

TX-1919RGBWS60C16V12-20H90

PRODUCT SPECIFICATION

Features:

- ◆Excellent transiting heat from LED chip operating under R:400mA, G/B:450mA, W/S:600mA.
- ◆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:

- ◆Red:AlGaInP
- ◆Green:GaInN
- ◆Blue:GaN
- ◆Warm White:GaN
- ◆White:GaN

Emitting Color:

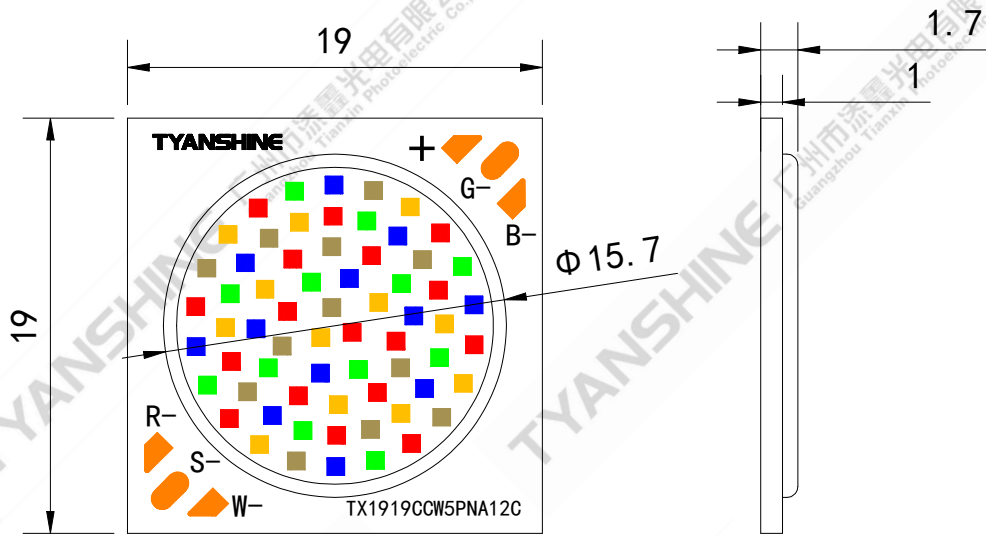
- ◆Red
- ◆Green
- ◆Blue
- ◆Warm White
- ◆White

Applications:

- ◆Indoor lighting
- ◆Outdoor lighting
- ◆Industrial lighting
- ◆General Lighting
- ◆Commercial lighting

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Package Dimensions:



R-Red; G-Green; W-White; S-Warm white; B-Blue

Notes:

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

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Absolute Maximum Ratings

Parameter	Symbol	MAX.	Unit
LED Junction Temperature	T _j	115	°C
Power Dissipation	R	15	W
	G	17	
	B	17	
	W	23	
	S	23	
	R+B+G+W+S	60	
Continuous Forward Current	R	400	mA
	G	450	
	B	450	
	W	600	
	S	600	
Reverse Voltage	V _R	—	V
Electrostatic Discharge Threshold (ESD)	ESD	2000	V
Operating Temperature Range	T _{opr}	-30 to +80	°C
Storage Temperature Range	T _{spr}	-30 to +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,R/G/B/S/W:IF=350mA)

Parameter	Symbol	Emitting Color	Values			Units
			Min.	Typ.	Max.	
Luminous Flux	ϕ_v	R	650	760	—	lm
		G	760	900	—	
		B	160	190	—	
		W	760	900	—	
		S	640	750	—	
Viewing Angle at 50 % IV	$2\theta_{1/2}$	R	—	115	—	Deg
		G	—	115	—	
		B	—	115	—	
		W	—	115	—	
		S	—	115	—	
Peak Emission Wavelength	λ_p	R	625	630	635	nm
		G	512	517	522	
		B	445	450	455	
Dominant Wavelength	λ_d	R	619	622	625	nm
		G	517	522	527	
		B	450	455	460	
Spectral Line Half-Width	$\Delta\lambda$	R	12	17	22	nm
		G	27	32	37	
		B	15	20	25	
Forward Voltage	V_f	R	33	35	39	V
		G	33	36	39	
		B	33	36	39	
		W	33	36	39	
		S	33	36	39	
Correlated Colour Temperature	CCT	W	6000	—	6500	K
		S	2670	—	2780	
Color Rendering Index	Ra	W	90	—	—	—
		S	90	—	—	

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.The dominant wavelength (λ_d) is derived from the CIE chromaticity diagram and represents the single wavelength which defines the color of the device.
- 4.Flux is measured with an accuracy of $\pm 15\%$.
- 5.Forward voltage is measured with an accuracy of $\pm 3\%$.

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