

### Peak Emission Wavelength: 1300nm

The 1300nm IR emitter series is designed for applications requiring precise optical / mechanical axis alignment and IR radiation in the SWIR range. Custom package solutions and sorting are available.

**FEATURES**

- > Metal Can Package
- > Narrow Beam Angle
- > High Reliability

**APPLICATIONS**

- > Bio Medical Applications
- > Optical Sensors
- > Optical Communications



### Absolute Maximum Ratings (Ta=25°C)

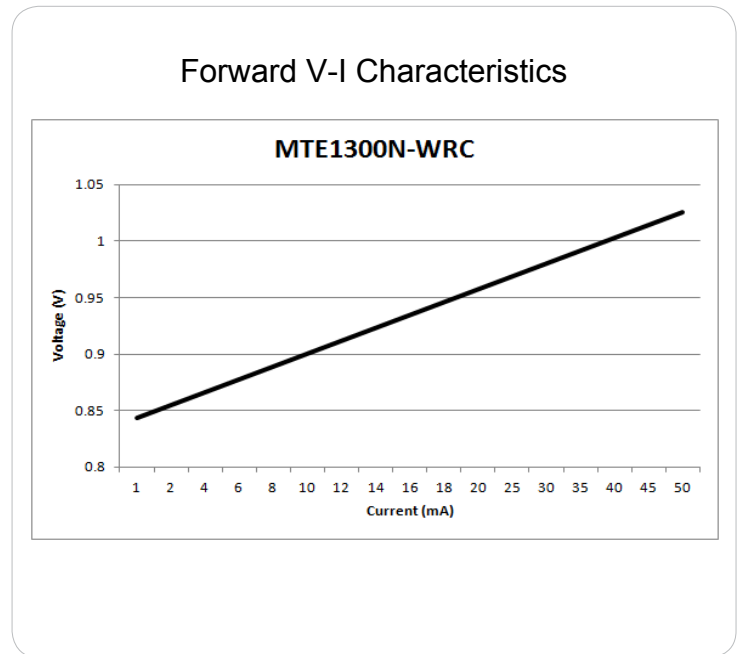
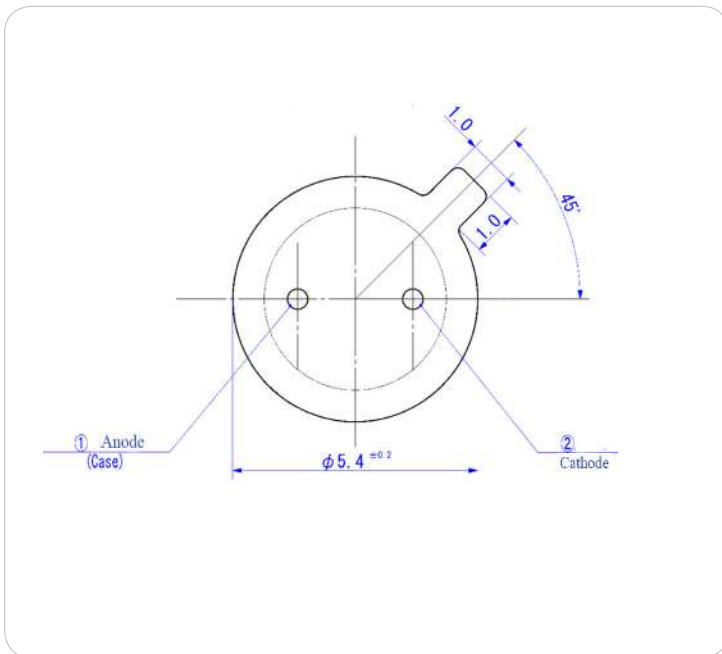
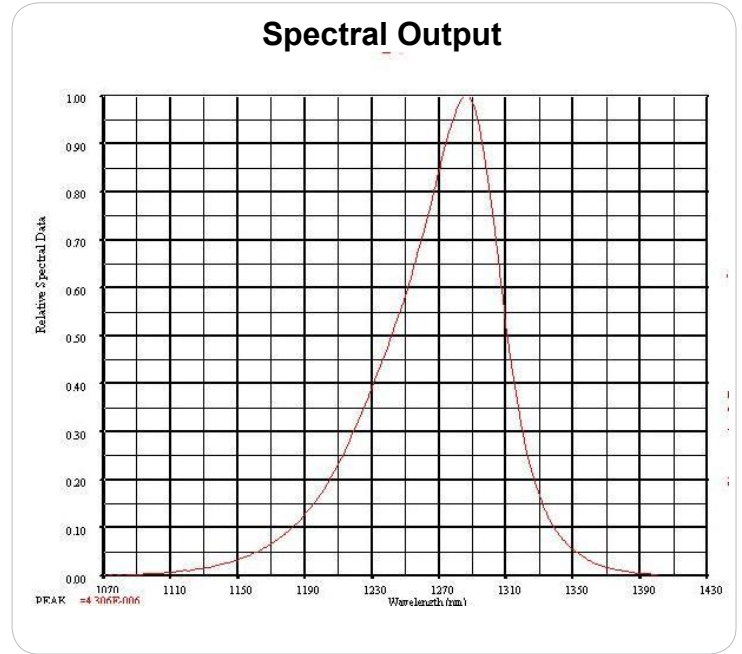
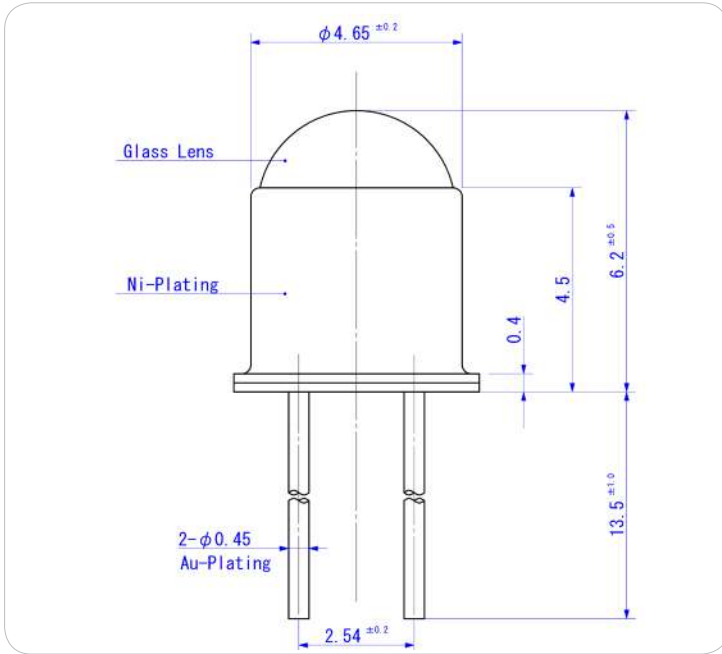


| ITEMS                        | SYMBOL | RATINGS    | UNIT |
|------------------------------|--------|------------|------|
| Forward Current (DC)         | IF     | 100        | mA   |
| Forward Current (Pulse)*1    | IFP    | 1          | A    |
| Reverse Voltage              | VR     | 5          | V    |
| Power Dissipation            | PD     | 100        | mW   |
| Operating Temperature Range  | Topr   | -25 ~ +85  | °C   |
| Storage Temperature Range    | Tstg   | -30 ~ +100 | °C   |
| Lead Soldering Temperature*2 | Tls    | 260        | °C   |

\*1: Tw=10μsec, T=10msec; \*2: Time 5 Sec max, Position: Up to 3mm from the body.

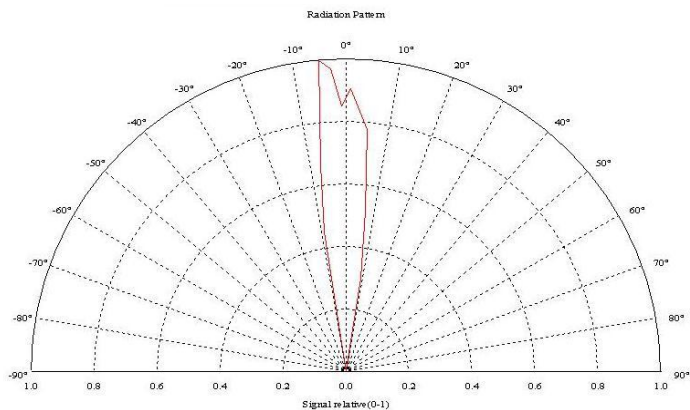
### Electrical & Optical Characteristics (Ta = 25°C)

| ITEMS                     | SYMBOL | CONDITIONS | MIN | TYP  | MAX | UNIT |
|---------------------------|--------|------------|-----|------|-----|------|
| Power Output              | PO     | IF=20mA    | --  | 2.8  | --  | mW   |
| Forward Voltage           | VF     | IF=20mA    | --  | 0.96 | --  | V    |
| Reverse Current           | IR     | VR=5V      | --  | --   | 100 | μA   |
| Peak Emission Wavelength  | λp     | IF=20mA    | --  | 1300 | --  | nm   |
| Spectral Line Half Width  | Δλ     | IF=20mA    | --  | 69   | --  | nm   |
| Half Intensity Beam Angle | Θ      | IF=20mA    | --  | 16   | --  | deg  |



Unit: mm, Tolerance: ±0.2

**RADIATION PATTERN**



**Radiation Distribution**

