

# TX-1912SW17A-3055V39-10H80

## PRODUCT SPECIFICATION (R&D version)

**Features:**

- ◆ Excellent transiting heat from LED chip operating under 500mA.
- ◆ Provide uniform cross distribution of positive white and warm white dual color scheme, mixed pure.
- ◆ High luminous output.
- ◆ No UV.
- ◆ Encapsulated materials are environmentally certified and meet environmental requirements.

**Chip Material:**

- ◆ GaInN

**Emitting Color:**

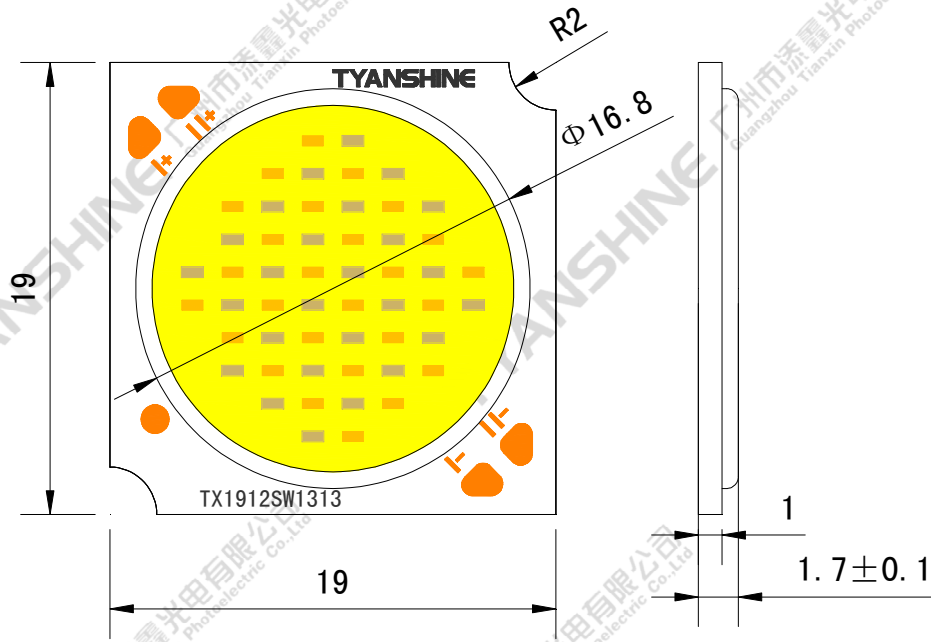
- ◆ White
- ◆ Warm white

**Applications:**

- ◆ Commercial lighting
- ◆ General Lighting

|          |                            |          |            |      |         |
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**Package Dimensions:**



I: Warm White    II: White

**Notes:**

- 1.All dimensions are in millimeters .
- 2.Tolerances unless otherwise mentioned are  $\pm 0.25\text{mm}$  .

**Code Formats:**

TX-1912SW17A-3055V39-10H80

|           |   |        |          |             |     |         |   |      |       |   |     |     |
|-----------|---|--------|----------|-------------|-----|---------|---|------|-------|---|-----|-----|
| TX        | — | 19     | 12       | SW          | 17  | A       | — | 3055 | V39   | — | 10  | H80 |
| TYANSHINE | — | series | watt typ | performance | LES | texture | — | CCT  | VOLTs | — | BOM | Ra  |

|          |                            |          |            |      |         |
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## Absolute Maximum Ratings

| Parameter                               | Symbol | Ratings                            | Unit |
|---|--------|------------------------------------|------|
| Forward Current                         | IF     | 500                                | mA   |
| Reverse Voltage                         | VR     | Not designed for reverse operation | V    |
| Power Dissipation                       | PD     | W                                  | 20   |
|   |        | S                                  | 20   |
| Junction Temperature                    | Tj     | W                                  | 135  |
|   |        | S                                  | 135  |
| Case Temperature (C)                    | Tc     | 85                                 | °C   |
| Electrostatic Discharge Threshold (ESD) | ESD    | 2000                               | V    |
| Storage Temperature                     | Tstg   | -30~+100                           | °C   |
| Operation Temperature                   | Topr   | -30~+80                            |      |

**Notes:**

- Specifications are subject to change without notice.
- The data on this specification is for reference only and the actual data is in accordance with the acknowledgment.
- Precautions for ESD:  
 STATIC SHIELD Electricity and surge damages the LED. It is recommended to use a wrist band or anti-electrostatic glove when handling the LED. All devices, equipment and machinery must be properly grounded.

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**Electrical Optical Characteristics (Tc=25°C)**

| Parameter                           | Symbol          | Condition | Emitting color | Min. | Typ. | Max.  | Units   |
|-------------------------------------|-----------------|-----------|----------------|------|------|-------|---------|
| Luminous Flux                       | $\Phi_v$        | If=320mA  | S              | —    | 1250 | —     | lm      |
|                                     |                 |           | W              | —    | 1500 | —     |         |
| Forward Voltage                     | $V_f$           |           | S              | 36   | 38   | 40    | V       |
|                                     |                 |           | W              | 36   | 38   | 40    |         |
| Correlated Colour Temperature       | CCT             |           | S              | —    | 3000 | —     | K       |
|                                     |                 |           | W              | —    | 5500 | —     |         |
| Viewing Angle at 50% IV             | $2\theta_{1/2}$ |           | S              | —    | 115  | —     | Deg     |
|                                     |                 |           | W              | —    | 115  | —     |         |
| Reverse Current                     | $I_R$           |           | —              | —    | —    | —     | $\mu A$ |
| Thermal Resistance Junction to Case | $R\theta_{J-C}$ |           | S              | —    | 1.67 | —     | K/W     |
|                                     |                 | W         | —              | 1.67 | —    |       |         |
| Temperature Coefficient of Voltage  | $V\Delta F/T$   | S         | —              | -20  | —    | mV/°C |         |
|                                     |                 | W         | —              | -20  | —    |       |         |
| Color Rendering Index               | Ra              | S         | —              | 80   | —    | —     |         |
|                                     |                 | W         | —              | 80   | —    |       |         |

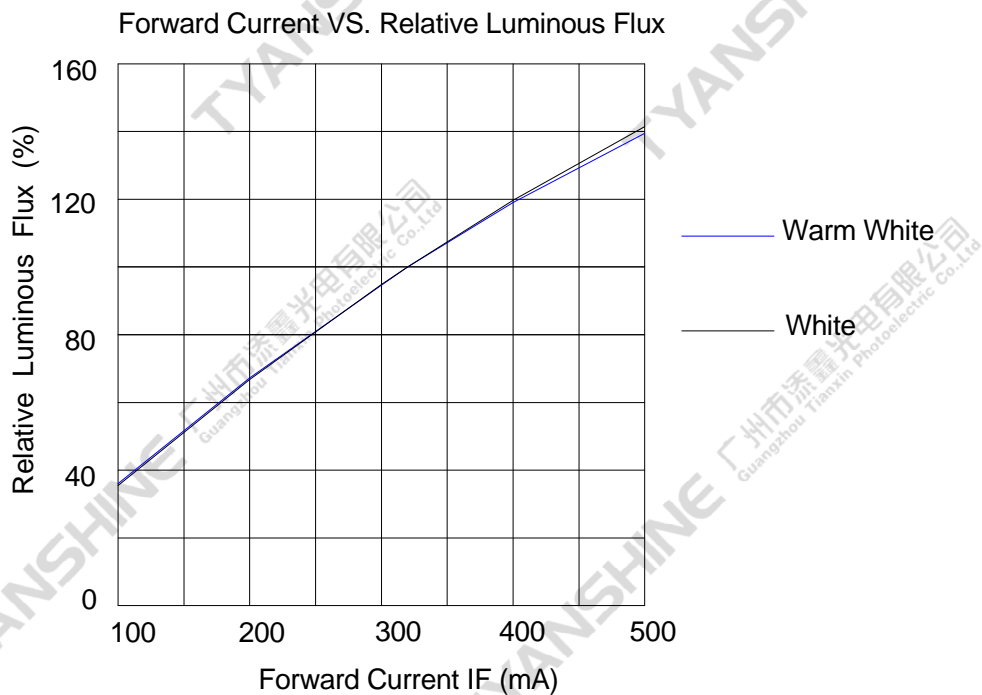
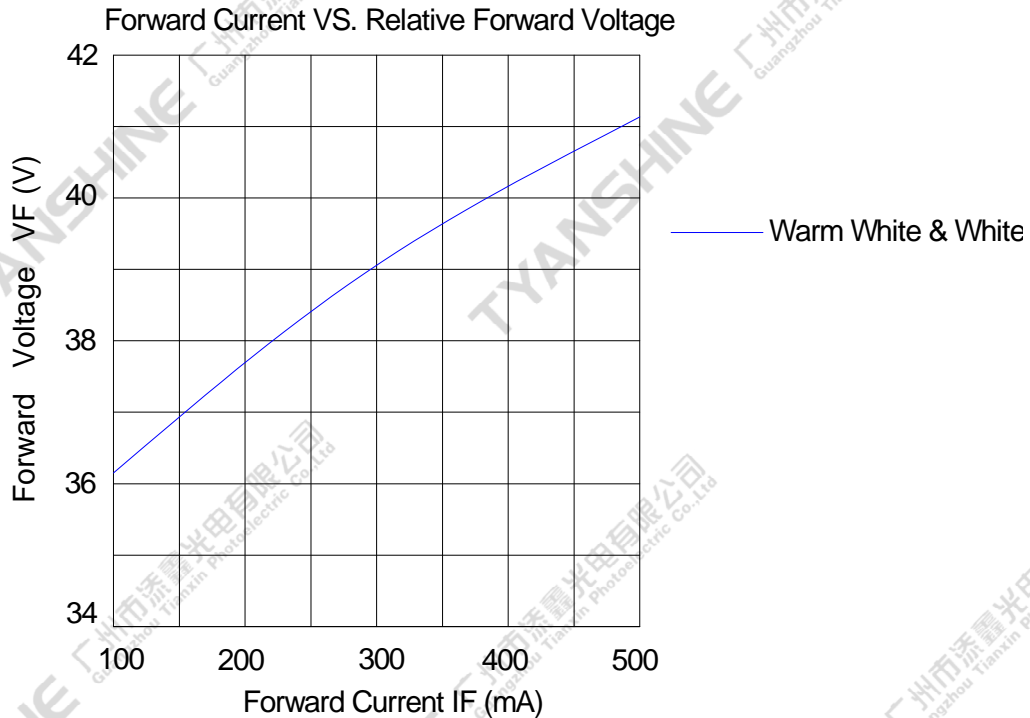
**Notes:**

- 1.Luminous intensity is measured with a light sensor and filter combination that approximates the CIE eye-response curve.
2. $\theta_{1/2}$  is the off-axis angle at which the luminous intensity is half the axial luminous intensity.
- 3.Luminous flux measurement tolerance:±15%.
- 4.Forward voltage measurement tolerance:±0.15V.

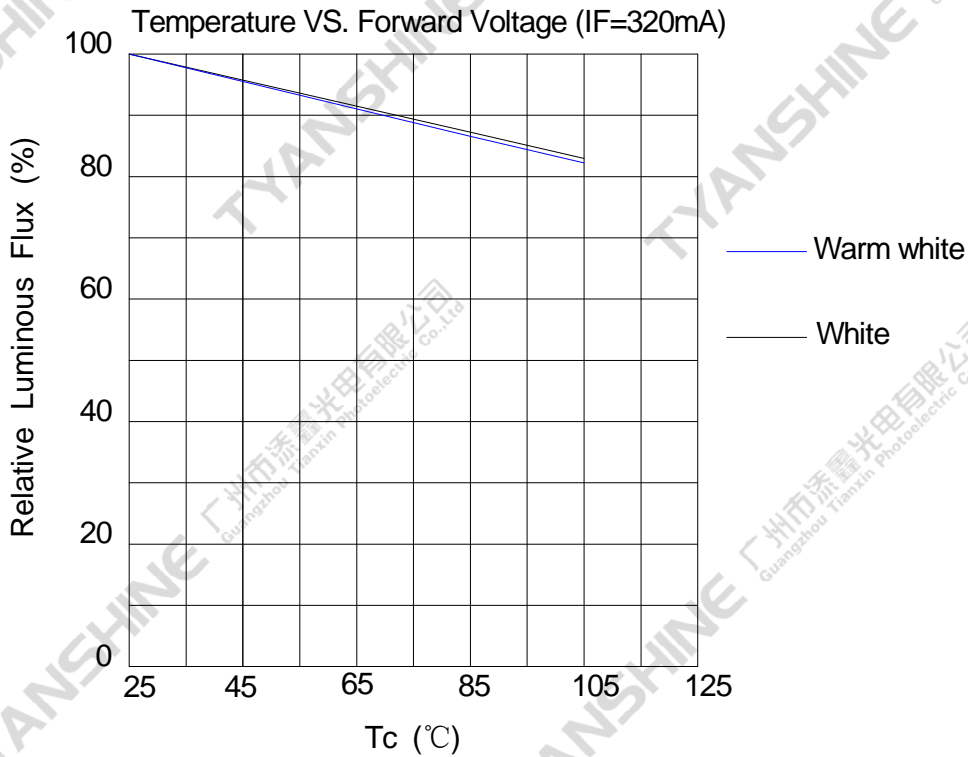
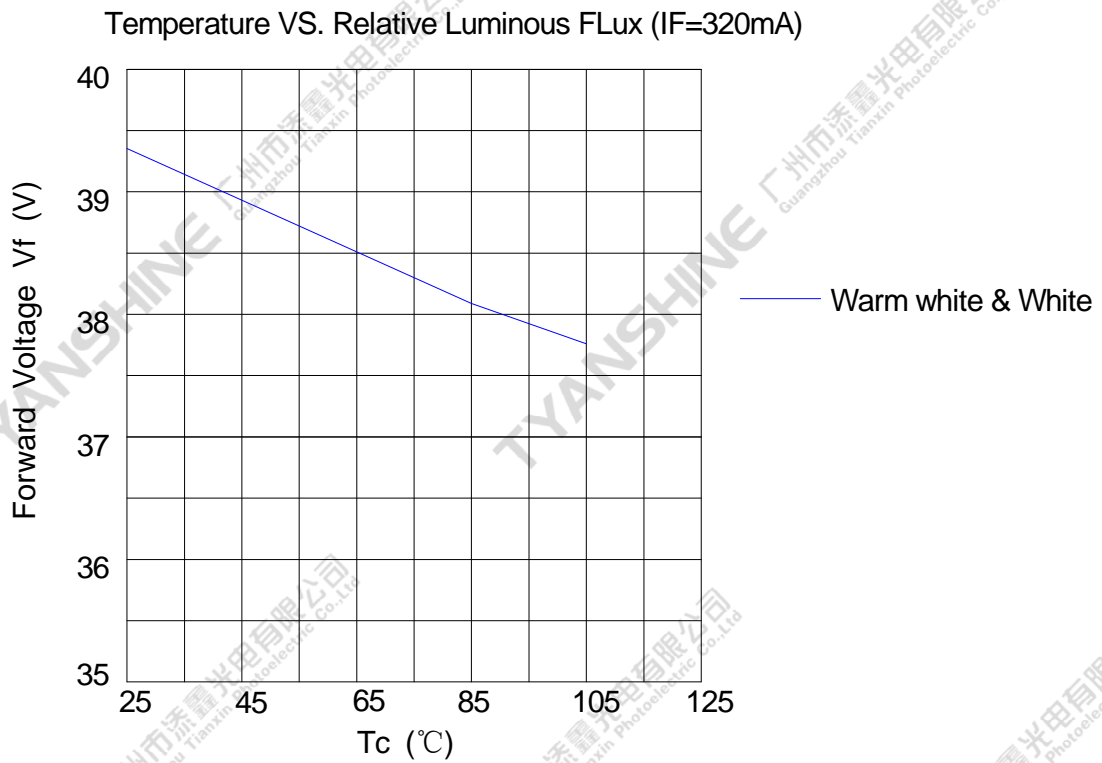
|          |                            |          |            |      |         |
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## Typical Electrical/Optical Characteristics Curves

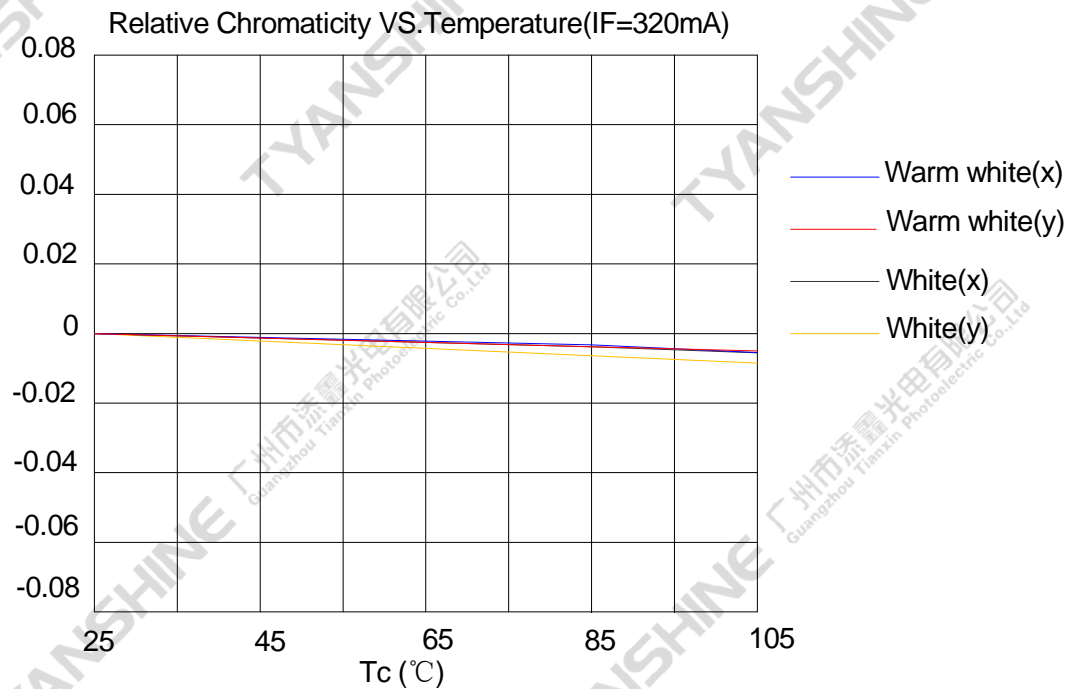
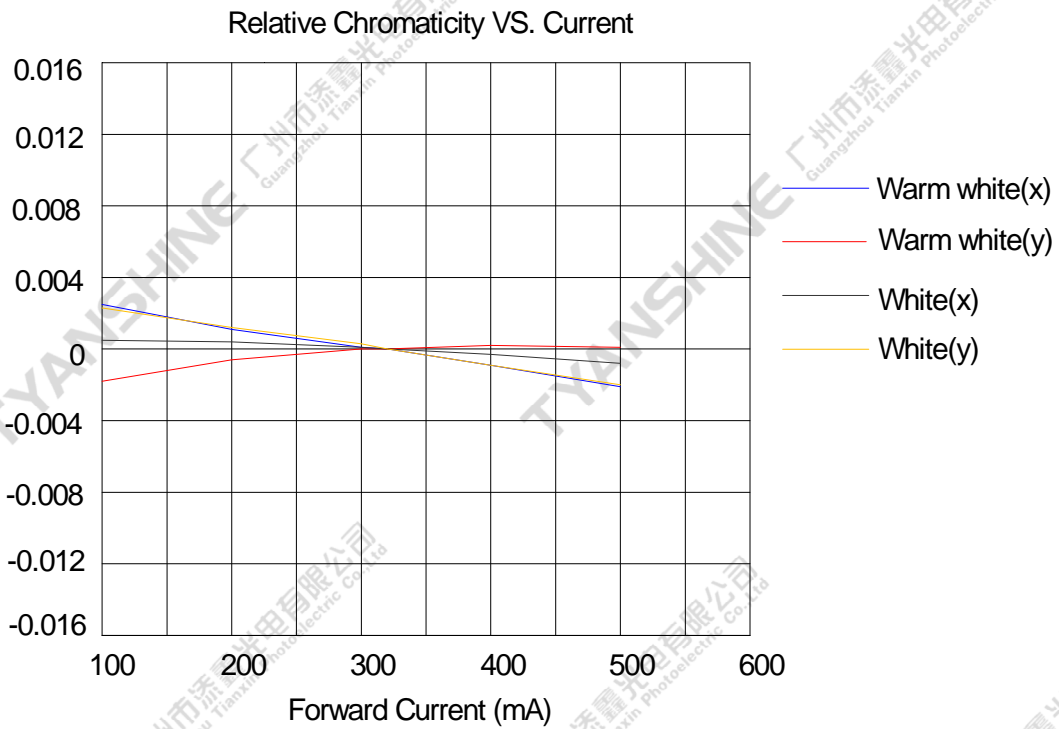
(25°C Ambient Temperature Unless Otherwise Noted)



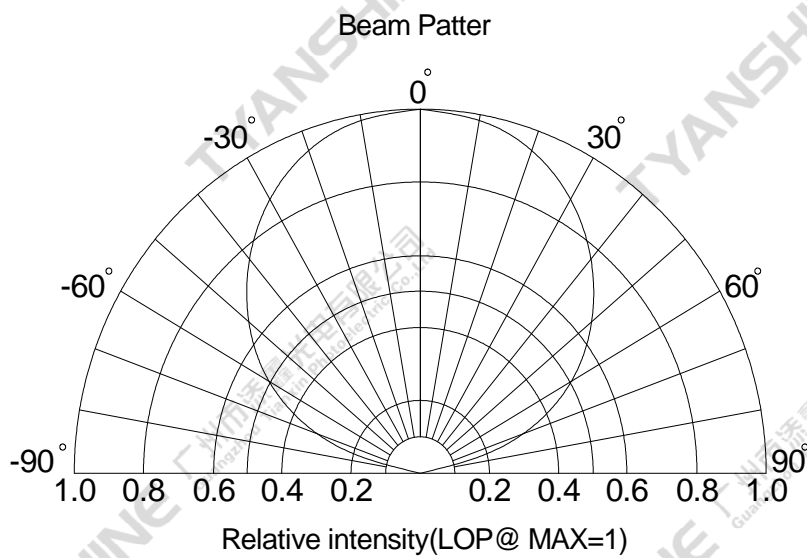
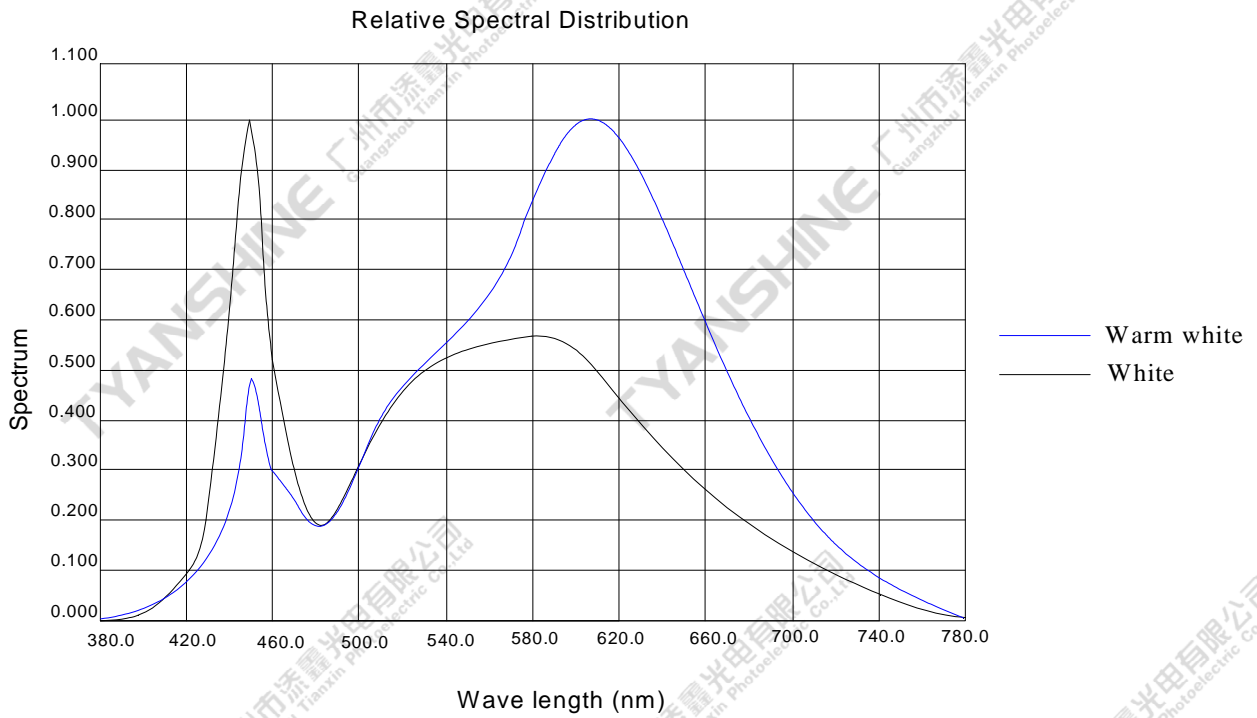
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**Notes:**

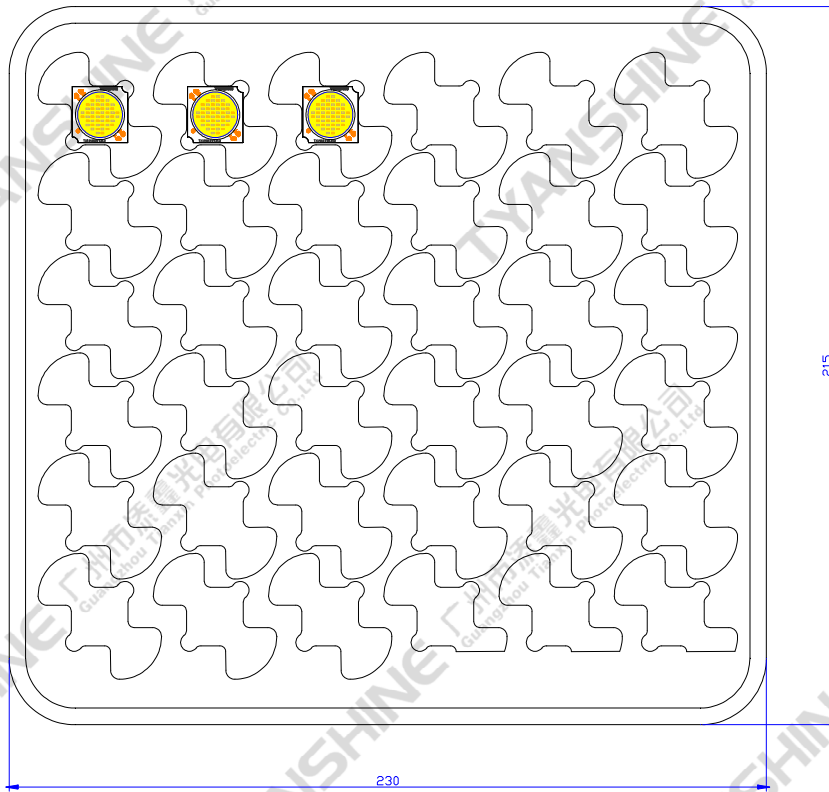
1.  $2\theta_{1/2}$  is the off axis angle from lamp centerline where the luminous intensity is 1/2 of the peak value.
2. View angle tolerance is  $\pm 5^\circ$ .

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**Dimensions For Cannulation And Packaging**

**Quantity: 36PCS**



**Notes:**

1. All dimensions are in millimeters.
2. Tolerances are  $\pm 2.0$  mm unless otherwise noted.
3. The products are packaged together with silica gel, Transport, not to the weight of welding LED light-emitting area, As a result of the weight of LED light-emitting zone in the quality of, Irreponsible of the Company.

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