

3mm One Position CBI Housing

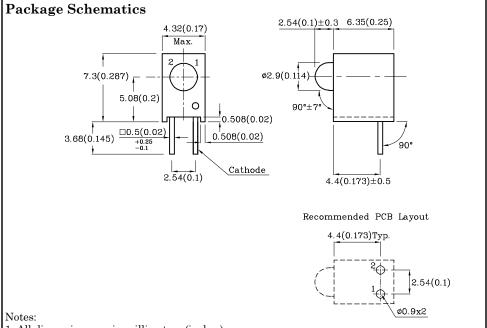
Features

- Housing material: Type 66 Nylon
- Black casing provides superior contrast
- Housing UL rating: 94V-0
- Reliable & robust
- RoHS Compliant

Dec 02,2020







- 1. All dimensions are in millimeters (inches).
- 2. Tolerance is $\pm 0.25(0.01")$ unless otherwise noted.
- 3. Specifications are subject to change without notice.

Absolute Maximum Ratings (T _A =25°C)		Green (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	i_{FS}	140	mA mW	
Power Dissipation	P_{D}	62.5		
Operating Temperature	$T_{\rm A}$	-40 ~ +85	°C	
Storage Temperature	Tstg	-40 ~ +85		
Lead Solder Temperature [2mm Below Package Base]	260°C For 3 Seconds			
Lead Solder Temperature [5mm Below Package Base]	260°C For 5 Seconds			

A Relative Humidity between 40% and 60% is recommended in ESD-protected work areas to reduce static build up during assembly process (Reference JEDEC/JESD625-A and JEDEC/J-STD-033)

Operating Characteristics (T _A =25°C)		Green (GaP)	Unit
Forward Voltage (Typ.) (I _F =10mA)	V_{F}	V_{F} 2	
Forward Voltage (Max.) (I _F =10mA)	V_{F}	2.4	V
Reverse Current (Max.) I_R		10	μА
Wavelength of Peak Emission CIE127-2007* (Typ.) (I _F =10mA)	λΡ	565*	nm
Wavelength of Dominant Emission CIE127-2007* (Typ.) (I _F =10mA)	λD	568*	nm
Spectral Line Full Width At Half-Maximum (Typ.) (I _F =10mA)	$\triangle \lambda$	30	nm
Capacitance (Typ.) (V _F =0V, f=1MHz)	C	15	pF

Part Number	Emitting Color	Emitting Material	Lens-color	$\begin{array}{c} \text{Luminous Intensity} \\ \text{CIE127-2007*} \\ \text{(I}_{\text{F}}\text{=}10\text{mA)} \\ \text{mcd} \end{array}$		Wavelength CIE127-2007* nm λP	Viewing Angle 20 1/2
				min.	typ.		
XNK1LUG11D	Green	GaP	Green Diffused	10*	24*	565*	50°

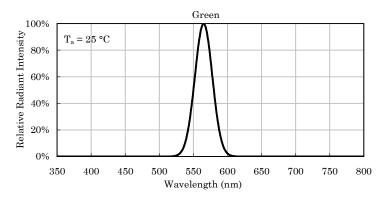
^{*}Luminous intensity value and wavelength are in accordance with CIE127-2007 standards.

XDSB8821 V2-Z Layout: Maggie L.



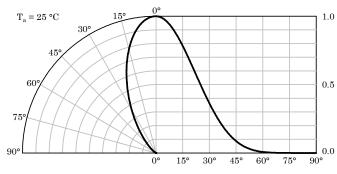


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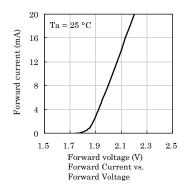
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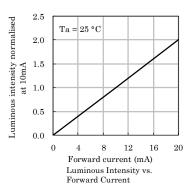
Relative Intensity Vs. CIE Wavelength

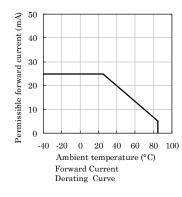


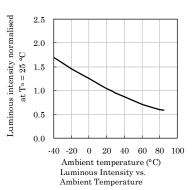
Spatial Distribution

Green

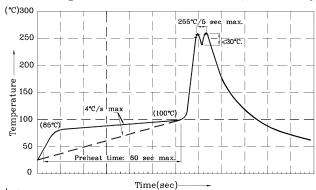








Wave Soldering Profile For Thru-Hole Products (Pb-Free Components)



Notes:

- 1.Recommend pre-heat temperature of 105°C or less (as measured with a thermocouple attached to the LED pins) prior to immersion in the solder wave with a maximum solder bath temperature of 260°C 2.Peak wave soldering temperature between 245°C ~ 255°C for 3 sec
- (5 sec max).
- 3.Do not apply stress to the epoxy resin while the temperature is above $85\,^\circ\text{C}.$ 4.Fixtures should not incur stress on the component when mounting and
- during soldering process. 5.SAC 305 solder alloy is recommended.
- 6. No more than one wave soldering pass

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:

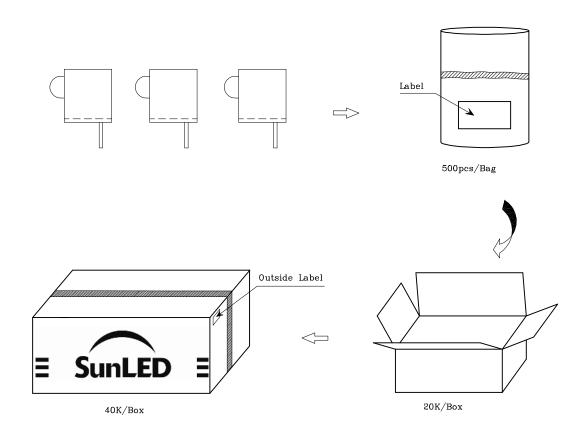
- 1. Wavelength: +/-1nm
- 2. Luminous Intensity / Luminous Flux: +/-15%
- 3. Forward Voltage: +/-0.1V

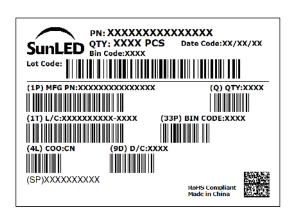
Note: Accuracy may depend on the sorting parameters.





PACKING & LABEL SPECIFICATIONS





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