter	Symbol	Min	Typ	Max	Unit
Rx Wavelength (B45)	$\lambda_c$	1480	1490	1500	nm
Rx Wavelength (B54)	$\lambda_{c2}$	1540	1550	1560	nm
Input Saturation Power	$P_{SAT}$	-6	-	-	dBm
Receiver Sensitivity	R	-	-	-23	dBm
LOS Assert	$LOS_A$	-38	-	-	dBm
LOS De-Assert	$LOS_D$	-	-	-24	dBm
LOS Hysteresis	$LOS_H$	0.5	-	8	dB

### Product Ordering Information

Part Number	Description
PRE-SFP10G-B45-80	SFP+, 1490nm Tx/1550nm Rx, BIDI, SMF, 80km, 10Gbps, C-Temp
PRE-SFP10G-B54-80I	SFP+, 1550nm Tx/1490nm Rx, BIDI, SMF, 80km, 10Gbps, I-Temp
PRE-SFP10G-B45-80	SFP+, 1490nm Tx/1550nm Rx, BIDI, SMF, 80km, 10Gbps, C-Temp
PRE-SFP10G-B54-80I	SFP+, 1550nm Tx/1490nm Rx, BIDI, SMF, 80km, 10Gbps, I-Temp