

**DESCRIPTION**

This is a 1050 nm Infrared 1206 package surface mount LED optimized for applications requiring a small, Infrared LED.

**FEATURES**

- 1050 nm Infrared emission
- 0.3 mw typical Output Power
- 60 Degree Half angle of light emission
- Low cost 1206 surface mount package

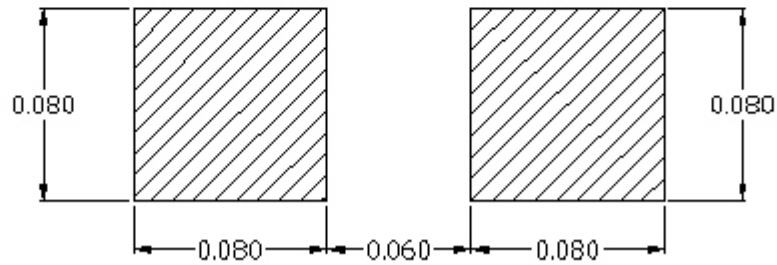
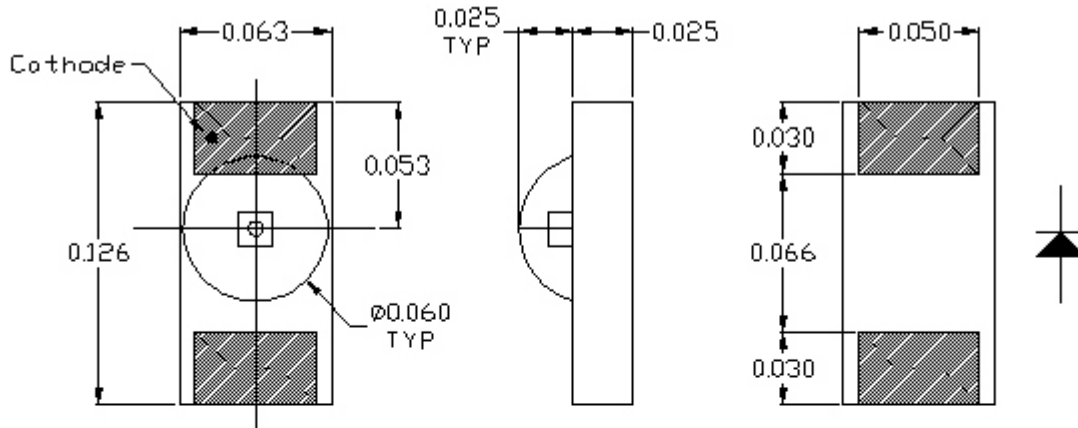
**ABSOLUTE MAXIMUM RATINGS**

- Storage temperature..... -550°C to +100°C
- Case operating temperature .... -40°C to +85°C
- Lead solder temperature..... 260°C, 10 seconds
- Continuous forward current..... 100 mA
- Reverse Voltage..... 3 Volts

| PARAMETER                | TEST CONDITION                      | SYMBOL          | MIN  | TYP      | MAX  | UNIT         |
|--------------------------|-------------------------------------|-----------------|------|----------|------|--------------|
| Forward Voltage          | If = 100 mA                         | $V_f$           |      | 1.2      | 2.0  | Volts        |
| Reverse Voltage          | I <sub>r</sub> = 10 μA              | $V_r$           | 3.0  |          |      | Volts        |
| Half Angle at Half Power |                                     | $\theta_{1/2}$  |      | 60       |      | DEG          |
| Capacitance              | $V_r = 0 V, f = 1 MHz$              | C               |      | 70       |      | pF           |
| Total Optical Power      | If = 100 mA                         | $P_{out}$       | 0.1  | 0.3      |      | mW           |
| Peak Wavelength          | If = 100 mA                         | $\lambda_p$     | 1020 | 1050     | 1080 | nm           |
| Spectral Bandwidth       | If = 100 mA                         | $\Delta\lambda$ |      | 145      |      | nm           |
| Electrical Bandwidth     | If = 100 mA                         | BWE             |      | 85       |      | MHz          |
| Response Time            | 10%-90%, 1 V Prebias<br>If = 100 mA | $t_r$<br>$t_f$  |      | 20<br>20 |      | nsec<br>nsec |

ELECTRO-OPTICAL CHARACTERISTICS (Case T = 25°C)

**OUTLINE DIMENSIONS**



Tolerances are +/-0.005 inches, except as noted

**Pinout**

- 1. Cathode
- 2. Anode