

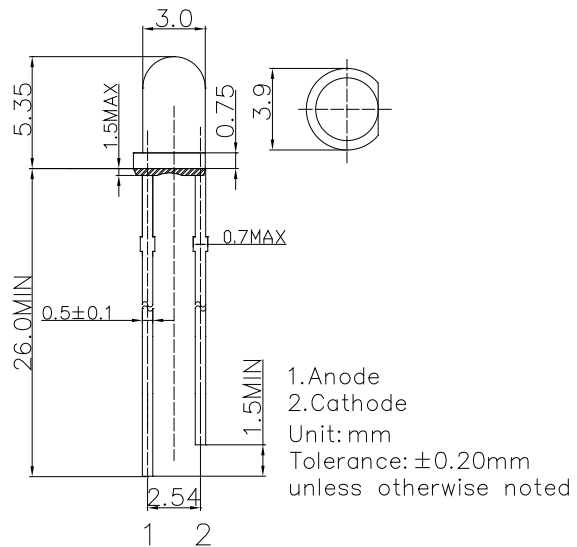
## ■Features

- High Radiant Power LEDs
- 3mm Round Standard Directivity
- UV Resistant Epoxy
- Water Clear Type

## ■Applications

- IrDA
- Encoder
- Data Communication
- IR camera

## ■Outline Dimension



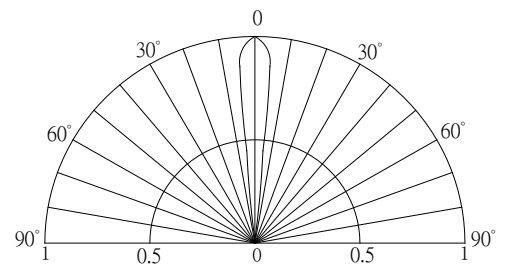
## ■Absolute Maximum Rating

(Ta=25°C)

| Item                       | Symbol    | Value      | Unit |
|----------------------------|-----------|------------|------|
| DC Forward Current         | $I_F$     | 100        | mA   |
| Pulse Forward Current#     | $I_{FP}$  | 1000       | mA   |
| Reverse Voltage            | $V_R$     | 5          | V    |
| Power Dissipation          | $P_D$     | 160        | mW   |
| Operating Temperature      | $T_{opr}$ | -30 ~ +85  | °C   |
| Storage Temperature        | $T_{stg}$ | -40 ~ +100 | °C   |
| Lead Soldering Temperature | $T_{sol}$ | 260°C/5sec | -    |

# Pulse Width  $\leq 100\mu\text{s}$ , Duty  $\leq 1/100$

## ■Directivity



## ■Electrical -Optical Characteristics

(Ta=25°C)

| Item                 | Symbol          | Condition         | Min. | Typ. | Max. | Unit          |
|----------------------|-----------------|-------------------|------|------|------|---------------|
| DC Forward Voltage*1 | $V_F$           | $I_F=50\text{mA}$ | -    | 1.35 | 1.6  | V             |
| DC Reverse Current   | $I_R$           | $V_R=5\text{V}$   | -    | -    | 10   | $\mu\text{A}$ |
| Peak Wavelength*2    | $\lambda_p$     | $I_F=50\text{mA}$ | -    | 940  | -    | nm            |
| Radiant Power*3      | $\Phi_e$        | $I_F=50\text{mA}$ | -    | 9    | -    | mW            |
| Radiant Intensity*4  | $I_e$           | $I_F=50\text{mA}$ | 25   | 40   | -    | mW/Sr         |
| 50% Power Angle      | $2\theta_{1/2}$ | $I_F=50\text{mA}$ | -    | 15   | -    | deg           |

\*1 Tolerance of measurements of forward voltage is  $\pm 0.1\text{V}$

\*2 Tolerance of measurements of peak wavelength is  $\pm 1\text{nm}$

\*3 Tolerance of measurements of Radiant Power is  $\pm 15\%$

\*4 Tolerance of measurements of Radiant Intensity is  $\pm 15\%$

**LED & Application Technologies**

