

# S80D2 Series 1-watt class

## FEATURES

high-luminosity high power LED  
high current operation  
low thermal resistance long  
operation life high energy efficient

## APPLICATION

automotive lighting system,  
street/ guard lighting  
architectural lighting  
decorative lighting general lighting

## Package

Series	Size(L·W·H)mm	Mounting	Pbfree
S80D2	8Φx 5.3T	Reflow	O

## Electro-optical Characteristics

(Ta 25 °C)

Part No.	Color	Current [mA]	Flux [lm]		Voltage [V]
			Min.	Max.	
IWS-S80D2-WW-K1	warm	350	60	100	3.0-3.75
IWS-S80D2-NW-K1	natural	350	60	100	3.0-3.75
IWS-S80D2-PW-K1	pure	350	60	124	3.0-3.75
IWS-S80D2-CW-K1	cool	350	60	124	3.0-3.75
IWS-S80D2-BW-K1	bluish	350	60	100	3.0-3.75
IWS-S80D2-UR-K1	red	350	29	50	2.0-3.75
IWS-S80D2-UG-K1	green	350	50	86	3.0-3.75
IWS-S80D2-UB-K1	blue	350	10	29	3.0-3.75

※ Please refer to the Chromaticity Diagram on page \_ for Color.

## Absolute Maximum Ratings

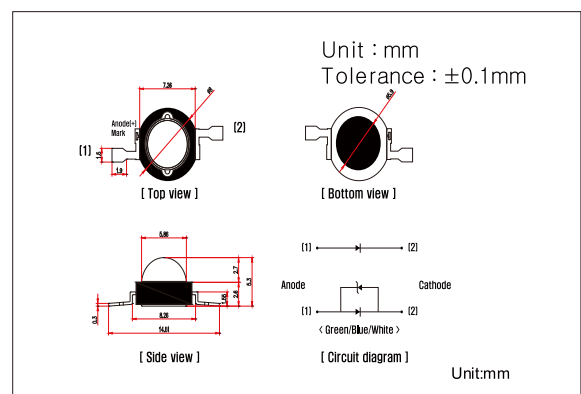
(Ta 25 °C)

Parameter	Symbol	Color	Value	Unit.
Power Dissipation	Pd	white	1.51	W
		red	1.09	
		green	1.51	
		blue	1.51	
Forward Current	IF	W/R/G/B	500	mA
Peak Forward Current ※1	IFP	W/R/G/B	1000	mA
Operating Temperature	Topr	W/R/G/B	-30 ~ +85	°C
Storage Temperature	Tstg	W/R/G/B	-40 ~ +100	°C
Soldering Temperature	Tsol	W/R/G/B	260 (5sec)	°C
Junction Temperature	Tjmax	W/R/G/B	125	°C
Thermal Resistance	Rthj-b	white	7 / 12 ※2	K/W
		red	9	
		green	12	
		blue	12	

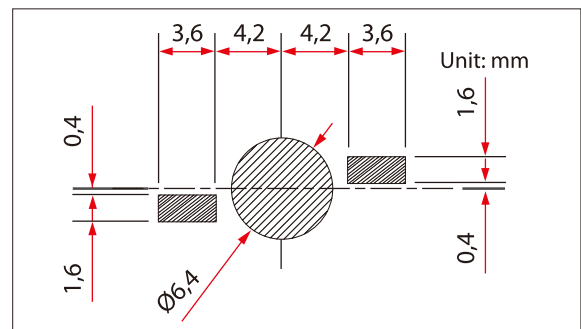
※ 1 Duty ratio = 1/10, Pulse width = 10ms

※ 2 Thermal resistance is 7K/W in vertical chip and 12K/W in sapphire-based chip

## Outline Drawing and Dimension



## Recommendable soldering pattern



## Directive Characteristics

(Viewing angle = 120 deg.)

