

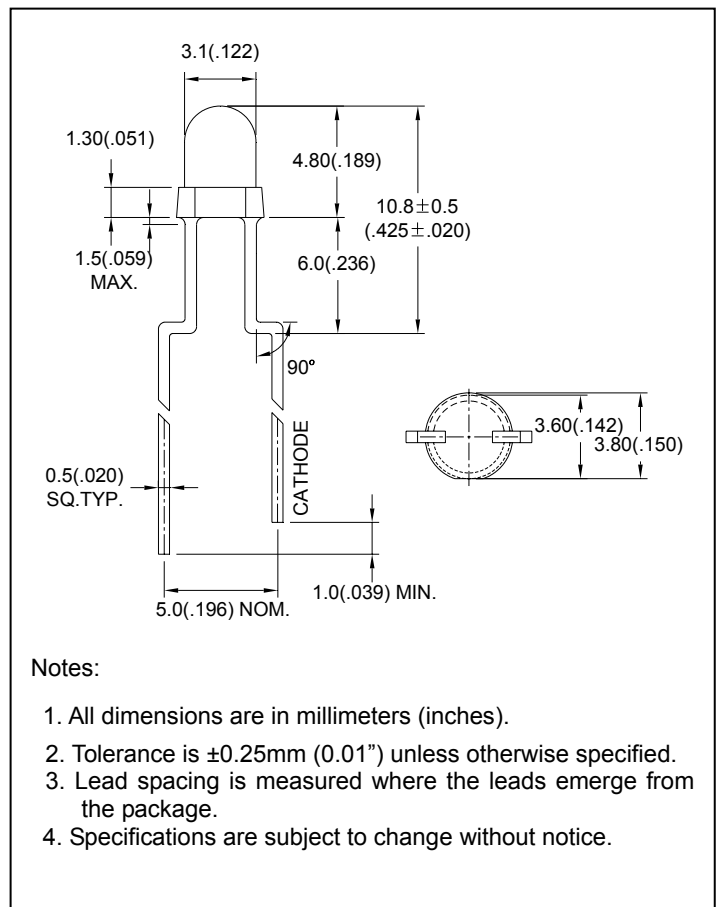
● Features:

1. Chip material: AlGaAs/GaAs
2. Emitted color : Super Red
3. Lens Appearance : Light Red Trans
4. Low power consumption.
5. High efficiency.
6. Versatile mounting on P.C. Board or panel.
7. Low current requirement.
8. 3.1mm diameter package
9. This product don't contained restriction substance, compliance ROHS standard.

● Applications:

1. TV set
2. Monitor
3. Telephone
4. Computer
5. Circuit board

● Package dimensions:



● Absolute Maximum Ratings(Ta=25°C)

| Parameter | Symbol | Rating | Unit |
|------------------------------------|-----------------|-----------------------|------|
| Power Dissipation | Pd | 80 | mW |
| Forward Current | I _F | 30 | mA |
| Peak Forward Current* ¹ | I _{FP} | 150 | mA |
| Reverse Voltage | V _R | 5 | V |
| Operating Temperature | Topr | -40°C~80°C | |
| Storage Temperature | Tstg | -40°C~85°C | |
| Soldering Temperature | Tsol | 260°C (for 5 seconds) | |

*¹Condition for I_{FP} is pulse of 1/10 duty and 0.1msec width.

● Electrical and optical characteristics(Ta=25°C)

| Parameter | Symbol | Condition | Min. | Typ. | Max. | Unit |
|--------------------------|-----------------|-------------------|------|------|------|---------------|
| Forward Voltage | V_F | $I_F=20\text{mA}$ | - | 1.8 | 2.4 | V |
| Luminous Intensity | I_v | $I_F=20\text{mA}$ | - | 80 | - | mcd |
| Reverse Current | I_R | $V_R=5\text{V}$ | - | - | 100 | μA |
| Peak Wave Length | λ_p | $I_F=20\text{mA}$ | - | 660 | - | nm |
| Dominant Wave Length | λ_d | $I_F=20\text{mA}$ | - | 643 | - | nm |
| Spectral Line Half-width | $\Delta\lambda$ | $I_F=20\text{mA}$ | - | 20 | - | nm |
| Viewing Angle | $2\theta_{1/2}$ | $I_F=20\text{mA}$ | - | 35 | - | deg |

● Typical electro-optical characteristics curves

Fig.1 Relative intensity vs. Wavelength

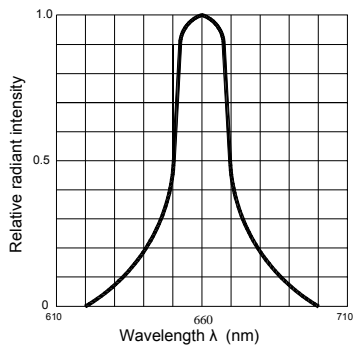


Fig.2 Forward current derating curve vs. Ambient temperature

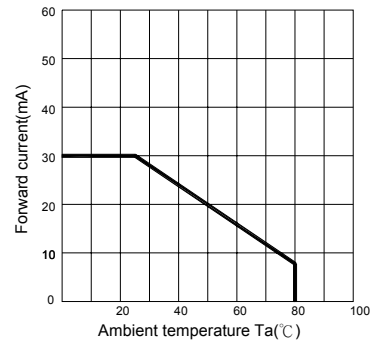


Fig.3 Forward current vs. Forward voltage

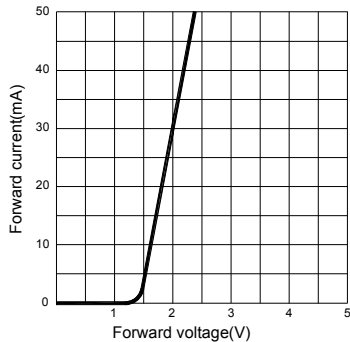


Fig.4 Relative luminous intensity vs. Ambient temperature

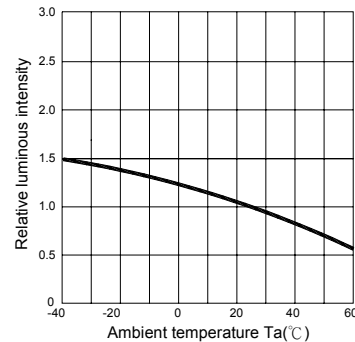


Fig.5 Relative luminous intensity vs. Forward current

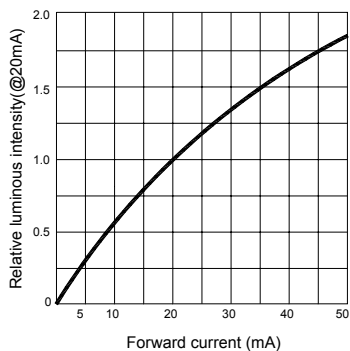
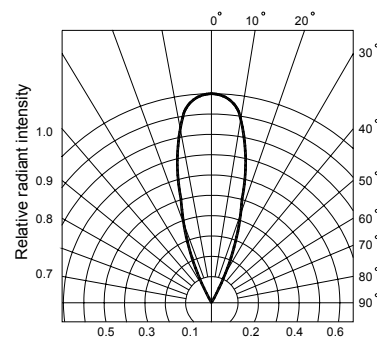
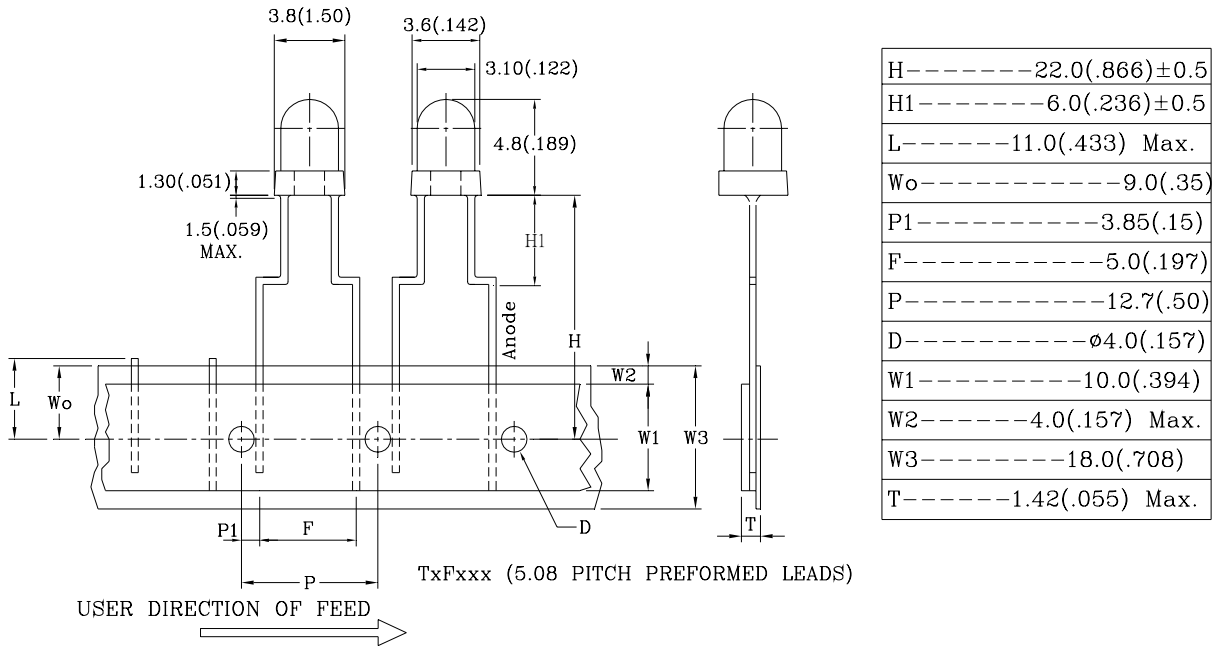


Fig.6 Radiation diagram



● Tapping and packaging specifications(Units: mm)



- Notes: 1.All dimensions are in millimeter (inch).
 2.Tolerance is ±0.25mm (0.01") unless otherwise specified.
 3.Lead spacing is measured where the leads emerge from the package.

● Bin Limits

1. Intensity Bin Limits (At $I_F = 20\text{mA}$)

| Bin Code | Min. (mcd) | Max. (mcd) |
|----------|------------|------------|
| : | : | : |
| M | 24 | 48 |
| N | 37 | 72 |
| P | 55 | 110 |
| Q | 82 | 160 |
| R | 120 | 240 |
| : | : | : |

● Bin : x

