

Feature

- High Luminous Output Red (AlInGaP)
- Red diffused 3mm T-1 Packages
- Pb Free, RoHS compliant
- Wide viewing angle **100** Degree

SDL-42NEW8D-LT1

Specification

Absolute Maximum Ratings

Item	Symbol	Absolute Maximum Rating	Unit
DC Forward Current	I_F	20	mA
Peak Pulsed Forward Current ※	I_{FP}	60	mA
Reverse Voltage	V_R	5	V
Power Dissipation	P_d	52	mW
Operating Temperature	T_{opr}	-30 ~ +85	°C
Storage Temperature	T_{stg}	-40 ~ +100	°C
Solder Dipping Temperature	T_{sld}	260°C for 5 sec	

※ I_{FP} = Pulse Width \leq 10 ms, Duty Ratio \leq 1/10

Electrical / Optical Characteristics

$T_a = 25^\circ\text{C}$

Item	Symbol	Condition	Min	Typ	Max	Unit
Forward Voltage	V_F	$I_F=10\text{mA}$		2.0	2.5	V
Reverse Current	I_R	$V_R=5\text{V}$			100	μA
Luminous Intensity	I_V	$I_F=10\text{mA}$	3.8	14	30	mcd
Dominant Wavelength	λ_d	$I_F=10\text{mA}$	613.5	625	633	nm
Peak Wavelength	λ_p	$I_F=10\text{mA}$		630		nm
Spectral Half Width	$\Delta \lambda_{1/2}$	$I_F=10\text{mA}$		20		nm



Electrostatic Sensitive Devices

Reversion 1-3 June 2017
www.sanderled.tw

Luminous Intensity Bin Table

IF=10mA

Rank name	Min (mcd)	Max (mcd)
3ST	3.8	6.5
3UV	6.5	11
3WX	11	18
3YZ	18	30

※ Tolerance for each bin limit is $\pm 15\%$

Color Bin Table

IF=10mA

Rank name	Min (nm)	Max (nm)
H27	613.5	617
H28	617	621
H29	621	625
H30	625	629
H31	629	633

※ Tolerance for each bin limit is $\pm 2\text{nm}$

Note

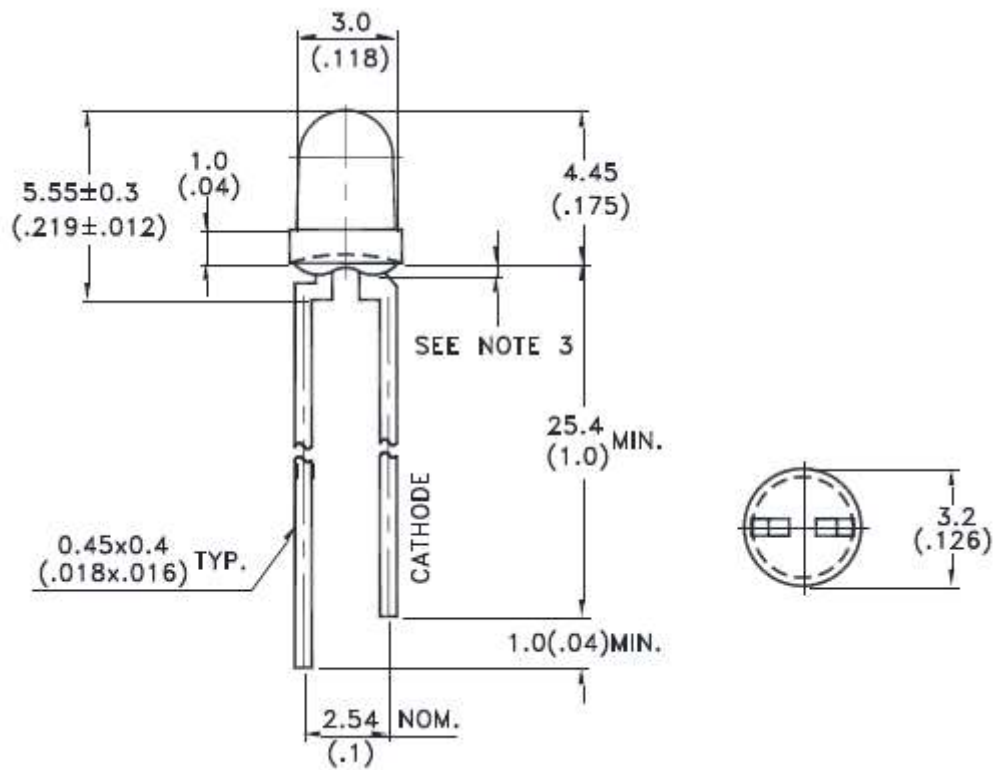
1. One delivery will include several color ranks and I_v ranks of products.
The quantity-ratio of the different rank is decided by Sander.
2. Bin Name typed on the Label: IV RANK + Color Rank.
3. Sander has the right to update the information without notice.
Please double confirm the Spec details before place an order.



Electrostatic Sensitive Devices

Outline Dimensions

Lamps without Standoffs



Item	Materials
Resin	Epoxy Resin
Lead Frame	Ag Plating on SPCC

Note

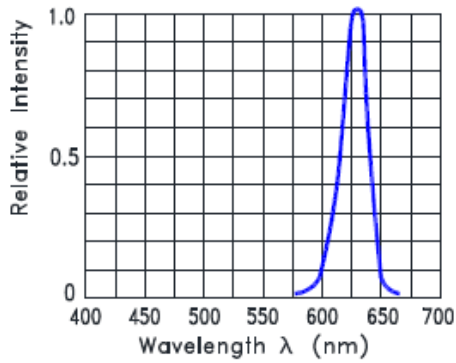
1. All Dimensions are in Millimeters
2. Tolerance is +/- 0.25mm unless otherwise noted.
3. Protruded resin under flange is 1.0mm max.



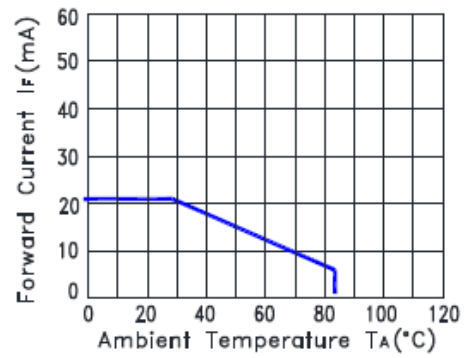
Electrostatic Sensitive Devices

Electrical-Optical Characteristics

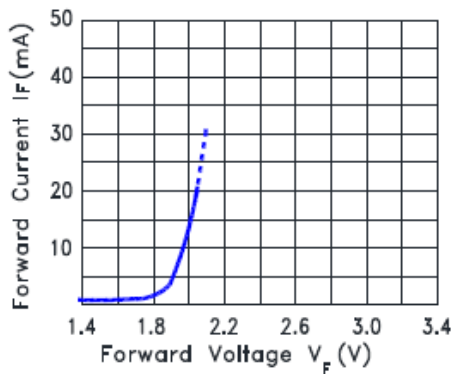
(25°C Ambient Temperature Unless Otherwise Noted)



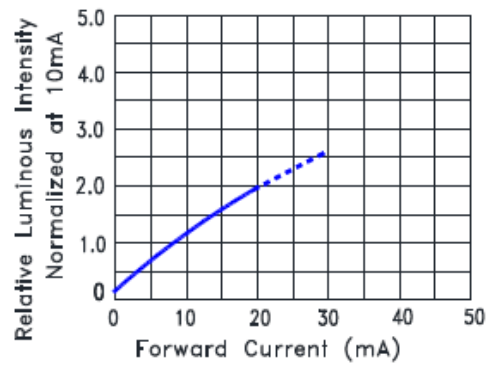
Relative Intensity VS. Wavelength



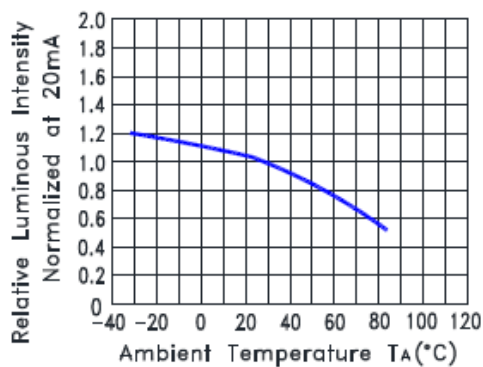
Forward Current Derating Curve



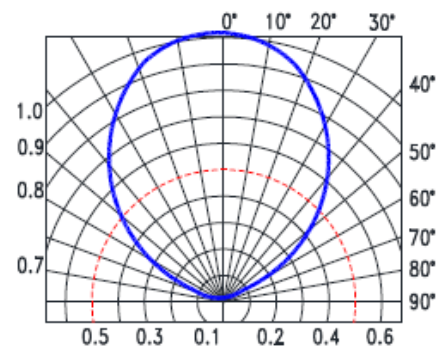
Forward Current vs. Forward Voltage



Relative Luminous Intensity vs. Forward Current



Relative Luminous Intensity VS. Ambient Temperature



Spatial Distribution

