

Part Number: KA-3528YCT

Yellow

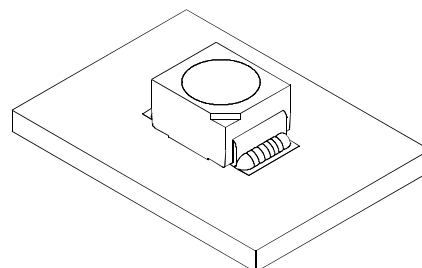
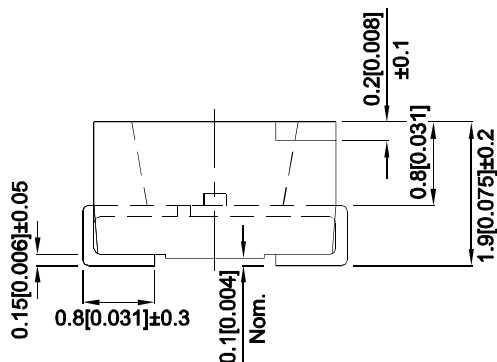
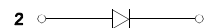
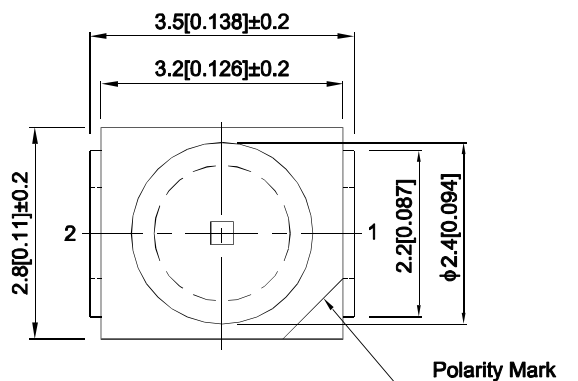
### Features

- Single color.
- Suitable for all SMD assembly and solder process.
- Available on tape and reel.
- Ideal for backlighting.
- Package : 2000pcs / reel.
- Moisture sensitivity level : level 3.
- RoHS compliant.

### Description

The Yellow source color devices are made with Gallium Arsenide Phosphide on Gallium Phosphide Yellow Light Emitting Diode.

### Package Dimensions



#### Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is  $\pm 0.25(0.01)$  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.   | Emitting Color (Material) | Lens Type   | Iv (mcd) [2]<br>@ 20mA |      | Viewing Angle [1] |
|------------|---------------------------|-------------|------------------------|------|-------------------|
|            |                           |             | Min.                   | Typ. | 2θ1/2             |
| KA-3528YCT | Yellow (GaAsP/GaP)        | Water Clear | 8                      | 15   | 120°              |

### 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%.
3. Luminous intensity value is traceable to CIE127-2007 standards.

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

| Symbol | Parameter                | Emitting Color | Typ. | Max. | Units | Test Conditions |
|--------|--------------------------|----------------|------|------|-------|-----------------|
| λpeak  | Peak Wavelength          | Yellow         | 590  |      | nm    | IF=20mA         |
| λD [1] | Dominant Wavelength      | Yellow         | 588  |      | nm    | IF=20mA         |
| Δλ1/2  | Spectral Line Half-width | Yellow         | 35   |      | nm    | IF=20mA         |
| C      | Capacitance              | Yellow         | 20   |      | pF    | VF=0V;f=1MHz    |
| VF [2] | Forward Voltage          | Yellow         | 2.1  | 2.5  | V     | IF=20mA         |
| IR     | Reverse Current          | Yellow         |      | 10   | uA    | VR=5V           |

### Notes:

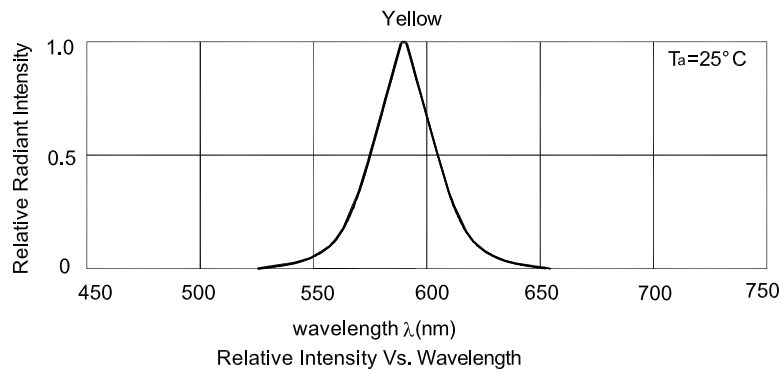
1. Wavelength: +/-1nm.
2. Forward Voltage: +/-0.1V.
3. Wavelength value is traceable to CIE127-2007 standards.
4. Excess driving current and / or operating temperature higher than recommended conditions may result in severe light degradation or premature failure.

## Absolute Maximum Ratings at TA=25°C

| Parameter                | Values         | Units |
|--------------------------|----------------|-------|
| Power dissipation        | 75             | mW    |
| DC Forward Current       | 30             | mA    |
| Peak Forward Current [1] | 140            | mA    |
| Reverse Voltage          | 5              | V     |
| Operating Temperature    | -40°C To +85°C |       |
| Storage Temperature      | -40°C To +85°C |       |

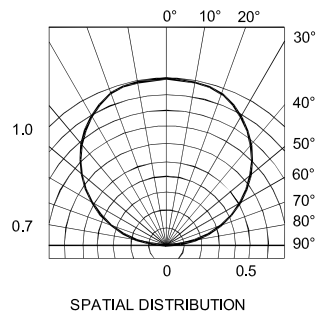
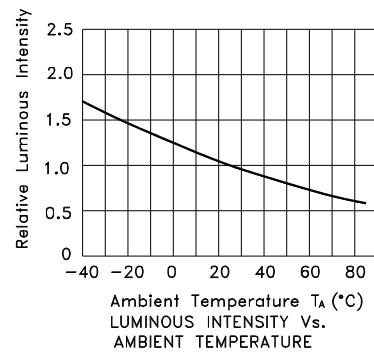
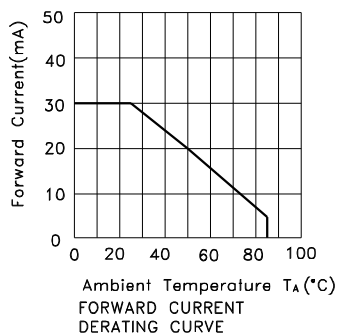
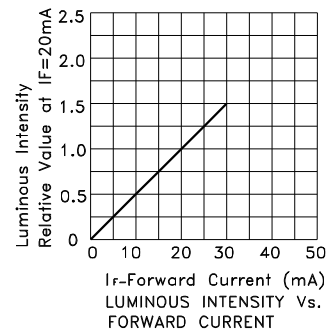
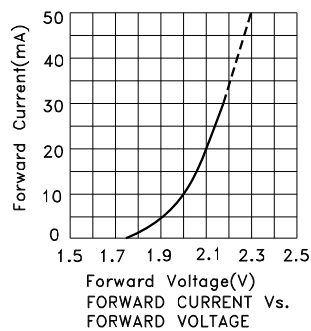
### Notes:

1. 1/10 Duty Cycle, 0.1ms Pulse Width.
2. Relative humidity levels maintained between 40% and 60% in production area are recommended to avoid the build-up of static electricity – Ref JEDEC/JESD625-A and JEDEC/J-STD-033.

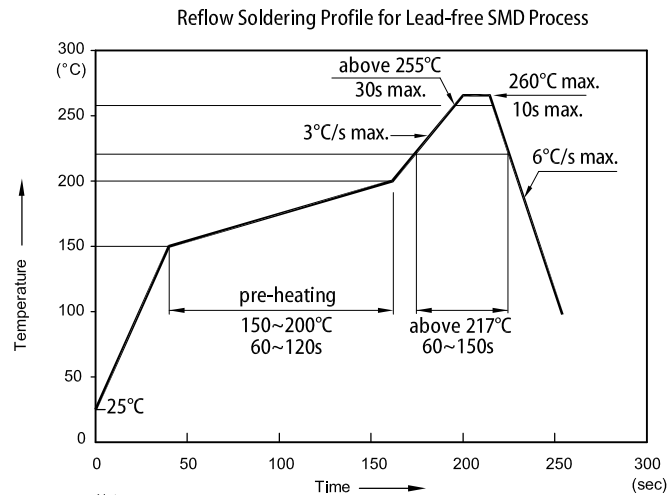


## Yellow

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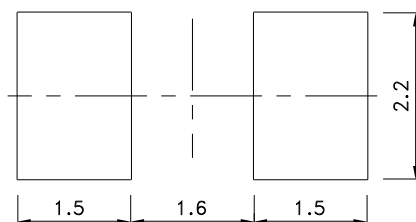


## KA-3528YCT

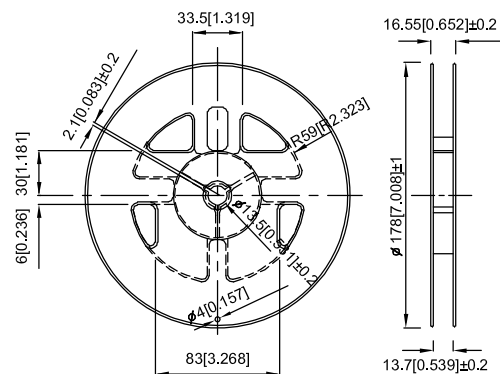


- Notes:
1. Don't cause stress to the LEDs while it is exposed to high temperature.
  2. The maximum number of reflow soldering passes is 2 times.
  3. Reflow soldering is recommended. Other soldering methods are not recommended as they might cause damage to the product.

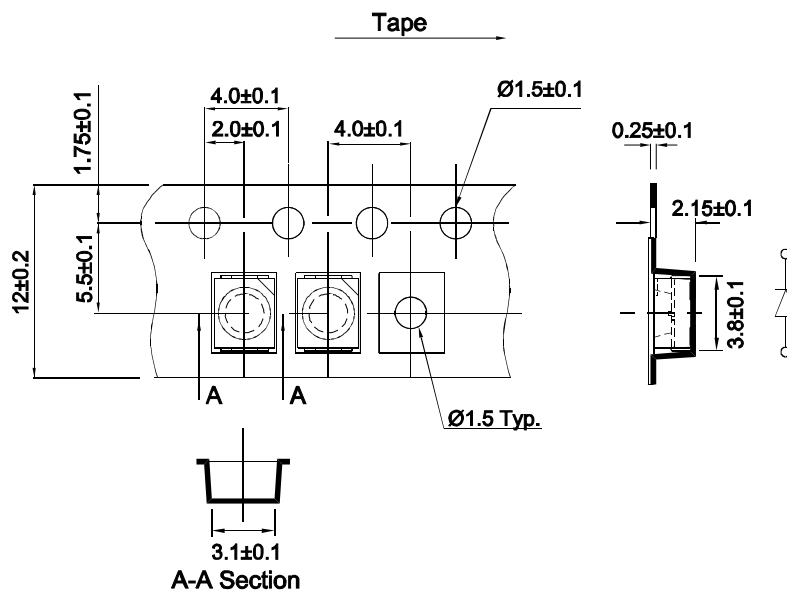
### Recommended Soldering Pattern (Units : mm; Tolerance: $\pm 0.1$ )



### Reel Dimension

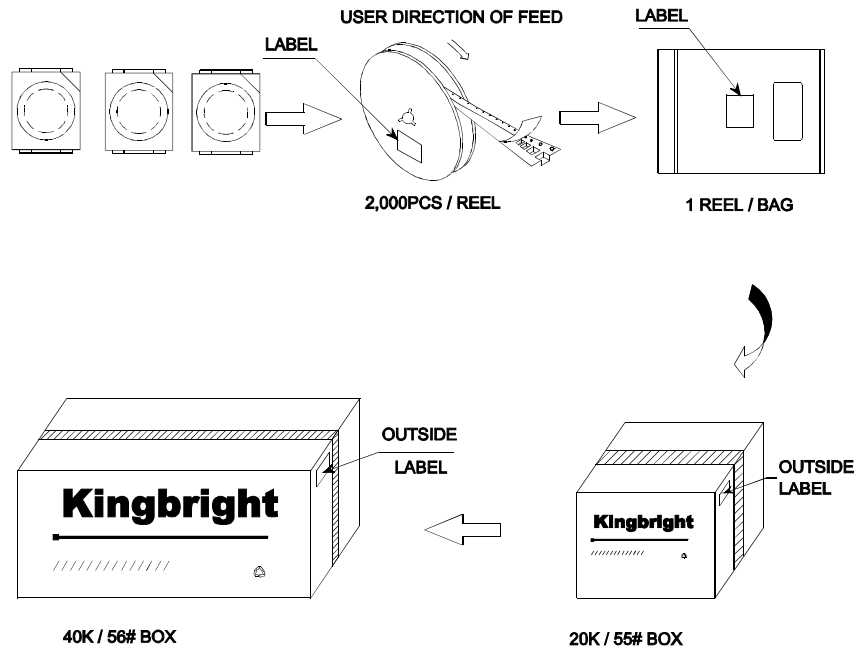


### Tape Dimensions (Units : mm)



## PACKING & LABEL SPECIFICATIONS

KA-3528YCT



|                                                                                     |  |                             |                                                                                       |
|-------------------------------------------------------------------------------------|--|-----------------------------|---------------------------------------------------------------------------------------|
| <b>Kingbright</b>                                                                   |  | XXXXXXXXXX-XXXX             |  |
| P/NO: XXXXXXXX                                                                      |  |                             |                                                                                       |
| QTY: XXXXpcs                                                                        |  |                             |                                                                                       |
| S/N: XXXX                                                                           |  |                             |                                                                                       |
| CODE: XXX                                                                           |  |                             |                                                                                       |
| COUNTRY: CN                                                                         |  | QC DATE: XXX XX XXXX PASSED |                                                                                       |
| LOT NO:                                                                             |  |                             |                                                                                       |
|  |  |                             |                                                                                       |
| XXXXXXXXXX-XXXX                                                                     |  |                             |                                                                                       |
|                                                                                     |  | 1                           | RoHS Compliant                                                                        |

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