

## 4.1 x 1.0mm RIGHT ANGLE SMD CHIP LED LAMP

Blue

PRELIMINARY SPEC



ATTENTION
OBSERVE PRECAUTIONS
FOR HANDLING
ELECTROSTATIC
DISCHARGE
SENSITIVE

**DEVICES** 

Part Number: APKA4110QBC/D-F01

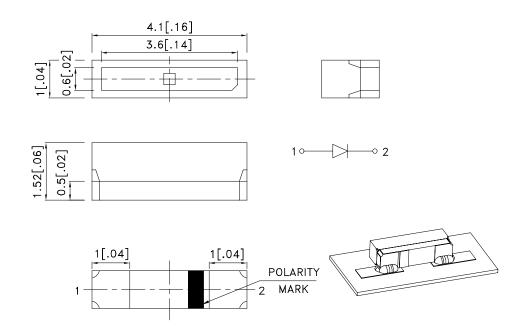
### **Features**

- 4.1mm x 1.0mm RIGHT ANGLE SMT LED, 1.52mm THICKNESS.
- LOW POWER CONSUMPTION.
- WIDE VIEWING ANGLE.
- IDEAL FOR BACKLIGHT AND INDICATOR
- VARIOUS COLORS AND LENS TYPES AVAILABLE.
- PACKAGE: 2000PCS/REEL.
- MOISTURE SENSITIVITY LEVEL : LEVEL 4.
- RoHS COMPLIANT.

### Description

The Blue source color devices are made with AllnGaN on Sapphire Light Emitting Diode.
Static electricity and surge damage the LEDS. It is recommended to use a wrist band or anti-electrostatic glove when handling the LEDs.
All devices, equipment and machinery must be electrically grounded.

## **Package Dimensions**



### Notes:

- 1. All dimensions are in millimeters (inches).
- 2. Tolerance is  $\pm 0.25 (0.01")$  unless otherwise noted.
- 3. Specifications are subject to change without notice.
- 4. The device has a single mounting surface. The device must be mounted according to the specifications.





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 REV NO: V.1
 DATE: APR/27/2007
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 APPROVED: WYNEC
 CHECKED: Allen Liu
 DRAWN: Y.L.LI
 ERP: 1204000471

## **Selection Guide**

Part No.	Dice	Lens Type	lv (mcd) [2] @ 20mA		Viewing Angle [1]
			Min.	Тур.	201/2
APKA4110QBC/D-F01	Blue (AllnGaN)	WATER CLEAR	50	120	90°

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

## Electrical / Optical Characteristics at TA=25°C

Symbol	Parameter	Device	Тур.	Max.	Units	Test Conditions	
λpeak	Peak Wavelength	Blue	468		nm	IF=20mA	
λD [1]	Dominant Wavelength	Blue	470		nm	IF=20mA	
Δλ1/2	Spectral Line Half-width	Blue	25		nm	IF=20mA	
С	Capacitance	Blue	100		pF	VF=0V;f=1MHz	
VF [2]	Forward Voltage	Blue	3.3	4	V	IF=20mA	
lR	Reverse Current	Blue		10	uA	V <sub>R</sub> =5V	

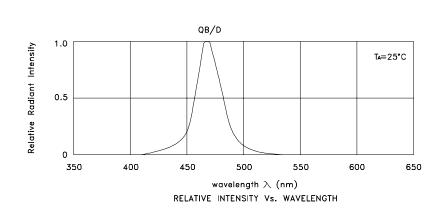
- 1.Wavelength: +/-1nm.
- 2. Forward Voltage: +/-0.1V.

## Absolute Maximum Ratings at TA=25°C

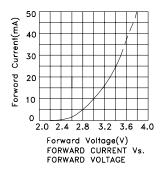
Parameter	Blue	Units	
Power dissipation	120	mW	
DC Forward Current	30	mA	
Peak Forward Current [1]	150	mA	
Reverse Voltage	5	V	
Operating Temperature	-40°C To +85°C		
Storage Temperature	-40°C To +85°C		

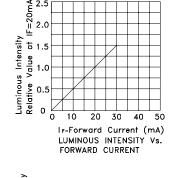
Note: 1. 1/10 Duty Cycle, 0.1ms Pulse Width.

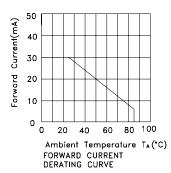
SPEC NO: DSAH3770 **REV NO: V.1** DATE: APR/27/2007 PAGE: 2 OF 5 APPROVED: WYNEC **CHECKED: Allen Liu** DRAWN: Y.L.LI ERP: 1204000471

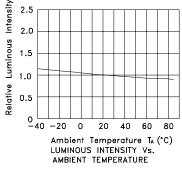


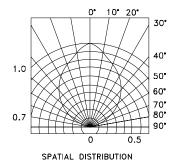
### Blue APKA4110QBC/D-F01









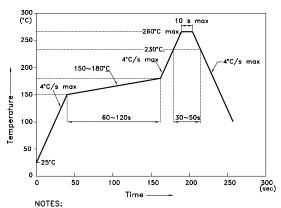


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## APKA4110QBC/D-F01

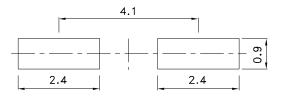
Reflow Soldering Profile For Lead-free SMT Process.



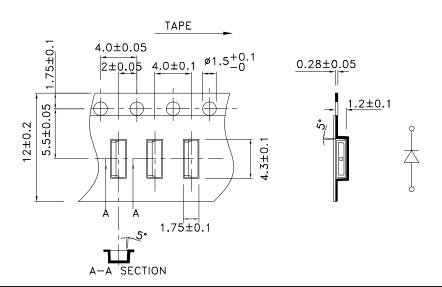
- NOTES:

  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)



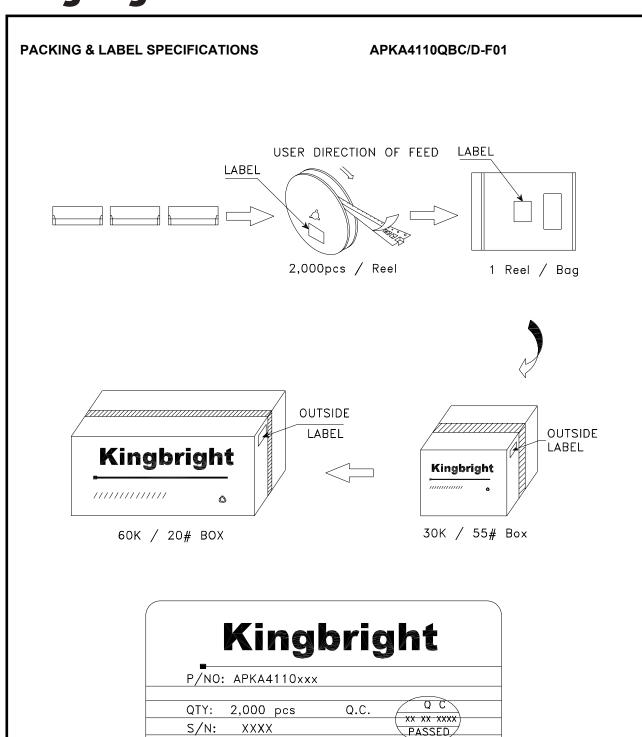
## **Tape Specifications** (Units: mm)



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SPEC NO: DSAH3770 APPROVED: WYNEC REV NO: V.1 CHECKED: Allen Liu

CODE: XXX

MADE IN CHINA

LOT NO:

DATE: APR/27/2007 DRAWN: Y.L.LI

RoHS Compliant

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