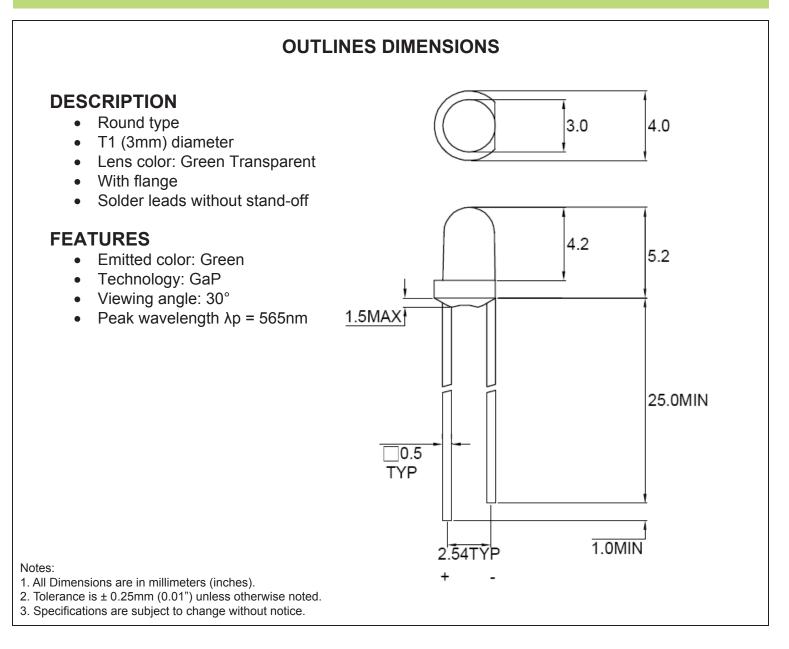


### SPECIFICATIONS



Part Number	Chip Material	Color of Emission	Lens Type	Viewing Angle
CL30G1T	GaP	Green	Green Tinted	30°



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**CL30G1T** 



# ABSOLUTE MAXIMUM RATINGS

			4	
Parameter	Symbol	Max Rating	Unit	
Power Dissipation	Po	50	mW	
Pulse Current Forward Current	IFP	80	mA	
Continuous Forward Current	lf	30	mA	
Reverse Voltage	VR	5	V	
Operating Temperature Range	Topr	-40~+85	°C	
Storage Temperature Range	Tstg	-40~+100	°C	
IFP = Pulse Width $\leq$ 10 ms, Duty Ratio $\leq$ 1/10. Soldering Condition: 260 °C/ 5sec				

# **OPTICAL-ELECTRICAL CHARACTERISTICS**

Devenuetor	Ourseland I	To at O and itian	Value			
Parameter	Symbol	Test Condition	Min	Тур	Max	Unit
Luminous Intensity	lv	l⊧ = 20mA	20	35	-	mcd
Forward Voltage	VF	l⊧ = 20mA	-	2.1	2.6	V
Reverse Leakage Current	lr	V <sub>R</sub> = 5V	-	-	10	μA
Viewing Angle	201/2	l⊧ = 20mA	-	30	-	deg
Dominant Wavelength	λd	l⊧ = 20mA	-	568	-	nm

\*Tolerance of viewing angle: -10 / +5 deg.



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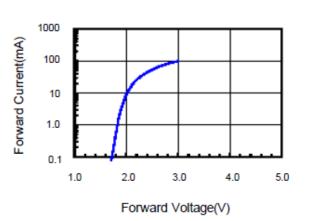


(TA=25°C

# (TA=25°C)

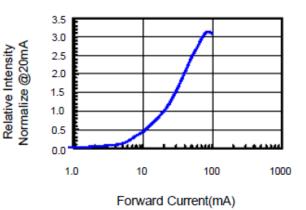


# **OPTICAL CHARACTERISTIC CURVES**



### Fig.1 Forward current vs. Forward Voltage

### Fig.2 Relative Intensity vs. Forward Current



#### Fig.3 Forward Voltage vs. Temperature

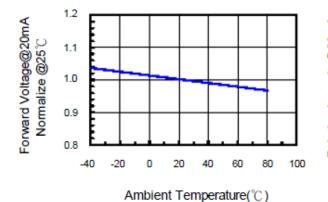
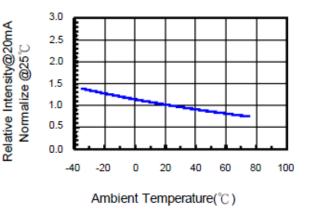
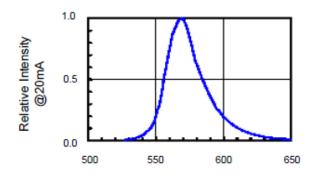


Fig.5 Relative Intensity vs. Wavelength

Fig.4 Relative Intensity vs. Temperature



#### Fig.6 Directive Radiation



RoHS Compliant

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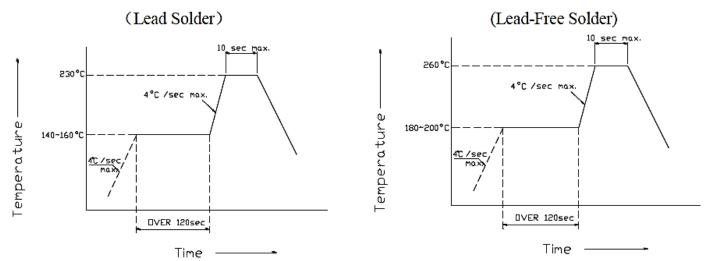


## SOLDERING CONDITIONS – LAMP TYPE LED

1. Soldering Conditions

Number of reflow process shall be less than 2 times and cooling process to normal temperature is required between first and second soldering process.

Reflow Soldering			Hand Soldering		
	Lead Solder	Lead-Free Solder	Temperature	350°C max	
Pre-heat	140~160°C	180~200°C	Soldering Time	3 sec. max. one	
Pre-heat time	120 sec. max	120 sec. max	Soldening Time	time only	
Peak Temp.	230°C max	260°C max			
Soldering Time	10 sec. max	10 sec. max			
Condition	See below	See below			



2. Static Electricity

It is recommended that a wrist band or an anti-electrostatic glove be used when handling LEDs. All devices, equipment and machinery must be properly grounded. Damaged LED will show some unusual characteristics such as the forward voltage becomes lower, or the LEDs do not light at the low current. Criteria:  $V_F > 2.0V @ I_F=0.5mA$ .



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