

3.5x2.8 mm SURFACE MOUNT LED LAMP

Features

- SINGLE COLOR.
- SUITABLE FOR ALL SMT ASSEMBLY AND SOLDER PROCESS.
- AVAILABLE ON TAPE AND REEL.
- IDEAL FOR BACKLIGHTING.
- PACKAGE: 1500PCS / REEL.
- MOISTURE SENSITIVITY LEVEL : LEVEL 4.
- Rohs Compliant.

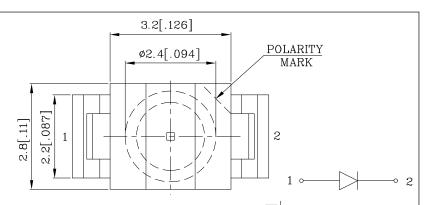


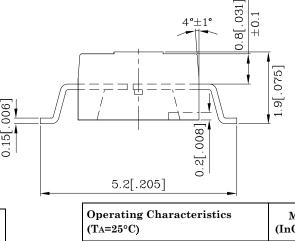


Notes:

- 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 (TA=25°C)		MDK (InGaAlP)	Unit
Reverse Voltage	$V_{\rm R}$	5	V
Forward Current	IF	30	mA
Forward Current (Peak) 1/10 Duty Cycle 0.1ms Pulse Width	ifs	185	mA
Power Dissipation	Рт	75	mW
Operating Temperature	TA	-40 ~ +85	°C
Storage Temperature	Tstg	-40 ~ +85	C



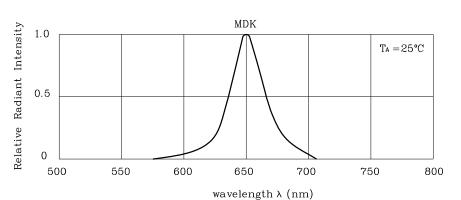


Operating Characteristic (TA=25°C)	MDK (InGaAlP)	Unit	
Forward Voltage (Typ.) (IF=20mA)	V_{F}	1.95	V
Forward Voltage (Max.) (IF=20mA)	$V_{\rm F}$	2.5	V
Reverse Current (Max.) (VR=5V)	IR	10	uA
Wavelength of Peak Emission (Typ.) (IF=20mA)	λр	650	nm
Wavelength of Dominant Emission (Typ.) (IF=20mA)	λ D	635	nm
Spectral Line Full Width At Half-Maximum (Typ.) (IF=20mA)	Δλ	28	nm
Capacitance (Typ.) (VF=0V, f=1MHz)	С	35	pF

Part Number	Emitting Color	Emitting Material	Lens-color	Luminous Intensity (IF=20mA) mcd		Wavelength nm λ P	Viewing Angle 2 0 1/2
				min.	typ.		
XZMDK45FW-9	Red	InGaAlP	Water Clear	70	198	650	120°
Published Date : J.	AN 22, 2008	Drawi	ing No : XDSB1708	V1	Che	cked : B.L.LIU	P. 1/4

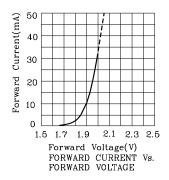


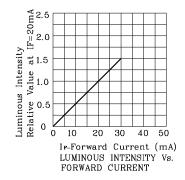
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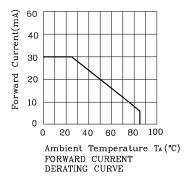


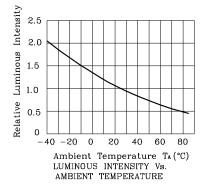
RELATIVE INTENSITY Vs. WAVELENGTH

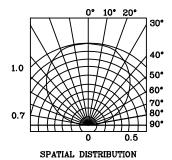
❖ MDK









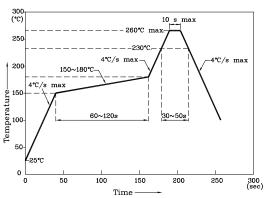


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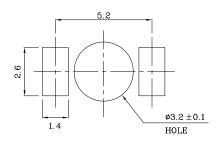
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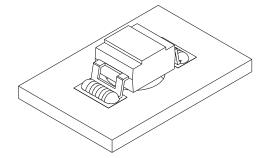
Reflow Soldering Profile For Lead-free SMT Process.



NOTES:

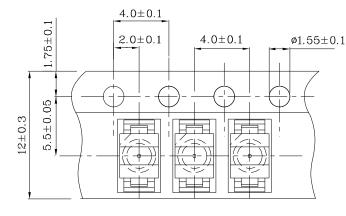
- Maximum soldering temperature should not exceed 260°c.
- 2. Recommended reflow temperature: 145°c-260°c.
- 3. Do not put stress to the epoxy resin during high temperatures conditions.
- ❖ Recommended Soldering Pattern (Units : mm; Tolerance: ±0.1)
- **❖** The device has a single mounting surface. The device must be mounted according to the specifications.

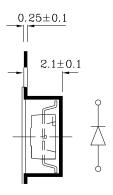




* Tape Specification (Units:mm)

TAPE





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.

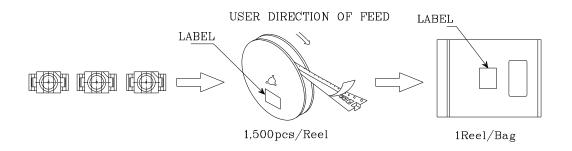
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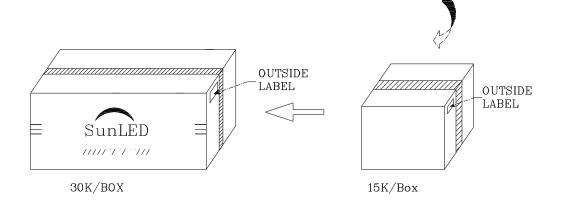


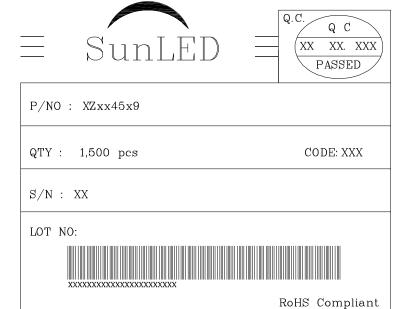
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PACKING & LABEL SPECIFICATIONS

XZMDK45FW-9







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