

5mm LEDs

Order code	Manufacturer code	Description
55-1662	n/a	L-7113QBC-D 5MM WATER CLEAR BLUE LED

5mm LEDs	Page 1 of 4
The enclosed information is believed to be correct, Information may change 'without notice' due to product improvement. Users should ensure that the product is suitable for their use. E. & O. E.	Revision A 04/07/2003

L-7113QBC-D BLUE

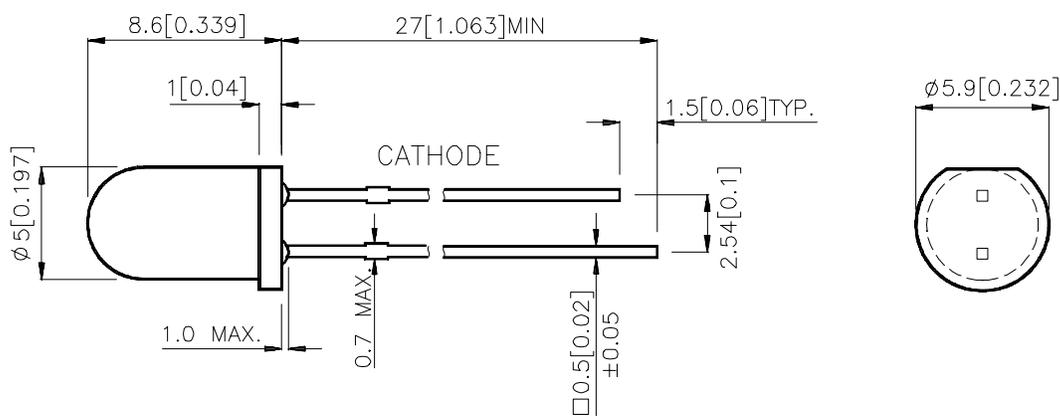
Features

- ULTRA BRIGHTNESS.
- BOTH DIFFUSED AND WATER CLEAR LENS ARE AVAILABLE.
- OUTSTANDING MATERIAL EFFICIENCY.
- RELIABLE AND RUGGED.
- IC COMPATIBLE/LOW CURRENT CAPABILITY.

Description

The Blue source color devices are made with GaN on SapphireLight Emitting Diode.

Package Dimensions



Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is $\pm 0.25 (0.01")$ unless otherwise noted.
3. Lead spacing is measured where the lead emerge package.
4. Specifications are subject to change without notice.

Selection Guide

Part No.	Dice	Lens Type	Iv (mcd) @ 20 mA		Viewing Angle
			Min.	Typ.	2θ1/2
L-7113QBC-D	BLUE (GaN)	WATER CLEAR	1200	2200	15°

Note:

1. θ1/2 is the angle from optical centerline where the luminous intensity is 1/2 the optical centerline value.

Electrical / Optical Characteristics at T_A=25°C

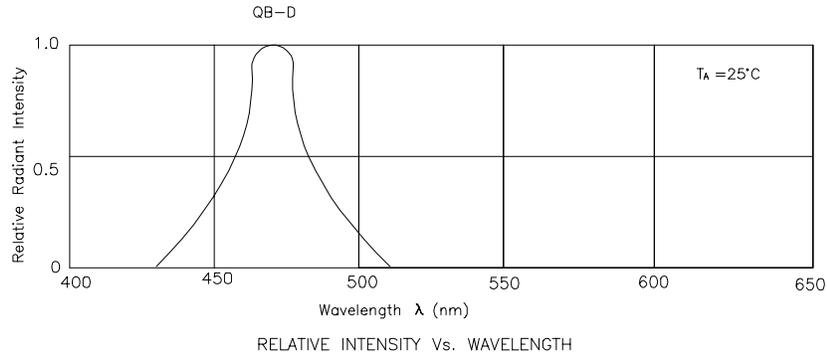
Symbol	Parameter	Device	Typ.	Max.	Units	Test Conditions
λ _{peak}	Peak Wavelength	Blue	468		nm	IF=20mA
λ _D	Dominate Wavelength	Blue	470		nm	IF=20mA
Δλ _{1/2}	Spectral Line Halfwidth	Blue	25		nm	IF=20mA
C	Capacitance	Blue	100		pF	VR=0V;f=1MHz
V _F	Forward Voltage	Blue	3.5	4.0	V	IF=20mA
I _R	Reverse Current	Blue		10	uA	VR = 5V

Absolute Maximum Ratings at T_A=25°C

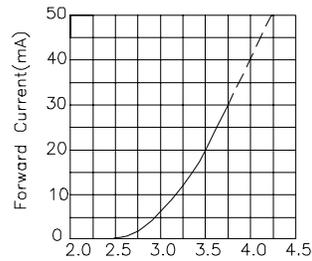
Parameter	Blue	Units
Power dissipation	105	mW
DC Forward Current	30	mA
Peak Forward Current [1]	180	mA
Reverse Voltage	5	V
Operating/Storage Temperature	-40°C To +85°C	
Lead Soldering Temperature [2]	260°C For 5 Seconds	

Notes:

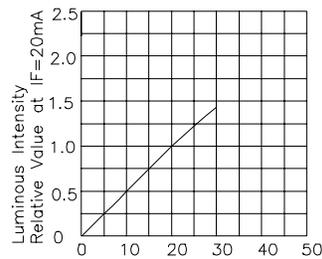
1. 1/10 Duty Cycle, 0.1ms Pulse Width.
2. 4mm below package base.



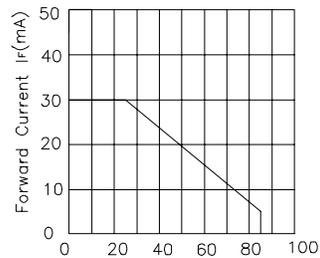
Blue L-7113QBC-D



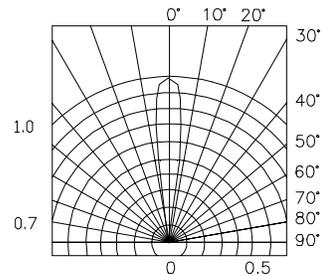
FORWARD CURRENT Vs
FORWARD VOLTAGE



LUMINOUS INTENSITY Vs.
FORWARD CURRENT



FORWARD CURRENT
DERATING CURVE



SPATIAL DISTRIBUTION