

3.0x2.5mm SURFACE MOUNT LED LAMP

Part Number: KPB-3025ESGC

High Efficiency Red Super Bright Green

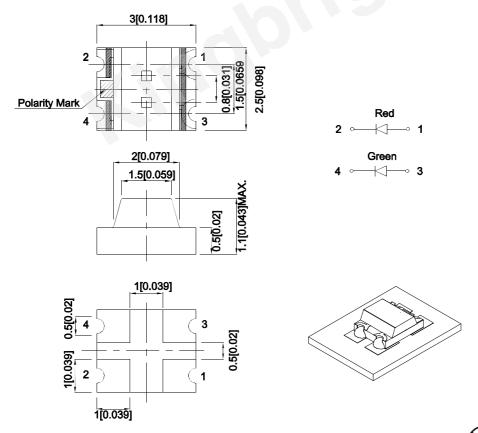
Features

- 3.0mmx2.5mm SMD LED, 1.1mm thickness.
- Bi-color,Low power consumption.
- Wide viewing angle.
- Ideal for backlight and indicator.
- Package: 2000pcs / reel.
- Moisture sensitivity level : level 3.
- · RoHS compliant.

Descriptions

- The High Efficiency Red source color devices are made with Gallium Arsenide Phosphide on Gallium Phosphide Orange Light Emitting Diode.
- The Super Bright Green source color devices are made with Gallium Phosphide Green Light Emitting Diode.

Package Dimensions



- 1. All dimensions are in millimeters (inches).
- 2. Tolerance is $\pm 0.2(0.008")$ unless otherwise noted.
- The specifications, characteristics and technical data described in the datasheet are subject to change without prior notice.
 The device has a single mounting surface. The device must be mounted according to the specifications.

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Selection Guide

Part No.	Emitting Color (Material)	Lens Type	lv (mcd) [2] @ 20mA		Viewing Angle [1]
			Min.	Тур.	201/2
KPB-3025ESGC	High Efficiency Red (GaAsP/GaP)	- Water Clear	8	15	120°
			*3	*8	
	Super Bright Green (GaP)		8	15	
			*8	*15	

- Notes:
 1. 01/2 is the angle from optical centerline where the luminous intensity is 1/2 of the optical peak value.
 2. Luminous intensity / luminous Flux: +/-15%.

 * Luminous intensity value is traceable to the CIE127-2007 compliant national standards.

Electrical / Optical Characteristics at TA=25°C

Symbol	Parameter	Emitting Color	Тур.	Max.	Units	Test Conditions
λpeak	Peak Wavelength	High Efficiency Red Super Bright Green	627 565		nm	I=20mA
λD [1]	Dominant Wavelength	High Efficiency Red Super Bright Green	617 568		nm	I==20mA
Δλ1/2	Spectral Line Half-width	High Efficiency Red Super Bright Green	45 30		nm	I==20mA
С	Capacitance	High Efficiency Red Super Bright Green	15 15		pF	VF=0V;f=1MHz
VF [2]	Forward Voltage	High Efficiency Red Super Bright Green	2 2.2	2.5 2.5	V	IF=20mA
lR	Reverse Current	High Efficiency Red Super Bright Green		10 10	uA	V _R = 5V

Notes:

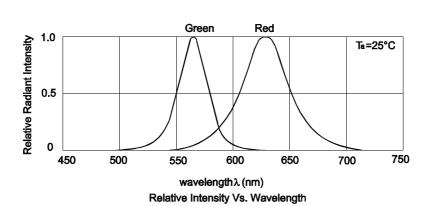
- 1. Wavelength: +/-1nm.
- 2. Forward Voltage: +/-0.1V.
- 3. Wavelength value is traceable to the CIE127-2007 compliant national standards.
- 4. Excess driving current and / or operating temperature higher than recommended conditions may result in severe light degradation or premature failure.

Absolute Maximum Ratings at TA=25°C

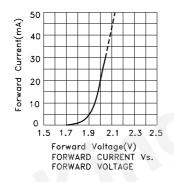
Parameter	High Efficiency Red	Super Bright Green	Units		
Power dissipation	75	62.5	mW		
DC Forward Current	30	25	mA		
Peak Forward Current [1]	160	140	mA		
Reverse Voltage		V			
Operating Temperature	-40°C To +85°C				
Storage Temperature	-40°C To +85°C				

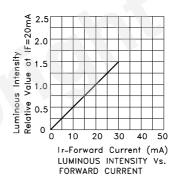
1. 1/10 Duty Cycle, 0.1ms Pulse Width.

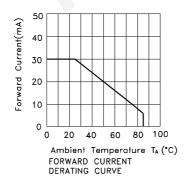
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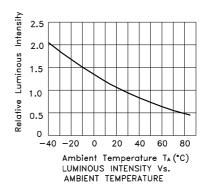


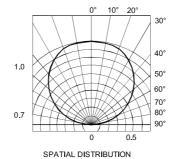
KPB-3025ESGC High Efficiency Red





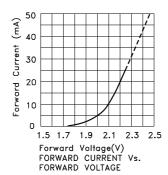


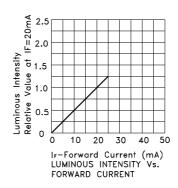


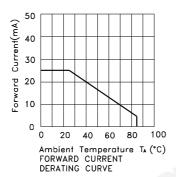


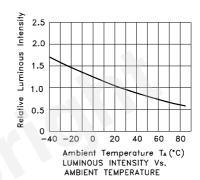
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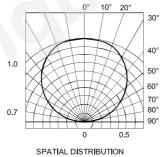
Super Bright Green









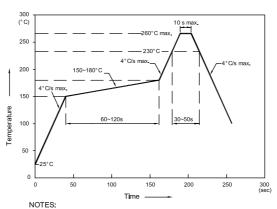


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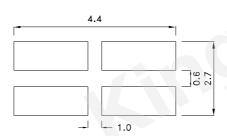
Reflow soldering is recommended and the soldering profile is shown below. Other soldering methods are not recommended as they might cause damage to the product.

Reflow Soldering Profile For Lead-free SMT Process.



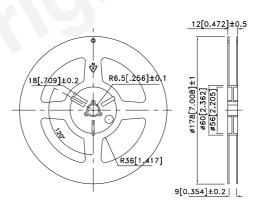
- We recommend the reflow temperature 245°C(+/-5°C). The maximum soldering temperature should be limited to 260°C.
- 2.Don't cause stress to the epoxy resin while it is exposed
- to high temperature.
 3.Number of reflow process shall be 2 times or less.

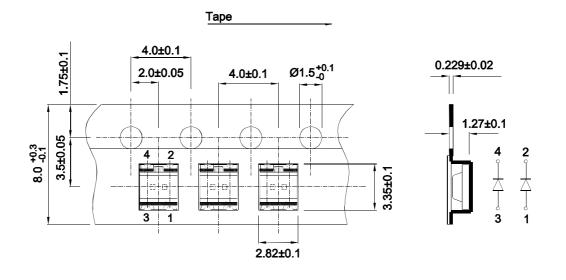
Recommended Soldering Pattern (Units: mm; Tolerance: ± 0.1)



Tape Dimensions (Units: mm)

Reel Dimension



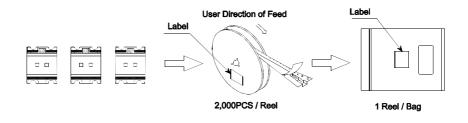


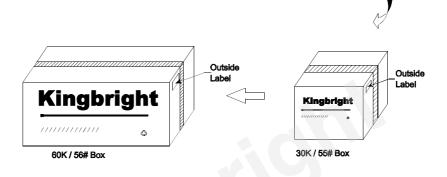
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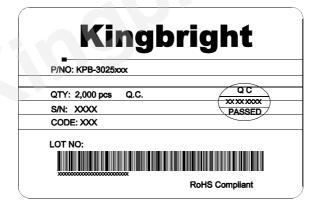
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PACKING & LABEL SPECIFICATIONS

KPB-3025ESGC







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