

2mm x 5mm Rectangular LED CBI® Circuit Board Indicator

Dialight

566-xx07

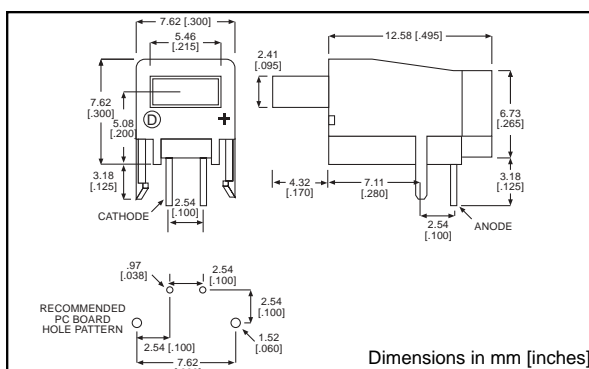


FIGURE A

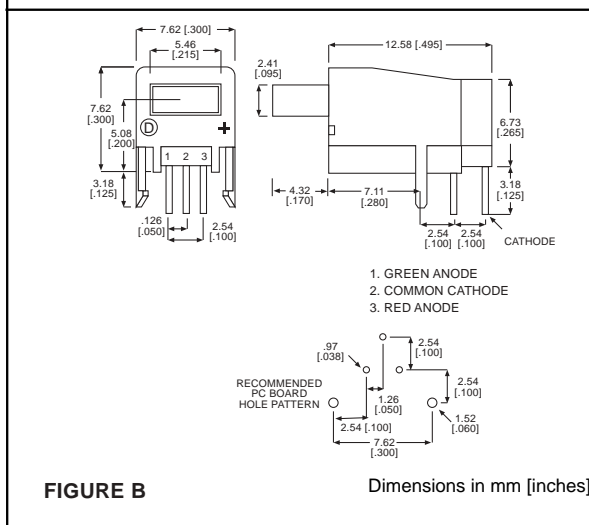


FIGURE B

PART NO.	COLOR	FIG.
566-0207	Green	A
566-0307	Yellow	A
566-0407	Red	A
BI-COLOR		
566-3507	Red/Green	B

Features

- Multiple CBIs form horizontal LED arrays on 10.16mm (0.400") center-lines.
- Available common cathode (3 leaded) multi-color option simplifies circuit designs
- High Contrast, UL 94 V-0 rated, black housing
- Oxygen index: 32%
- Polymer content: PBT, 0.532 g
- Housing stand-offs facilitate PCB cleaning
- Solderability per MIL-STD-202F, method 208F
- LEDs are safe for direct viewing per IEC 825-1, EN-60825-1

Tolerance note: As noted, otherwise:

- LED Protrusion: ± 0.04 mm [± 0.016]
- CBI Housing: ± 0.02 mm [± 0.008]

Typical Operating Characteristics ($T_A = 25^\circ\text{C}$)

See LED data sheet for additional information

See Page 5-20 and 5-21 for Reference Only LED Drive Circuit Example

See Page 5-22 for Pin Out

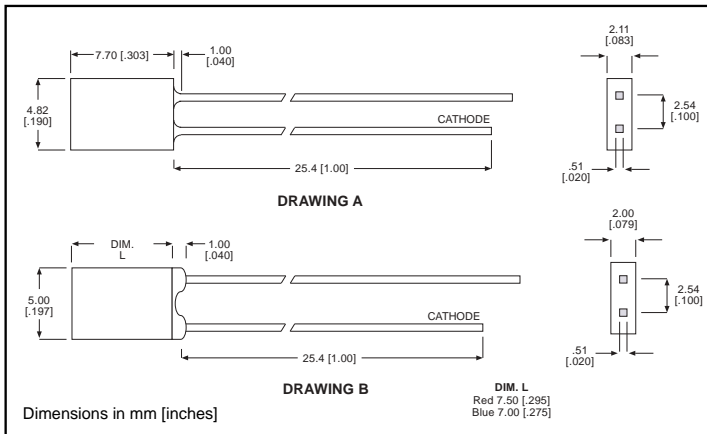
Part Number	Color	Peak Wavelength nm	I_V mcd	V_F Volts	Test Current (mA)	Viewing Angle $2\theta_{1/2}$	LED Data sheet	Page #
566-0207	Green	565	4	2.2	20	110°	521-9332	5-16
566-0307	Yellow	583	3.5	2.1	20	110°	521-9452	5-16
566-0407	Red	635	7.4	2	20	140°	521-9499	5-16
566-3507	Red/Green	635/565	3.5*/4*	1.9/2.1	10	100°	521-9406	5-17

* $I_F = 20\text{mA}$

2mm x 5mm Discrete LED
Rectangular
Tinted, Diffused

Dialight

521-9332, -9452, -9499, -9718



PART NO.	COLOR	DRAWING
521-9332	Green	A
521-9452	Yellow	A
521-9499	Red	B
521-9718	Blue	B

ABSOLUTE MAXIMUM RATINGS ($T_A=25^\circ\text{C}$)	Green -9332	Yellow -9452	Red -9499	Blue -9718
Power Dissipation (mW)	135	85	100	189
Forward Current (mA)	30	20	30	30
Derating (mA/°C) From 50°C 1. mW/°C From 25°C	.5	.34	.4	.45 ¹
Peak Current (mA) Pulse width = 1 ms *Pulse width = 10 μs	500*	500*	120	180
Operating Temperature (°C)	-20/+100	-55/+100	-55/+100	-25/+75
Storage Temperature (°C)	-55/+100	-55/+100	-55/+100	-25/+100
Soldering Temperature	260°C, 5 seconds, 1.6 mm from case			

Solder Adherence per MIL-STD-202E, Method 208C

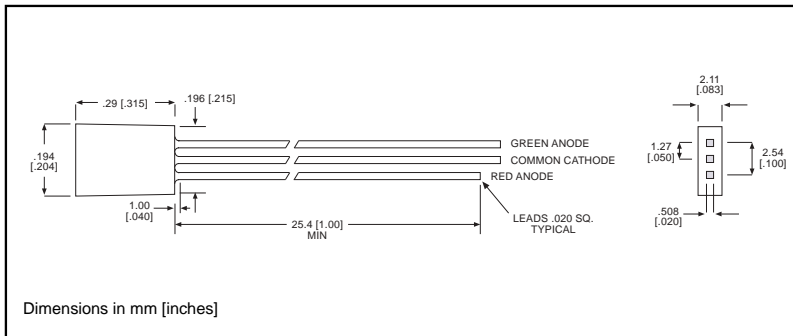
OPERATING CHARACTERISTICS ($T_A=25^\circ\text{C}$)		Green -9332	Yellow -9452	Red -9499	Blue -9718
Luminous Intensity (mcd)	Min.	2.6	2.2	3	9
	Typical	4	3.5	7.4	18
Peak Wavelength (nm)	Typical	565	583	635	430
λ_{Peak}					
Viewing Angle ($2\theta_{\frac{1}{2}}$)	Typical	110°	110°	140°	120°
Forward Voltage (V)	Typical	2.2	2.1	2	5.3
	Max.	3	2.6	2.8	6
Reverse Voltage (V), $I_R=100\mu\text{A}$	Min.	5	5	5	5

¹ $\theta_{\frac{1}{2}}$ is the off axis angle at which the luminous intensity is half the axial luminous intensity

**2mm x 5mm Discrete LED
Bi-Color LED, Common Cathode
Non-Tinted, Diffused**

Dialight

521-9406



PART NO.

521-9406

COLOR

Red/Green

ABSOLUTE MAXIMUM RATINGS ($T_A=25^\circ\text{C}$)

Red/Green

-9406

Power Dissipation (mW)	135/135
Derating (mW/ $^\circ\text{C}$) From 25 $^\circ\text{C}$	1.8/1.8
Forward Current (mA)	25/25
Peak Current (mA) Pulse width = 10 μs	90/90
Operating Temperature ($^\circ\text{C}$)	-20/+85
Storage Temperature ($^\circ\text{C}$)	-55/+100
Soldering Temperature	260 $^\circ\text{C}$, 5 seconds, 1.6 mm from case

Solder Adherence per MIL-STD-202E, Method 208C

OPERATING CHARACTERISTICS ($T_A=25^\circ\text{C}$)

Red/Green

-9406

Luminous Intensity (mcd) $I_F=20\text{mA}$	Min. Typical	2.1/2.6 3.5/4
Peak Wavelength (nm) λ Peak	Typical	635/565
Viewing Angle (2θ)	Typical	100 $^\circ$
Forward Voltage (V) $I_F=10\text{mA}$	Typical Max.	1.9/2.1 2.4/2.7

θ is the off axis angle at which the luminous intensity is half the axial luminous intensity

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