



Seven Segment Display Data Sheet

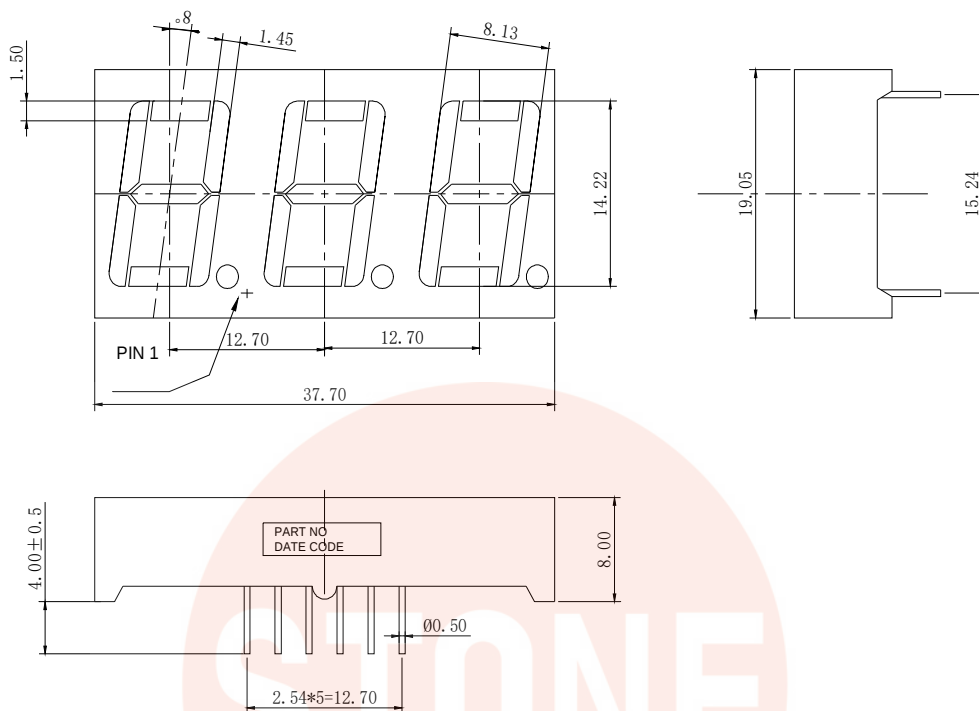
Description

The YDT-53628AR-N is a 0.56inch (14.2mm) digit height triple digit seven-segment display. This device utilizes Red LED chips ,which are made from AlInGaP on a non-transparent GaAs substrate. The display has a Black face and White segments.

Features

- 0.56 inch (14.2mm) digit height
- Continuous uniform segments
- Low power requirement
- Excellent characters appearance
- High brightness & high contrast
- Wide viewing angle
- Solid state reliability
- Categorized for luminous intensity

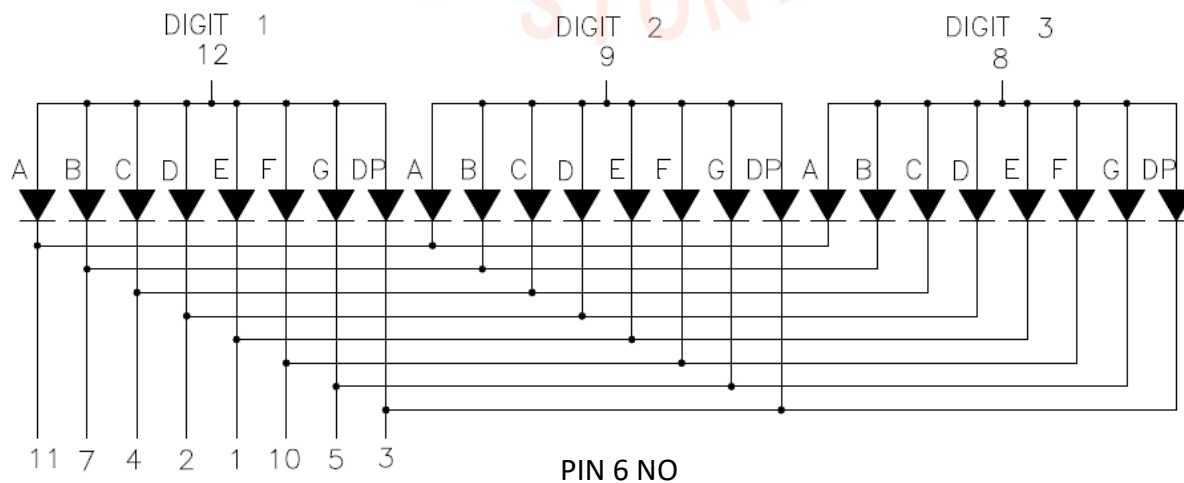
Package Dimensions



NOTES:

1.All dimensions are in millimeters. Tolerances are ± 0.25 mm (0.01") unless otherwise noted.

Internal Circuit Diagram





Absolute Maximum Rating (Ta = 25°C)

Parameter	Maximum	Unit
Power Dissipation Per Segment	70	mW
Peak Forward Current Per Segment (Frequency 1Khz, 15% duty cycle)	90	mA
Continuous Forward Current Per Segment	20	mA
Reverse Voltage Per Segment	5	V
Operating Temperature Range	-40°C to +80°C	
Storage Temperature Range	-40°C to +85°C	
Soldering Conditions: 1/16 inch below seating plane for 3 seconds at 260°C		

This product should be operated in forward bias. If a reverse voltage is continuously applied to the product, such operation can cause migration resulting in LED damage.

Electrical / Optical Characteristics (Ta = 25°C)

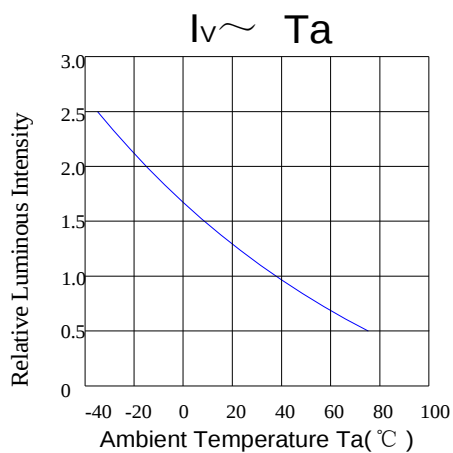
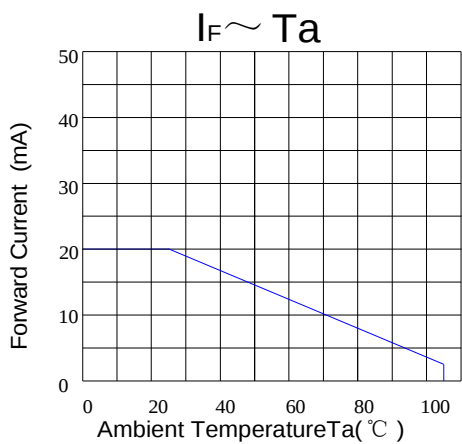
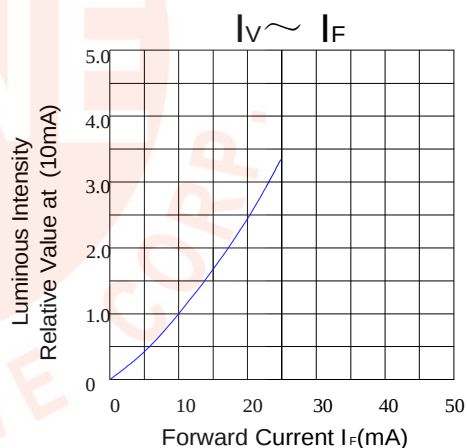
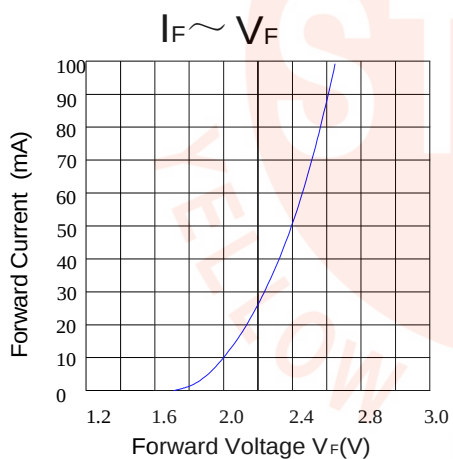
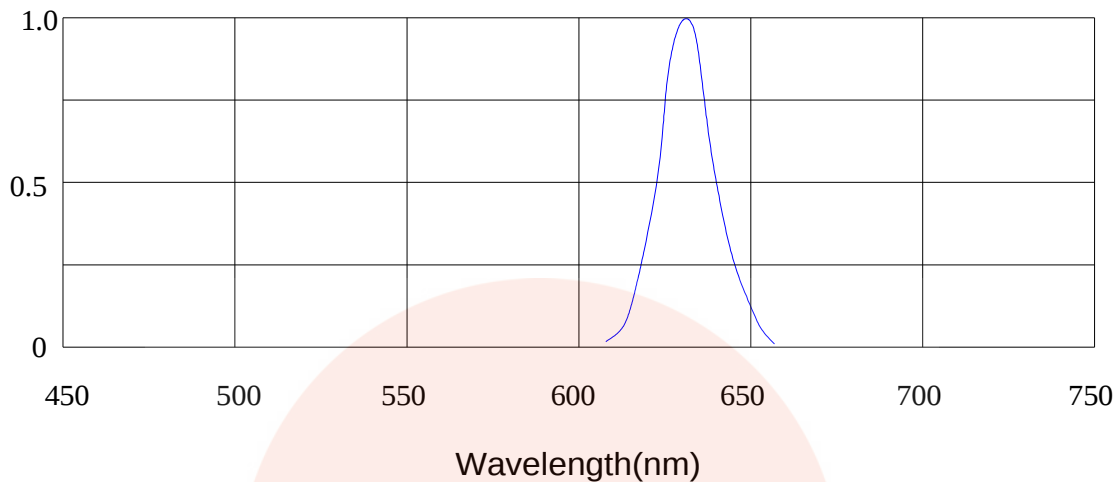
Parameter	Symbol	Min.	Typ.	Max.	Unit	Test Condition
Average Luminous Intensity	Iv	8	15		mcd	IF=10mA
Peak Emission Wavelength	λ_p		632		nm	IF=20mA
Spectral Line Half-Width	$\Delta\lambda$		35		nm	IF=20mA
Dominant Wavelength	λ_d		624		nm	IF=20mA
Forward Voltage Per Segment	VF		2.0	2.6	V	IF=20mA
Reverse Current Per Segment	IR			10	μ A	VR=5V
Luminous Intensity Matching Ratio	Iv-m			2:1		IF=10mA



Typical Electrical / Optical Characteristic Curves

(25°C Ambient Temperature Unless Otherwise Noted)

RELATIVE INTENSITY vs WAVELENGTH



Package Flow

