

2.0x1.25mm SMD CHIP LED LAMP

Part Number: APHBM2012CGKSEKC

Green

Super Bright Orange

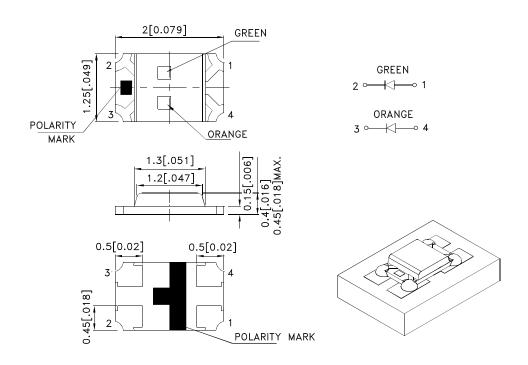
Features

- 2.0mmx1.25mm SMT LED, 0.45mm max. 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 Green source color devices are made with AlGaInP on GaAs substrate Light Emitting Diode.
- The Super Bright Orange device is made with AlGaInP (on GaAs substrate) light emitting diode chip.

Package Dimensions



- 1. All dimensions are in millimeters (inches).
- 2. Tolerance is $\pm 0.1 (0.004")$ 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.

SPEC NO: DSAG8826 **REV NO: V.7A** DATE: AUG/11/2014 PAGE: 1 OF 6 APPROVED: WYNEC **CHECKED: Allen Liu** DRAWN: L.Q.Xie ERP: 1203006100

Selection Guide

Part No.	Dice	Lens Type	lv (mcd) [2] @ 20mA		Viewing Angle [1]
		-	Min.	Тур.	201/2
APHBM2012CGKSEKC	Green (AlGaInP)	Water Clear	20	50	- 120°
			*20	*50	
	Super Bright Orange (AlGaInP)		150	250	
			*80	*180	

- Notes: 1. θ 1/2 is the angle from optical centerline where the luminous intensity is 1/2 of the optical peak value.
- 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	Device	Тур.	Max.	Units	Test Conditions
λpeak	Peak Wavelength	Green Super Bright Orange	574 610		nm	I==20mA
λD [1]	Dominant Wavelength	Green Super Bright Orange	570 601		nm	I==20mA
Δλ1/2	Spectral Line Half-width	Green Super Bright Orange	20 29		nm	I==20mA
С	Capacitance	Green Super Bright Orange	15 15		pF	VF=0V;f=1MHz
VF [2]	Forward Voltage	Green Super Bright Orange	2.1 2.1	2.5 2.5	V	I==20mA
lR	Reverse Current	Green Super Bright Orange		10 10	uA	V _R = 5V

Notes:

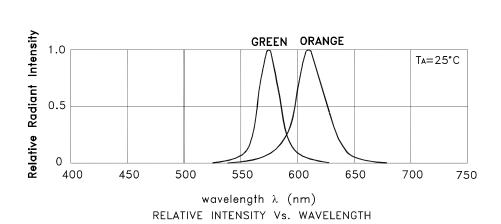
- 1.Wavelength: +/-1nm.
- Forward Voltage: +/-0.1V.
 Wavelength value is traceable to the CIE127-2007 compliant national standards.

Absolute Maximum Ratings at TA=25°C

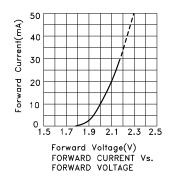
Parameter	Green	Super Bright Orange	Units		
Power dissipation	75	75	mW		
DC Forward Current	30	30	mA		
Peak Forward Current [1]	150	195	mA		
Reverse Voltage	5				
Operating Temperature	-40°C To +85°C				
Storage Temperature	-40°C To +85°C				

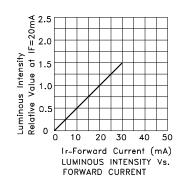
Note: 1. 1/10 Duty Cycle, 0.1ms Pulse Width.

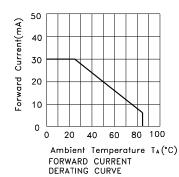
SPEC NO: DSAG8826 **REV NO: V.7A** DATE: AUG/11/2014 PAGE: 2 OF 6 APPROVED: WYNEC **CHECKED: Allen Liu** DRAWN: L.Q.Xie ERP: 1203006100

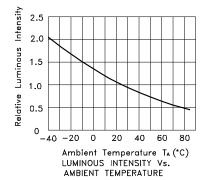


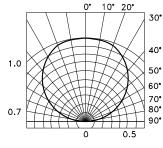
APHBM2012CGKSEKC Green







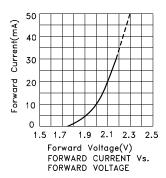


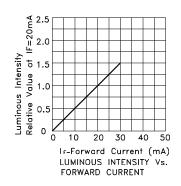


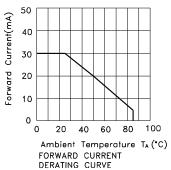
SPATIAL DISTRIBUTION

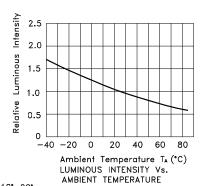
SPEC NO: DSAG8826 REV NO: V.7A DATE: AUG/11/2014 PAGE: 3 OF 6
APPROVED: WYNEC CHECKED: Allen Liu DRAWN: L.Q.Xie ERP: 1203006100

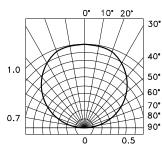
Super Bright Orange











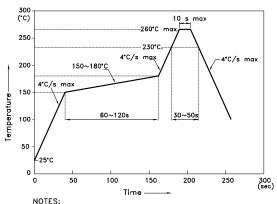
SPATIAL DISTRIBUTION

SPEC NO: DSAG8826 REV NO: V.7A DATE: AUG/11/2014 PAGE: 4 OF 6
APPROVED: WYNEC CHECKED: Allen Liu DRAWN: L.Q.Xie ERP: 1203006100

APHBM2012CGKSEKC

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.



- NOTES:

 1.We recommend the reflow temperature 245°C(+/-5°C). The maximum soldering temperature should be limited to 260°C.

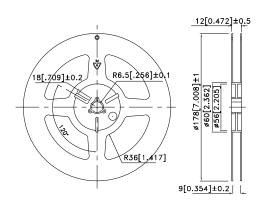
 2.Don't cause stress to the epoxy resin while it is exposed to high temperature.

 3.Number of reflow process shall be 2 times or less.

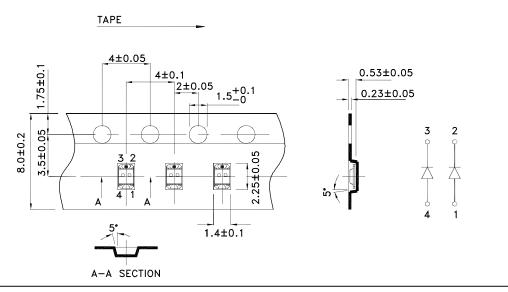
Recommended Soldering Pattern (Units: mm; Tolerance: ± 0.1)

0.6

Reel Dimension



Tape Dimensions (Units : mm)



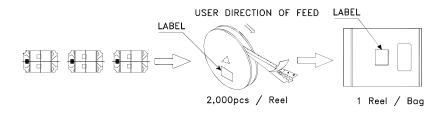
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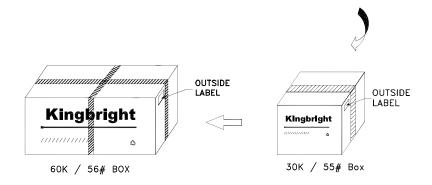
REV NO: V.7A CHECKED: Allen Liu DATE: AUG/11/2014 DRAWN: L.Q.Xie

PAGE: 5 OF 6 ERP: 1203006100

PACKING & LABEL SPECIFICATIONS

APHBM2012CGKSEKC







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SPEC NO: DSAG8826 REV NO: V.7A DATE: AUG/11/2014 PAGE: 6 OF 6
APPROVED: WYNEC CHECKED: Allen Liu DRAWN: L.Q.Xie ERP: 1203006100

AMEYA360 Components Supply Platform

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