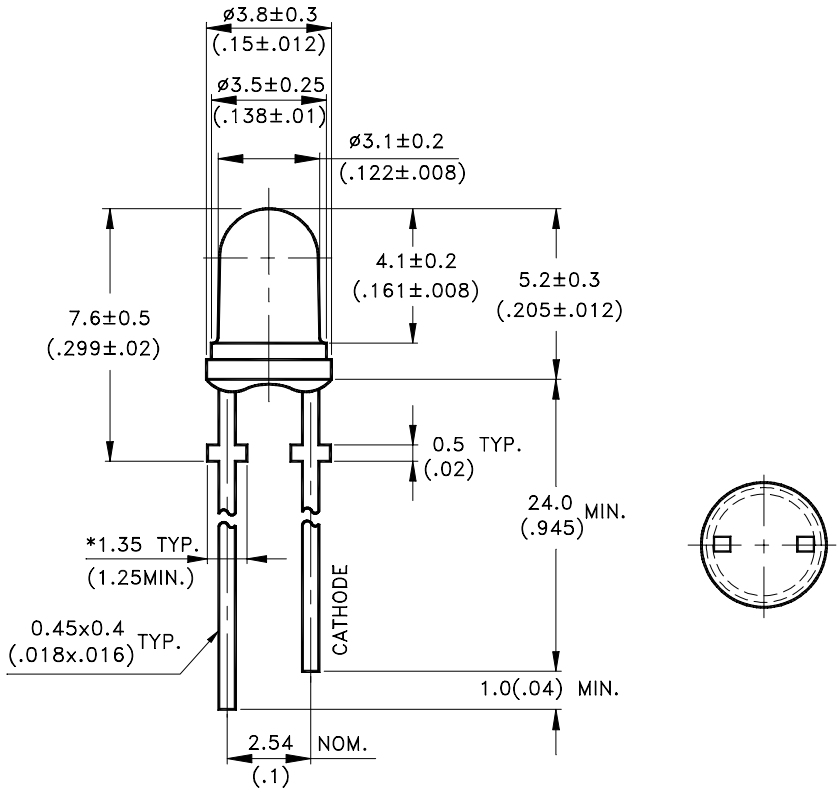
Features

* Low power consumption.
* High efficiency.
* Versatile mounting on P.C. board or panel.
* I.C. compatible/low current requirements.
* 3.1 mm diameter package.

Package Dimensions



Part No.	Lens	Source Color
LTL1CHUBJS-UA	White Diffused	Blue

Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is ±0.25mm(.010") unless otherwise noted.
3. Lead spacing is measured where the leads emerge from the package.
4. Specifications are subject to change without notice.

Absolute Maximum Ratings at T_A=25℃

Parameter	Maximum Rating	Unit
Power Dissipation	135	MW
Peak Forward Current (1/10 Duty Cycle, 0.1ms Pulse Width)	70	MA
Continuous Forward Current	30	MA
Derating Linear From 30℃	0.5	mA/℃
Reverse Voltage	5	V
Electrostatic Discharge Threshold(HBM)[Note A]	1000	V
Operating Temperature Range	-20℃ to + 80℃	
Storage Temperature Range	-30℃ to + 100℃	
Lead Soldering Temperature [1.6mm(.063") From Body]	260℃ for 5 Seconds	

Note A :

HBM : Human Body Model. Seller gives no other assurances regarding the ability of Products to withstand ESD.

Electrical / Optical Characteristics at T_A=25℃

Parameter	Symbol	Min.	Typ.	Max.	Unit	Test Condition
Luminous Intensity	I_V	10	25		mcd	I_F = 20mA Note 1,5
Viewing Angle	$2\theta_{1/2}$		60		deg	Note 2 (Fig.6)
Peak Emission Wavelength	λ_P		428		nm	Measurement @Peak (Fig.1)
Dominant Wavelength	λ_d		466		nm	Note 3
Spectral Line Half-Width	$\Delta\lambda$		65		nm	
Forward Voltage	V_F		3.8	4.5	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. $\theta_{1/2}$ is the off-axis angle at which the luminous intensity is half the axial luminous intensity.
3. The dominant wavelength, λ_d is derived from the CIE chromaticity diagram and represents the single wavelength which defines the color of the device.
4. Iv classification code is marked on each packing bag.
5. The Iv guarantee should be added ±15% tolerance.
6. Precautions in handling:
   - When soldering, leave 2mm of minimum clearance from the resin to the soldering point.
   - Dipping the resin to solder must be avoided.
   - Correcting the soldered position after soldering must be avoided.
   - In soldering, do not apply any stress to the lead frame particularly when heated.
   - When forming a lead, make sure not to apply any stress inside the resin.
   - Lead forming must be done before soldering.
   - It is necessary to cut the lead frame at normal temperature.
7. 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.

Typical Electrical / Optical Characteristics Curves

(25℃ Ambient Temperature Unless Otherwise Noted)

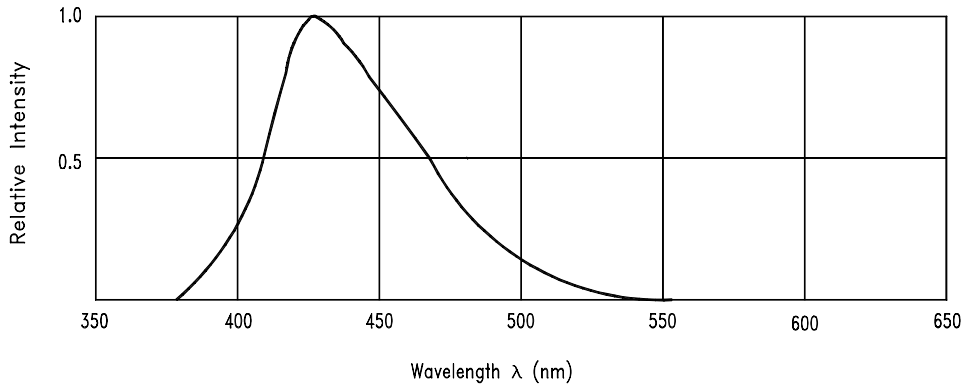


Fig.1 Relative Intensity vs. Wavelength

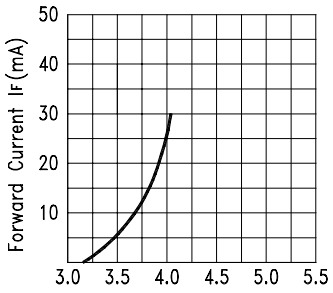


Fig.2 Forward Current vs. Forward Voltage

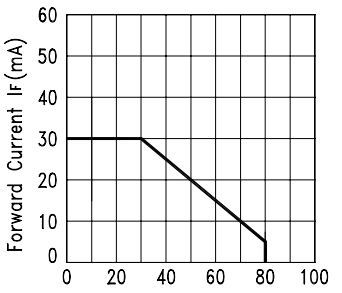


Fig.3 Forward Current Derating Curve

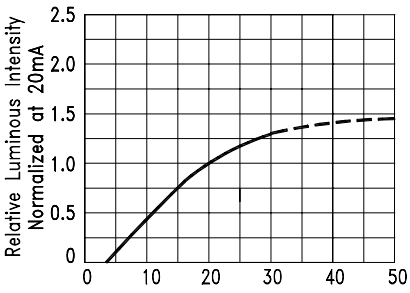


Fig.4 Relative Luminous Intensity vs. Forward Current

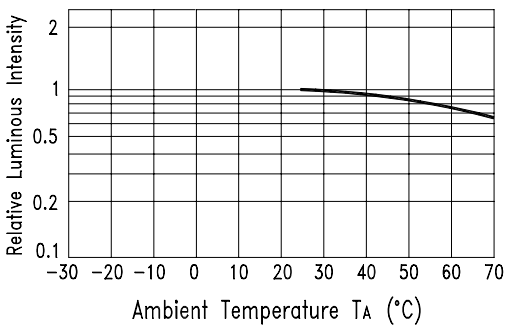


Fig.5 Luminous Intensity vs. Ambient Temperature

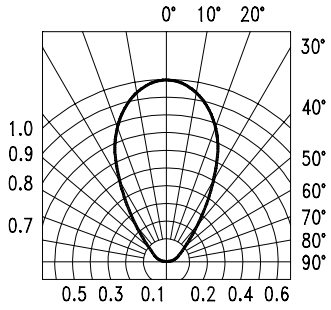
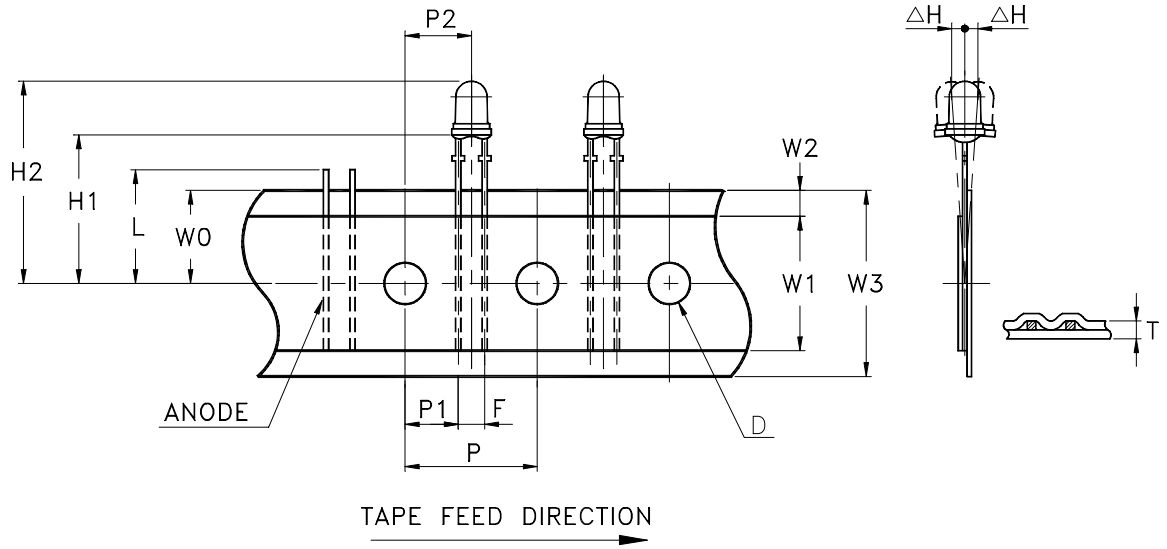


Fig.6 Spatial Distribution

Features

* Compatible with radial lead automatic insertion equipment.
* Most radial lead plastic lead lamps available packaged in tape and folding.
* 2.54mm (0.1") straight lead spacing available.
* Folding packaging simplifies handling and testing.

Package Dimensions



Item	Symbol	Specification			
		Minimum		Maximum	
		mm	inch	mm	Inch
Tape Feed Hole Diameter	D	3.8	0.149	4.2	0.165
Component Lead Pitch	F	2.3	0.091	3.0	0.118
Front to Rear Deflection	△H	--	--	2.0	0.078
Feed Hole to Bottom of Component	H1	21.5	0.846	22.5	0.886
Feed Hole to Overall Component Height	H2	26.4	1.039	28.0	1.102
Lead Length After Component Height	L	W0		11.0	0.433
Feed Hole Pitch	P	12.4	0.488	13.0	0.511
Lead Location	P1	4.4	0.173	5.8	0.228
Center of Component Location	P2	5.05	0.198	7.65	0.301
Total Tape Thickness	T	--	--	0.90	0.035
Feed Hole Location	W0	8.5	0.334	9.75	0.384
Adhesive Tape Width	W1	14.5	0.571	15.5	0.610
Adhesive Tape Position	W2	0	0	3.0	0.118
Tape Width	W3	17.5	0.689	19.0	0.748