

Part Number: TA12-41SYKWB

Super Bright Yellow

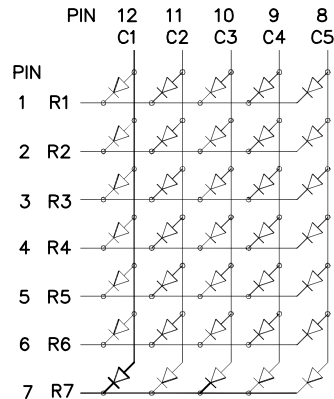
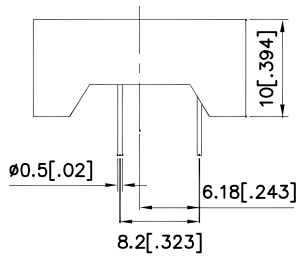
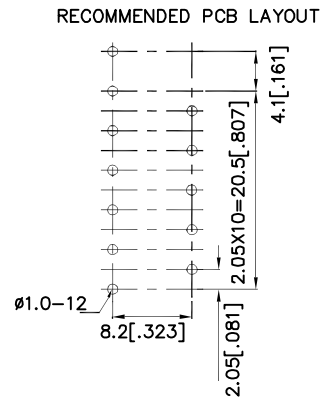
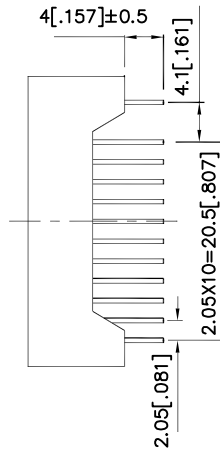
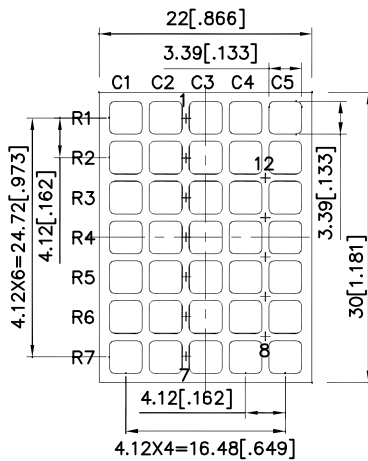
Features

- 1.107 inch matrix height.
- Low current operation.
- High contrast and light output.
- Easy mounting on P.C. boards or sockets.
- Categorized for luminous intensity.
- Mechanically rugged.
- RoHS compliant.

Description

The Super Bright Yellow device is made with AlGaInP (on GaAs substrate) light emitting diode chip.

Package Dimensions & Internal Circuit Diagram



Notes:

1. All dimensions are in millimeters (inches), Tolerance is ±0.25(0.01") unless otherwise noted.
2. The specifications, characteristics and technical data described in the datasheet are subject to change without prior notice.

Selection Guide

| Part No. | Dice | Lens Type | Iv (ucd) [1] @ 10mA | | Description |
|--------------|-------------------------------|----------------|------------------------|--------|--------------|
| | | | Min. | Typ. | |
| TA12-41SYKWB | Super Bright Yellow (AlGaInP) | White Diffused | 88000 | 240000 | Column Anode |

Note:

1. Luminous intensity/ luminous Flux: +/-15%.

Electrical / Optical Characteristics at TA=25°C

| Symbol | Parameter | Device | Typ. | Max. | Units | Test Conditions |
|-----------------------|--------------------------|---------------------|------|------|-------|---------------------------|
| λ_{peak} | Peak Wavelength | Super Bright Yellow | 590 | | nm | I _F =20mA |
| λ_D [1] | Dominant Wavelength | Super Bright Yellow | 590 | | nm | I _F =20mA |
| $\Delta\lambda_{1/2}$ | Spectral Line Half-width | Super Bright Yellow | 20 | | nm | I _F =20mA |
| C | Capacitance | Super Bright Yellow | 20 | | pF | V _F =0V;f=1MHz |
| V _F [2] | Forward Voltage | Super Bright Yellow | 2.0 | 2.5 | V | I _F =20mA |
| I _R | Reverse Current | Super Bright Yellow | | 10 | uA | V _R =5V |

Notes:

1.Wavelength: +/-1nm.
2. Forward Voltage: +/-0.1V.

Absolute Maximum Ratings at TA=25°C

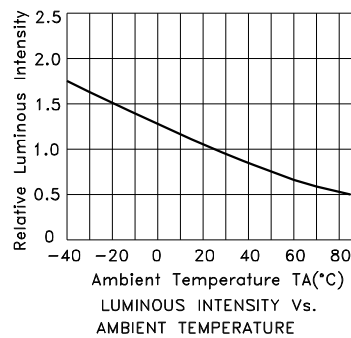
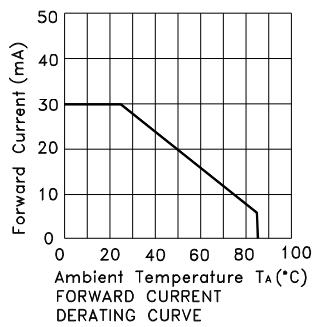
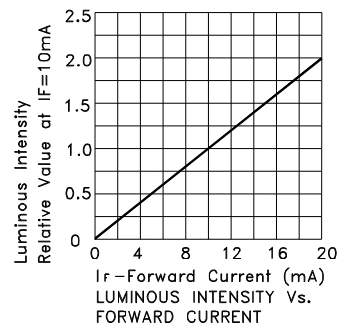
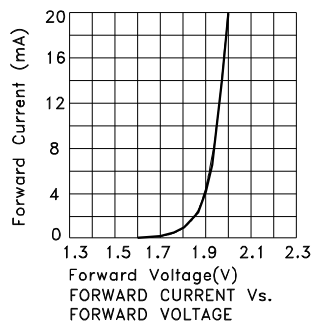
| Parameter | Super Bright Yellow | Units |
|---------------------------------|-----------------------|-------|
| Power dissipation | 75 | mW |
| DC Forward Current | 30 | mA |
| Peak Forward Current [1] | 175 | mA |
| Reverse Voltage | 5 | V |
| Operating / Storage Temperature | -40°C To +85°C | |
| Lead Solder Temperature[2] | 260°C For 3-5 Seconds | |

Notes:

1. 1/10 Duty Cycle, 0.1ms Pulse Width.
2. 2mm below package base.



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PACKING & LABEL SPECIFICATIONS

TA12-41SYKWB

