Specification

CUSTOMER NAME: _____

DIRECTOR: _____ TITLE: _____

CUSTOMER PART NO.: _____

PART NUMBER: **IE-3535Y-SB-L-CE** REVISION: **2.0**

ISSUE DATE: **2014/01/08** RETURN DATE: / /

Features

1. Low thermal resistance ceramic structure

2. Small size, flexible design

3. Automatic integration molding process

4. Light good uniformity, the perspective wide

5. High photosynthetic efficiency,

highlights flux maintenance ratio

Features

1. General lighting

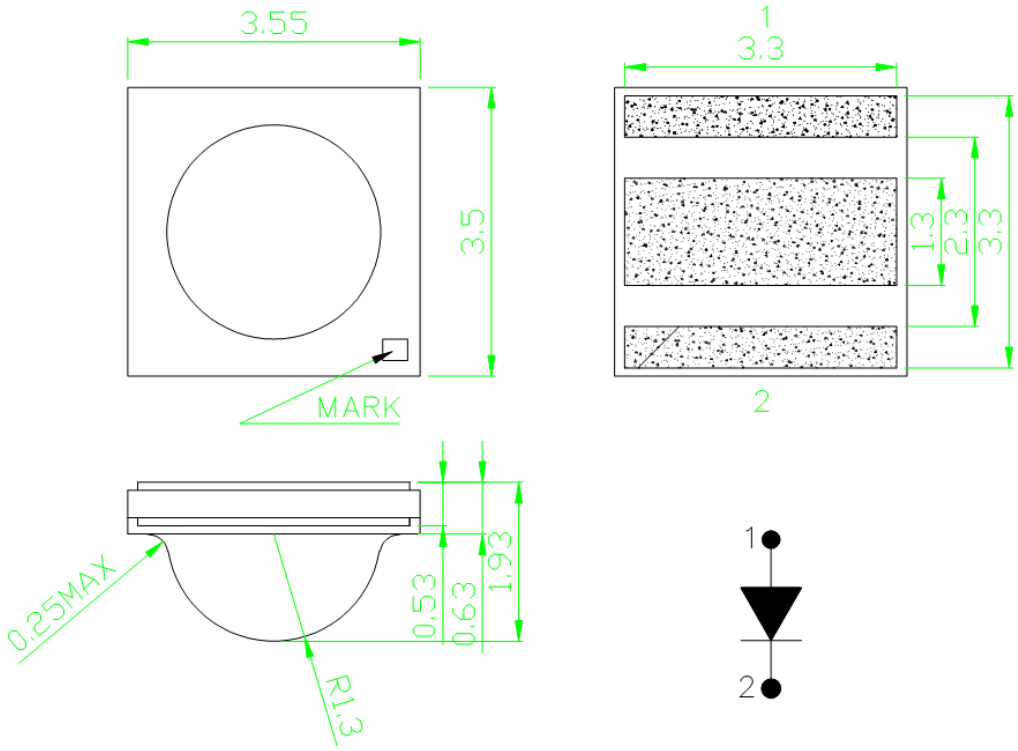
2. Stage light

3. Project-light lamp

4. The landscape lighting

5. Other lighting

Package Dimensions



Notes:

1. All dimensions are in millimeters (inches).

2. Tolerance is ±0.1(0.004") unless otherwise noted.

3.Specifications are subject to change without notice.

Selection Guide

Part No.	Dice	Lens Type	Øv (lm) @ 350mA		Viewing Angle
			Min.	Typ.	2 θ 1/2
IE-3535Y-SB-L-CE	YELLOW (GaAsP/GaP)	WATER CLEAR	40	50	120

Note:

1. 1/2 is the angle from optical centerline where the luminous intensity is 1/2 the optical centerline value.

Electrical / Optical Characteristics at T_A=25°C

Symbol	Parameter	Device	Typ.	Max.	Units	Test Conditions
λpeak	Peak Wavelength	YELLOW	585	590	nm	IF=350mA
λD	Dominant Wavelength	YELLOW			nm	IF=350mA
Δλ1/2	Spectral Line Half-width	YELLOW			nm	IF=350mA
C	Capacitance	YELLOW			pF	VF=0V;f=1MHz
VF	Forward Voltage	YELLOW	2.3	2.6	V	IF=350mA
IR	Reverse Curren	YELLOW		≤5	uA	VR = 5V

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.

Absolute Maximum Ratings at T_A=25°C

Parameter	YELLOW	Units
Power dissipation	1	W
DC Forward Current	350	mA
Peak Forward Current [1]	500	mA
Reverse Voltage	5	V
Operating/Storage Temperature	-40°C To +85°C	

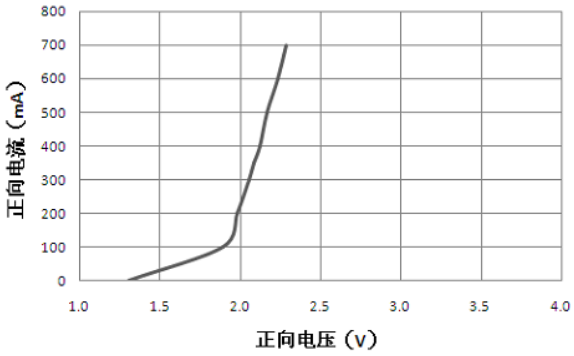
Note:

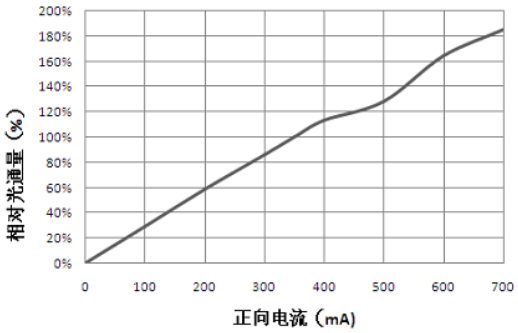
1. 1/10 Duty Cycle, 0.1ms Pulse Width.

■ Typical Electrical/ Optical Characteristics Curves

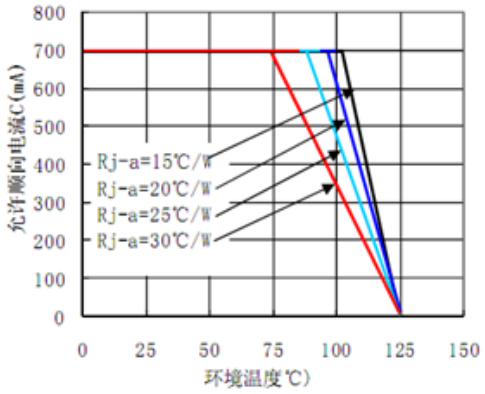
(Ta=25°C Unless Otherwise Noted) :

Forward Current Characteristics

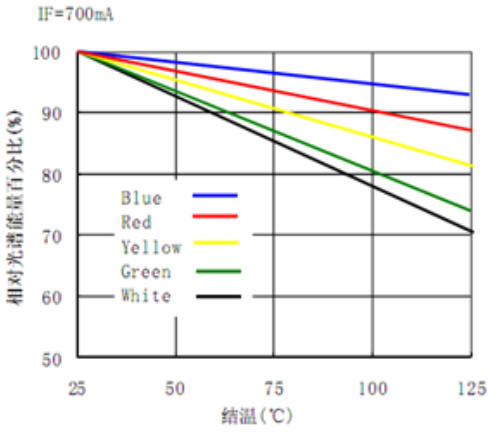




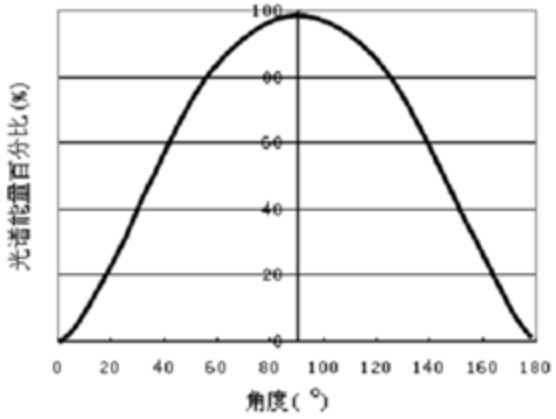
■ 环境温度---顺向允许电流特性曲线图



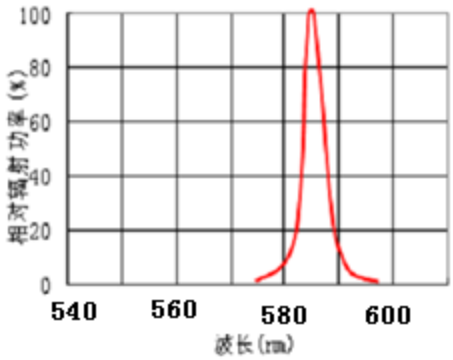
■ 结温—相对光谱能量百分比特性曲线图



■ 发光角度曲线图



■ 波段能量百分比特性曲线图



Reliability experiments

测试项目	应用标准	测试条件	失效判定标准
室温工作寿命测试	JESD22 方法 A108-C	-环境温度：常温 -正向电流：技术数据表所列最大值 -测试周期：1008 小时	1. 正向电压偏移＞200mV 2. 光通量下降： • InGaN LEDs＞15% • AlInGaP LEDs＞25% 3. 正向或反向漏电流＞10μA 4. 灾难性失效
高温工作寿命测试	JESD22 方法 A108-C	-环境温度：85℃ -正向电流：技术数据表所列最大值 -测试周期：1008 小时	
低温工作寿命测试	JESD22 方法 A108-C	-环境温度：-40℃ -正向电流：技术数据表所列最大值 -测试周期：1008 小时	
高温高湿工作寿命测试	JESD22 方法 A101-B	-环境温度：60℃ -湿度 90％相对湿度(RH) -时间 1008 小时(循环) -正向电流：技术数据表所列最大值	
高低温恒湿可程式寿命测试	JESD22 方法 A101-B	--环境温度： －20℃ ～0℃ ～25℃ ～60℃ ～25℃ (30 分) (30 分) (30 分) (30 分) (30 分) -湿度 60％相对湿度(RH) -试验周期：20 循环	
冷热冲击试验	MIL-STD-202G 方法 107G	-温度范围：-40℃～125℃或依客户要求 -保持时间 15 分钟 -转换时间＜60 秒 -周期：100 循环	测试后 LED 不能再点亮发光

■ Handling

Handle the component along the side surfaces by using forceps or appropriate tools. The forceps or other appropriate tools should not put any pressure on the lens.it’s also strictly forbidden to poke and press the lens.

■ Electrical Notes

1. The LED can not be drived reversely.
2. It’s necessary to have the measures to limit the current Otherwise slight voltage shift may cause enormous current change and results in the failure of LEDs.
3. It is recommended that the drive current should be lower when the light output is enough for applying.It would be helpful to improve the product’s reliability.

■ Antistatic

The LEDs are electrostatic sensitive devices,so antistatic steps should be taken during the processing.