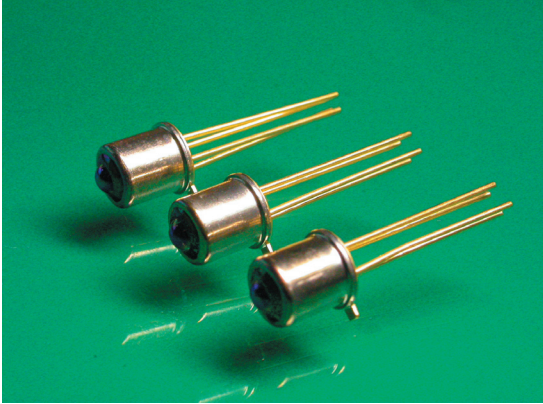


T-149-622A-G3-B-01



Features

- InGaAs/InP PIN Photodiode with transimpedance amplifier
- High sensitivity with AGC
- Differential ended output
- 3.3 supply voltage
- -40 to 85°C operating temperature
- Integrated 4-pin TO-46 with ball lens cap package
- 622Mbps SONET/SDH/ATM receivers
- Bi-Directional optical module/transceiver
- RoHS compliance available

Absolute Maximum Rating (Tc=25°C)

Parameter	Symbol	Min	Max	Unit
Supply Voltage	V _{cc}	-	6.5	V
Operating Temperature	T _{opr}	-40	+85	°C
Storage Temperature	T _{stg}	-40	+85	°C

DC Electrical Characteristics(Tc=25°C)

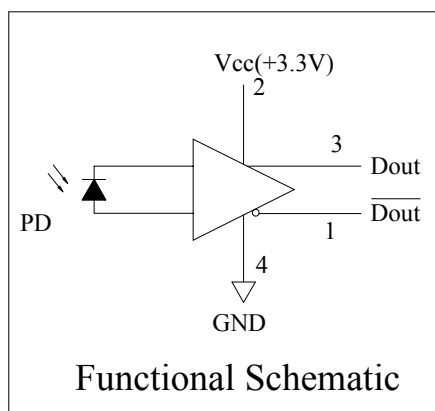
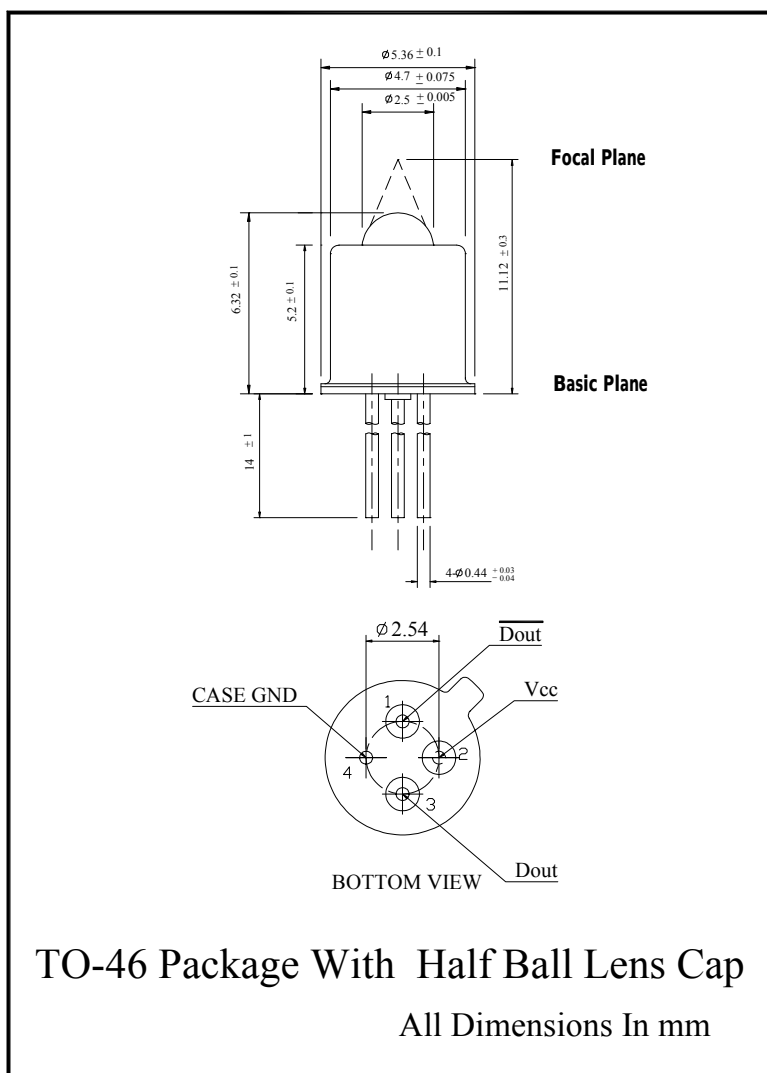
Parameter	Symbol	Min	Typical	Max	Unit
Power Supply	V _{cc}	3.0	3.3	3.6	V
Differential Output offset Voltage	V _d	-	+/-5	-	V
Supply Current (Vcc=3.3V)	I _{cc}	-	21	30	mA

Operating at V_{cc} = 3.3V, T_c = 25°C, 9/125μm SM fiber

AC/Optical and Electrical Characteristics(Tc=25°C)

Parameter	Symbol	Min	Typical	Max	Unit	Test Condition
Detection Range	-	1475	1490	1505	nm	-
Wavelength Isolation @ 1310nm+/-50nm&1550nm+/-10nm	-	26	-	-	dB	-
Gain @ 10 Mbps Differential	G	6	7	-	V/mW	Measure differentially AC coupled, RL=50Ω
Bandwidth (to -3dB point)	BW	404	470	-	MHz	-
Saturation Power	P _{sat}	-3	0	-	dBm	BER <10 ⁻¹⁰ @ 622Mbps, PRBS 2 ²³ -1 Er = 10 dB
Sensitivity	Sens	-	-33	-31	dBm	BER <10 ⁻¹⁰ @ 622Mbps, PRBS 2 ²³ -1 Er = 10 dB
Output Resistance	R _{out}	48	50	52	Ω	-

Package Diagram



T-149-622A-G3-B-01

Ordering Information

Available Options:

T-149-622A-G3-B-01

T-149-622A-G3-B-01-G5

T-149-622A-G3-B-01-GR

T	-	149	-	622	A	-	G	3	-	B	-	01	-	XX
Family		Detection Range		Data Rate	Pinout		Header Type	Supply Voltage		Cap Type		Customer Specifics		RoHS compliance
T=PIN TIA		149=1475nm-1505nm		622=622Mbps	A=A-type		G=TO-46	3=3.3V		B=Ball Lens		Special spec.		Blank = RoHS non-compliant product G5 = RoHS 5/6-compliant product (lead exemption) GR = Full RoHS compliant product (no exemption)

Warnings

Handling Precautions: This device is susceptible to damage as a result of electrostatic discharge (ESD). A static free environment is highly recommended. Follow guidelines according to proper ESD procedures.

Laser Safety: Radiation emitted by laser devices can be dangerous to human eyes. Avoid eye exposure to direct or indirect radiation.

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