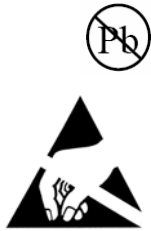


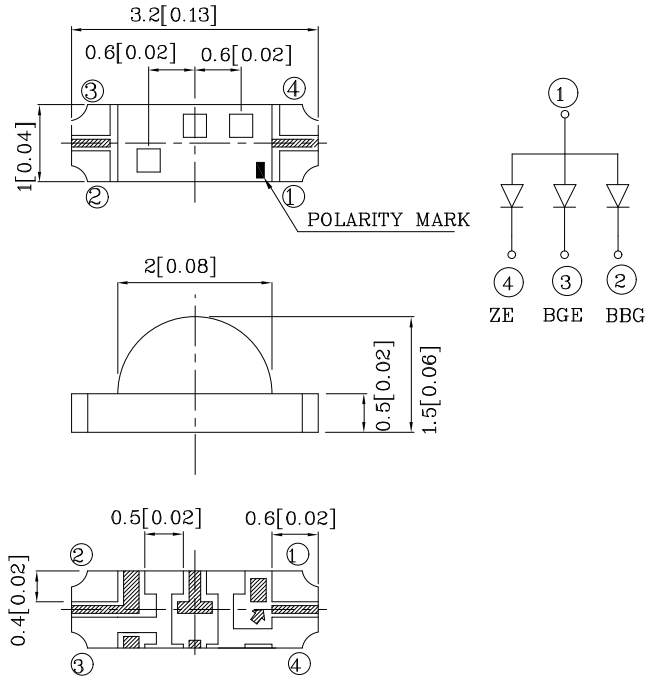
PRELIMINARY SPEC

Features

- LOW POWER CONSUMPTION.
- 3.2mmX1.0mm RIGHT ANGLE SMT LED,1.5mm THICKNESS.
- WIDE VIEWING ANGLE.
- PACKAGE : 2000PCS / REEL.
- MOISTURE SENSITIVITY LEVEL : LEVEL 3
- RoHS COMPLIANT.



ATTENTION
OBSERVE PRECAUTIONS
FOR HANDLING
ELECTROSTATIC
DISCHARGE
SENSITIVE
DEVICES



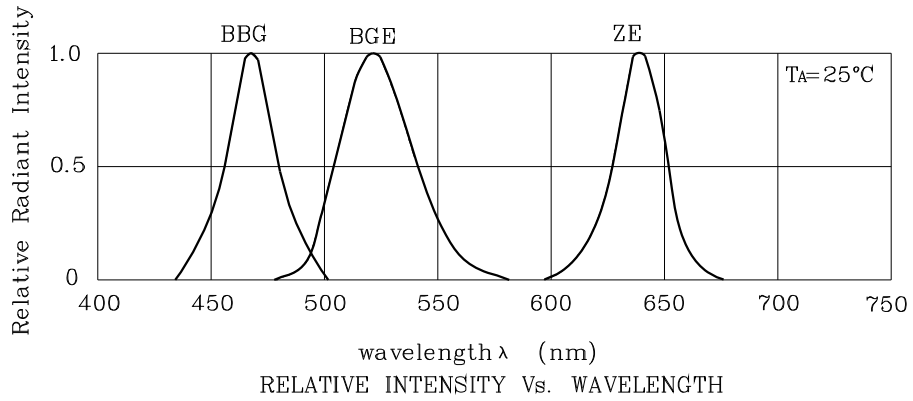
Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is $\pm 0.1(0.004)$ " unless otherwise noted.
3. Specifications are subject to change without notice.

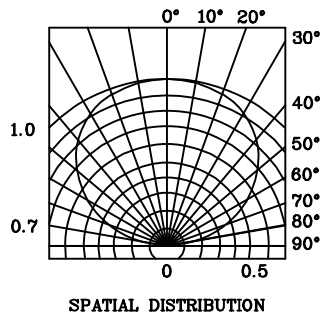
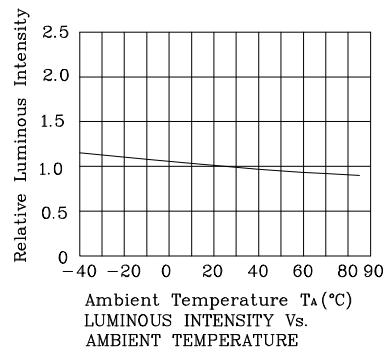
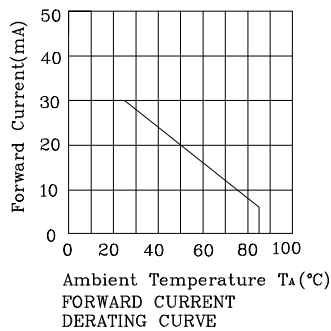
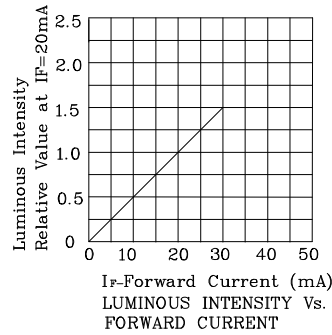
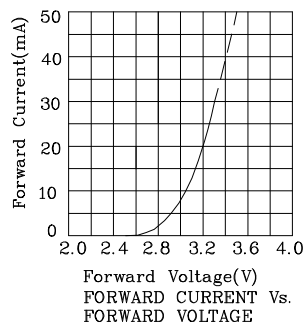
| Absolute Maximum Ratings (TA=25°C) | | BBG (InG aN) | BGE (InGa N) | ZE (InGa AlP) | Unit |
|---|------|--------------------|--------------------|---------------------|------|
| Reverse Voltage | VR | 5 | 5 | 5 | V |
| Forward Current | IF | 30 | 30 | 30 | mA |
| Forward Current (Peak) 1/10Duty Cycle 0.1ms Pulse Width | iFS | 100 | 100 | 150 | mA |
| Power Dissipation | PT | 120 | 120 | 84 | mW |
| Electrostatic Discharge Threshold (HBM) | | 1000 | 1000 | - | V |
| Operating Temperature | TA | -40 ~ +85 | | | °C |
| Storage Temperature | Tstg | -40 ~ +85 | | | |

| Operating Characteristics (TA=25°C) | | BBG (InG aN) | BGE (InGa N) | ZE (InGa AlP) | Unit |
|---|-----------------|--------------------|--------------------|---------------------|------|
| Forward Voltage (Typ.) (IF=20mA) | VF | 3.2 | 3.2 | 2.2 | V |
| Forward Voltage (Max.) (IF=20mA) | VF | 4.0 | 4.0 | 2.8 | V |
| Reverse Current (Max.) (VR=5V) | IR | 10 | 10 | 10 | uA |
| Wavelength of Peak Emission (Typ.) (IF=20mA) | λP | 468 | 520 | 640 | nm |
| Wavelength of Dominant Emission (Typ.) (IF=20mA) | λD | 470 | 525 | 630 | nm |
| Spectral Line Full Width At Half-Maximum (Typ.) (IF=20mA) | $\Delta\lambda$ | 21 | 35 | 25 | nm |
| Capacitance (Typ.) (VF=0V, f=1MHz) | C | 100 | 100 | 27 | pF |

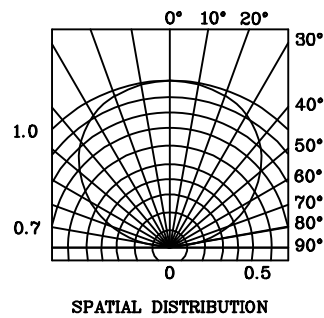
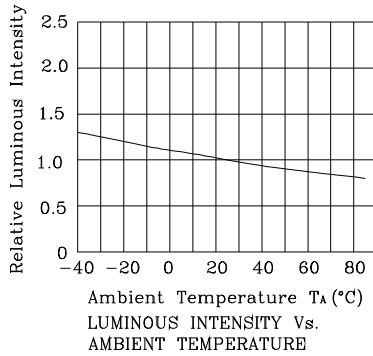
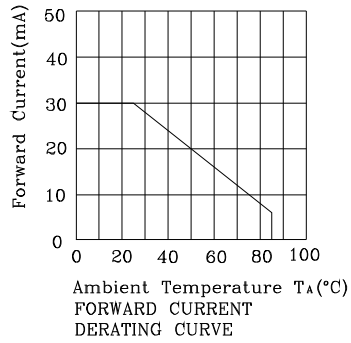
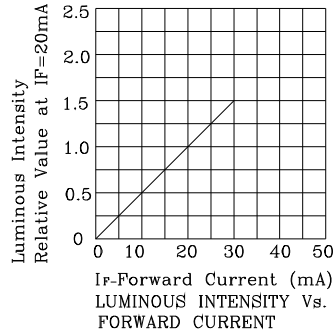
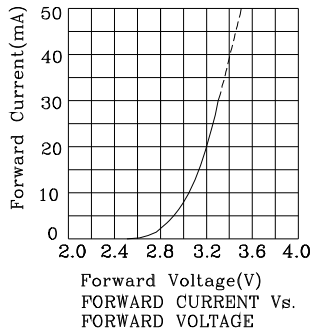
| Part Number | Emitting Color | Emitting Material | Lens-color | Luminous Intensity (IF=20mA) mcd | | Wavelength nm λP | Viewing Angle 2 θ 1/2 |
|---------------|----------------|-------------------|-------------|--|------|---------------------------------|---------------------------------|
| | | | | min. | typ. | | |
| XZBBGBGEZE88W | Blue | InGaN | Water Clear | 36 | 79 | 468 | 130° |
| | Green | InGaN | | 110 | 258 | 520 | |
| | Red | InGaAlP | | 280 | 547 | 640 | |



❖ **BBG**

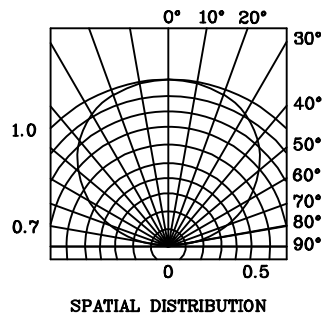
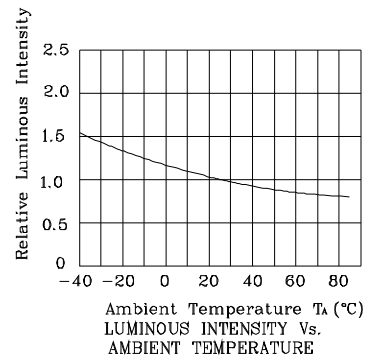
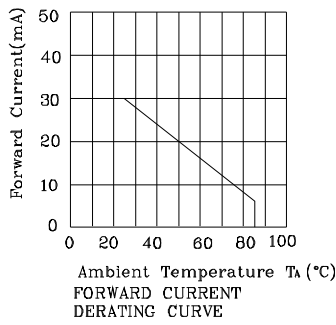
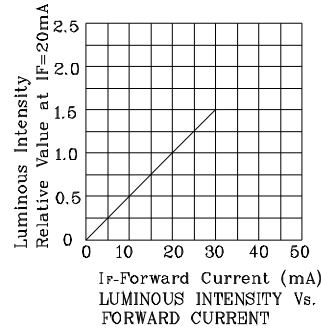
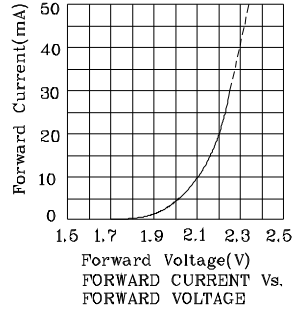


❖ BGE

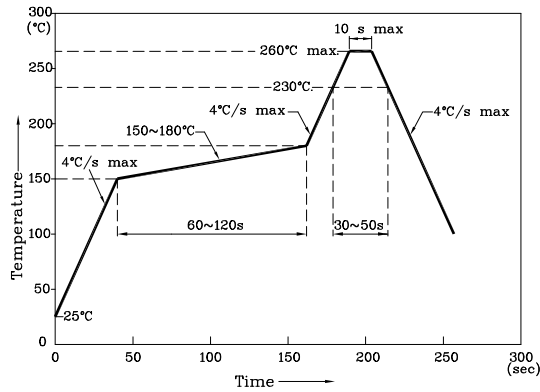




❖ ZE



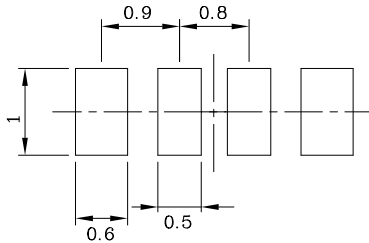
Reflow Soldering Profile For Lead-free SMT Process.



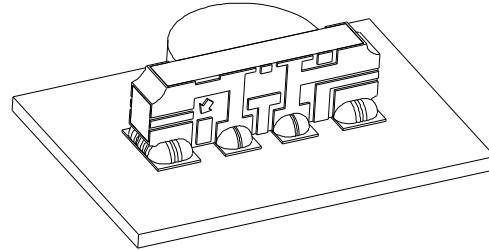
NOTES:

1. Maximum soldering temperature should not exceed 260°C.
2. Recommended reflow temperature: 145°C~260°C.
3. Do not put stress to the epoxy resin during high temperatures conditions.

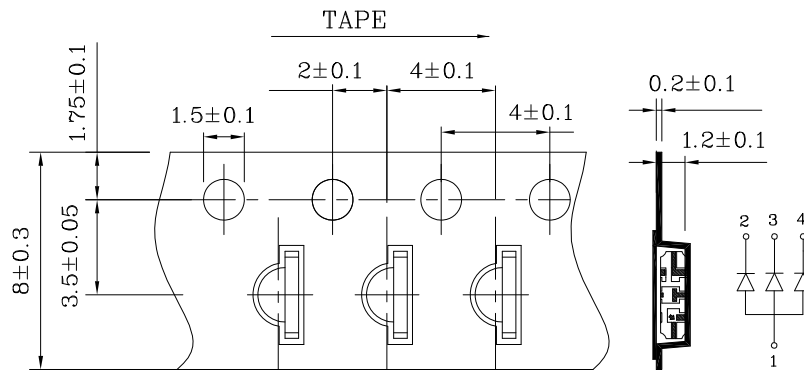
❖ Recommended Soldering Pattern (Units : mm; Tolerance: ±0.1)



❖ The device has a single mounting surface. The device must be mounted according to the specifications.



❖ Tape Specification (Units : mm)



Remarks:

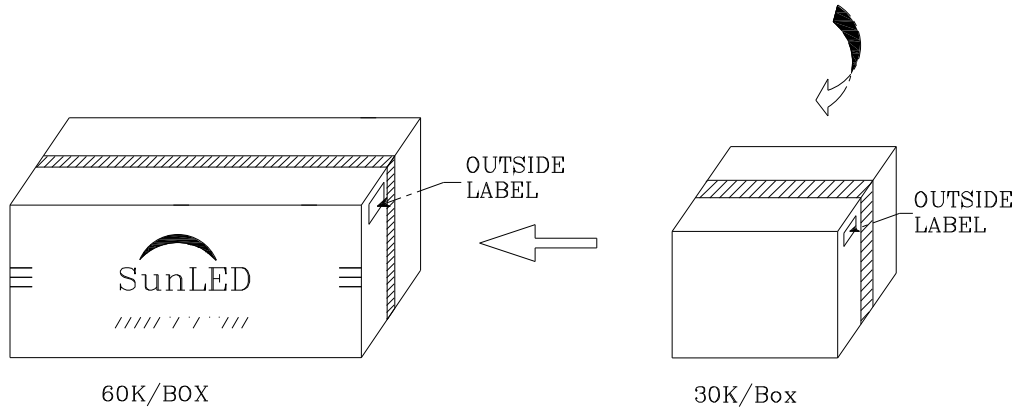
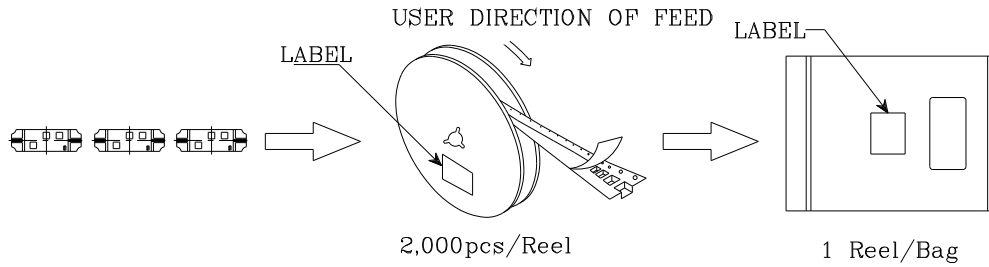
If special sorting is required (e.g. binning based on forward voltage, luminous intensity / luminous flux or wavelength), the typical accuracy of the sorting process is as follows:


1. Wavelength: +/-1nm
2. Luminous Intensity / luminous flux: +/-15%
3. Forward Voltage: +/-0.1V

Note: Accuracy may depend on the sorting parameters.

PACKING & LABEL SPECIFICATIONS

XZBBGBGEZE88W



| | |
|--|-----------|
| P/NO : XZxxx88x | |
| QTY : 2,000 pcs | CODE: XXX |
| S/N : XX | |
| LOT NO : | |
|  XXXXXXXXXXXXXXXXXXXXXXXXXX | |
| RoHS Compliant | |