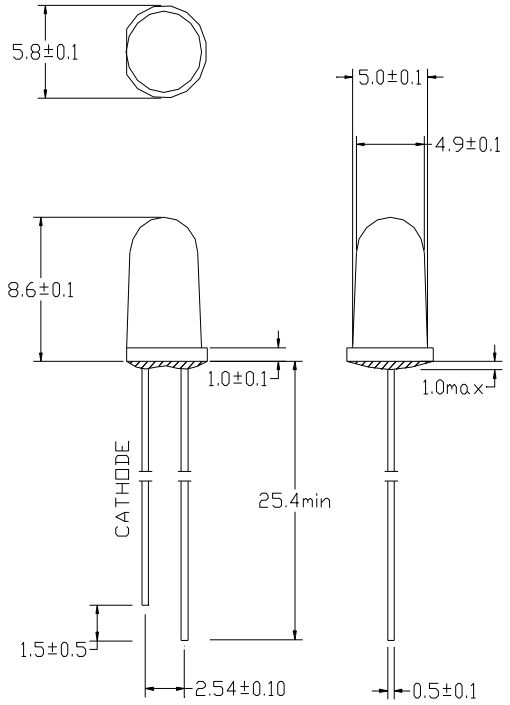
Hebei I.T. (Shanghai) Co., Ltd.

LED SPECIFICATION

Part No.: 510E850C

Ø Features:

- Single color
- High Power output
- Low power consumption
- High reliability and long life

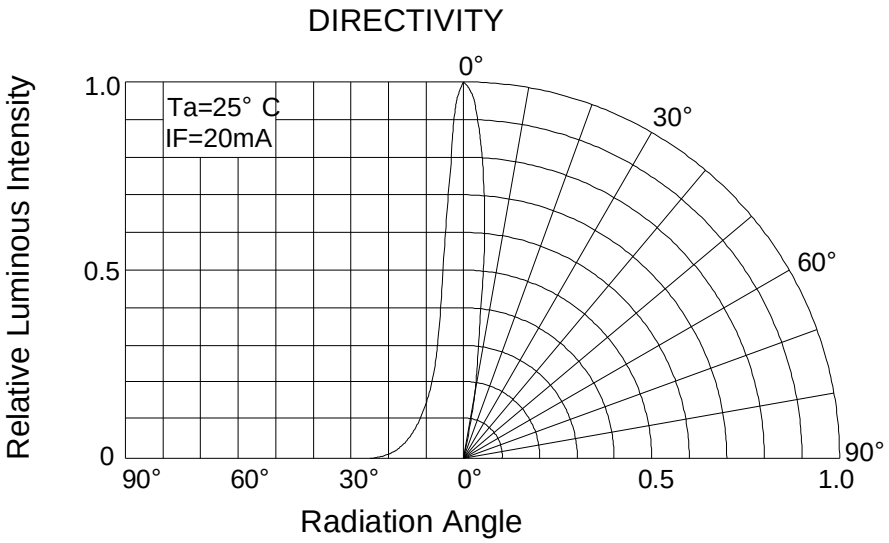


●Tolerance is +/-0.25mmunless otherivise noted

Ø Descriptions:

- Dice material：AlGaAs
- Emitting Color：Infrared Emitting diodes
- Device Outline：Φ5mm Round Type
- Lens Type：Black Transparent

Ø Directivity:



Ø Absolute maximum ratings（Ta = 25℃）

Parameter	Symbol	Test Conditions	Characteristics		Unit
			Min.	Max.	
Power Dissipation	P_d	——	——	100	mW
Reverse Voltage	V_R	I_R=10μA	9	——	V
Forward Current	I_{FM}	Duty=0.01mS 1kHz	——	1000	mA
Operating Temperature Range	T_{opr}	——	-40	+85	℃
Storage Temperature Range	T_{str}	——	-40	+100	℃
Soldering Temperature	T_{sd}	t≤5sec,2mm from case	——	260	℃

Ø Electrical and optical characteristics （Ta = 25℃）

Parameter	Symbol	Test Condition	Value			Unit
			Min.	Typ.	Max.	
Forward Voltage	VF	IF = 50mA	----	1.55	1.8	V
Reverse Current	IR	VR = 9V	----	----	10	μA
Peak Wavelength	λp	IF = 50mA	----	850	----	nm
Spectrum Width of Half Value	Δλ	IF = 50mA	——	45	——	nm
Radiant Intensity	Ie	I_F=50mA	——	160	——	mW/Sr
Viewing Angle	2θ1/2	IF = 50mA	----	13	----	Deg.

Ø Typical electrical/optical characteristic curves: