

L418R-04 (L413/422R-04) UV LED Lamp with UV resistant resin

L418R-04 is an InGaN LED mounted on a lead frame with UV resistant resin.

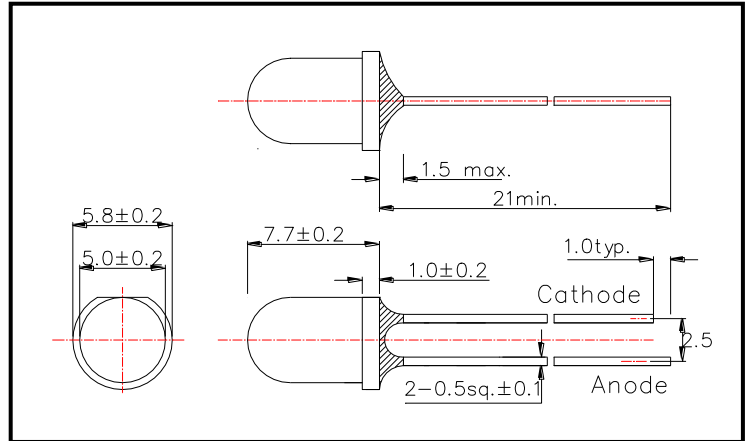
On forward bias, it emits a band of UV light that peaks 413~422nm.

This UV series is designed for long life under UV beam.

◆ Specifications

- 1) Product Name UV LED Lamp
- 2) Type No. L418R-04
- 3) Chip
- (1) Chip Material InGaN
- (2) Peak Wavelength 413~422nm.
- 4) Package
- (1) Type Φ5mm clear molding
- (2) Resin Material UV Resin
- (3) Lead Frame Soldered (Lead Free)

◆ 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	50	mA	T _a =25°C
Reverse Voltage	V _R	5	V	T _a =25°C
Junction Temperature	T _J	100	°C	
Thermal Resistance	R _{thja}	230	K/W	
Operating Temperature	T _{OPR}	-30 ~ +85	°C	
Storage Temperature	T _{STG}	-40 ~ +100	°C	
Soldering Temperature	T _{SOL}	265	°C	

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

‡Thermal resistance: junction – ambient, leads 7mm, soldered on PCB.

◆ Electro-Optical Characteristics

Item	Symbol	Condition	Minimum	Typical	Maximum	Unit
Forward Voltage	V _F	I _F =20mA	3.0	3.4	4.0	V
Reverse Current	I _R	V _R =5V			10	uA
Radiated Power	P _O	I _F =20mA	18.0	24.0		mW
Radiant Intensity	I _E	I _F =20mA		28		mW/sr
Brightness	I _v	I _F =20mA		40		mcd
Peak Wavelength	λ _P	I _F =20mA	413	418	422	nm
Half Width	Δλ	I _F =20mA		16		nm
Viewing Half Angle	θ _{1/2}	I _F =20mA		±20		deg.

‡Radiated Power is measured by S3584-08.

‡Radiated intensity is measured by Ando Optical Multi Meter AQ2140 & AQ2741

‡Brightness is measured by Tektronix J-16.