### Property of Lite-On Only

#### **FEATURES**

- \*0.4 inch (10.16 mm) 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.

### **DESCRIPTION**

The LTS-4610AE is a 0.4 inch (10.16 mm) digit height single digit seven-segment display. This device utilizes red orange LED chips, which are made from GaAsP on a transparent GaP substrate, and has a orange face and orange segments.

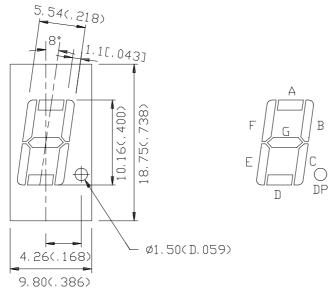
### **DEVICE**

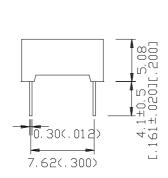
PART NO.	DESCRIPTION		
Red Orange	Common Anode		
LTS-4610AE	Rt. Hand Decimal		

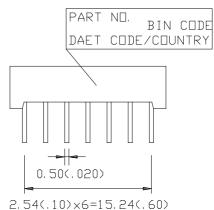
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### **PACKAGE DIMENSIONS**

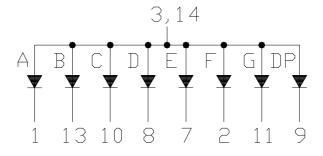






NOTES: All dimensions are in millimeters. Tolerances are ± 0.25 mm (0.01") unless otherwise noted.

### INTERNAL CIRCUIT DIAGRAM



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### **PIN CONNECTION**

No	CONNECTION
1	CATHODE A
2	CATHODE F
3	COMMON ANODE
4	NO CONNECTION
5	NO PIN
6	NO CONNECTION
7	CATHODE E
8	CATHODE D
9	CATHODE D.P.
10	CATHODE C
11	CATHODE G
12	NO CONNECTION
13	CATHODE B
14	COMMON ANODE

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### ABSOLUTE MAXIMUM RATING AT Ta=25°C

PARAMETER	MAXIMUM RATING	UNIT			
Power Dissipation Per Segment	75	mW			
Peak Forward Current Per Segment (1/10 Duty Cycle, 0.1ms Pulse Width)	100	mA			
Continuous Forward Current Per Segment	25	mA			
Derating Linear From 25°C Per Segment	0.33	mA/°C			
Reverse Voltage Per Segment	5	V			
Operating Temperature Range	-35°C to +85°C				
Storage Temperature Range	-35°C to +85°C				
Solder Temperature: max 260°C for max 3sec at 1.6mm below seating plane.					

### ELECTRICAL / OPTICAL CHARACTERISTICS AT Ta=25°C

PARAMETER	SYMBOL	MIN.	TYP.	MAX.	UNIT	TEST CONDITION
Average Luminous Intensity	Iv	870	2200		μcd	I <sub>F</sub> =10mA
Peak Emission Wavelength	λр		630		nm	I <sub>F</sub> =20mA
Spectral Line Half-Width	Δλ		40		nm	I <sub>F</sub> =20mA
Dominant Wavelength	λd		621		nm	I <sub>F</sub> =20mA
Forward Voltage Per Segment	VF		2	2.6	V	I <sub>F</sub> =20mA
Reverse Current Per Segment	IR			100	μΑ	V <sub>R</sub> =5V
Luminous Intensity Matching Ratio	Iv-m			2:1		I <sub>F</sub> =10mA

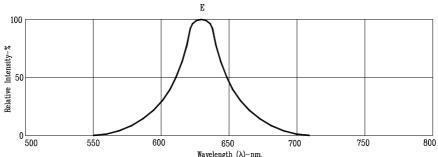
Note: Luminous intensity is measured with a light sensor and filter combination that approximates the CIE (Commision Internationale De L'Eclairage) eye-response curve.

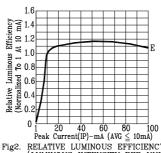
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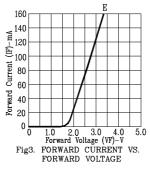
### TYPICAL ELECTRICAL / OPTICAL CHARACTERISTIC CURVES

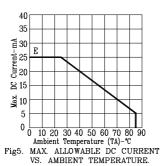
(25°C Ambient Temperature Unless Otherwise Noted)

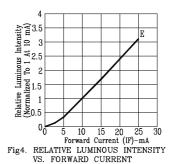




0 1 20 40 60 80 100 Peak Current(IP)-mA (AVG ≤ 10mA) RELATIVE LUMINOUS EFFICIENCY (LUMINOUS INTENSITY PER UNIT CURRENT) VS. PEAK CURRENT (REFRESH RATE 1KHz)







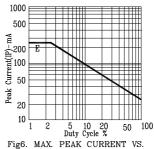


Fig6. MAX. PEAK CURRENT VS. DUTY CYCLE % (REFRESH RATE 1KHz)

NOTE: E=RED ORANGE

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### **Mouser Electronics**

**Authorized Distributor** 

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Lite-On: