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# 13.8mm (0.54 INCH) 14 SEGMENT DUAL DIGIT ALPHANUMERIC DISPLAY

Part Number: PDC54-12SRWA SUPER BRIGHT RED

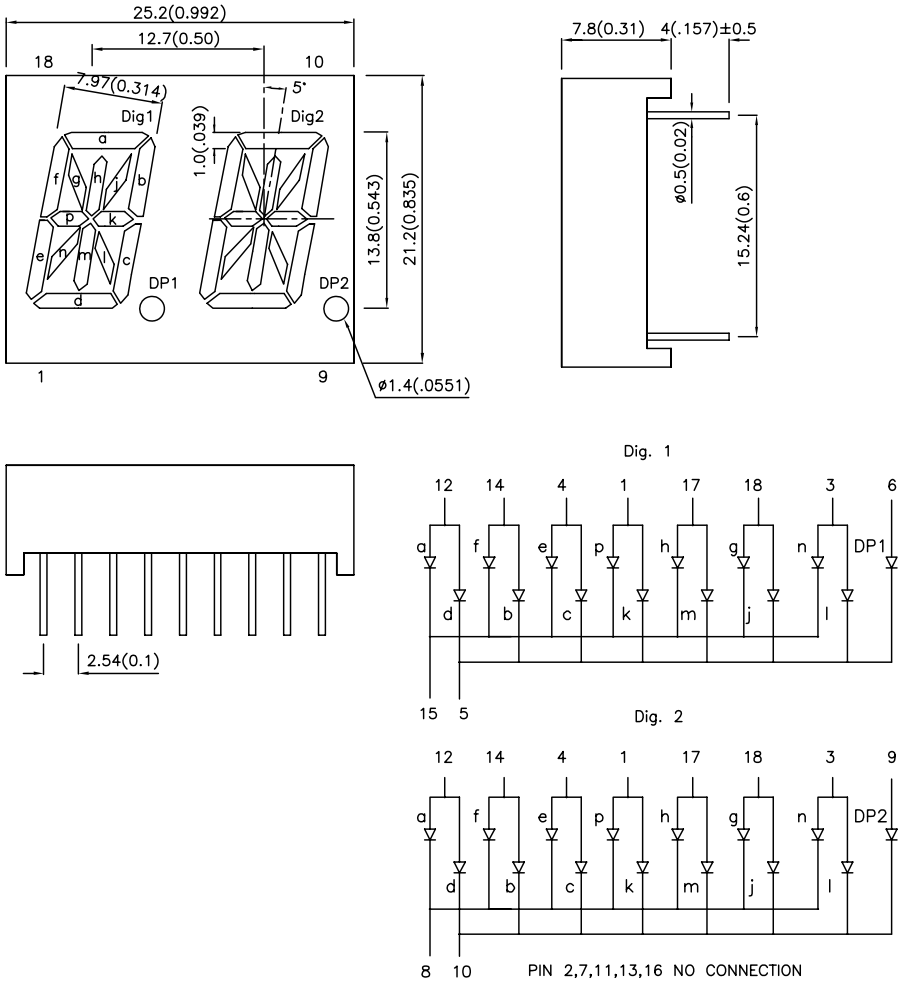
## Features

- 0.54 INCH CHARACTER HEIGHT.
- LOW CURRENT OPERATION.
- HIGH CONTRAST AND LIGHT OUTPUT.
- EASY MOUNTING ON P.C. BOARDS OR SOCKETS.
- CATEGORIZED FOR LUMINOUS INTENSITY.
- MECHANICALLY RUGGED.
- STANDARD: GRAY FACE, WHITE SEGMENT.
- RoHS COMPLIANT.

## Description

The Super Bright Red source color devices are made with Gallium Aluminum Arsenide Red Light Emitting Diode.

## Package Dimensions & Internal Circuit Diagram




Notes:
1. All dimensions are in millimeters (inches), Tolerance is ±0.25(0.01")unless otherwise noted.
2. Specifications are subject to change without notice.

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## Selection Guide

| Part No. | Dice | Lens Type | Iv (ucd) [1] @ 10mA | | Description |
|---|---|---|---|---|---|
| | | | Min. | Typ. | |
| PDC54-12SRWA | SUPER BRIGHT RED (GaAlAs) | WHITE DIFFUSED | 4700 | 18000 | Common Cathode, Rt. Hand Decimal. |

Note:
1. Luminous Intensity/ Luminous Flux: +/-15%.

## Electrical / Optical Characteristics at $T_A$=25°C

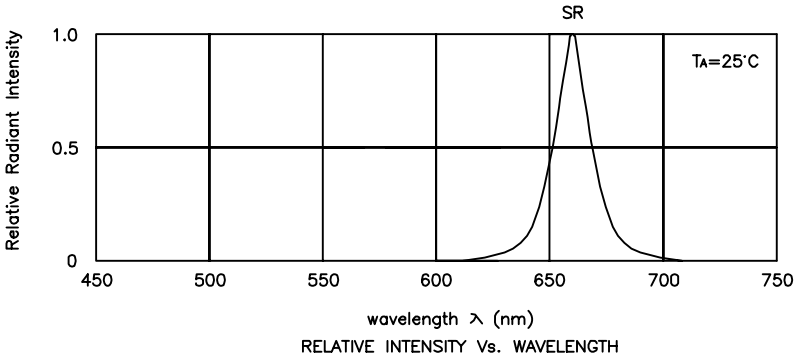
| Symbol | Parameter | Device | Typ. | Max. | Units | Test Conditions |
|---|---|---|---|---|---|---|
| $\lambda$peak | Peak Wavelength | Super Bright Red | 660 | | nm | $I_F$=20mA |
| $\lambda$D [1] | Dominant Wavelength | Super Bright Red | 640 | | nm | $I_F$=20mA |
| $\Delta\lambda$1/2 | Spectral Line Half-width | Super Bright Red | 20 | | nm | $I_F$=20mA |
| C | Capacitance | Super Bright Red | 45 | | pF | $V_F$=0V;f=1MHz |
| $V_F$ [2] | Forward Voltage Per Segment or DP | Super Bright Red | 1.85 | 2.5 | V | $I_F$=20mA |
| $I_R$ | Reverse Current Per Segment or DP | Super Bright Red | | 10 | uA | $V_R$ = 5V |

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

## Absolute Maximum Ratings at $T_A$=25°C

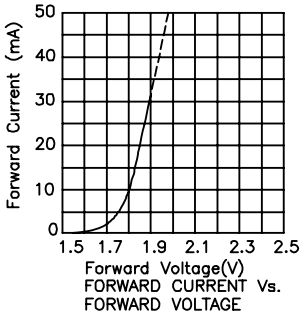
| Parameter | Super Bright Red | Units |
|---|---|---|
| Power dissipation Per Segment or DP | 100 | mW |
| DC Forward Current Per Segment or DP | 30 | mA |
| Peak Forward Current [1] Per Segment or DP | 155 | mA |
| Reverse Voltage Per Segment or DP | 5 | V |
| Operating / Storage Temperature | -40°C To +85°C | |
| Lead Solder Temperature [2] | 260°C For 3 Seconds | |

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

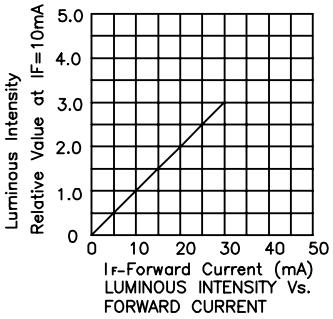


RELATIVE INTENSITY Vs. WAVELENGTH

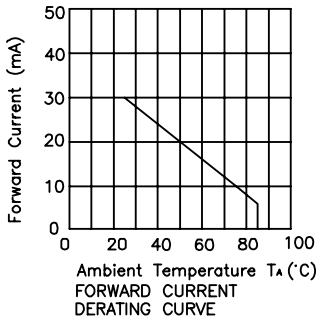
**Super Bright Red** **PDC54-12SRWA**



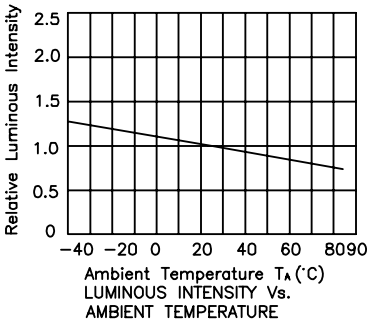
FORWARD CURRENT Vs.
FORWARD VOLTAGE



LUMINOUS INTENSITY Vs.
FORWARD CURRENT



FORWARD CURRENT
DERATING CURVE



LUMINOUS INTENSITY Vs.
AMBIENT TEMPERATURE

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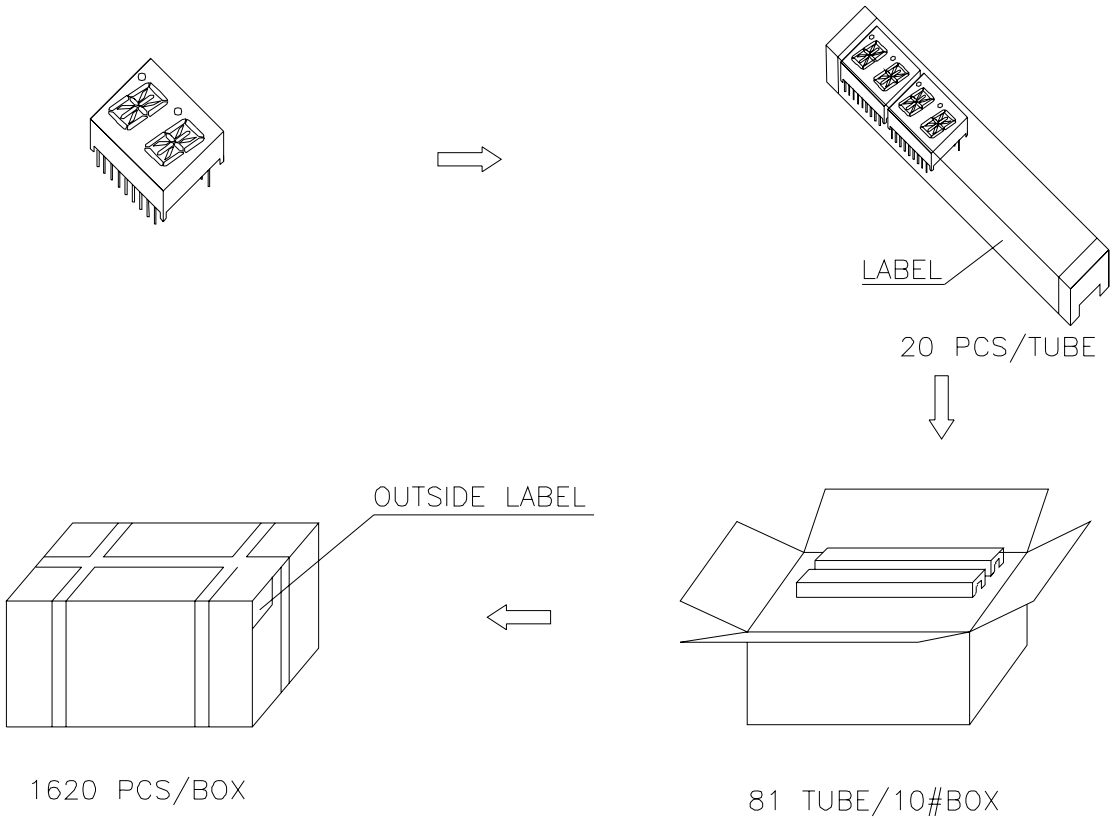
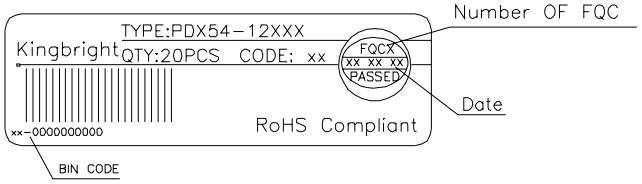
**PACKING & LABEL SPECIFICATIONS** **PDC54-12SRWA**




Inside LABEL Paste On The IC-tube




Outside LABEL Paste On The Box