

SMT640CE-200

Point Source LED

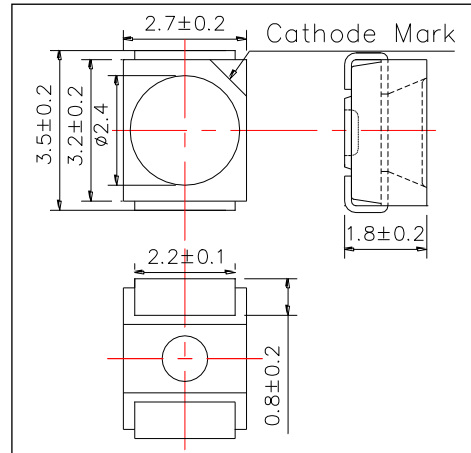
SMT640CE-200 consists of red color point source LED mounted on the lead frame as TOP LED package and is 50mcd typical of brightness.

It emits a spectral band of radiation at 640nm.

<Specifications>

1. Product Name: Point Source LED
2. Type Number: SMT640CE-200
3. Chip:
 - Chip Material: AlGaInP
 - Peak Wavelength: 640nm
 - Emission Area: $\Phi 200\mu\text{m}$
4. Package
 - Lead Frame Die: Silver Plated
 - Package Resin: PPA Resin
 - Lens: Epoxy Resin

Outer Dimension (Unit:mm)



Absolute Maximum Ratings[Ta=25°C]			
Item	Symbol	Maximum Rated Value	Unit
Power Dissipation	PD	100	mW
Pulse Forward Current*	IF	50	mA
Reverse Voltage	VR	5	V
Operating Temperature	TOPR	-20 ~ +80	°C
Storage Temperature	TSTG	-30 ~ +80	°C
Soldering Temperature**	TSOL	255	°C

* Duty=1% and Pulse Width=10us.

** Soldering condition must be completed within 10 second at 255°C.

Electro-Optical Characteristics[Ta=25°C]						
Item	Symbol	Condition	Minimum	Typical	Maximum	Unit
Forward Voltage	VF	IF=20mA		1.9	2.2	V
Reverse Current	IR	VR=5V			10	uA
Total Radiated Power*	PO	IF=20mA		0.5		mW
Brightness**	IV	IF=20mA		50		mcd
Radiant Intensity	IE	IF=50mA		0.2		mW/sr
Peak Wavelength	λ_P	IF=20mA	630	640	650	nm
Half Width	$\Delta\lambda$	IF=20mA		13		nm
Viewing Half Angle	$\theta_{1/2}$	IF=20mA		± 30		deg

* Measured by Photodyne #500

** Measured by Tektronix J-16

