

L934LID HIGH EFFICIENCY RED

L934LGD GREEN

L934LYD YELLOW

L934LSRD SUPER BRIGHT RED

Features

- LOW CURRENT $I_F=2\text{mA}$ OPERATING.
- HIGH LIGHT OUTPUT AT LOW CURRENTS.
- LOW POWER CONSUMPTION.
- LOW CURRENT REQUIREMENTS.
- WIDE VIEWING ANGLE.
- I.C. COMPATIBLE.
- RELIABLE AND RUGGED.

Description

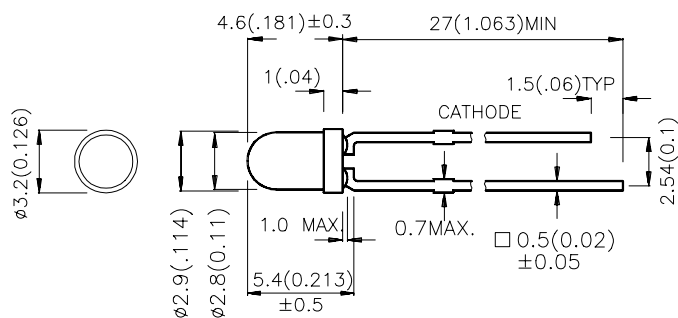
The High Efficiency Red source color devices are made with Gallium Arsenide Phosphide on Gallium Phosphide Orange Light Emitting Diode

The Green source color devices are made with Gallium Phosphide Green Light Emitting Diode..

The Yellow source color devices are made with Gallium Arsenide Phosphide on Gallium Phosphide Yellow Light Emitting Diode.

The Super Bright Red source color devices are made with Gallium Aluminum Arsenide Red Light 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) @ 2 mA | | Viewing Angle |
|----------|---------------------------------|-----------------|--------------------|------|------------------|
| | | | Min. | Typ. | 2 θ 1/2 |
| L934LID | HIGH EFFICIENCY RED (GaAsP/GaP) | RED DIFFUSED | 0.8 | 3 | 60° |
| L934LGD | GREEN (GaP) | GREEN DIFFUSED | 0.8 | 2 | 60° |
| L934LYD | YELLOW (GaAsP/GaP) | YELLOW DIFFUSED | 0.8 | 2 | 60° |
| L934LSRD | SUPER BRIGHT RED (GaAlAs) | RED DIFFUSED | 8 | 20 | 60° |

Note:

1. θ 1/2 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

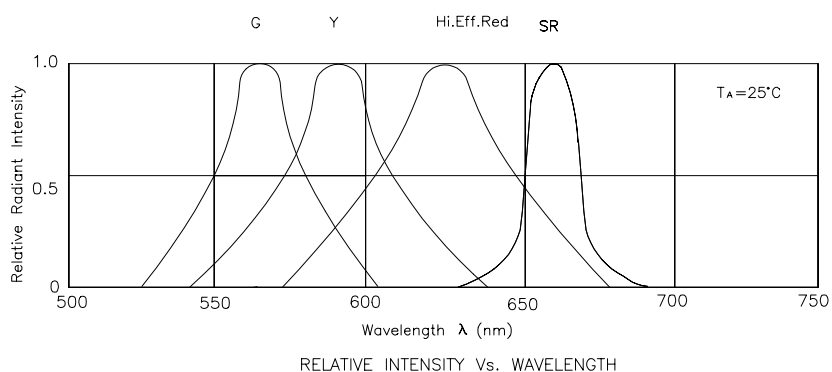
| Symbol | Parameter | Device | Typ. | Max. | Units | Test Conditions |
|-----------------------|-------------------------|--|----------------------------|--------------------------|-------|-----------------|
| λ_{peak} | Peak Wavelength | High Efficiency Red Green Yellow Super Bright Red | 625 565 590 660 | | nm | IF=2mA |
| λ_D | Dominate Wavelength | High Efficiency Red Green Yellow Super Bright Red | 627 568 588 640 | | nm | IF=2mA |
| $\Delta\lambda_{1/2}$ | Spectral Line Halfwidth | High Efficiency Red Green Yellow Super Bright Red | 45 30 35 20 | | nm | IF=2mA |
| C | Capacitance | High Efficiency Red Green Yellow Super Bright Red | 15 15 20 45 | | pF | VF=0V;f=1MHz |
| V _F | Forward Voltage | High Efficiency Red Green Yellow Super Bright Red | 1.75 1.9 1.8 1.65 | 2.5 2.5 2.1 2.5 | V | IF=2mA |
| I _R | Reverse Current | All | | 10 | uA | VR = 5V |

Absolute Maximum Ratings at $T_A=25^{\circ}\text{C}$

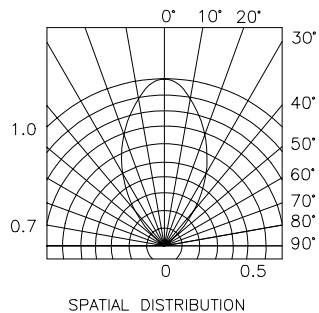
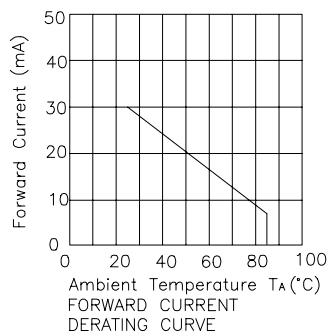
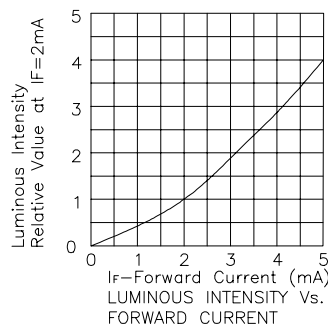
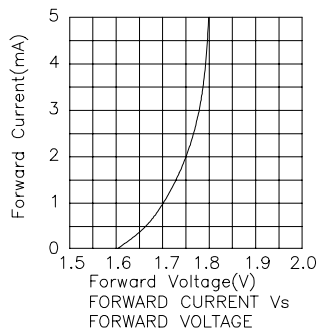
| Parameter | High Efficiency Red | Green | Yellow | Super Bright Red | Units |
|-------------------------------|---------------------|-------|--------|------------------|-------|
| Power dissipation | 105 | 105 | 100 | 100 | mW |
| DC Forward Current | 30 | 25 | 30 | 30 | mA |
| Peak Forward Current [1] | 160 | 140 | 70 | 155 | mA |
| Reverse Voltage | 5 | 5 | 5 | 5 | V |
| Operation/Storage Temperature | -40°C To +85°C | | | | |
| Lead Solder Temperature [2] | 260°C For 5 Seconds | | | | |

Notes:

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

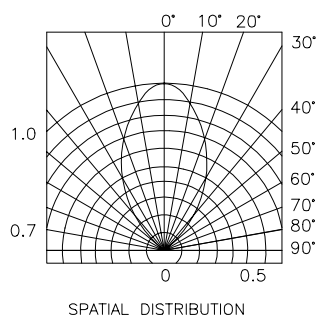
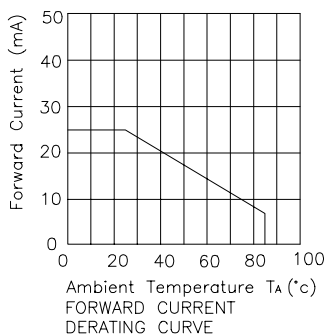
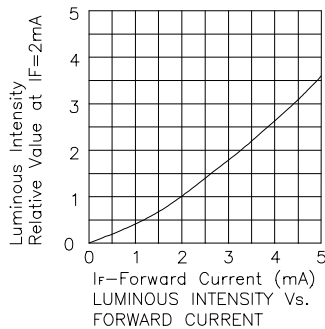
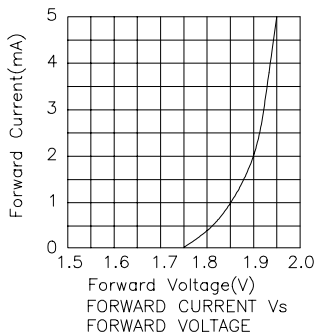


High Efficiency Red L934LID

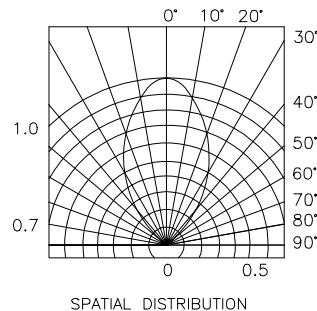
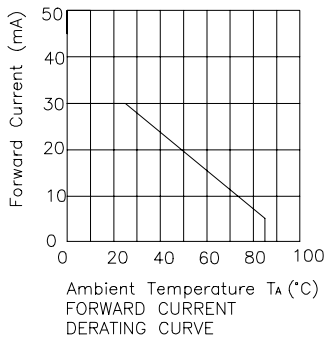
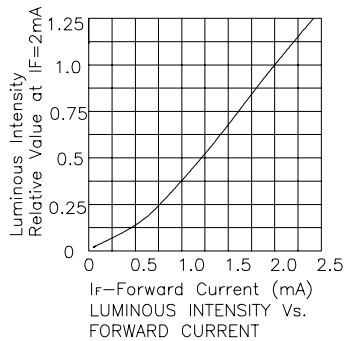
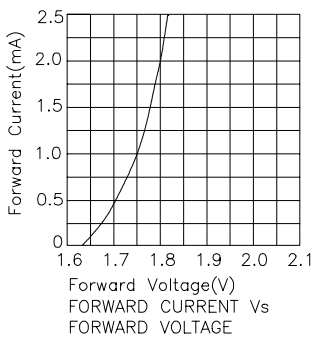


Kingbright

Green L934LGD



Yellow L934LYD



Kingbright

Super Bright Red L934LSRD

