

Part Number: APHB1608CGKSURKC

Green
Hyper Red

Features

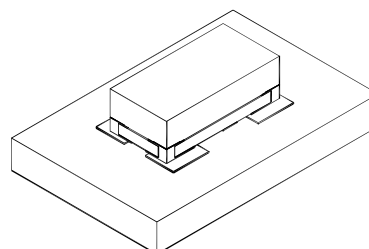
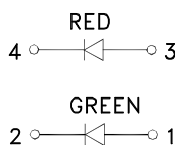
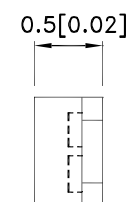
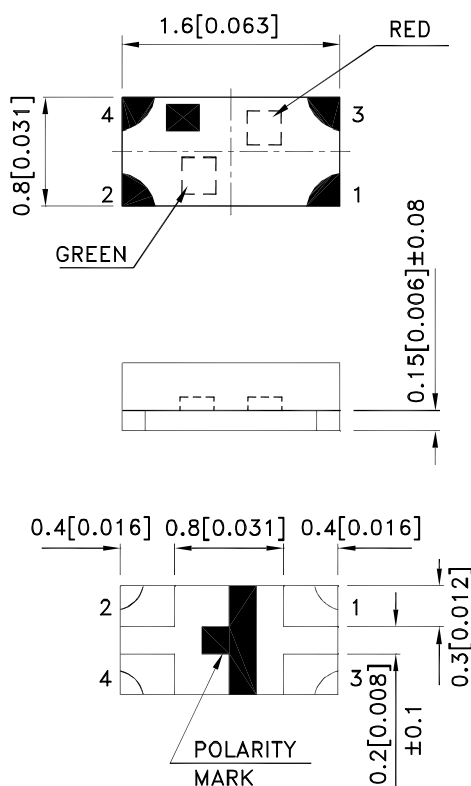
- 1.6mmX0.8mm SMT LED, 0.5mm thickness.
- Compatible with reflow soldering.
- Available in various color combination.
- Package: 2000pcs / reel.
- Moisture sensitivity level : level 3.
- Tinned pads for improved solderability.
- RoHS compliant.

Description

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

The Hyper Red source color devices are made with Al-GaInP on GaAs substrate Light Emitting Diode.

Package Dimensions



Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is $\pm 0.15(0.006)$ unless otherwise noted.
3. The specifications, characteristics and technical data described in the datasheet are subject to change without prior notice.
4. The device has a single mounting surface. The device must be mounted according to the specifications.



Selection Guide

Part No.	Dice	Lens Type	Iv (mcd) [2] @ 20mA		Viewing Angle [1]
			Min.	Typ.	2θ1/2
APHB1608CGKSURKC	Green (AlGaInP)	Water Clear	20	50	130°
			*20	*50	
	Hyper Red (AlGaInP)		120	250	
			*40	*90	

Notes:

1. θ1/2 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	Device	Typ.	Max.	Units	Test Conditions
λpeak	Peak Wavelength	Green Hyper Red	574 645		nm	If=20mA
λD [1]	Dominant Wavelength	Green Hyper Red	570 630		nm	If=20mA
Δλ1/2	Spectral Line Half-width	Green Hyper Red	20 28		nm	If=20mA
C	Capacitance	Green Hyper Red	15 35		pF	VF=0V;f=1MHz
VF [2]	Forward Voltage	Green Hyper Red	2.1 1.95	2.5 2.5	V	If=20mA
IR	Reverse Current	Green Hyper Red		10 10	uA	VR = 5V

Notes:

1. Wavelength: +/-1nm.

2. Forward Voltage: +/-0.1V.

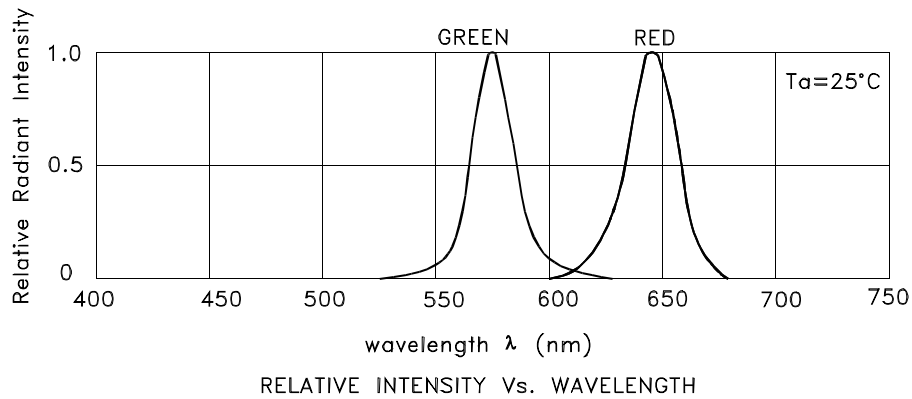
3. Wavelength value is traceable to the CIE127-2007 compliant national standards.

Absolute Maximum Ratings at TA=25°C

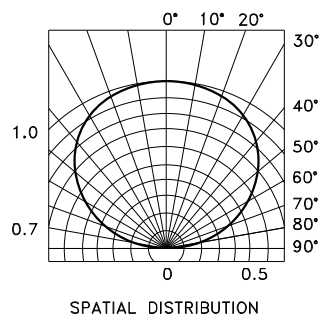
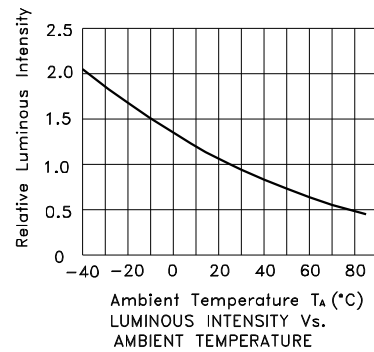
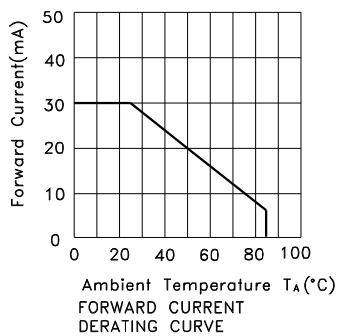
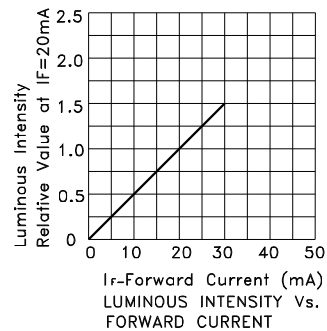
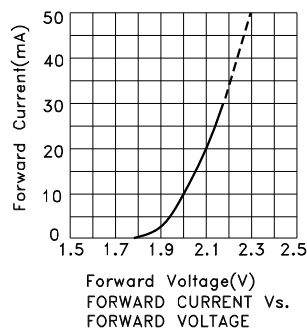
Parameter	Green	Hyper Red	Units
Power dissipation	75	75	mW
DC Forward Current	30	30	mA
Peak Forward Current [1]	150	185	mA
Reverse Voltage	5		V
Operating Temperature	-40°C To +85°C		
Storage Temperature	-40°C To +85°C		

Note:

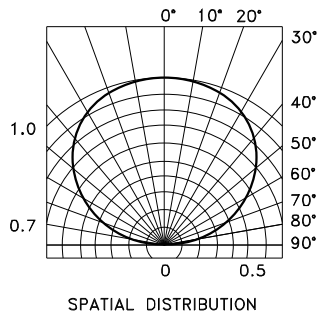
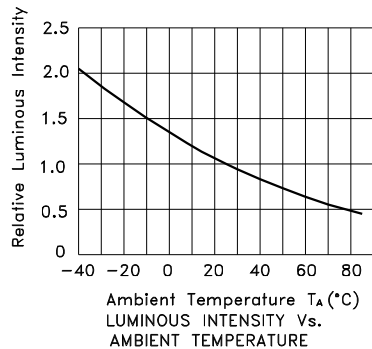
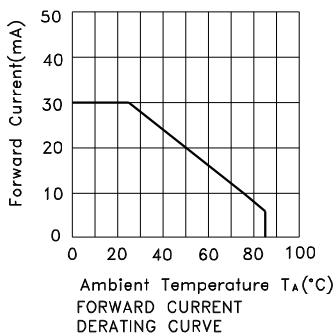
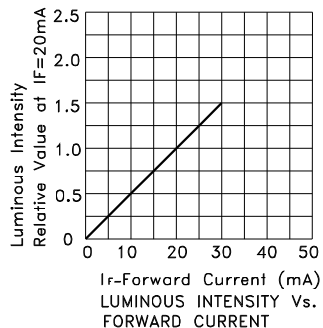
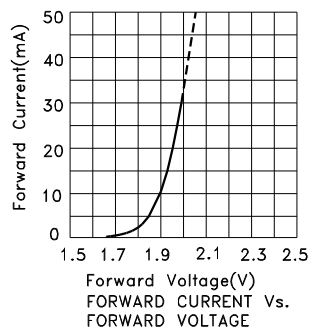
1. 1/10 Duty Cycle, 0.1ms Pulse Width.



APHB1608CGKSURKC Green

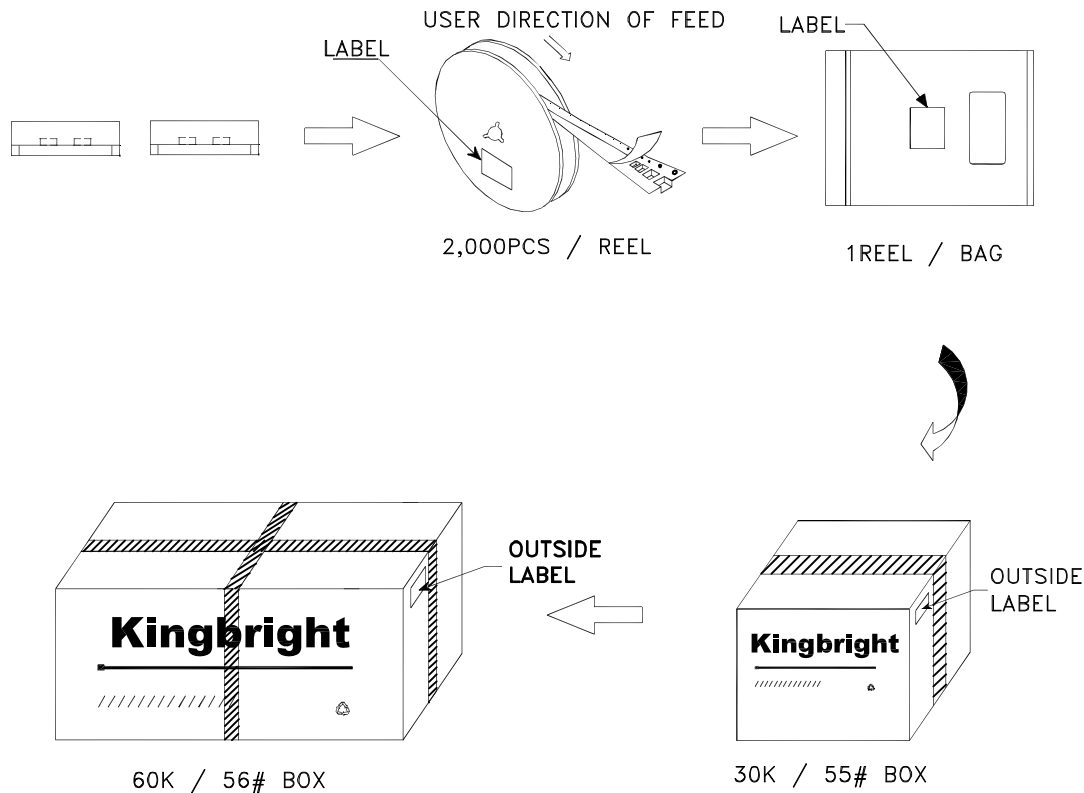



Hyper Red



PACKING & LABEL SPECIFICATIONS

APHB1608CGKSURKC



Kingbright		
P/NO: APHB1608xxx		
QTY: 2,000 pcs	Q.C.	<div>Q C XX XX XXXX PASSED</div>
S/N: XXXX		
CODE: XXX		
LOT NO:		
 XXXXXXXXXXXXXXXXXXXX		
RoHS Compliant		

All design applications should refer to Kingbright application notes available at <http://www.KingbrightUSA.com/ApplicationNotes>