

# Part Number: XLMYK12D5V

T-1 3/4 (5mm) SOLID STATE LAMP

### Features

- Radial / Through hole package
- $\bullet$  Reliable & robust
- Low power consumption
- Available on tape and reel
- $\bullet$  5V internal resistor.
- RoHS Compliant







1. All dimensions are in millimeters (inches).

**Package Schematics** 

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

Absolute Maximum Ratings (T <sub>A</sub> =25°C)		MYK (AlGaInP)	Unit		
Reverse Voltage	$V_{R}$	5	V		
Forward Voltage	$V_{\rm F}$	6	V		
Power Dissipation	$P_{D}$	85	mW		
Operating Temperature	TA	-40 ~ +70	°C		
Storage Temperature	Tstg	$-40 \sim +85$			
Lead Solder Temperature [2mm Below Package Base]	260°C For 3 Seconds				
Lead Solder Temperature [5mm Below Package Base]	260°C For 5 Seconds				

Operating Characteristics (T <sub>A</sub> =25°C)		MYK (AlGaInP)	Unit
Forward Current (Typ.) (V <sub>F</sub> =5V)	$\mathrm{I}_\mathrm{F}$	13	mA
Forward Current (Max.) (V <sub>F</sub> =5V)	$I_{\rm F}$	17.5	mA
Reverse Current (Max.) (V <sub>R</sub> =5V)	$I_R$	10	uA
Wavelength of Peak Emission CIE127-2007* (Typ.) (V <sub>F</sub> =5V)	λP	590*	nm
Wavelength of Dominant Emission CIE127-2007* (Typ.) (V <sub>F</sub> =5V)	λD	590*	nm
Spectral Line Full Width At Half-Maximum (Typ.) (V <sub>F</sub> =5V)	$ riangle \lambda$	20	nm

Part Number	Emitting Color	Emitting Material	Lens-color	Luminous Intensity CIE127-2007* (V <sub>F</sub> =5V) mcd		Wavelength CIE127-2007* nm λP	Viewing Angle 20 1/2
				min.	typ.		
XLMYK12D5V	Yellow	AlGaInP	Yellow Diffused	250*	497*	590*	30°

\*Luminous intensity value and wavelength are in accordance with CIE127-2007 standards.







## ♦ MYK







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



I.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  $85^{\circ}$ C. 4.Fixtures should not incur stress on the component when mounting and

during soldering process. 5.SAC 305 solder alloy is recommended.

No more than one wave soldering pass.

#### Remarks:

If special sorting is required (e.g. binning based on 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%

Note: Accuracy may depend on the sorting parameters.



### **PACKING & LABEL SPECIFICATIONS**



#### TERMS OF USE

- 1. Data presented in this document reflect statistical figures and should be treated as technical reference only.
- 2. Contents within this document are subject to improvement and enhancement changes without notice.
- 3. The product(s) in this document are designed to be operated within the electrical and environmental specifications indicated on the datasheet.
- User accepts full risk and responsibility when operating the product(s) beyond their intended specifications.
- 4. The product(s) described in this document are intended for electronic applications in which a person's life is not reliant upon the LED. Please consult with a SunLED representative for special applications where the LED may have a direct impact on a person's life.
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