

L680-40M00 stem type LED with epoxy resin lens

L680-40M00 is AlGaAs LED mounted on TO-18 stem with epoxy resin lens, being designed for sensing devices.

On forward bias, it emits a spectral band of radiation, which peaks at 680nm.

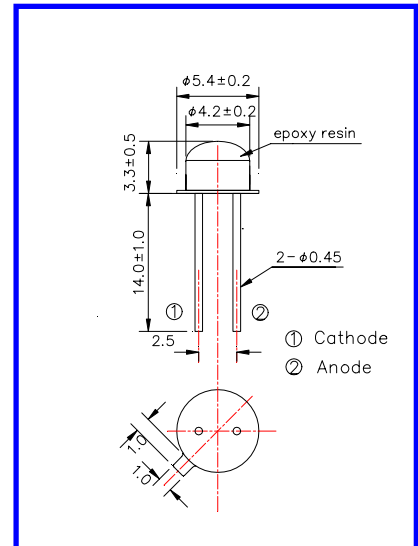
◆ Features

- 1) High Power
- 2) High Reliability
- 3) Wide Viewing Angle

◆ Specifications

- | | |
|---------------------|-------------------|
| 1) Product Name | Infrared LED Lamp |
| 2) Type No. | L680-40M00 |
| 3) Chip Spec. | |
| (1) Material | AlGaAs |
| (2) Peak Wavelength | 680nm |
| 4) Package | |
| (1) type | TO-18 stem |
| (2) Lens | Clear Epoxy Resin |

◆ Outer dimension(unit:mm)



◆ Absolute Maximum Ratings

Item	Symbol	Maximum Rated Value	Unit	Ambient Temperature
Power Dissipation	P _D	110	mW	T _a =25°C
Forward Current	I _F	50	mA	T _a =25°C
Pulse Forward Current	I _{FP}	200	mA	T _a =25°C
Reverse Voltage	V _R	5	V	T _a =25°C
Operating Temperature	T _{OPR}	-30 ~ +85	°C	
Storage Temperature	T _{STG}	-30 ~ +100	°C	
Soldering Temperature	T _{SOL}	260	°C	

‡Pulse Forward Current condition : Duty=1% and Pulse Width=10us.

‡Soldering condition : Soldering condition must be completed within 3 seconds at 260°C

◆ Elector-Optical Characteristics

Item	Symb ol	Condition	Minimum	Typical	Maximum	Unit
Forward Voltage	V _F	I _F =20mA		1.90	2.30	V
Reverse Current	I _R	V _R =5V			10	uA
Total Radiated Power	P _O	I _F =20mA	1.0	2.0		mW
Radiant Intensity	I _E	I _F =20mA		1.0		mW/sr
Peak Wavelength	λ _P	I _F =20mA	660	680	700	nm
Half Width	Δλ	I _F =20mA		20		nm
Viewing Half Angle	Θ _{1/2}	I _F =20mA		±40		deg.
Rise Time	t _r	I _F =20mA		80		ns
Fall Time	t _f	I _F =20mA		80		ns

‡Total Radiated Power is measured by Photodyne #500

‡Radiant Intensity is measured by Tektronix J-651