

LL-S110WC

DATA SHEET

QC:

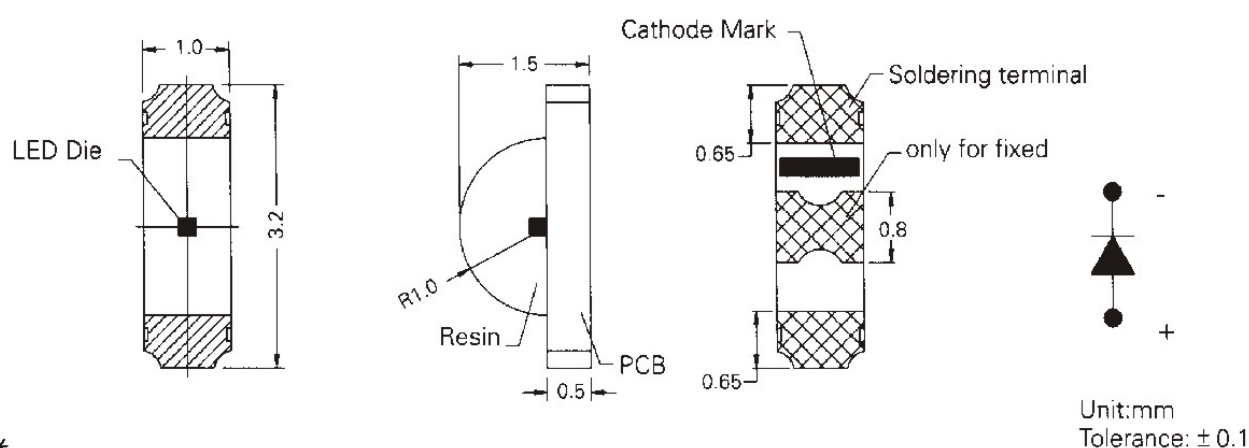
ENG:

Prepared By:

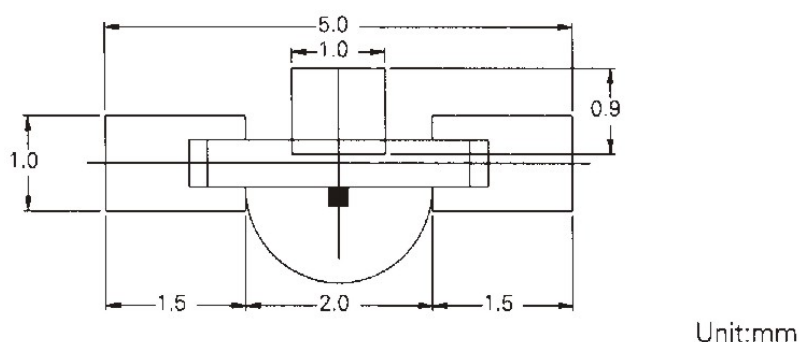
Features

- ◆ High intensity
- ◆ 3.2*1.5*1.0mm(1204,SMD) package
- ◆ Wide viewing angle
- ◆ General purpose leads
- ◆ Reliable and rugged

Package Dimension:



* Polarity referring onto the cathode mark is reversed on the UR/HR/SR



Part NO.	Chip Material	Lens Color	Source Color
LL-S110WC	GaInN	Water Clear	White

Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is $\pm 0.10(0.004)$ unless otherwise specified.
3. Specifications are subject to change without notice
4. Caution in ESD:
Static Electricity and surge damages the LED. It is recommend to use a wrist band or anti-electrostatic glove when handling the LED. All devices, equipment and machinery must be properly grounded.

Absolute Maximum Ratings at Ta=25°C

Parameter	MAX.	Unit
Power Dissipation	100	mW
Peak Forward Current (1/10 Duty Cycle, 0.1ms Pulse Width)	100	mA
Continuous Forward Current	35	mA
Derating Linear From 50°C	0.4	mA/°C
Reverse Voltage	5	V
Operating Temperature Range	-40°C to +80°C	
Storage Temperature Range	-40°C to +80°C	
Lead Soldering Temperature [4mm(.157") From Body]	260°C for 5 Seconds	

Electrical Optical Characteristics at Ta=25°C

Parameter	Symbol	Min.	Typ.	Max.	Unit	Test Condition
Luminous Intensity	I _v	---	120	---	mcd	I _F =20mA (Note 1)
Viewing Angle	2 θ _{1/2}	---	140	---	Deg	Note 2
$x = \frac{X}{X+Y+Z} = \frac{\text{Red}}{\text{Red} + \text{Green} + \text{Blue}}$	x	0.20	0.27	0.34	---	I _F =20mA (Note 3)
$y = \frac{Y}{X+Y+Z} = \frac{\text{Green}}{\text{Red} + \text{Green} + \text{Blue}}$	y	0.20	0.27	0.35	---	I _F =20mA (Note 3)
Forward Voltage	V _F	2.8	3.6	4.0	V	I _F =20mA
Reverse Current	I _R	---	---	100	μA	V _R =5V

Note:

1. Luminous intensity is measured with a light sensor and filter combination that approximates the CIE eye-response curve.
2. θ_{1/2} is the off-axis angle at which the luminous intensity is half the axial luminous intensity.
3. It use many parameters that correspond to the CIE 1931 2°. X,Y, and Z are CIE 1931 2° values of Red, Green and Blue content of the measurement.

Typical Electrical / Optical Characteristics Curves
(25°C Ambient Temperature Unless Otherwise Noted)

