

TX-6065BS60FC120-NUVENG-01

PRODUCT SPECIFICATION

Features:

- ◆Excellent transiting heat from LED chip operating under 4.0 A.
- ◆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:

- ◆GaN

Emitting Color:

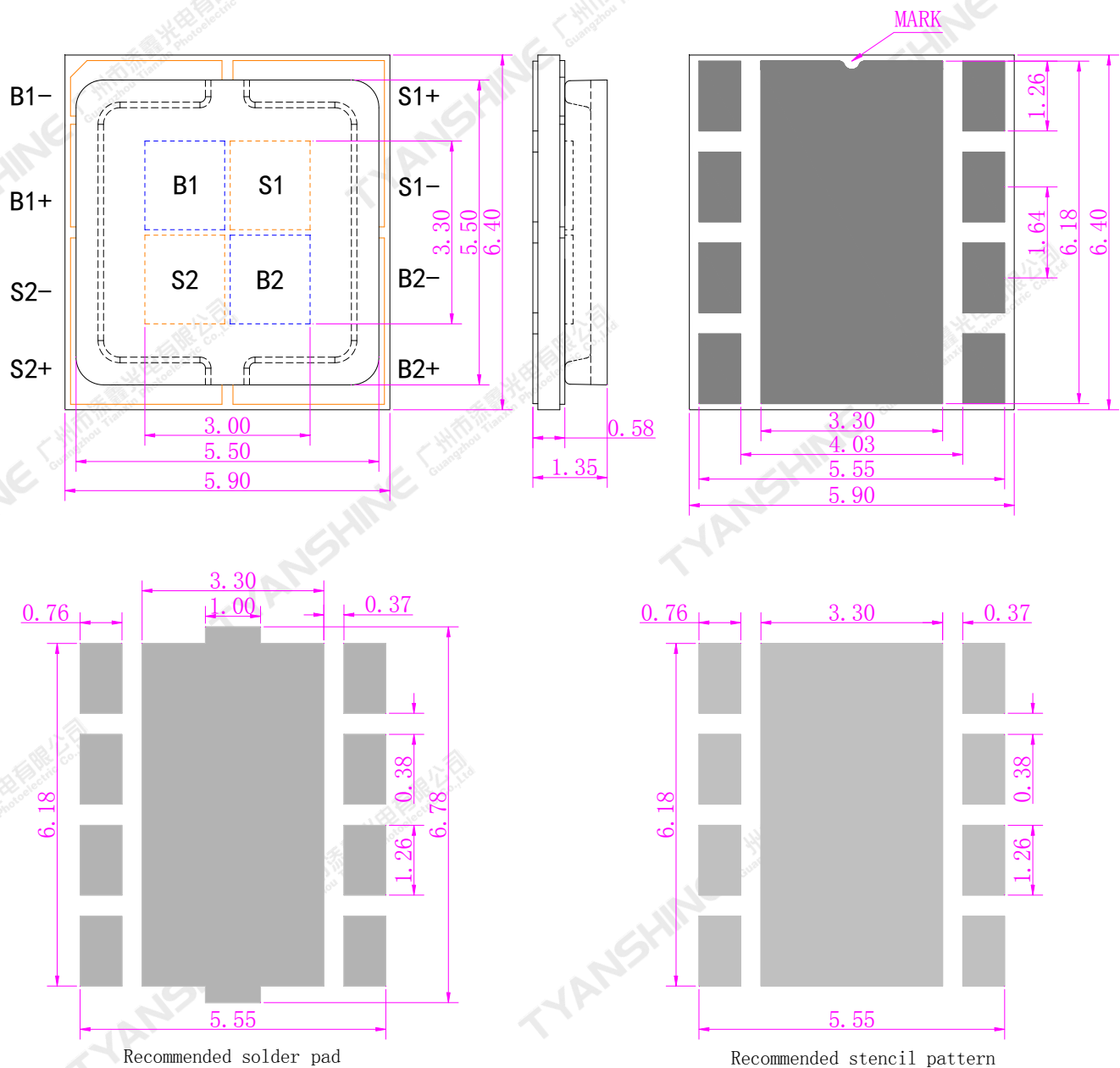
- ◆Blue
- ◆Warm white

Applications:

- ◆Auxiliary lighting
- ◆Ambient lighting
- ◆Architectural lighting

Part No.	TX-6065BS60FC120-NUVENG-01	Spec No.	WKF-BF0253	Page	1 of 9
----------	----------------------------	----------	------------	------	--------

Package Dimensions:



Notes:

1. All dimensions are in millimeters .
2. Tolerances unless otherwise mentioned are $\pm 0.1\text{mm}$.

Part No.	TX-6065BS60FC120-NUVENG-01	Spec No.	WKF-BF0253	Page	2 of 9
----------	----------------------------	----------	------------	------	--------

Absolute Maximum Ratings (Tc=25℃)

Parameter	Symbol		Ratings	Unit
Forward Current	IF		4000	mA
Reverse Voltage	VR		Not designed for reverse operation	V
Power Dissipation	PD	B	29.2	W
		S	29.2	
Junction Temperature	Tj	B	150	℃
		S	150	
Electrostatic Discharge Threshold (ESD)	ESD		2000	V
Storage Temperature	Tstg		-40~+70	℃
Operation Temperature	Topr		-30~+100	

Notes:

- 1.Specifications are subject to change without notice.
- 2.The data on this specification is for reference only and the actual data is in accordance with the acknowledgment.
- 3.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.

Electrical Optical Characteristics (Tc=25°C)

Parameter	Symbol	Condition	Emitting color	Min.	Typ.	Max.	Units
Luminous Flux	φ_v	If=1.0A	B1+B2	95	110	125	lm
			S1+S2	670	750	830	
		If=4.0A	B1+B2	250	300	350	
			S1+S2	2200	2400	2600	
Forward Voltage	V_f	If=1.0A	B1/B2	2.9	3.1	3.3	V
			S1/S2	2.9	3.1	3.3	
		If=4.0A	B1/B2	3.3	3.5	3.7	
			S1/S2	3.3	3.5	3.7	
Correlated Colour Temperature	CCT	If=1.0A	S	2590	2720	2840	K
		If=4.0A	S	3000	3120	3240	
Viewing Angle at 50 % IV	$2\theta_{1/2}$	—	B	—	120	—	Deg
			S	—	120	—	
Reverse Current	I_R	—	B	—	—	—	μA
			S	—	—	—	
Thermal Resistance Junction to Case	$R\theta_{J-C}$	If=4.0A	—	—	0.35	—	K/W
Temperature Coefficient of Voltage	$V\Delta F/T$		B	—	-2	—	mV/°C
			S	—	-2	—	

White Color coordinate filing (IF=1.0A Tc=25°C)

Region	CCT Range		X1	Y1	X2	Y2	X3	Y3	X4	Y4
	Min	Max								
Q	2590	2670	0.4656	0.4072	0.4591	0.4058	0.4655	0.4175	0.4725	0.4188
P	2670	2780	0.4591	0.4058	0.4513	0.4041	0.4574	0.4158	0.4655	0.4175
O	2780	2840	0.4513	0.4041	0.4463	0.4030	0.4523	0.4147	0.4574	0.4158

Notes:

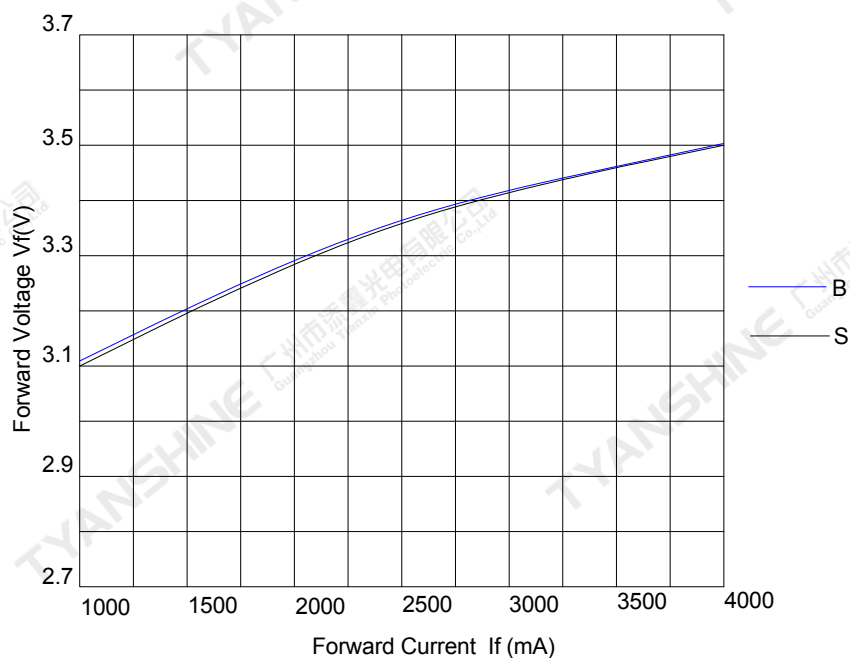
- 1.Luminous intensity is measured with a light sensor and filter combination that approximates the CIE eye-response curve.
2. $\theta_{1/2}$ is the off-axis angle at which the luminous intensity is half the axial luminous intensity.
- 3.Luminous flux measurement tolerance:±15%.
- 4.Forward voltage measurement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

Part No.	TX-6065BS60FC120-NUVENG-01	Spec No.	WKF-BF0253	Page	4 of 9
----------	----------------------------	----------	------------	------	--------

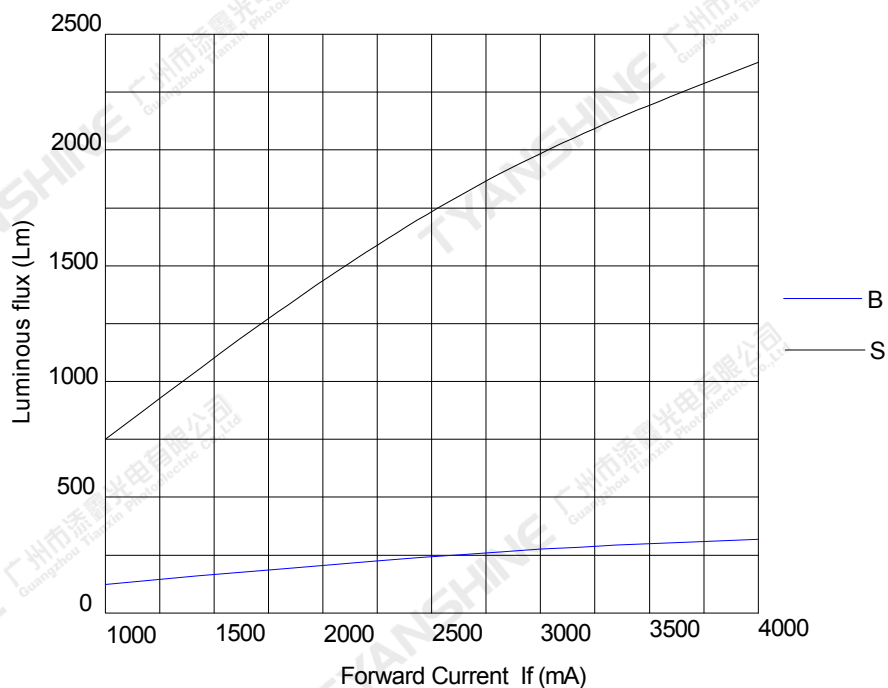
Typical Electrical/Optical Characteristics Curves

(25°C Ambient Temperature Unless Otherwise Noted)

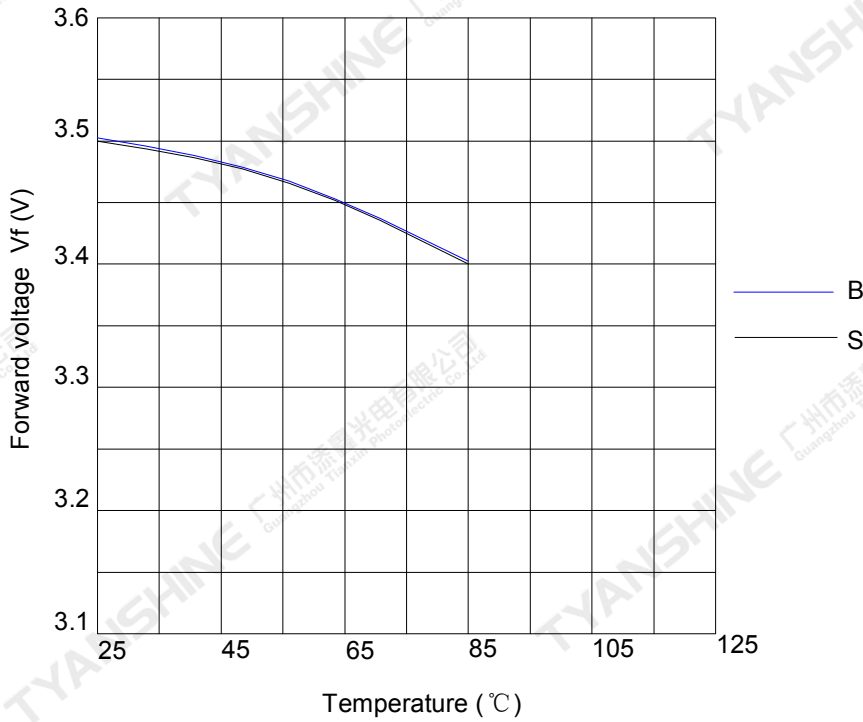
Forward Current VS. Forward Voltage



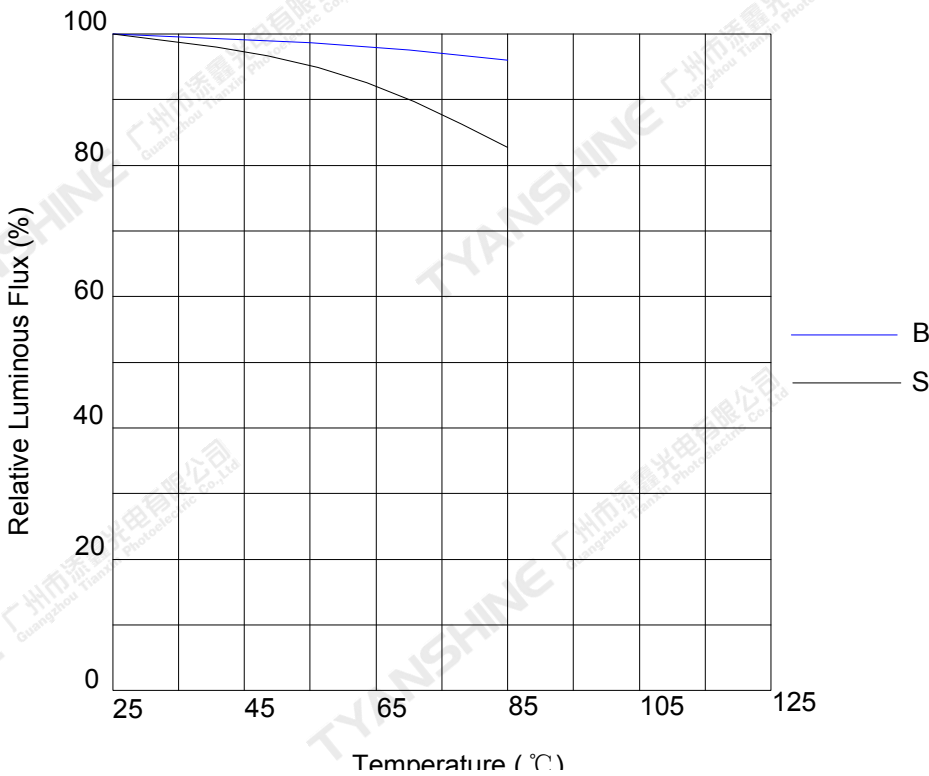
Forward Current VS. Luminous flux

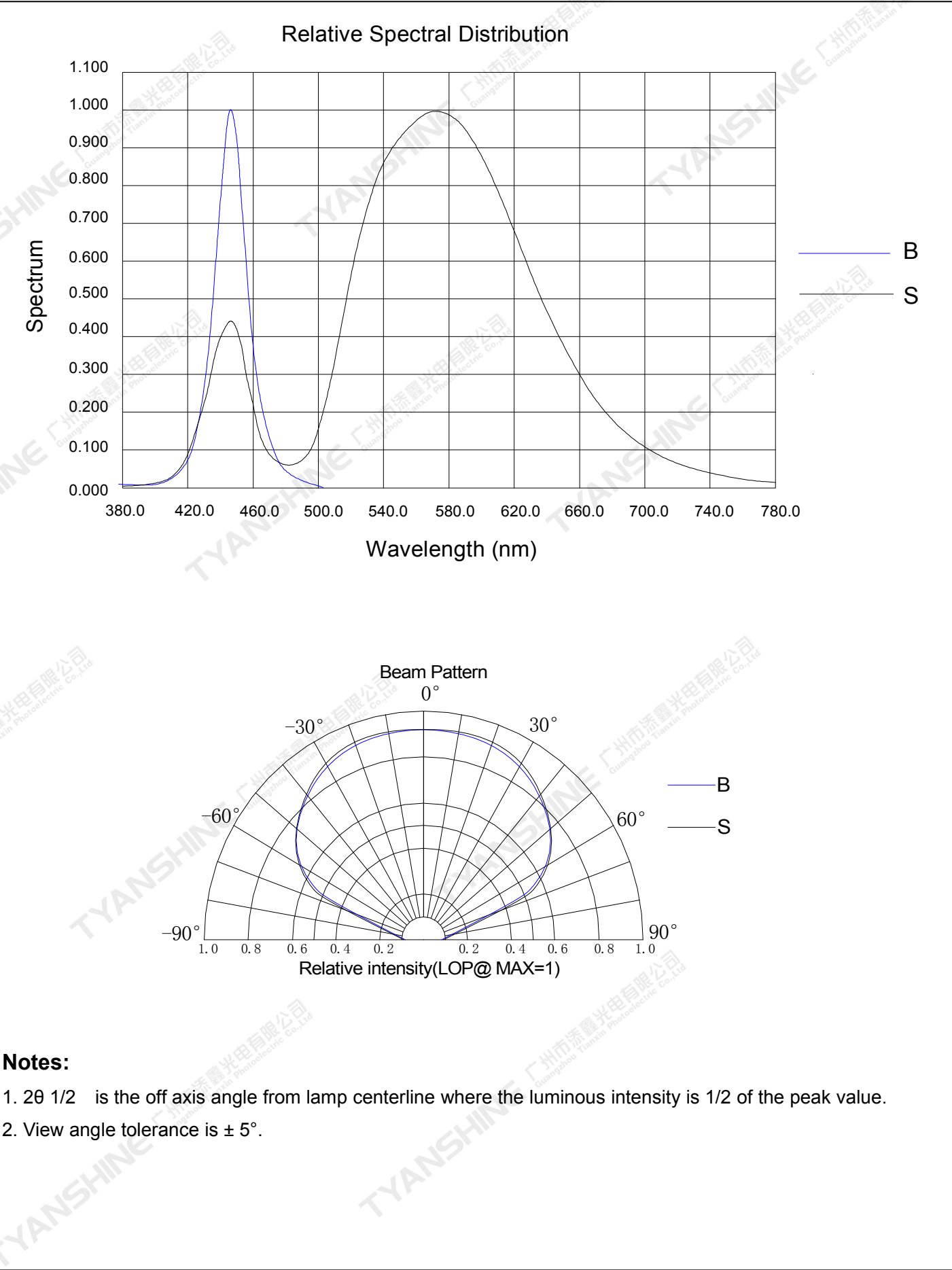


Temperature VS. Forward Voltage (IF=4000mA)



Temperature VS. Relative Luminous Flux (IF=4000mA)





Usage Precautions

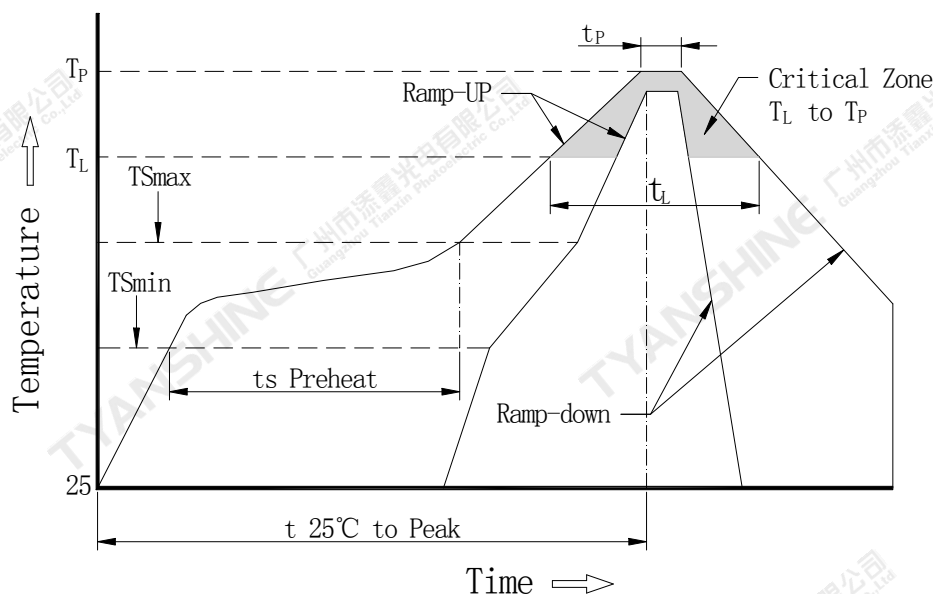
Storage Environment Condition

Temperature: 5°C ~ 30°C (41°F ~ 86°F)

Humidity: 60% RH Max.

Soldering Condition

Use the conditions shown to the under figure.



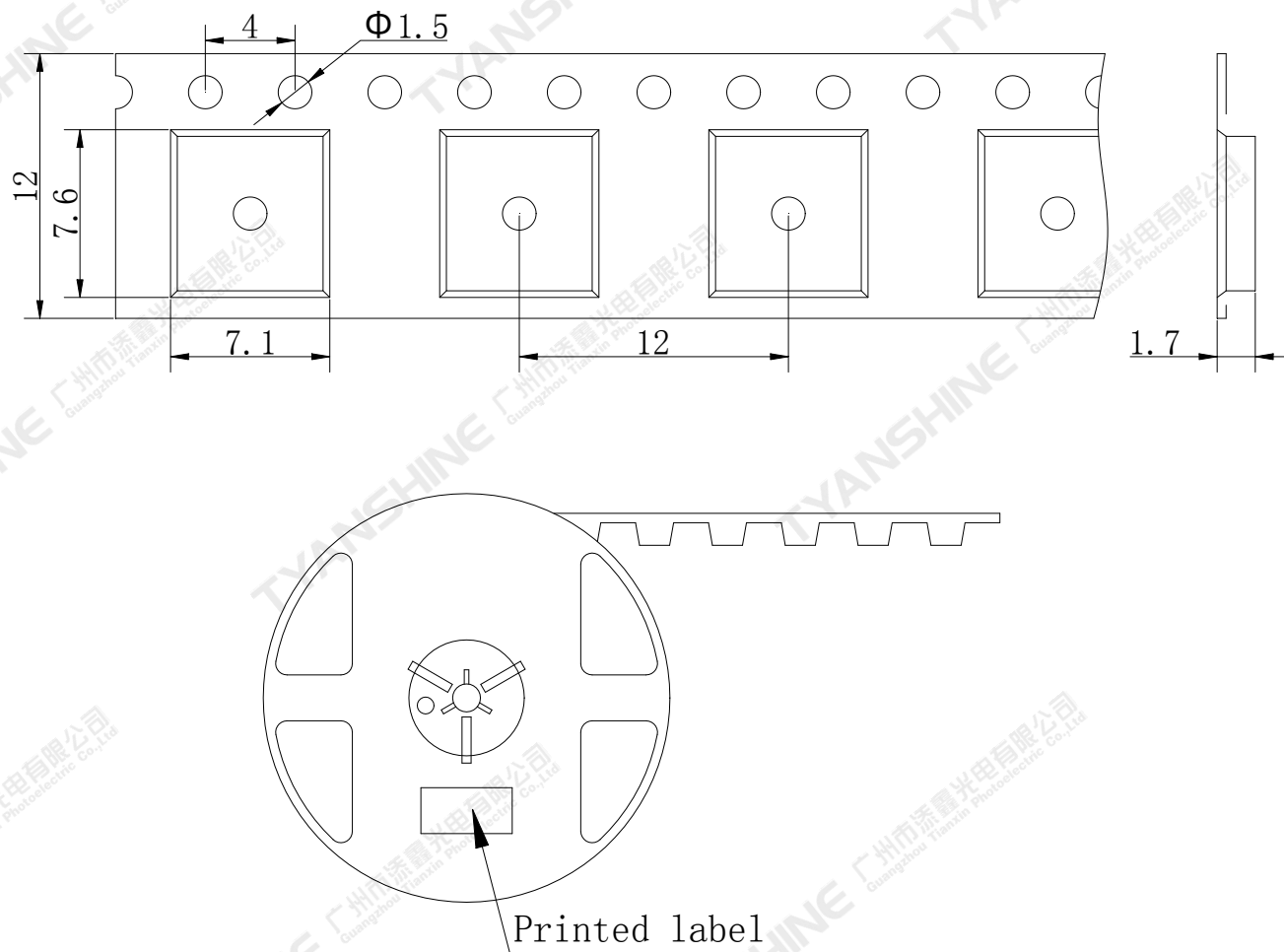
Profile Feature	Lead-Based Solder
Average Ramp-Up Rate (T_{smax} to T_P)	3°C/second max.
Preheat: Temperature Min (T_{smin})	100°C
Preheat: Temperature Max (T_{smax})	150°C
Preheat: Time (T_{smin} to T_{smax})	60-120 seconds
Time Maintained Above: Temperature (T_L)	183°C
Time Maintained Above: Time (T_L)	60-150 seconds
Peak/Classification Temperature (T_P)	225°C
Time Within 5°C of Actual Peak Temperature (T_P)	10-30 seconds
Ramp-Down Rate	6°C/second max.
Time 25°C to Peak Temperature	6 minutes max.

Note:

All temperatures refer to topside of the package, measured on the package body surface.

Dimensions For Cannulation And Packaging

Quantity:1000PCS

**Notes:**

1. All dimensions are in millimeters.
2. Tolerances are ± 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, Irresponsible of the Company.

Part No.	TX-6065BS60FC120-NUVENG-01	Spec No.	WKF-BF0253	Page	9 of 9
----------	----------------------------	----------	------------	------	--------