SunLED
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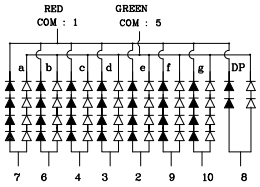
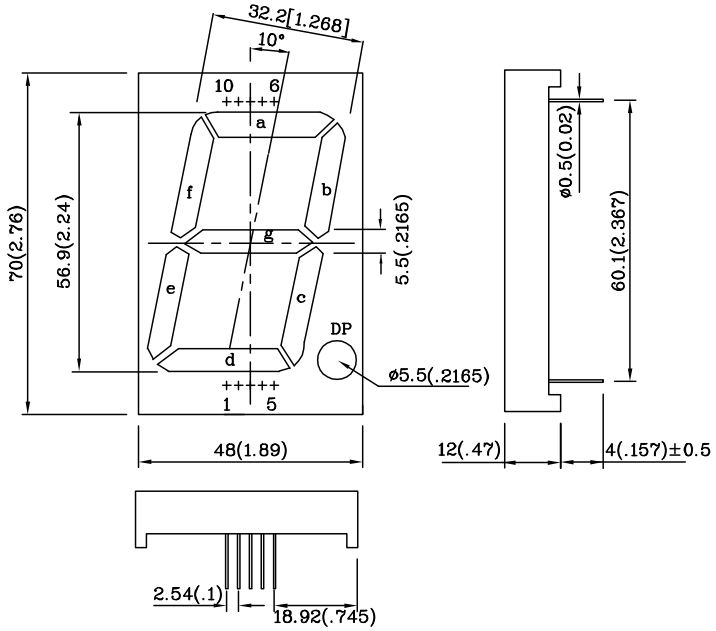
Part Number : XDURG57C-A

57mm (2.3") SINGLE DIGIT NUMERIC DISPLAY

Features

- 2.3 INCH DIGIT HEIGHT.
- LOW CURRENT OPERATION.
- EXCELLENT CHARACTER APPEARANCE.
- HIGH LIGHT OUTPUT.
- EASY MOUNTING ON P.C. BOARDS OR SOCKETS.
- MULTICOLOR AVAILABLE.
- CATEGORIZED FOR LUMINOUS INTENSITY, YELLOW AND GREEN CATEGORIZED FOR COLOR.
- MECHANICALLY RUGGED.
- STANDARD :GRAY FACE, WHITE SEGMENT.
- RoHS COMPLIANT.





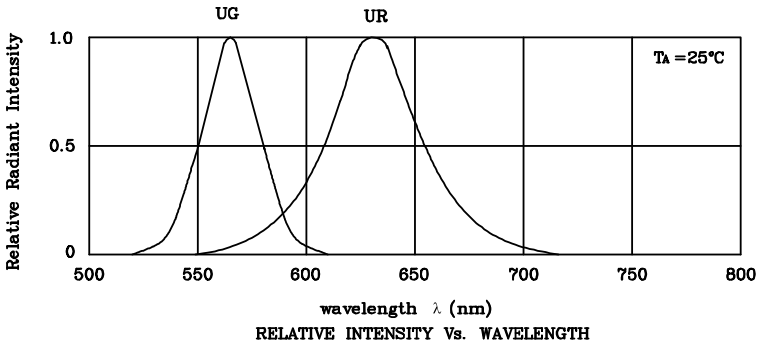
Notes:

1. All dimensions are in millimeters (inches).
2. Tolerance is ± 0.25(0.01") unless otherwise noted.

Absolute Maximum Ratings (T_A=25°C)		**UR (GaAsP /GaP)**	**UG (GaP)**	**Unit**
Reverse Voltage Per Segment or (Dp and Comma)	V_R	20(10)	20(10)	V
Forward Current Per Segment or (Dp and Comma)	I_F	30(30)	25(25)	mA
Forward Current (peak) Per Segment or (Dp and Comma) 1/10Duty Cycle 0.1ms Pulse Width	i_{FS}	160	140	mA
Power Dissipation Per Segment or (Dp and Comma)	P_T	300 (150)	250 (125)	mW
Operating Temperature	T_A	-40 ~ +85		°C
Storage Temperature	Tstg	-40 ~ +85		
Lead Solder Temperature [2mm below package base]	260°C For 5 Seconds			

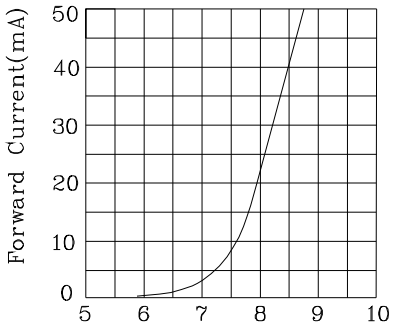
Operating Characteristics (T_A=25°C)		**UR (GaAsP /GaP)**	**UG (GaP)**	**Unit**
Forward Voltage (typ.) Per Segment or (Dp and Comma) (IF=10mA)	VF	7.6 (3.8)	8.0 (4.0)	V
Forward Voltage (max.) Per Segment or (Dp and Comma) (IF=10mA)	VF	10.0 (5.0)	10.0 (5.0)	V
Reverse Current Per Segment or (Dp and Comma) (VR=5V)	IR	10	10	uA
Wavelength of Peak Emission (IF=10mA)	λ P	627	565	nm
Wavelength of Dominant Emission (IF=10mA)	λ D	625	568	nm
Spectral Line Full Width At Half-Maximum (IF=10mA)	Δλ	45	30	nm
Capacitance (VF=0V, f=1MHz)	C	15	15	pF

Part Number	Emitting Color	Emitting Material	Luminous Intensity (IF=10mA) ucd		Wavelength nm λ P	Description
			min.	typ.		
XDURG57C-A	Red	GaAsP/GaP	4700	17990	627	Common Cathode, Rt. Hand Decimal
	Green	GaP	4700	23990	565	

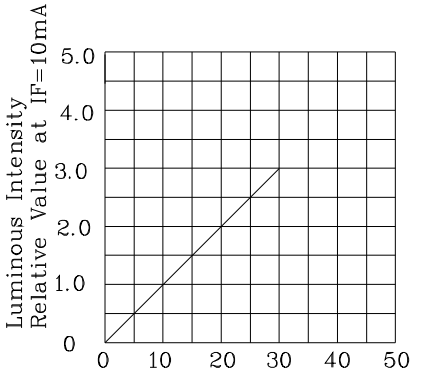


RELATIVE INTENSITY Vs. WAVELENGTH

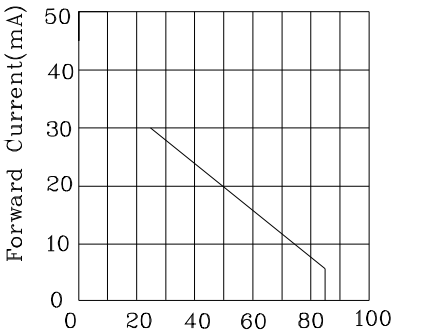
❖ **UR**



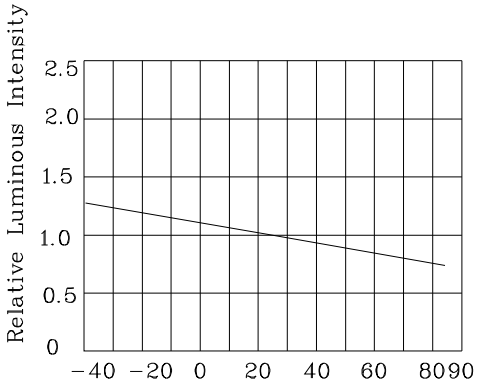
FORWARD CURRENT Vs
FORWARD VOLTAGE



LUMINOUS INTENSITY Vs.
FORWARD CURRENT

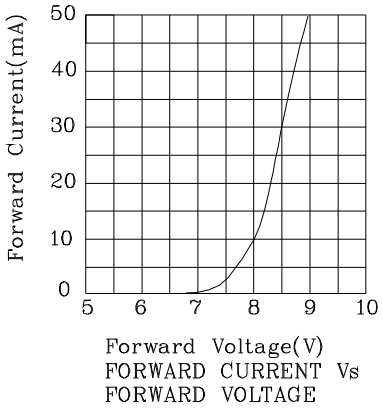


FORWARD CURRENT
DERATING CURVE

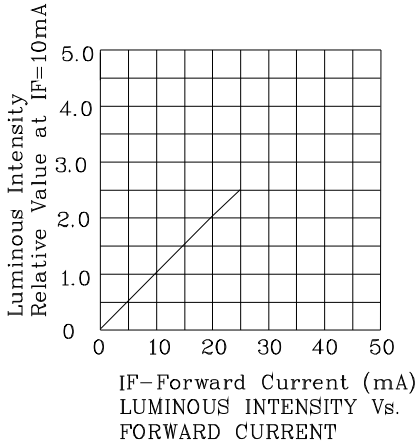


LUMINOUS INTENSITY Vs.
AMBIENT TEMPERATURE

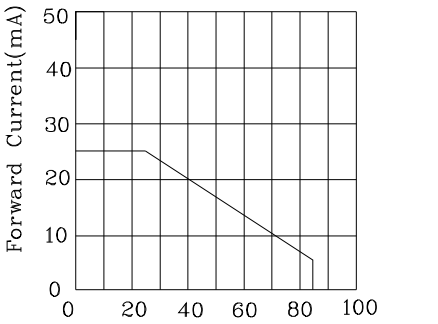
❖ **UG**



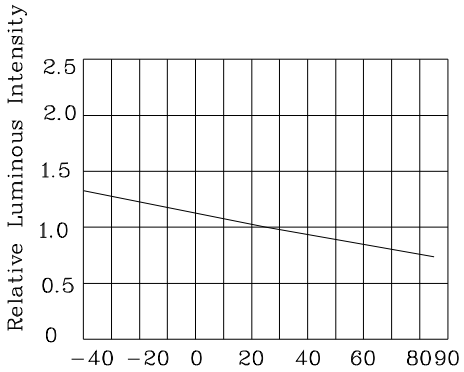
FORWARD CURRENT Vs
FORWARD VOLTAGE



LUMINOUS INTENSITY Vs.
FORWARD CURRENT

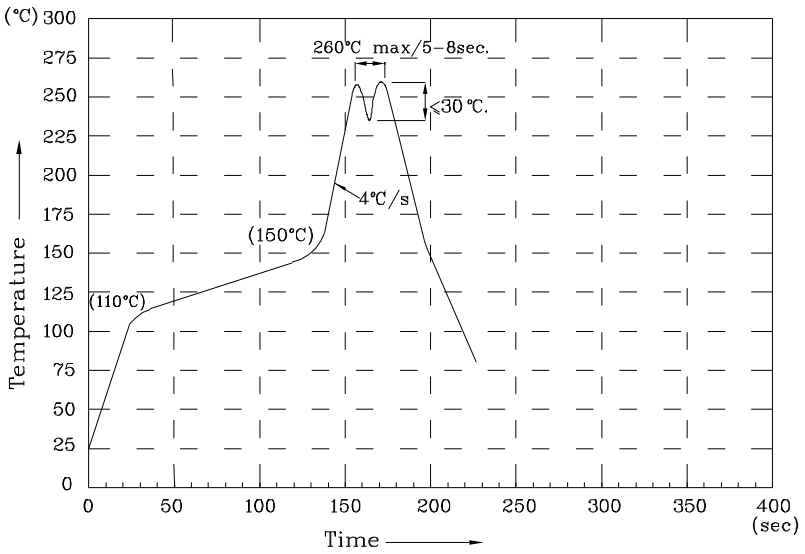


FORWARD CURRENT
DERATING CURVE



LUMINOUS INTENSITY Vs.
AMBIENT TEMPERATURE

Wave Soldering Profile For Lead-free Through-hole LED.



NOTES:

1. Recommend the wave temperature 245℃~260℃. The maximum soldering temperature should be less than 260℃.
2. Do not apply stress on epoxy resins when temperature is over 85 degree℃.
3. The soldering profile apply to the lead free soldering (Sn/Cu/Ag alloy).
4. No more than once.

Remarks:

If special sorting is required (e.g. binning based on forward voltage, luminous intensity, or wavelength), the typical accuracy of the sorting process is as follows:

1. Wavelength: +/-1nm

2. Luminous Intensity: +/-15%

3. Forward Voltage: +/-0.1V

Note: Accuracy may depend on the sorting parameters.