

SAMPLE APPROVE SHEET

Customer Name:

Product application: Sterilization / disinfection / purification

Product model: 2835 UV 405+405nm2Chip (병렬)

Product encoding : CL-SFC285UV-405-B-05(1W, 병렬)

Issue Date : 2021-03-05

Lens Color Code	C	Water Transparent
	T	Colored Transparent
	D	White Diffused
	E	Colored Diffused

Customer confirmation	Checked by	Prepared by



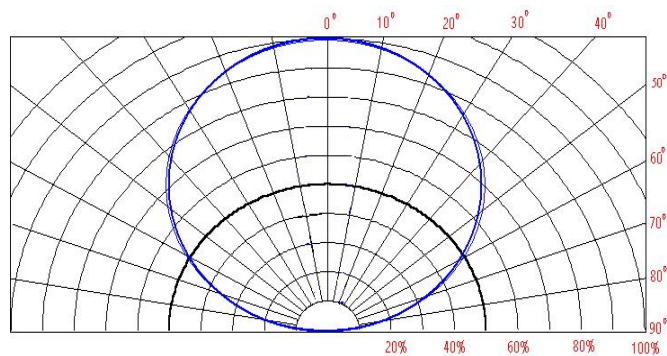
Aatures

- Long service life
- High brightness
- Energy saving and environmental protection
- Low DC voltage operation
- Quick response
- Photometric tunable
- Short wavelength, strong penetration
- Strong antistatic ability
- Eutectic process
- RoHS compliant

Applications

- All kinds of sterilization
- UV light therapy, beauty and manicure
- Anti-counterfeit detection
- Photocatalytic air purification
- UV curing
- Plant lighting
- Printing equipment

Radiation Pattern



Typical Optical/ Electrical Characteristics @T_J=25°C

Item	Symbol	Condition	Min.	Typ.	Max.	Unit
Forward Voltage	V _F	I _F =300mA	3.4	---	3.8	V
Reverse Current	I _R	V _R =5v	--	--	10	μA
50% Power Angle	2θ _{1/2}	I _F =300mA	---	120	---	deg
Luminous Intensity	φ _V	I _F =300mA	400	--	500	mcd
Recommend Forward Current	I _F	--	--	150	--	mA
Chromaticity	λ _P	I _F =300mA	405	+	405	nm
Junction temperature	T _J	I _F =300mA	--	125	--	°C
Thermal Resistance, Junction to Case	R _{JP}	I _F =300mA	--	8	--	°C/W

Notes: 1. Tolerance of measurement of forward voltage ±0.1V.
 2. Tolerance of measurement of peak Wavelength ±2.0nm.
 3. Tolerance of measurement of luminous intensity ±5%.

Absolute Maximum Rating

Item	Symbol	Absolute Maximum Rating	Unit
Forward Current	I _F	500	mA
Pulse Forward Current*	I _{FP}	100	mA
Reverse Voltage	V _R	5	V
Power Dissipation	P _D	280	mW
Operation Temperature	T _{OPR}	-40~+80	°C
Storage Temperature	T _{STG}	-40~+100	°C
Lead Soldering Temperature*	T _{SOL}	Max. 260°C for 3sec Max.	

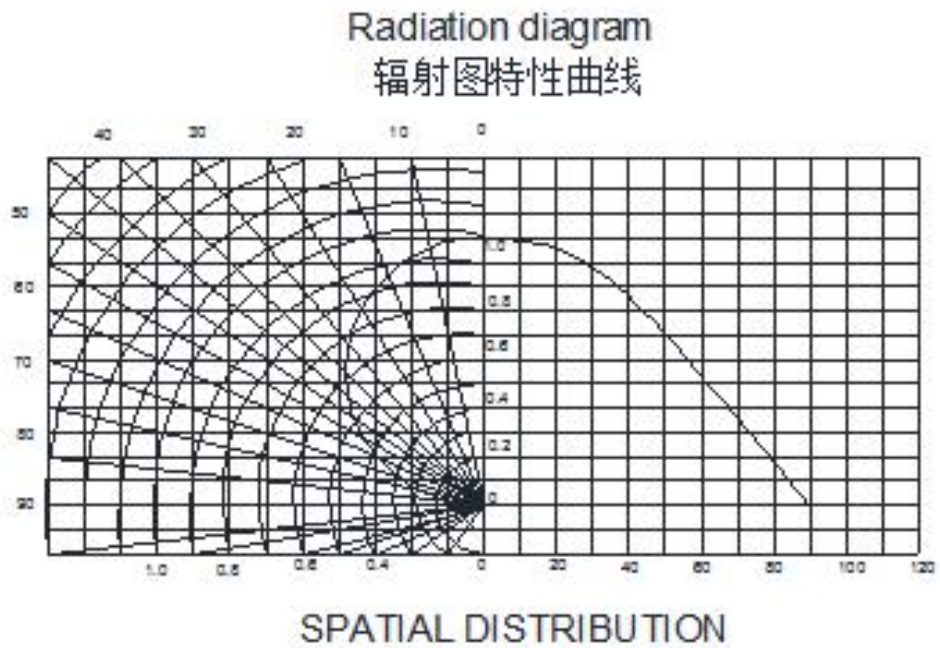
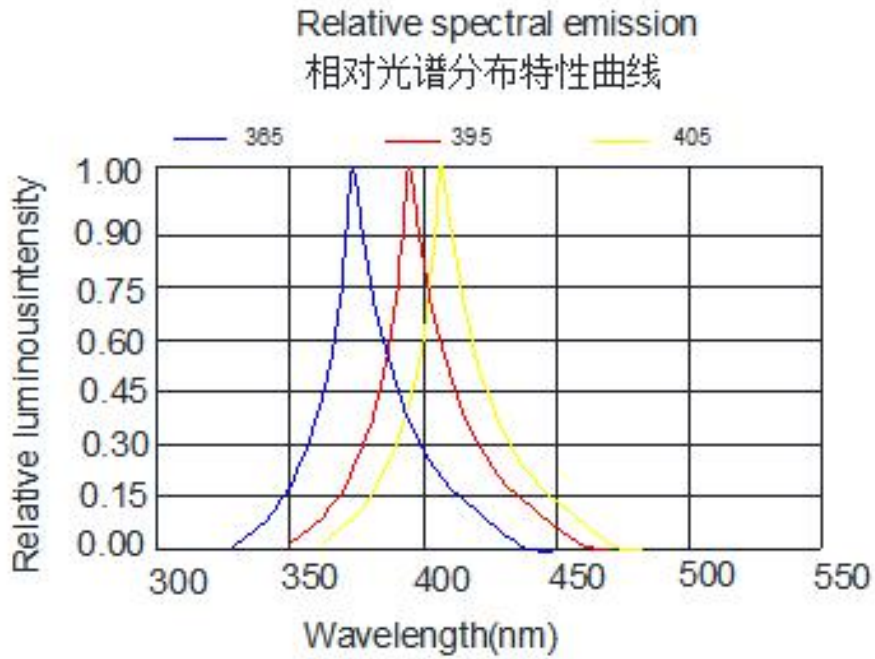
*IFP Conditions: Pulse Width ≤ 10msec duty ≤ 1/10

* All high power emitter LED products mounted on aluminum metal-core printed circuit board, can be lighted directly, but we do not recommend lighting the high power products for more than 5 seconds without a appropriate heat dissipation equipment.

*Re-flow, wave peak and soak-stannum soldering etc. is not suitable for High power integrated light source.

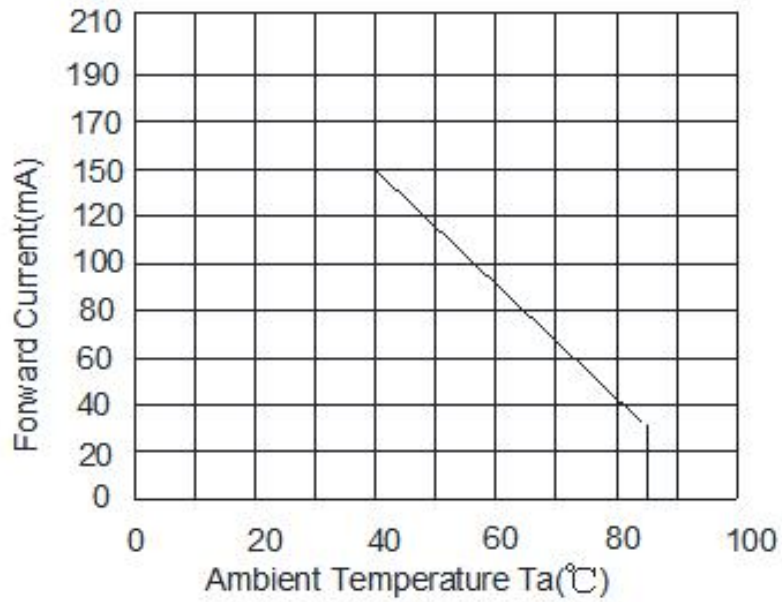
*Suggest to solder it by professional high power LED soldering machine.

*Can use invariable-temperature searing-iron with soldering condition : ≤ 260 degree less than 3 seconds.



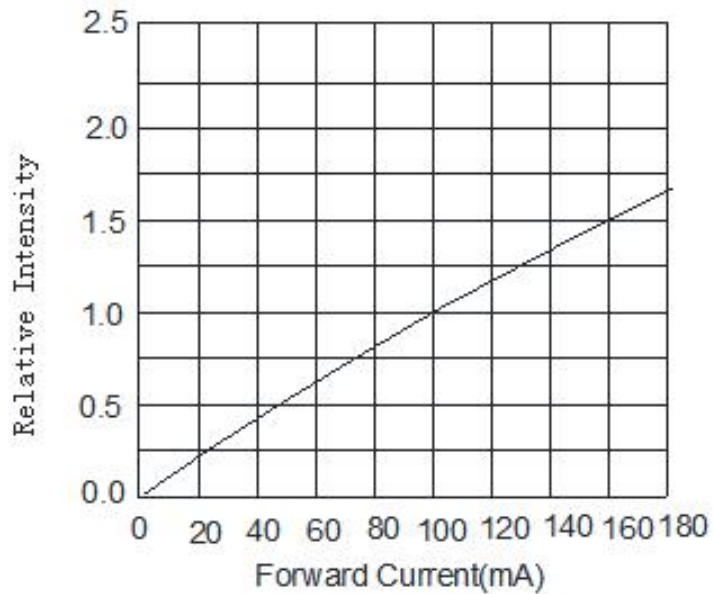
Ambient Temperature vs. Forward Current

环境温度与正向电流特性曲线

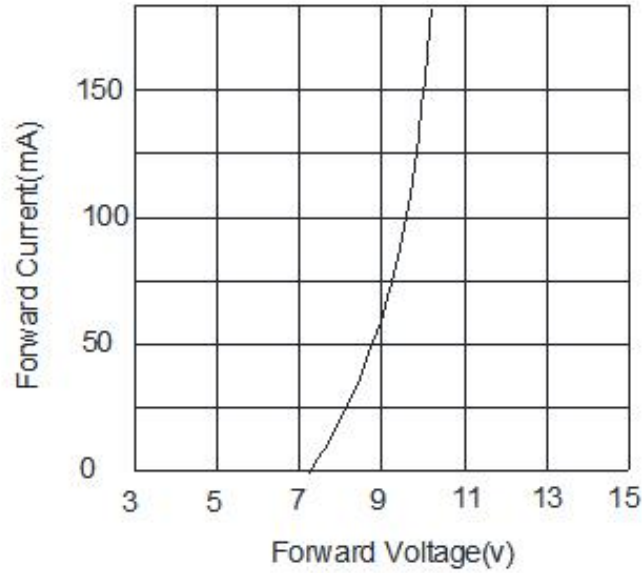


Forward Current vs. Relative Intensity

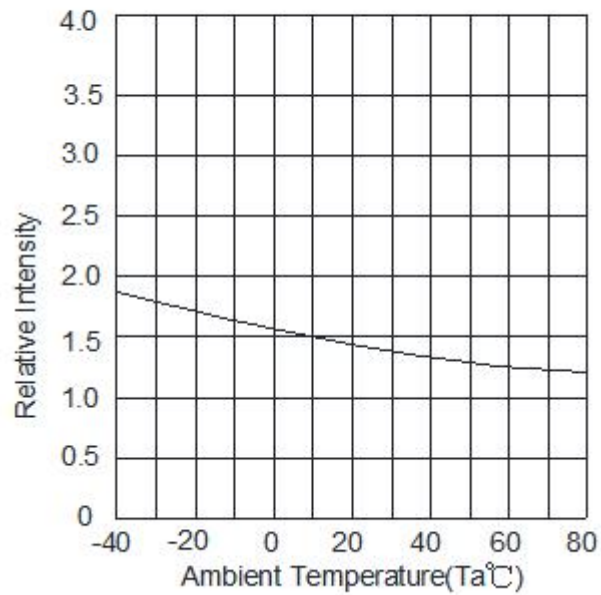
正向电流与相对光强特性曲线

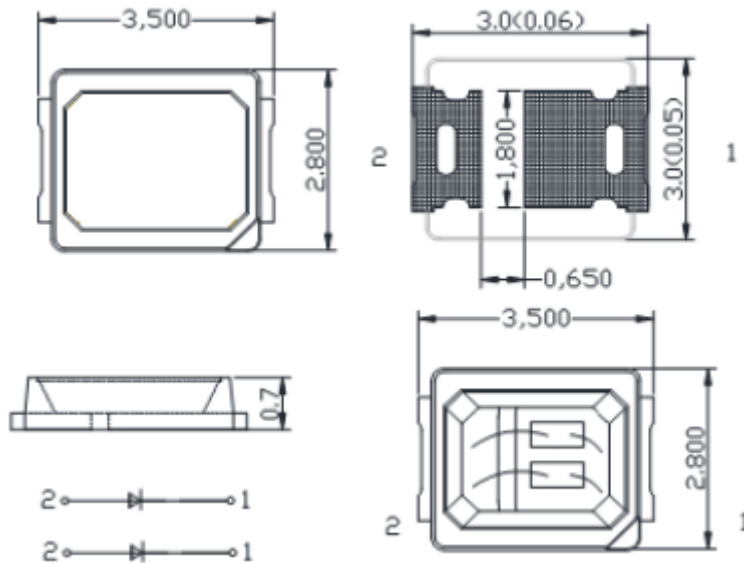


Forward Voltage VS. Forward Current
正向电压与正向电流特性曲线

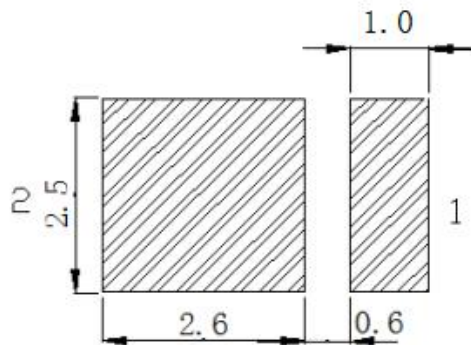


Ambient Temperature VS. Relative Intensity
环境温度与相对光强特性曲线

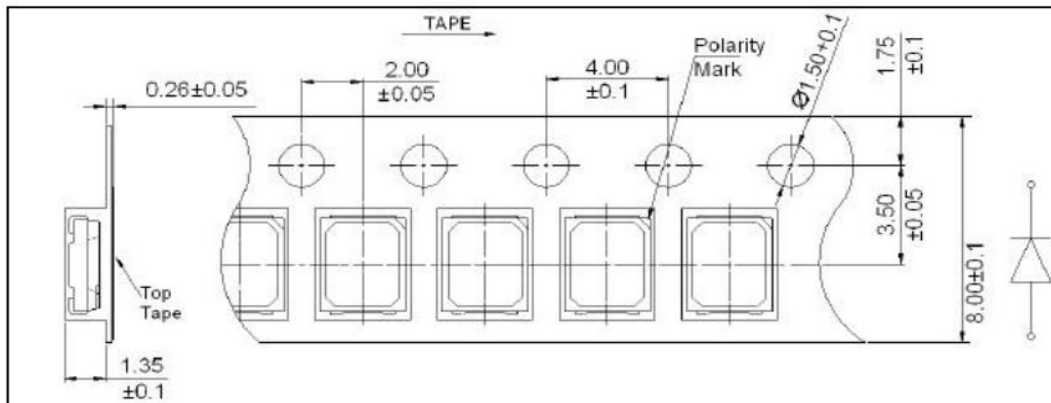


Package Dimensions (MM)


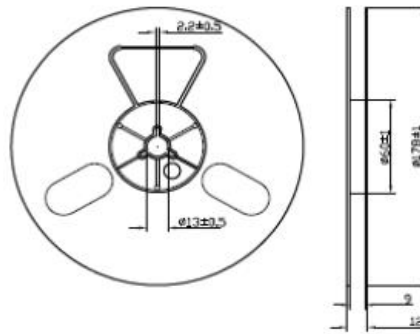
- Notes:
1. All dimension units are millimeters.
 2. All dimension tolerance is $\pm 0.2\text{mm}$ unless otherwise noted.
 3. The brass column of heat sink of the high power LED is Anode. Please pay more attention to the necessary installation, when installing The heat dissipate on equipments and connecting the electric circuit in avoid of short circuit and destroying

Pad diagram: (MM)


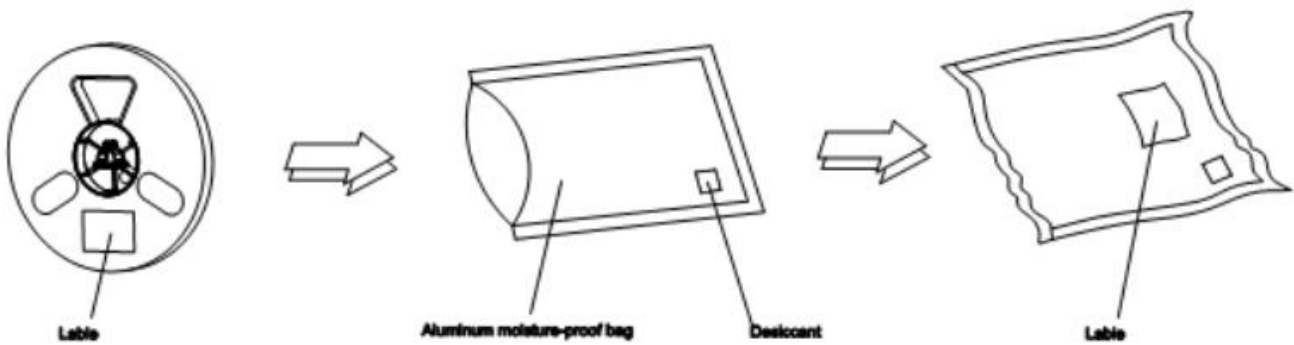
Tape Specifications (Units : mm)



Reel Dimensions:



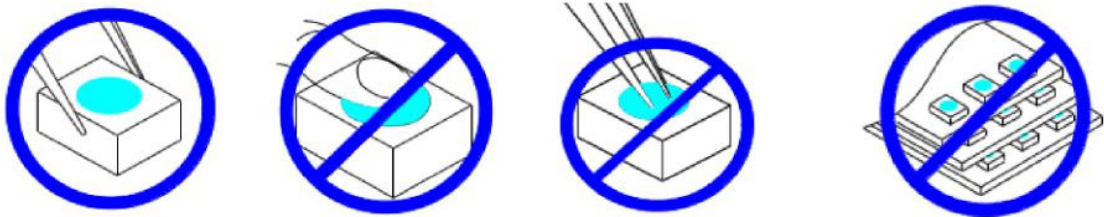
Moisture Resistant Packaging:



Note: The tolerances unless mentioned is $\pm 0.1\text{mm}$, Unit: mm

Other points for attention:

1. No pressure should be exerted to the epoxy shell of the SMD under high temperature.
2. Do not scratch or wipe the lens since the lens and gold wire inside are rather fragile and cross out easy to break.
3. LED should be used as soon as possible when being taken out of the original package, and should be stored in anti-moisture and anti-ESD package.
4. Do not stack together assembled PCBs containing LEDs. Impact may scratch the silicone lens or damage the internal circuitry

**Storage:**

1. It is recommended to store the products in the following conditions: Humidity: 60% R. H. Max. Temperature : 5~30 (41~86)
2. Shelf life in sealed bag: 12 month at 5~30 and 60% R. H. after the package is Opened, the products should be used within a week or they should be keeping to stored at 20 R. H. with zip-lock sealed.

Baking:

It is recommended to baking before soldering when the pack is unsealed after 12hrs. The Conditions are as followings:

1. $70 \pm 3^{\circ}\text{C}$ (12~24hrs) and 5%RH, taped reel type
2. $100 \pm 3^{\circ}\text{C}$ 1hrs , bulk type