

# PRODUCT SPECIFICATION

*Part Number*  
**PL311A-3G13**

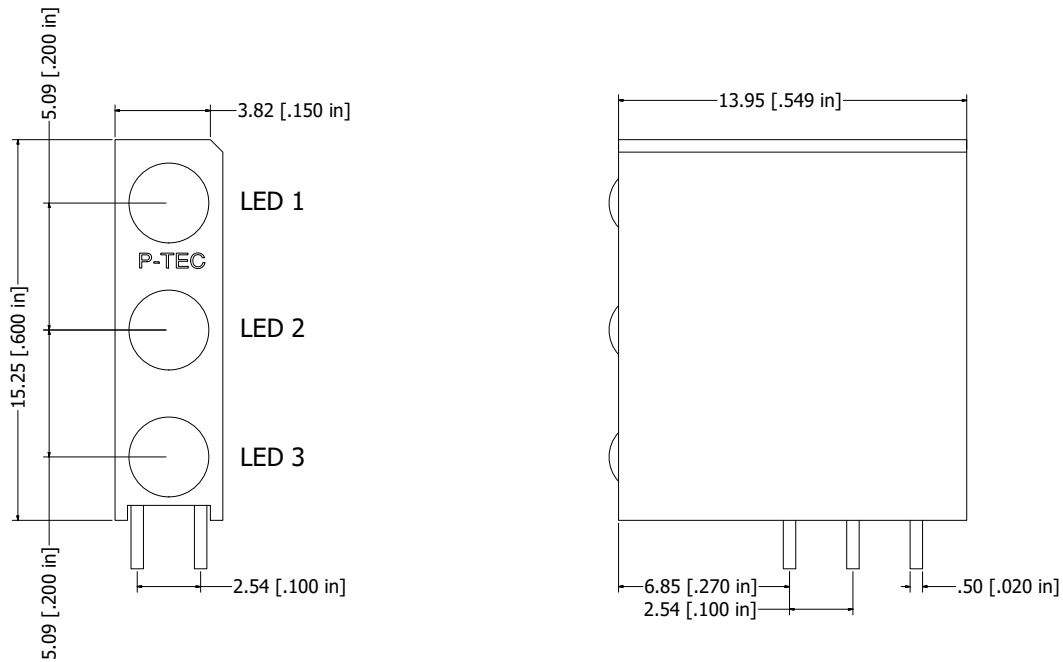
**Details**

- Tri-Level CBI LED
- Green Emitting
- Chip Material: GaP
- Housing Material: Nylon 66 UL94V-2

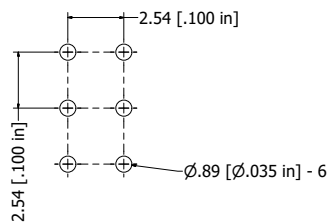
**Features**

- RoHS Compliant
- Space-Saving Circuit Board Indicator
- Rugged and Durable
- LEDs Have Color Diffused Lens

**Mechanical Dimensions**



**Recommended PCB Layout**



**Notes:**

1. All dimensions are in millimeters unless otherwise noted
2. Tolerance is  $\pm 0.25\text{mm}$  unless otherwise noted
3. Specifications subject to change without notice



**Device Selection Guide**

Part Number	Housing Material	Chip		
		Material	Emitting Color	Lens Type
PL311A-3G13	Nylon 66 UL94V-2	GaP	Green	Color Diffused

**LED Absolute Maximum Ratings at Ta=25 °C**

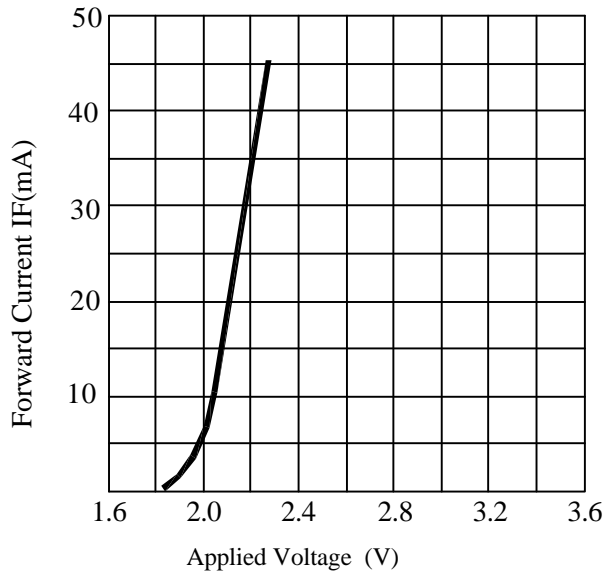
Parameter	Symbol	Rating	Unit
Power Dissipation	PD	78	mW
Reverse Voltage	VR	5	V
DC Forward Current	IF	30	mA
Reverse (Leakage) Current	Ir	100	μA
Peak Current (duty cycle 1/10, 1KHz)	IPF	100	mA
Operating Temperature	Topr	-25~+85	°C
Storage Temperature	Tstg	-40~+100	°C
Soldering Temperature (1.6mm from body)	Tsol.	Dip Soldering : 260°C for 5 sec. Hand Soldering : 350°C for 3 sec.	

**LED Electrical and Optical Characteristics at Ta=25 °C**

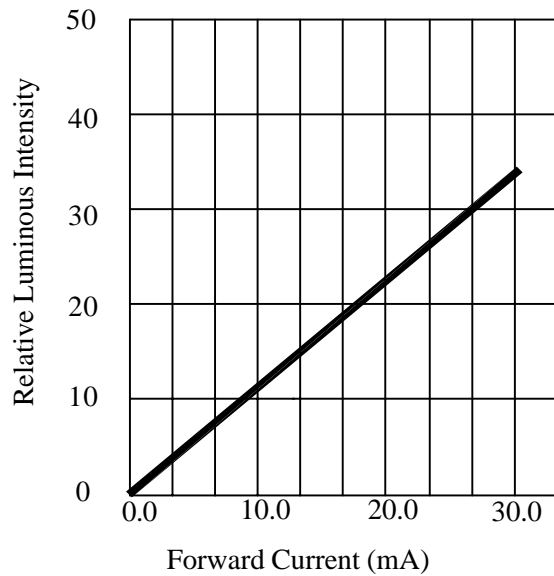
Parameter	Symbol	Min.	Typ.	Max.	Unit	Condition
Luminous Intensity	Iv	10.0	30.0	--	mcd	IF=20mA
Forward Voltage	Vf	--	2.1	2.6	V	
Peak Wavelength	λp	--	567	--	nm	
Dominant Wavelength	λd	--	572	--		
Reverse (Leakage) Current	Ir	--	--	100	μA	Vr=5V
Viewing Angle	2θ1/2	--	54	--	--	deg
Spectrum Line Halfwidth	Δλ	--	30	--	nm	IF=20mA

- Notes: 1. Tolerance of Luminous Intensity is ±15%  
 2. Tolerance of Forward Voltage is ±0.1V  
 3. Tolerance of Dominant Wavelength is ±1nm  
 4. Customer's special requirements are welcomed

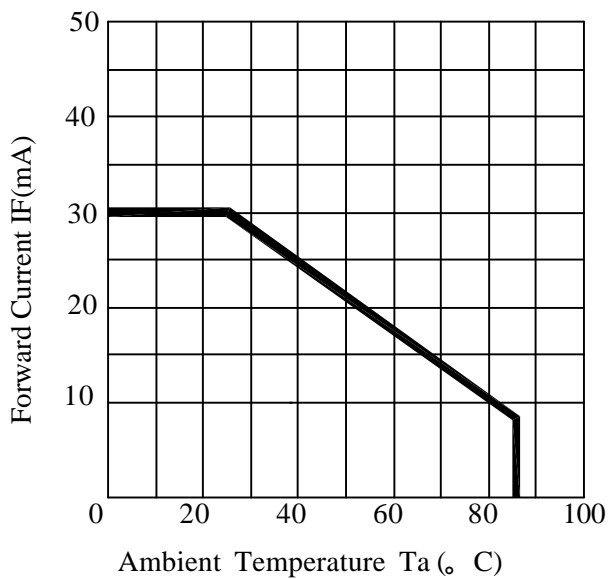
**LED Typical Electrical / Optical Characteristic Curves**



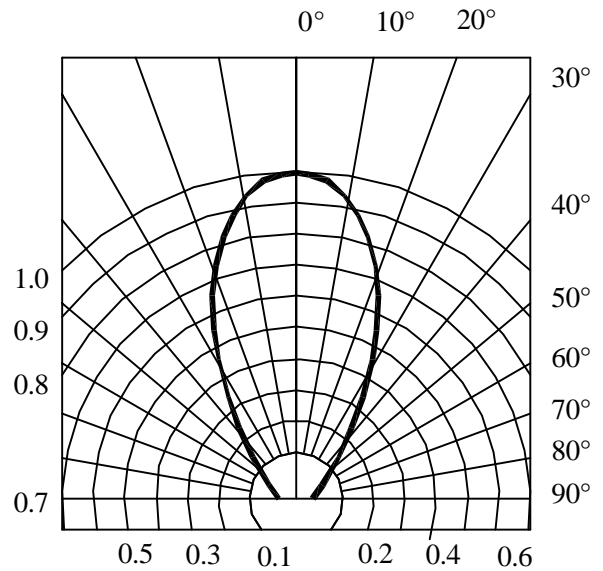
**FORWARD CURRENT VS. APPLIED VOLTAGE**



**FORWARD CURRENT VS. LUMINOUS INTENSITY**



**AMBIENT TEMPERATURE VS. FORWARD CURRENT**



**RADIATION DIAGRAM**

