

 $2.0 \mathrm{x} 1.25 \mathrm{mm}$ SMD CHIP LED LAMP

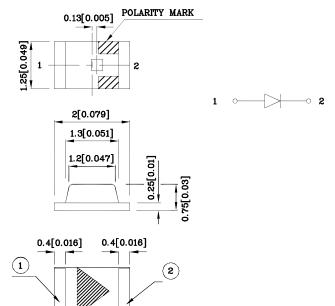
Features

- \bullet Ideal for indication light on hand held products
- Long life and robust package
- Standard Package: 2,000pcs/ Reel
- \bullet MSL (Moisture Sensitivity Level): 3
- RoHS compliant





Package Schematics



Notes

- 1. All dimensions are in millimeters (inches).
- 2. Tolerance is $\pm 0.1 (0.004")$ unless otherwise noted.
- 3. Specifications are subject to change without notice.

Absolute Maximum Ratings (T _A =25°C)		MG (GaP)	Unit	
Reverse Voltage	V_{R}	5	V	
Forward Current	I_{F}	25	mA	
Forward Current (Peak) 1/10 Duty Cycle 0.1ms Pulse Width	ifs	140	mA	
Power Dissipation	P_{D}	62.5	mW	
Operating Temperature	T_{A}	-40 ~ +85	°C	
Storage Temperature	Tstg	-40 ~ +85		

Operating Characteristics (T _A =25°C)	MG (GaP)	Unit		
Forward Voltage (Typ.) (I _F =20mA)	V_{F}	2.2	V	
Forward Voltage (Max.) (I _F =20mA)	V_{F}	2.5	V	
Reverse Current (Max.) (V _R =5V)	I_R	10	uA	
Wavelength of Peak Emission CIE127-2007*(Typ.) (I _F =20mA)	λΡ	565*	nm	
Wavelength of Dominant EmissionCIE127-2007* (Typ.) (I _F =20mA)	λD	568*	nm	
Spectral Line Full Width At Half-Maximum (Typ.) (I _F =20mA)	Δλ	30	nm	
Capacitance (Typ.) (V _F =0V, f=1MHz)	С	15	pF	

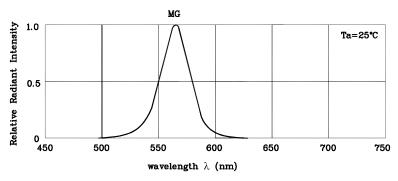
Part Number	Emitting Color	Emitting Material	Lens-color	$\begin{array}{c} \text{Luminous Intensity} \\ \text{CIE127-2007*} \\ \text{(I}_{\text{F}}\text{=20mA)} \\ \text{mcd} \end{array}$		Wavelength CIE127-2007* nm λΡ	Viewing Angle 20 1/2
				min.	typ.		
XZMG54W-1	Green	GaP	Water Clear	5*	11*	565*	120°

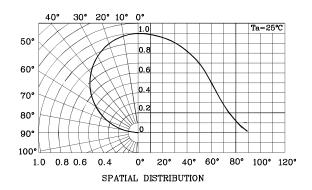
^{*}Luminous intensity value and wavelength are in accordance with CIE127-2007 standards.

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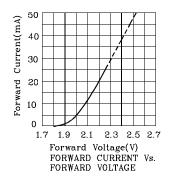


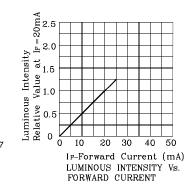


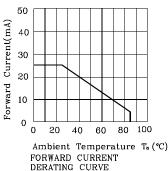


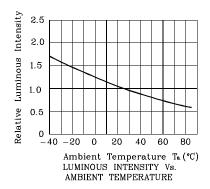
RELATIVE INTENSITY Vs. CIE WAVELENGTH

❖ MG



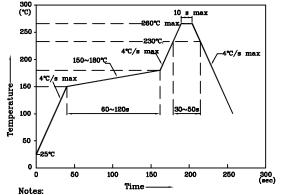






LED is recommended for reflow soldering and soldering profile is shown below.

Reflow Soldering Profile for SMD Products (Pb-Free Components)

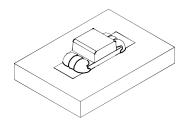


- 1. Maximum soldering temperature should not exceed 260°C
- 2. Recommended reflow temperature: 145°C-260°C
- 3. Do not put stress to the epoxy resin during high temperatures conditions

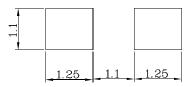




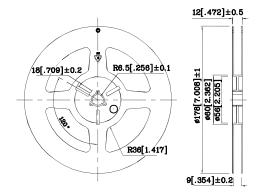
❖ The device has a single mounting surface. The device must be mounted according to the specifications.



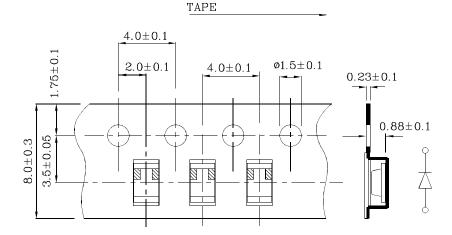
❖ Recommended Soldering Pattern (Units: mm; Tolerance: ± 0.1)



❖ Reel Dimension



❖ Tape Specification (Units:mm)



Remarks:

If special sorting is required (e.g. binning based on forward voltage, Luminous intensity / luminous flux, or wavelength), the typical accuracy of the sorting process is as follows:

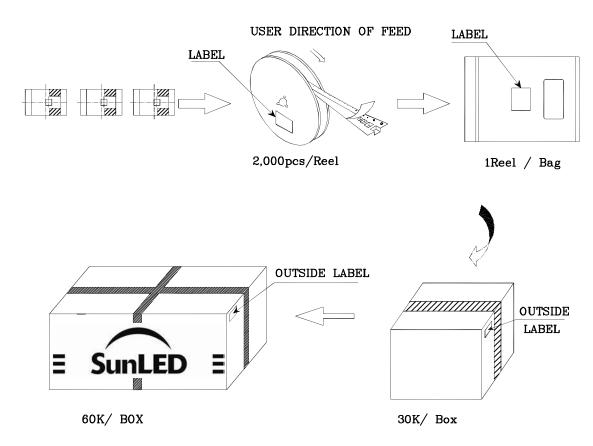
- 1. Wavelength: +/-1nm
- 2. Luminous intensity / luminous flux: +/-15%
- 3. Forward Voltage: +/-0.1V

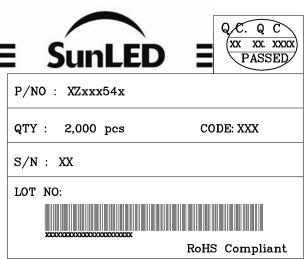
Note: Accuracy may depend on the sorting parameters.





PACKING & LABEL SPECIFICATIONS





TERMS OF USE

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- 2. Contents within this document are subject to improvement and enhancement changes without notice.
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