

FEATURES

- High optical output
- 850nm peak emission
- Hermetically sealed TO-46 package
- Narrow angle for long distance applications

All surfaces are gold plated. Dimensions are nominal values in inches unless otherwise specified. Caps are welded to the case.

ELECTRO-OPTICAL CHARACTERISTICS AT 25°C

PARAMETERS	TEST CONDITIONS	MIN	TYP	MAX	UNITS
Total Power Output, P _O	I _F = 100mA	22	30		mW
Peak Emission Wavelength, λ _P	I _F = 20mA		850		nm
Spectral Bandwidth at 50%, Δλ	I _F = 20mA		40		nm
Half Intensity Beam Angle, θ	I _F = 20mA		8		Deg
Forward Voltage, V _F	I _F = 100mA		1.6	2	Volts
Reverse Breakdown Voltage, V _R	I _R = 10μA	5	30		Volts
Rise Time	I _{FP} = 50mA		20		nsec
Fall Time	I _{FP} = 50mA		20		nsec

ABSOLUTE MAXIMUM RATINGS AT 25°C CASE

Power Dissipation	200mW
Continuous Forward Current	100mA
Peak Forward Current (10μs, 200Hz) ¹	300mA
Reverse Voltage	5V
Lead Soldering Temperature (1/16" from case for 10sec)	260°C

¹Derate linearly above 25°C.

THERMAL PARAMETERS

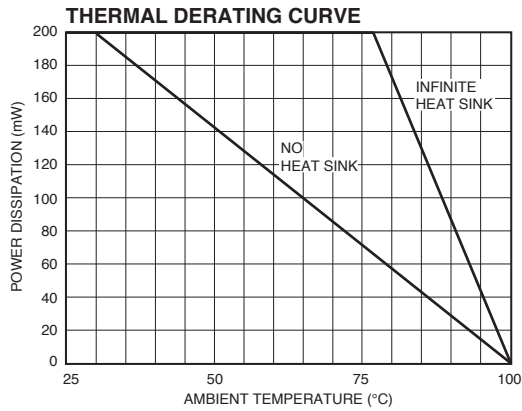
Storage and Operating Temperature Range	-40°C to 100°C
Maximum Junction Temperature	100°C
Thermal Resistance, R _{THJA} ¹	400°C/W Typical
Thermal Resistance, R _{THJA} ²	135°C/W Typical

¹Heat transfer minimized by measuring in still air with minimum heat conducting through leads.

²Air circulating at a rapid rate to keep case temperature at 25°C.



MAXIMUM RATINGS



TYPICAL CHARACTERISTICS

