

L660N-50M32L High Power Red LED

L660N-50M32L is an AlGaInP LED mounted on TO-18 stem and hermetically sealed with glass ball lens can being designed for high beam uses.

On forward bias it emits a spectral band of radiation, which peaks at 660nm.

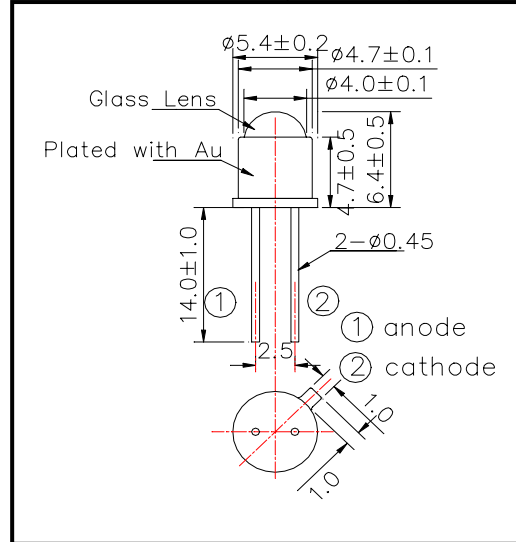
◆ Features

- 1) High Power
- 2) High Reliability

◆ Specifications

- | | |
|---------------------|-----------------|
| 1) Product Name | LED Lamp |
| 2) Type No. | L660N-50M32L |
| 3) Chip Spec. | |
| (1) Material | AlGaInP |
| (2) Chip dimension | 500um*500um |
| (2) Peak Wavelength | 660nm |
| 4) Package | |
| (1) Type | TO-18 Stem |
| (2) Lens | Glass Ball Lens |
| (3) Cap | Gold plated |

◆ Outer dimension (Unit: mm)



◆ Absolute Maximum Ratings

Item	Symbol	Maximum Rated Value	Unit	Ambient Temperature
Power Dissipation	P _D	220	mW	T _a =25°C
Forward Current	I _F	100	mA	T _a =25°C
Pulse Forward Current	I _{FP}	1000	mA	T _a =25°C
Reverse Voltage	V _R	5	V	T _a =25°C
Thermal Resistance	R _{thja}	310	K/W	
Operating Temperature	T _{OPR}	-30 ~ +85	°C	
Storage Temperature	T _{STG}	-40 ~ +100	°C	
Soldering Temperature	T _{SOL}	265	°C	

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

‡Soldering condition: Soldering condition must be completed within 3 seconds at 265°C

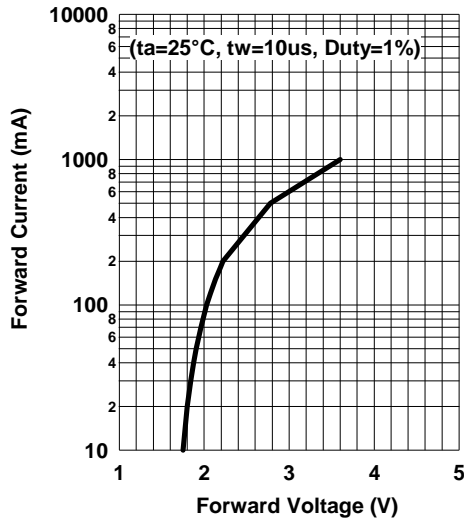
◆ Electro-Optical Characteristics

Item	Symb ol	Condition	Minimum	Typical	Maximum	Unit
Forward Voltage	V _F	I _F =20mA		1.8	2.0	V
		I _F =50mA		1.9	2.1	
Radiated Power	P _O	I _F =20mA		7.6		mW
Radiant Intensity	I _E	I _F =20mA		45		mWsr
Brightness	I _V	I _F =20mA		3500		mcd
Peak Wavelength	λ _P	I _F =20mA	650	660	670	nm
Half Width	Δλ	I _F =20mA		15		nm
Viewing Half Angle	θ _{1/2}	I _F =20mA		±8		deg.

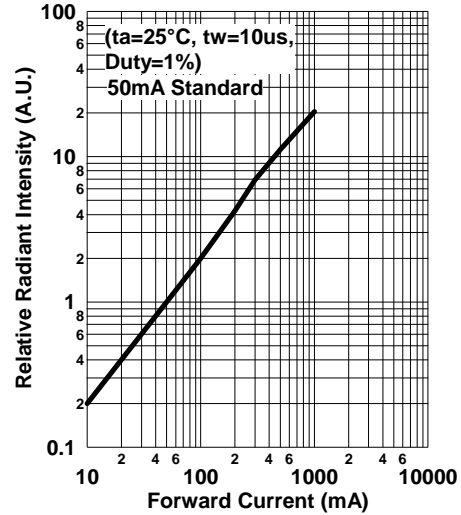
‡Radiated Power is measured by S3584-08

‡Radiant Intensity is measured by Tektronix J-6512.

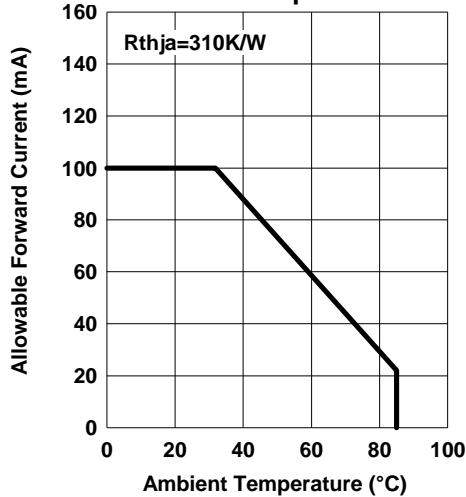
Forward Current - Forward Voltage



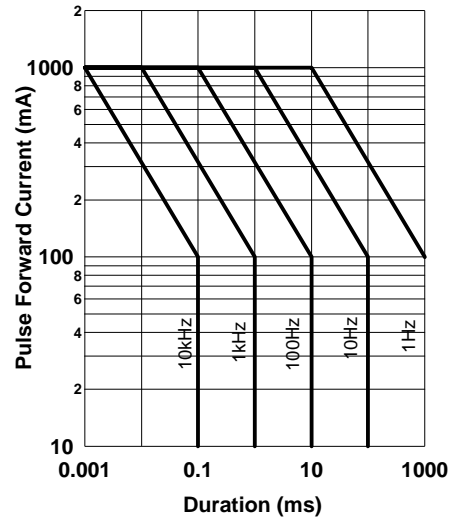
Relative Radiant Intensity - Forward Current



Allowable Forward Current - Ambient Temperature



Forward Current-Pulse Duration



Relative Spectral Emission

