



DESCRIPTION

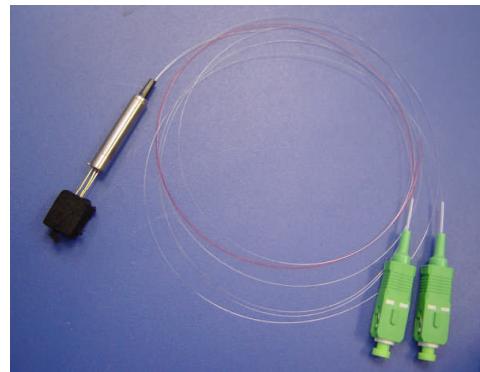
The TPDM series module incorporates an InGaAs photodiode sensitive to the communications wavelength range between 1100 nm and 1650 nm with an integrated fiber tap. The photodiode is hermetically packaged in an industry standard coaxial package. Two fiber pigtails for input and output exit from the device. This module is especially suited as a compact, low cost detector for channel monitoring.

FEATURES

- Low insertion loss polarization dependent losses
- RF Bandwidth to 600 MHz
- Wide operating temperature range
- RoHS and Telcordia compliant

APPLICATIONS

- Gain monitors for optical amplifiers
- WDM channel monitoring
- Network monitoring



MODEL NUMBERS: TPDM-X-Y-Z

X:	Tap Ratio	Y:	Fiber Type	Z :	Connector
01:	1%	1:	250 um Bare Fiber	1:	SC/APC
02:	2%	2:	900 um loose tube	2:	SC/UPC
05:	5%			3:	FC/APC
10:	10%			4:	FC/UPC
				5:	LC/UPC
				6:	None

MAXIMUM RATINGS

PARAMETER	Symbol	LIMIT
Storage Temperature	T _{ST}	-40 to +85°C
Input Power Saturation	P _{IN}	100 mW
Reverse Voltage	V _R	35 V
Forward Current	I _F	10 mA

**ELECTRO-OPTICAL CHARACTERISTICS**

(T=25 °C unless otherwise specified)

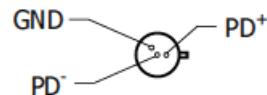
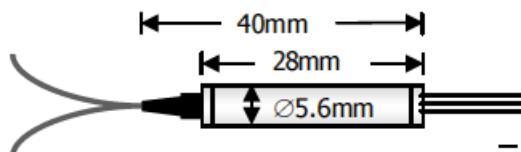
PARAMETER	SYMBOL	MIN	TYPICAL	MAX	UNIT
Operating Temperature	T _{OP}	0		+75	°C
Optical Wavelength Range			C/L Band		
RF Bandwidth		0.6			GHz
Responsivity 1% 2% 5% 10%	R	--	7-12 14-24 35-65 70-120	--	mA/W
Insertion Loss 1% 2% 5% 10%	FR			0.2 0.4 0.6 0.9	dB
Return Loss		45			dB
Wavelength Dependent Loss	WDL			0.3	dB
Polarization Dependent Loss	PDL			0.1	dB
Dark Current	I _D	--	--	1	nA

All values referenced without connectors

MECHANICAL SPECIFICATIONS

(mm unless otherwise noticed, orientation of leads in bracket arbitrary)

Input - uncolored



Output - yellow

Standard SMF-28 optical fiber 1 m length