



PRODUCT SPECIFICATION

Model No.: CSDS-56103V

Descriptions:
<ul style="list-style-type: none"> ■ 0.56 Inch Single Digit Display ■ Common Cathode ■ Emitting Color: Super Bright Orange ■ Black Face ■ White Segment



CUSTOMER APPROVED SIGNATURES	APPROVED BY	CHECKED BY	PREPARED BY

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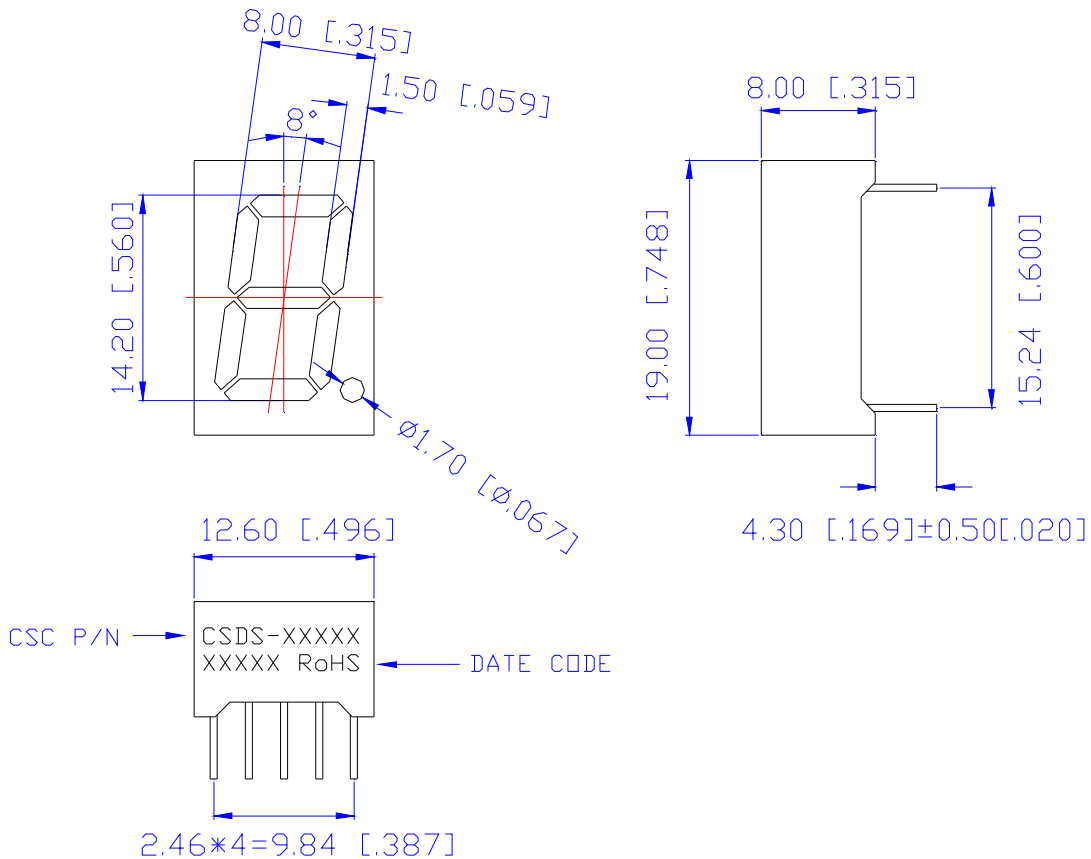
Features -

1. 0.56 inch (14.20mm) digit height.
2. Case mold type.
3. RoHS compliant.
4. Low power consumption.
5. Standard: black face, white segment.
6. Easy mounting on P.C. board or socket.

Device Selection Guide -

Model No.	Chip		Description
	Material	Emitting Color	
CSDS-56103V	AlGaInP	Super Bright Orange	Common Cathode

Mechanical Dimensions -



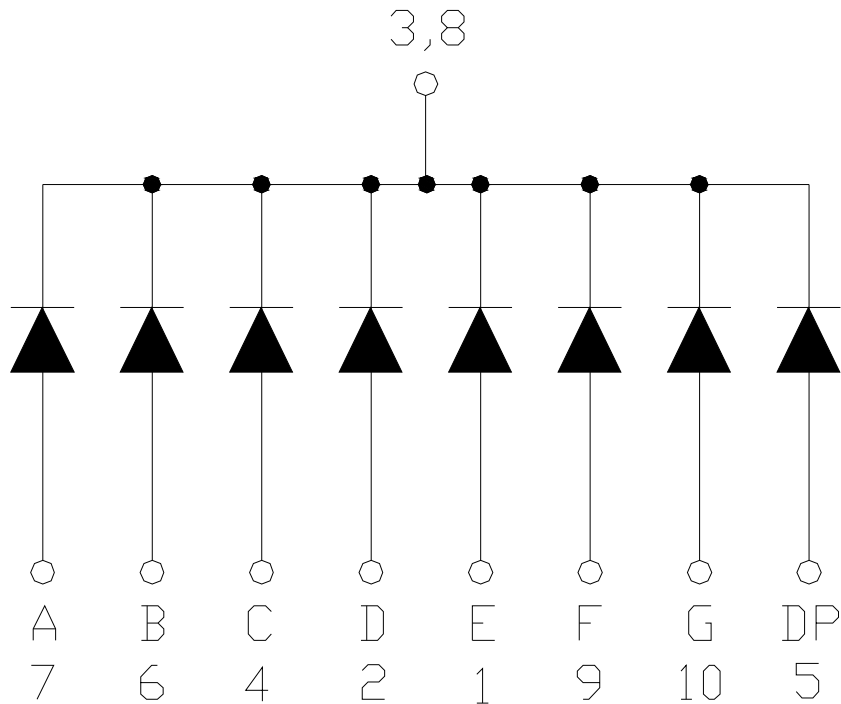
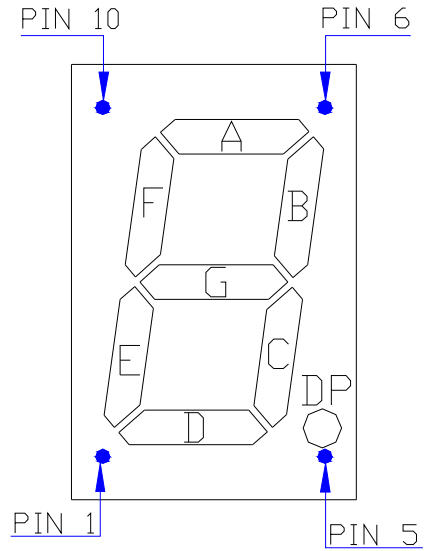
Notes:

1. All pins are $\varnothing 0.50 [0.020]$
2. Dimension in millimeter [inch], tolerance is $\pm 0.25 [0.010]$ and angle is $\pm 1^\circ$ unless otherwise noted.
3. Bending \leq Length*1%.



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Internal Circuit Diagrams -





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■ Absolute Maximum Rating -

(Ta=25°C)

Parameter	Symbol	Rating	Unit
Power Dissipation Per Dice	P_{AD}	70	mW
Derating Liner from 25°C per Dice	-	0.33	mA/°C
Continuous Forward Current Per Dice	I_{AF}	25	mA
Peak Current Per Dice(duty cycle 1/10,1KHz)	I_{PF}	90	mA
Reverse Voltage Per Dice	VR	5	V
Operating Temp.	Topr	-35 ~ +85	°C
Storage Temp.	Tstg	-35 ~ +85	°C

■ Electro-optical Characteristics -

(Ta=25°C)

Parameter	Symbol	Min.	Typ.	Max.	Unit	Condition
Forward Voltage Per Segment	V_F	-	2.0	2.8	V	I _F =20mA
Luminous Intensity Per Segment	I_V	20	50	-	mcd	I _F =10mA
Peak Emission Wavelength	λ_P	-	632	-	nm	I _F =20mA
Dominant Wavelength	λ_d	-	624	-	nm	I _F =20mA
Spectrum Radiation Bandwidth	Δλ	-	20	-	nm	I _F =20mA
Reverse Current	I_R	-	-	100	μA	VR=5V
Luminous Intensity Matching Ratio	IV-m	-	-	2:1	-	I _F =10mA



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■ Typical Electrical / Optical Characteristics Curves -

(Ta = 25°C Unless Otherwise Noted)

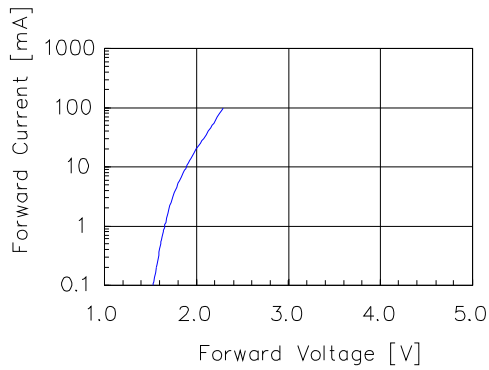


Fig 1. Forward Current vs. Forward Voltage

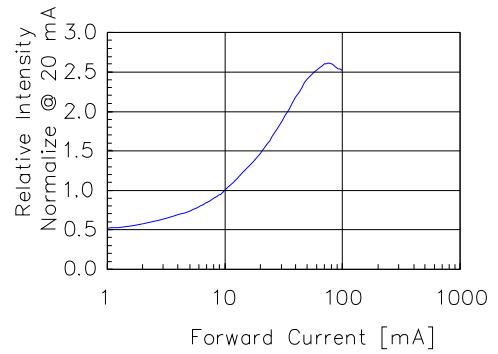


Fig 2. Relative Intensity vs. Forward Current

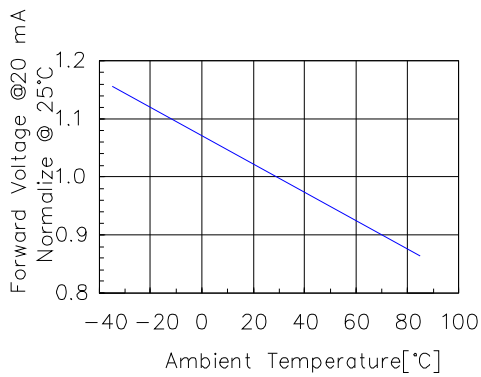


Fig 3. Forward Voltage vs. Temperature

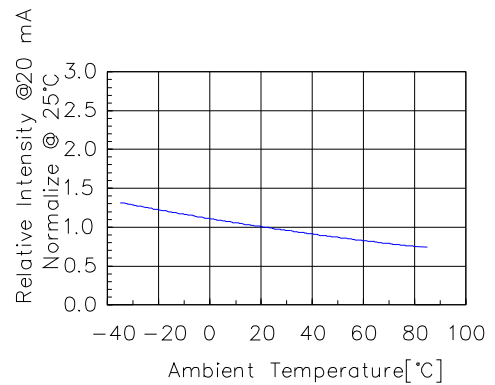


Fig 4. Relative Intensity vs. Temperature

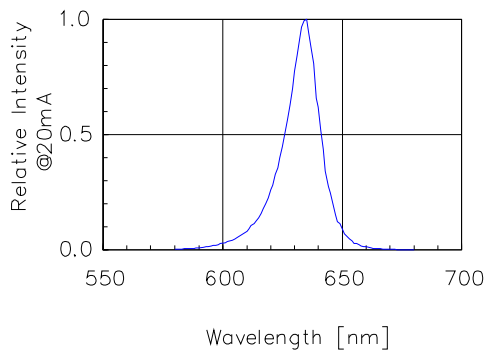


Fig 5. Relative Intensity vs. Wavelength

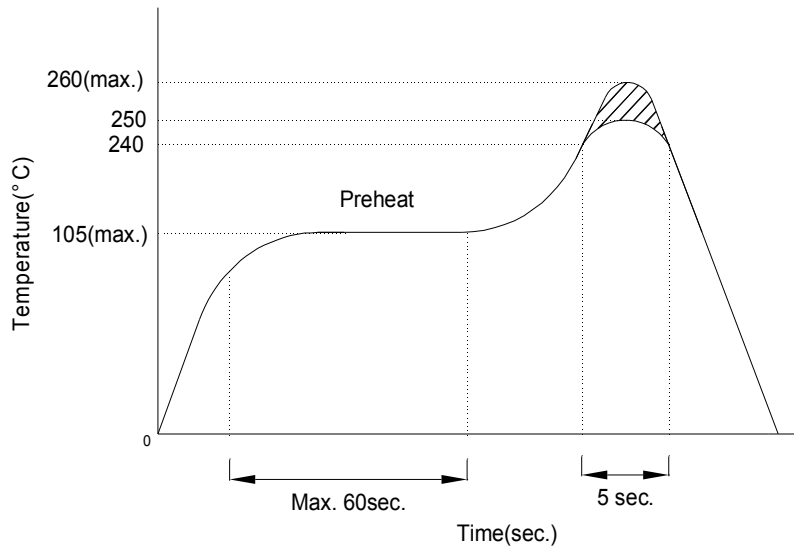


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■ Precautions For Use -

1. Recommended Soldering conditions

Wave Soldering



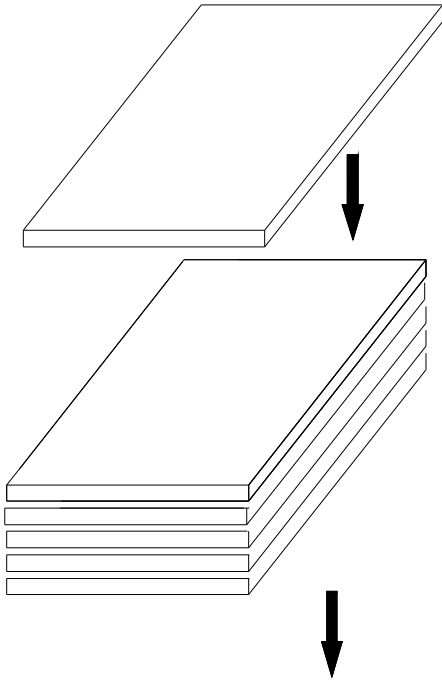
2. Soldering Iron

Basic SPEC. is ≤ 5 sec. When 260°C . If temperature is higher, time should be shorter ($+10^{\circ}\text{C} \rightarrow -1$ sec.). Power dissipation of iron should be smaller than 15W, and temperature should be controllable. Surface temperature of the device should be under 230°C .

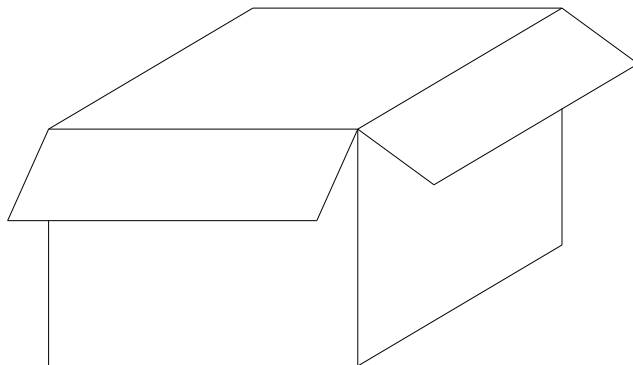


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■ Package Dimensions



176 Pcs Per PE.foam
PE.foam Size:
L295xW195xH15mm



10 PE.foam Per Box
Q'TY :1760 PCS
Box Size:
L300*W205*H240mm