### 1.6x0.8x0.5mm BI-COLOR SURFACE MOUNT LED

Part Number: APHB1608CGKSYKC

Green Super Bright Yellow

#### **Features**

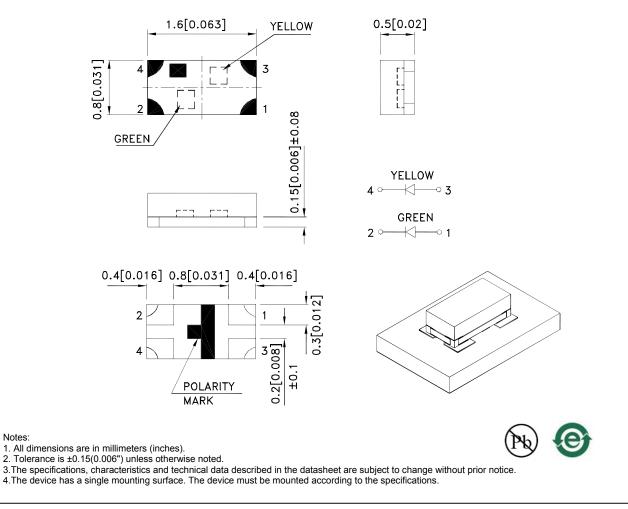
- 1.6mmX0.8mm SMT LED, 0.5mm thickness.
- Compatible with reflow soldering.
- Available in various color combination.
- Package: 2000pcs / reel .
- Moisture sensitivity level : level 3.
- Tinned pads for improved solderability.
- · RoHS compliant.

#### Description

The Green source color devices are made with AlGaInP on GaAs substrate Light Emitting Diode.

The Super Bright Yellow device is made with AlGaInP (on GaAs substrate) light emitting diode chip.

#### **Package Dimensions**



Notes:

**REV NO: V.6B CHECKED: Allen Liu**  DATE: MAR/04/2013 DRAWN: Y.Liu

PAGE: 1 OF 6 ERP: 1203011475

#### **Selection Guide** lv (mcd) [2] Viewing @ 20mA Angle [1] Part No. Dice Lens Type 201/2 Min. Тур. Green (AlGaInP) 20 50 APHB1608CGKSYKC Water Clear 130° Super Bright Yellow (AlGaInP) 80 150

Notes:

θ1/2 is the angle from optical centerline where the luminous intensity is 1/2 of the optical peak value.
Luminous intensity/ luminous Flux: +/-15%.

3. 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 Yellow	574 590		nm	I⊧=20mA
λD [1]	Dominant Wavelength	Green Super Bright Yellow	570 590		nm	I⊧=20mA
Δλ1/2	Spectral Line Half-width	Green Super Bright Yellow	20 20		nm	I⊧=20mA
С	Capacitance	Green Super Bright Yellow	15 20		pF	VF=0V;f=1MHz
Vf [2]	Forward Voltage	Green Super Bright Yellow	2.1 2	2.5 2.5	V	I⊧=20mA
lr	Reverse Current	Green Super Bright Yellow		10 10	uA	VR = 5V

Notes:

1.Wavelength: +/-1nm.

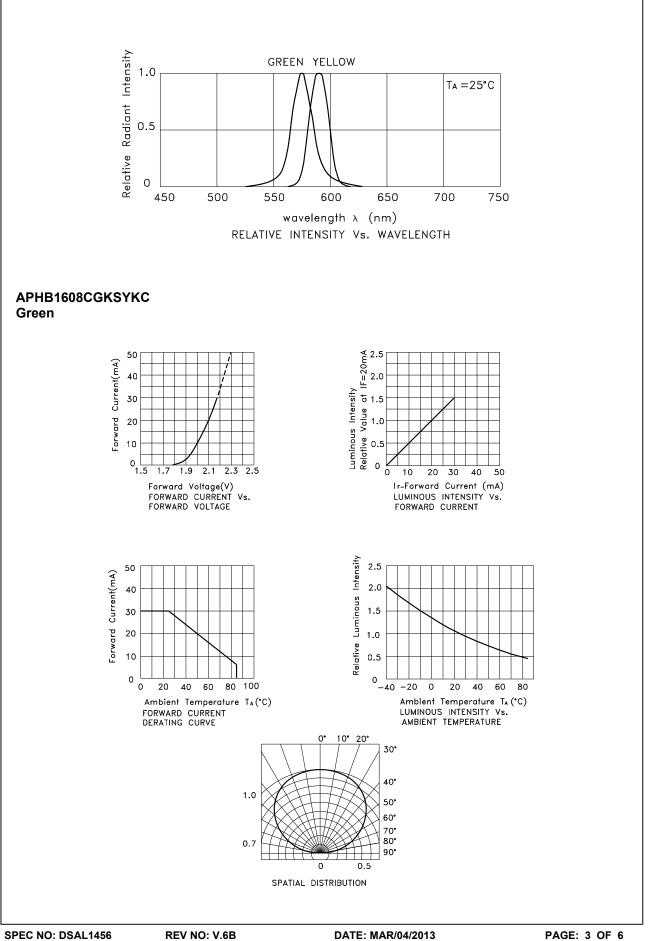
Forward Voltage: +/-0.1V.
Wavelength value is traceable to the CIE127-2007 compliant national standards.

#### Absolute Maximum Ratings at TA=25°C

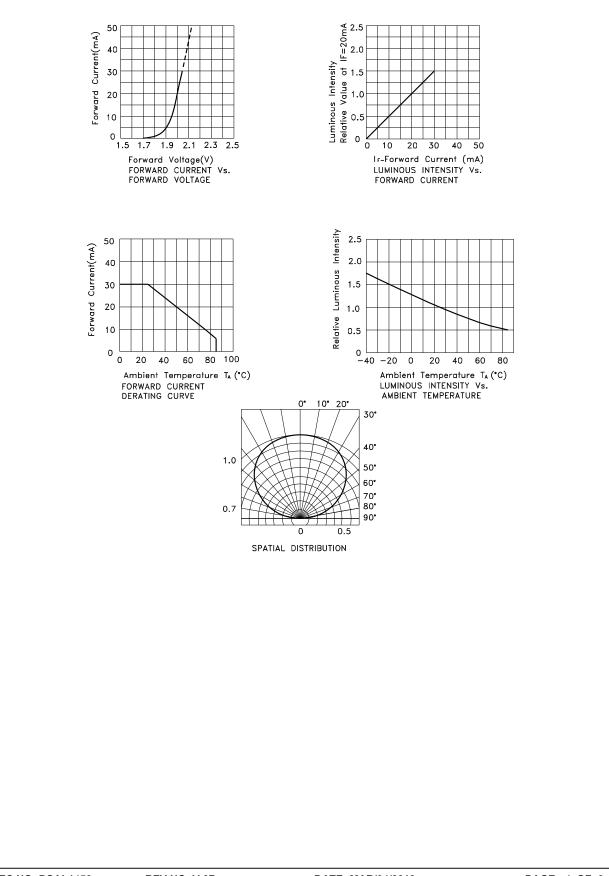
Parameter	Green	Super Bright Yellow	Units		
Power dissipation	75	75	mW		
DC Forward Current	30	30	mA		
Peak Forward Current [1]	150	175	mA		
Reverse Voltage		V			
Operating Temperature	-40°C To +85°C				
Storage Temperature	-40°C To +85°C				

Note:

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



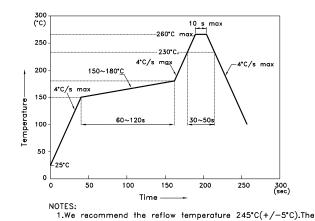
### Super Bright Yellow



### APHB1608CGKSYKC

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.

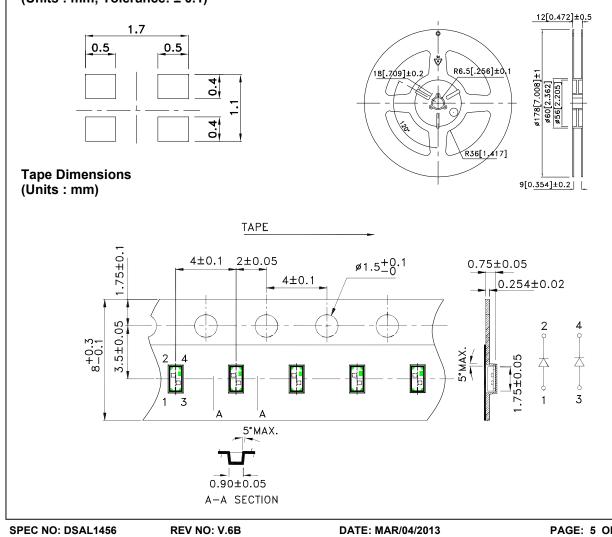


NOTES: 1.We recommend the reflow temperature 245°C(+/-5°C).The maximum soldering temperature should be limited to 260°C. 2.Don't cause stress to the epoxy resin while it is exposed

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



### **Reel Dimension**



**CHECKED: Allen Liu** 

DRAWN: Y.Liu

