3mm (T1) Package Discrete LED COOL WHITE



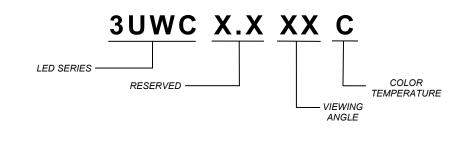
3UWC1.030C

- Industry Standard 3mm (T1) Package
- RoHS Compliant
- Water Clear Lens
- 6500K Color Temperature
- Multiple Intensity and Viewing Angle Options
- Available in Flange and Standard LED Body styles
- Ideal for Backlighting, Status Indication, and Display

Bivar's 3mm T1 Package 3UWC Series LED may be used in almost any application. They are offered in 6500K color temperature and come in multiple intensity, viewing angle, and body styles. Bivar offers a water clear LED lens for maximum light output. The Standard LED is ideal for vertical spacer and holder assemblies.

Part Number	Material	Emitted Color	Color Temperature	Lens Appearance	Viewing Angle		
3UWC1.030C	InGaN/Sapphire	WHITE	6500K	Water Clear	30°		

Part Number Designation



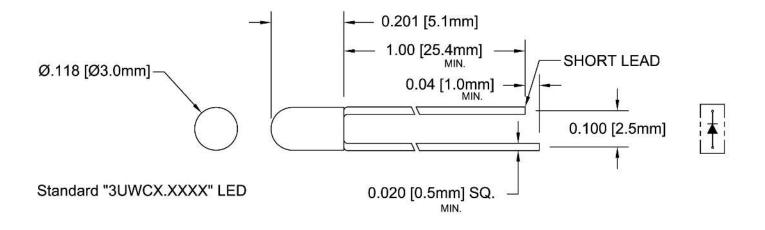


Bivar reserves the right to make changes at any time without notice.



~~~~~

## **Outline Dimensions**



| Recommended Mounting                   |  |
|----------------------------------------|--|
| Hole Size = Ø.032 <sup>+.003</sup> 002 |  |

**Outline Drawings Notes:** 

- All dimensions are in inches [millimeters].
  Standard tolerance: ±0.010" unless otherwise noted.
  S. Tolerance of overall epoxy outline: ±0.020" unless otherwise noted.
  Epoxy meniscus may extend to 0.060" max.



# **Absolute Maximum Ratings**

 $T_A = 25^{\circ}C$  unless otherwise noted

| Power Dissipation                                                                | 120 mW      |
|----------------------------------------------------------------------------------|-------------|
| Forward Current ( DC )                                                           | 30 mA       |
| Peak Forward Current <sup>1</sup>                                                | 100mA       |
| Reverse Voltage                                                                  | 5 V         |
| Operating Temperature Range                                                      | -25 ~ +80°C |
| Storage Temperature Range                                                        | -30 ~ +80°C |
| Lead Soldering Temperature ( 3 mm from the base of the epoxy bulb ) <sup>2</sup> | 260°C       |

Notes: 1. 10% Duty Cycle, Pulse Width  $\leq$  0.1 msec. 2. Solder time less than 5 seconds at temperature extreme.

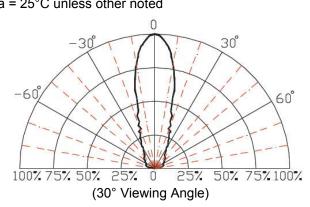
# **Electrical / Optical Characteristics**

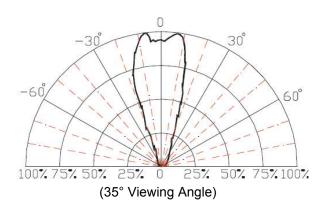
 $T_A = 25^{\circ}C \& I_F = 20 \text{ mA}$  unless otherwise noted

| Part Number | Forward<br>Voltage (V) <sup>1</sup> |     |     | Recommend<br>Forward<br>Current (mA) |     | Reverse<br>Current<br>(µA) | CCT (Kelvin) |     | Luminous<br>Intensity Iv (mcd) |     |      | Viewing<br>Angle<br>2 O ½<br>(deg) |      |     |
|-------------|-------------------------------------|-----|-----|--------------------------------------|-----|----------------------------|--------------|-----|--------------------------------|-----|------|------------------------------------|------|-----|
|             | MIN                                 | TYP | MAX | MIN                                  | ΤΥΡ | MAX                        | MAX          | MIN | ТҮР                            | MAX | MIN  | ΤΥΡ                                | MAX  | ТҮР |
| 3UWC1.030C  | 2.7                                 | 3.2 | 3.6 | /                                    | 20  | /                          | 10           | /   | 6500                           | /   | 3000 | 5000                               | 8000 | 30  |

Notes: 1. Tolerance of forward voltage : ±0.05V.

# **Directivity Radiation** — Relative Luminous Intensity vs. Radiation Angle Ta = 25°C unless other noted





Bivar reserves the right to make changes at any time without notice.



CARACARA ARACARA \*\*\*\*\*\*\*\*\*\*\*\*\*

# **Typical Electrical / Optical Characteristics**

 $T_A = 25^{\circ}C$  unless otherwise noted

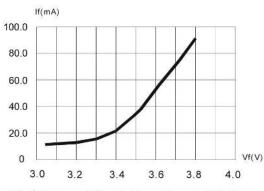


Fig.1 Forward Current vs. Forward Voltage

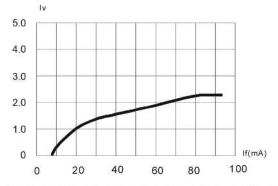


Fig.2 Relative Luminous Intensity vs. Forward Current

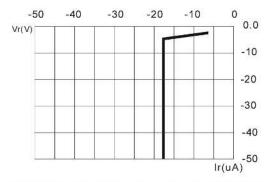


Fig.3 Reverse Current vs. Reverse Voltage

IV

2.0

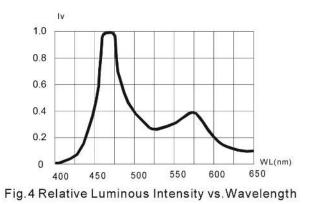
1.0

0.5

0.2

0.1

-30 -20



lf(mA) 50 40 30 20 10 0 40 20 100 0 60 80 Fig.6 Maximum Forward Current vs.Ambient Temperature

Ta(°C)

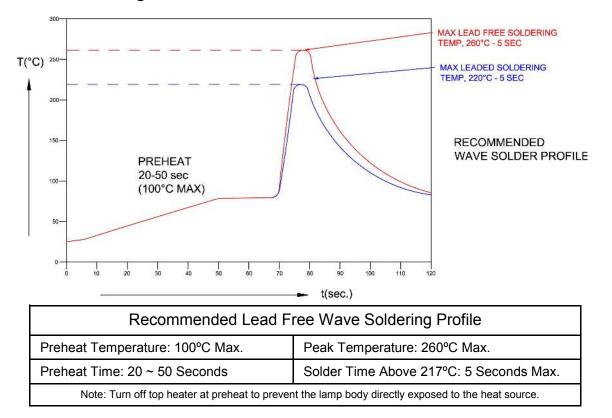
vs.Ambient Temperature

-10 10 20 30 40 50 60 70 Fig.5 Relative Luminous Intensity Ta(°C)

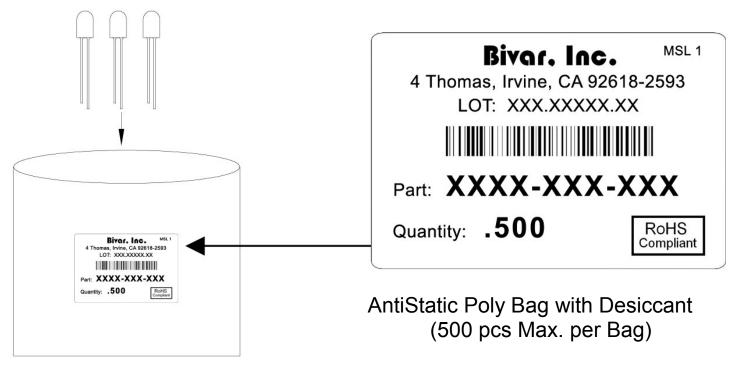


#### 

### **Recommended Soldering Conditions**



### Packaging and Labeling Plan



Bivar reserves the right to make changes at any time without notice.