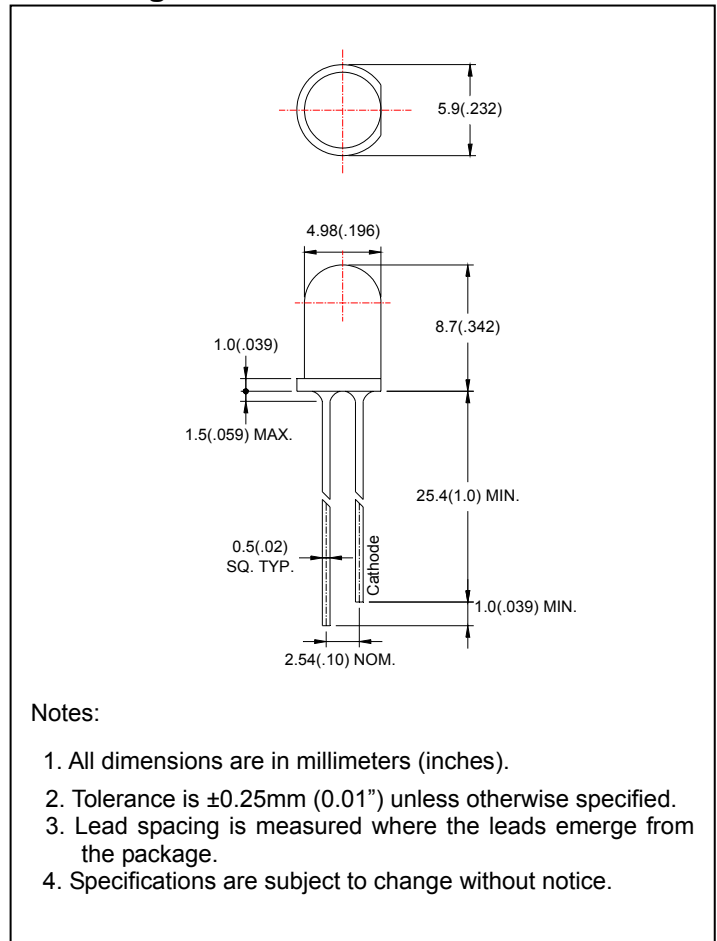# BRIGHT LED ELECTRONICS CORP.

● **Features:**

1. Chip material: AlInGaN
2. Emitted color : Super Blue
3. Lens Appearance : Blue Trans
4. Low power consumption.
5. High efficiency.
6. Versatile mounting on P.C. Board or panel.
7. Low current requirement.
8. T-1 3/4 type package
9. This product don't contained restriction substance, compliance ROHS standard.

● **Applications:**

1. TV set
2. Monitor
3. Telephone
4. Computer
5. Circuit board

● **Package dimensions:**

5.9(.232)
4.98(.196)
8.7(.342)
1.0(.039)
1.5(.059) MAX.
25.4(1.0) MIN.
0.5(.02) SQ. TYP.
Cathode
1.0(.039) MIN.
2.54(.10) NOM.

Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is ±0.25mm (0.01") unless otherwise specified.
3. Lead spacing is measured where the leads emerge from the package.
4. Specifications are subject to change without notice.

● **Absolute maximum ratings(Ta=25℃)**

Parameter	Symbol	Rating	Unit
Power Dissipation	Pd	120	mW
Forward Current	I_F	30	mA
Peak Forward Current*[1]	I_{FP}	150	mA
Reverse Voltage	V_R	5	V
Operating Temperature	Topr	-40℃~80℃	
Storage Temperature	Tstg	-40℃~85℃	
Soldering Temperature	Tsol	260℃(for 5 seconds)	

*[1]Condition for I_{FP} is pulse of 1/10 duty and 0.1msec width.

● Electrical and optical characteristics(Ta=25℃)

Parameter	Symbol	Condition	Min.	Typ.	Max.	Unit
Forward Voltage	V_F	I_F=20mA	-	3.5	4.0	V
Luminous Intensity	Iv	I_F=20mA	-	5600	-	mcd
Reverse Current	I_R	V_R=5V	-	-	10	μA
Peak Wave Length	λ p	I_F=20mA	-	470	-	nm
Dominant Wave Length	λ d	I_F=20mA	465	-	475	nm
Spectral Line Half-width	Δ λ	I_F=20mA	-	30	-	nm
Viewing Angle	$2\theta_{1/2}$	I_F=20mA	-	12	-	deg

● Typical electro-optical characteristics curves
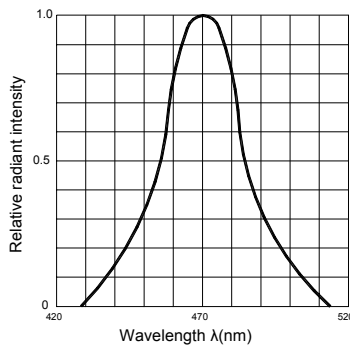
Fig.1 Relative intensity vs. Wavelength

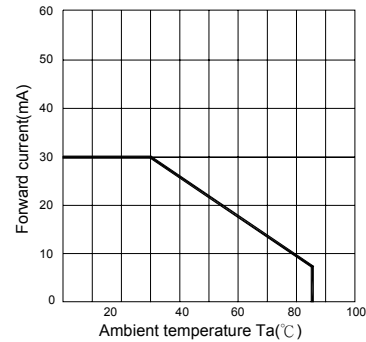Fig.2 Forward current derating curve vs. Ambient temperature

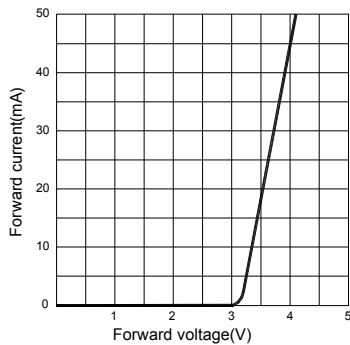Fig.3 Forward current vs. Forward voltage

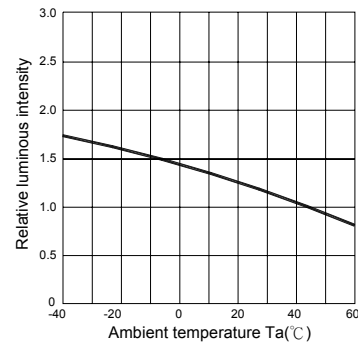Fig.4 Relative luminous intensity vs. Ambient temperature
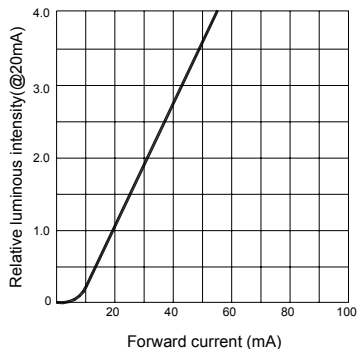
Fig.5 Relative luminous intensity vs. Forward current

Fig.6 Radiation diagram

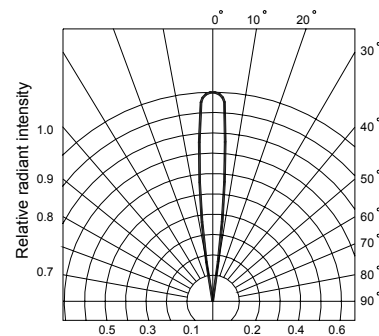● **Bin Limits**

1. Intensity bin limits (At I_F= 20mA)

Bin Code	Min. (mcd)	Max. (mcd)
:	:	:
Y	2090	4260
Z	3220	6440
ZA	4880	9660
ZB	7320	14490
ZC	11000	21350
:	:	:

2. Color Bin Limits (At I_F=20mA) : Dominant Wave Length λd(nm)

Bin Code	Min. (nm)	Max. (nm)
4	464	471
5	469	476

● Bin：x   x

color bin code

Intensity bin code