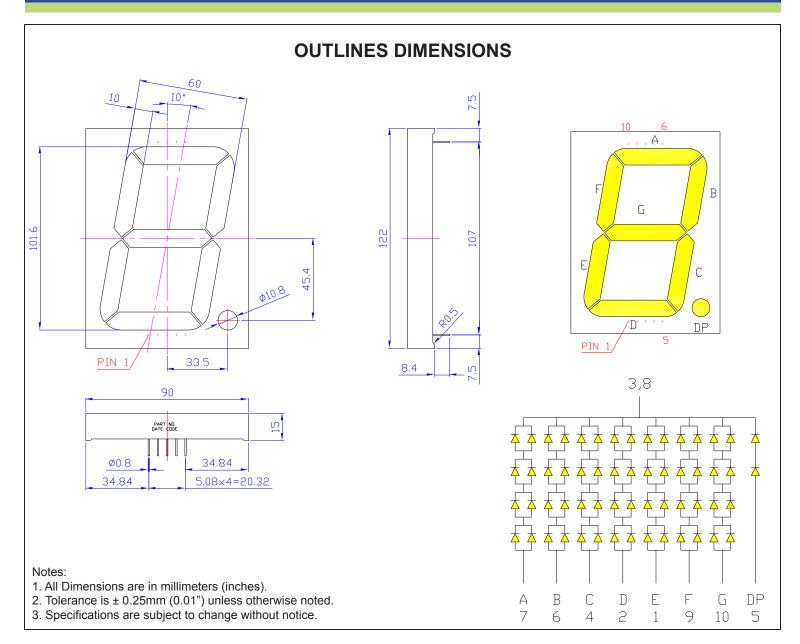


SPECIFICATIONS CDSC400Y2W



Part Number	Chip Material	Color of Emission	Lens Type	Description
CDSC400Y2W	InGaAlP	Yellow	White Segment	Common Cathode



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ABSOLUTE MAXIMUM RATINGS

(TA=25°C)

Parameter	Symbol	Max Rating	Unit
Power Dissipation	Po	70	mW
Pulse Forward Current	IFP	90	mA
Continuous Forward Current	lF	20	mA
Reverse Voltage	VR	5	V
Operating Temperature Range	Topr	-25~+85	°C
Storage Temperature Range	Тѕтс	-25~+85	°C
I _{FP} = Pulse Width ≤ 10 ms, Duty Ratio ≤1/10. Soldering Condition: 260 °C/ 5se			

OPTICAL-ELECTRICAL CHARACTERISTICS

(TA=25°C)

arameter	Symbol	Test Condition	Value			Lloit
Parameter			Min	Тур	Max	Unit
Luminous Intensity	lv	I _F = 20mA	-	250	-	mcd
Forward Voltage per Segment	VF	I _F = 40mA	1	8.2	9.6	V
Reverse Leakage Current	lr	V _R = 20V	-	ı	10	μΑ
Peak Wavelength	λ P	I⊧ = 20mA	-	593	-	nm
Dominant Wavelength	λ D	I⊧ = 20mA	-	590	-	nm
Spectral Radiation Bandwidth	Δλ	I⊧ = 20mA	-	20	-	nm

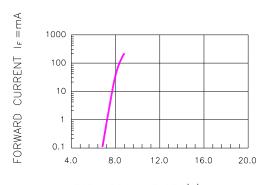


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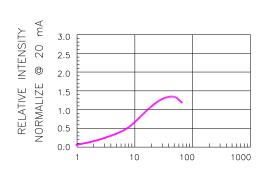


OPTICAL CHARACTERISTIC CURVES

Typical Electro-optical Characteristic Curves (25 °C Free Air Temperature Unless Otherwise Specified)



FORWARD VOLTAGE (V)
Fig.1 FORWARD CURRENT VS. FORWARD VOLTAGE



FORWARD CURRENT (mA)
Fig.2 RELATIVE INTENSITY VS. FORWARD CURRENT

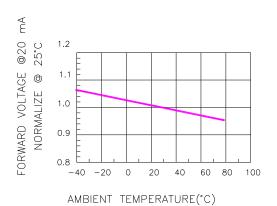


Fig. 3 FORWARD VOLTAGE VS. TEMPERATURE

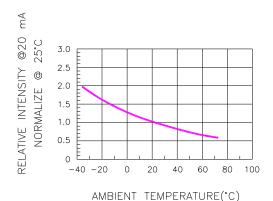


Fig.4 RELATIVE INTENSITY VS. TEMPERATURE

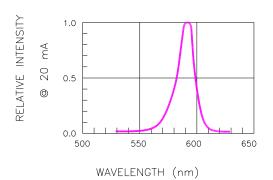
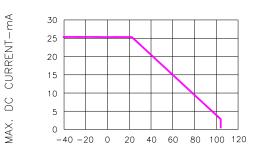


Fig.5 RELATIVE INTENSITY VS. WAVELENGTH



AMBIENT TEMPERATURE (TA)-°C

Fig.6 MAX. ALLOWABLE DC CURRENT VS. AMBIENT TEMPERATURE



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SOLDERING CONDITIONS – LAMP TYPE LED

- * Solder the LED no closer than 3mm from the base of the epoxy bulb. Soldering beyond the base of the tie bar is recommended.
- * Recommended soldering conditions

Dip Soldering			
Pre-Heat	100 °C Max		
Pre-Heat Time	60 Second Max		
Solder Bath Temperature	260 °C Max		
Dippng Time	5 Second Max		
Dipping Position	No lower than 3mm from the base of the epoxy		

Hand Soldering					
	3mm Series	Others			
Tomporature Soldering Time	300 °C Max	350 °C Max			
Temperature Soldering Time Position	3 Second Max	3 Second Max			
	No closer than 3mm from the	No closer than 3mm from the			
	base of the epoxy	base of the epoxy			

- * Do not apply any stress to the lead. Particularly when heated.
- * The LED must not be repositioned after soldering.
- * After soldering the LEDs, the epoxy bulb should be protected from mechanical shock or vibration until the LEDs return to room temperature.
- * Direct soldering onto a PC board should be avoided. Mechanical stress to the resin may be caused by the PC board warping or from the clinching and cutting of the leadframes. When it is absolutely necessary, the LEDs may be mounted in this fashion, but, the user will assume responsibility for any problems. Direct soldering should only be done after testing has confirmed that no damage, such as wire bond failure or resin deterioration, will occur. LEDs should not be soldered directly to double sided PC boards because the heat will deteriorate the epoxy resin.
- * When it is necessary to clamp the LEDs to prevent soldering failure, it is important to minimize the mechanical stress on the LEDs.
- * Cut the LED leadframes at room temperature. Cutting the leadframes at high temperature may cause LED failure.

