

# PRODUCT SPECIFICATION

**Model No.: OA-R102510BEUHRUG-XX**

Descriptions:
■ Bargraph Digit Display
■ Shape: Rectangular
■ Diameter:25.40*10.10mm
■ Emitting Color : Ultra Hi Red;Ultra Green
■ Chip Material:AlGaInP;AlGaInP



CUSTOMER APPROVED SIGNATURES	APPROVED BY	CHECKED BY	PREPARED BY

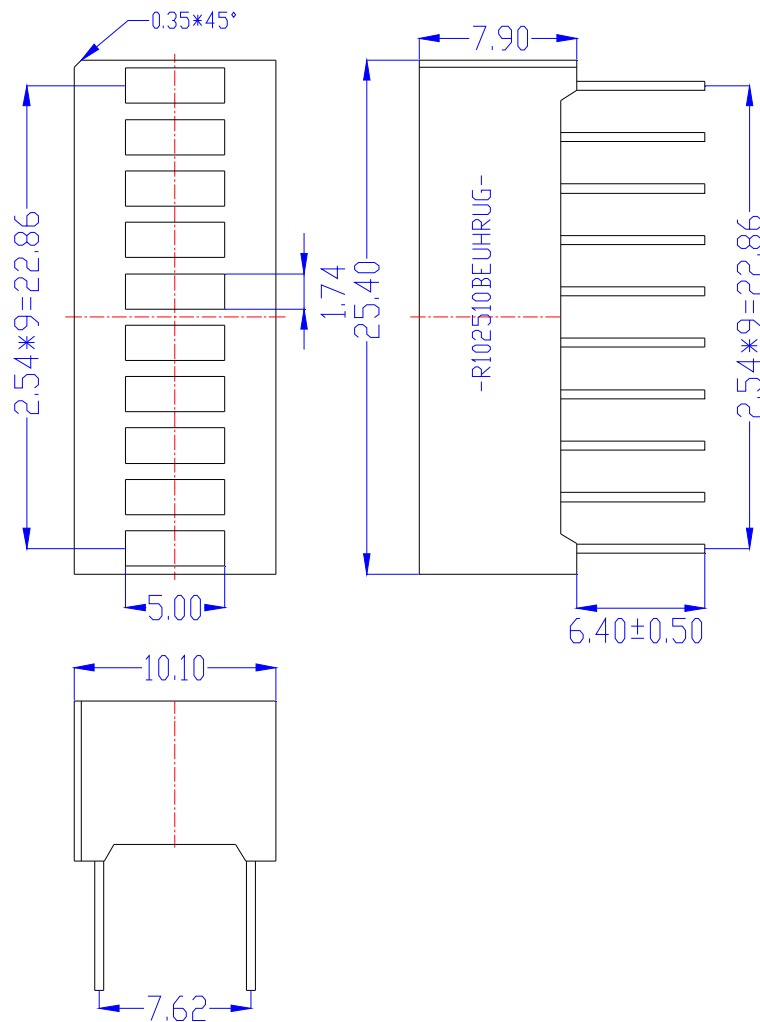
## Model No. : OA-R102510BEUHRUG-XX

Color \ Number	0	1	2	3	4
REF Surface Color	<input type="radio"/> White	<input type="radio"/> Black	<input type="radio"/> Gray	<input type="radio"/> Red	<input type="radio"/> Green
Epoxy Color	<input type="radio"/> Water Clear	<input type="radio"/> White	<input type="radio"/> Red	<input type="radio"/> Green	<input type="radio"/> Yellow

### ■ Features -

1. 0.97 inch (24.60mm) height.
2. Case mold type.
3. RoHS compliant.
4. Low current operation
5. Low power consumption.
6. Easy mounting on P.C. board or socket.

### ■ Mechanical Dimensions -

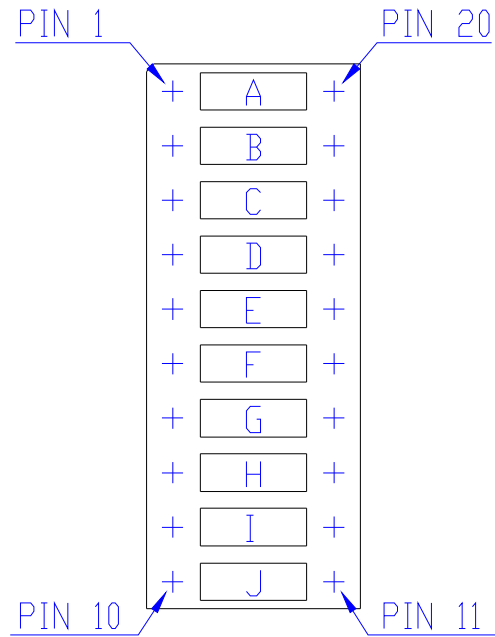


### Notes:

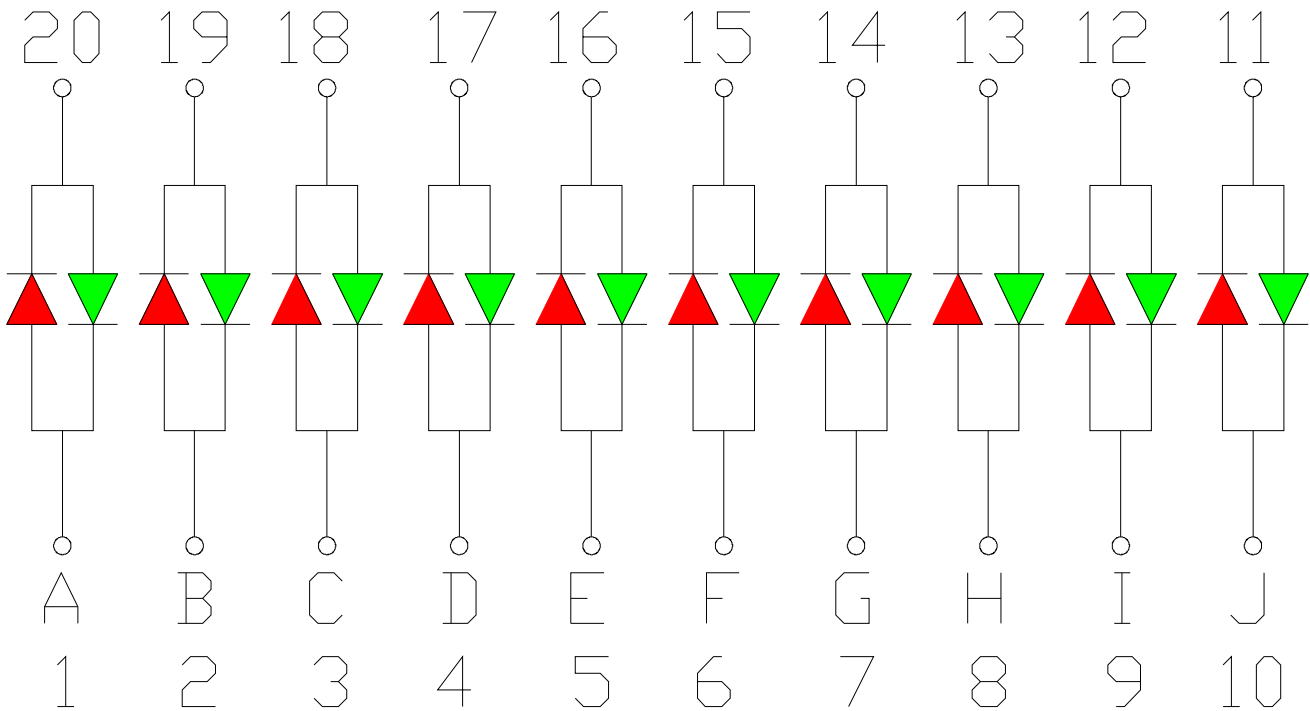
1. All pins are  $\Phi 0.45$  [0.018]mm
2. Dimension in millimeter [inch], tolerance is  $\pm 0.25$  [.010] and angle is  $\pm 1^\circ$  unless otherwise noted.
3. Bending  $\leq$  Length \* 1%.
4. The specifications, characteristics and technical data described in the datasheet are subject to change without prior notice.

## Model No. : OA-R102510BEUHRUG-XX

### ■ All Light On Segments Feature & Pin Position



### ■ Internal Circuit Diagrams -



## Model No. : OA-R102510BEUHRUG-XX

### ■ Absolute maximum ratings

(Ta=25°C)

Parameter	Symbol	Test Condition	Value		Unit
			Min	Max	
Reverse Voltage	VR	IR=30	5	—	V
Forward Current	IF	—	—	30	mA
Power Dissipation	Pd	—	—	100	mW
Pulse Current	Ipeak	Duty=0.1mS,1KHz	—	150	mA
Operating Temperature	Topr	—	-40	+85	°C
Storage Temperature	Tstr	—	-40	+85	°C

### ■ Electrical-Optical Characteristics

#### ● Color Code & Chip Characteristics:(Test Condition:IF=20mA)

(Ta=25°C)

Emitting Color		Dice Material	Peak Wave Length( $\lambda_p$ )	Spectral Line halfwidth( $\Delta\lambda_{1/2}$ )	Forward Voltage(VF) Unit:V		Luminous Intensity (Iv) Unit:mcd
					Typ	Max	
UHR	Ultra Hi Red	AlGaInP	640nm	20nm	1.90	2.50	30-60
UG	Ultra Green	AlGaInP	570nm	20nm	1.90	2.50	30-60
Segment-to-Segment Luminous Intensity ratio(Iv-M)						1.5:1	

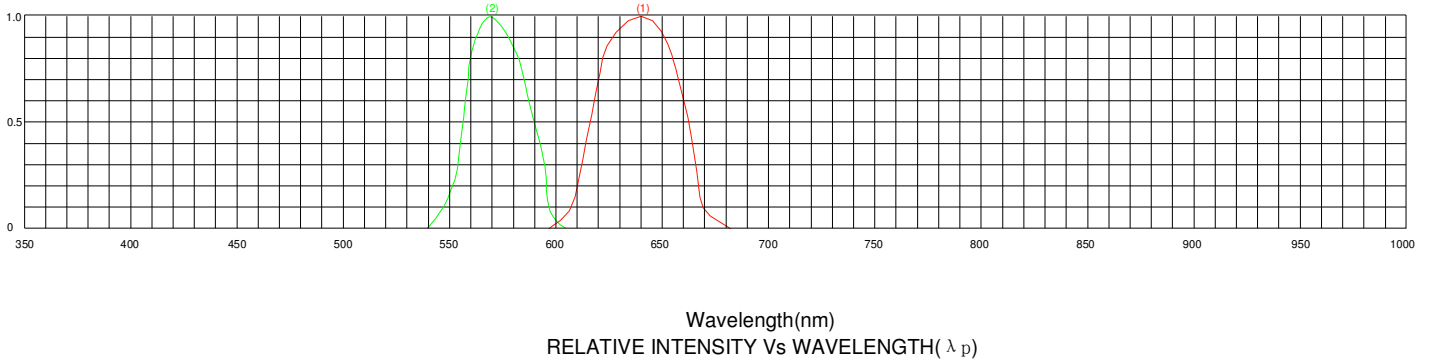
Note:

- 1.Luminous Intensity is based on the standards.
- 2.Pay attention about static for Indium chip.

**Model No. : OA-R102510BEUHRUG-XX**

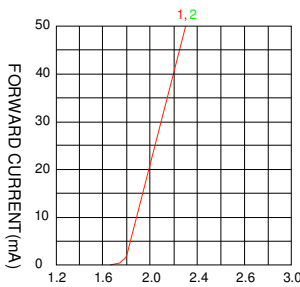
## Typical Electrical / Optical Characteristics Curves

(Ta = 25°C Unless Otherwise Noted)

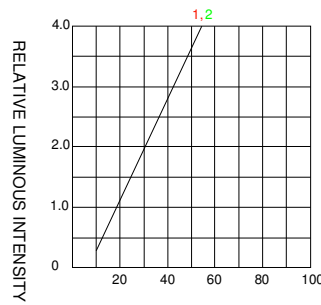


(1)-AlGaInP/640nm/Ultra Hi Red

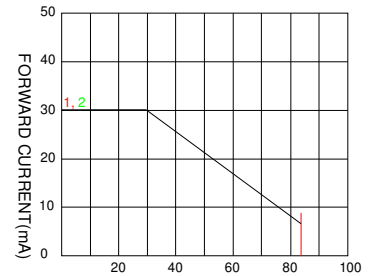
(2)-AlGaInP/570nm/Ultra Yellow Green



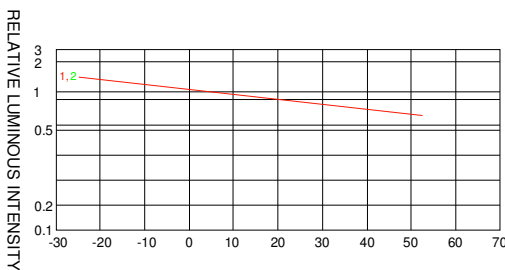
**FORWARD VOLTAGE(Vf)**  
FORWARD CURRENT VS.  
FORWARD VOLTAGE



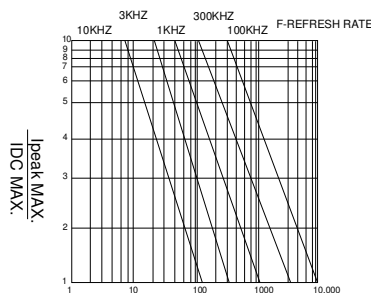
**FORWARD CURRENT (mA)**  
RELATIVE LUMINOUS  
INTENSITY VS FORWARD  
CURRENT



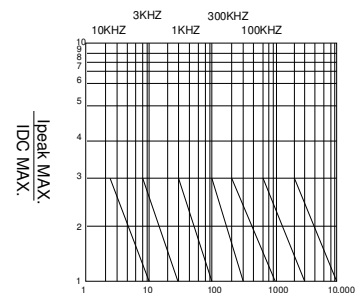
**AMBIENT TEMPERATURE Ta(°C)**  
FORWARD CURRENT VS. AMBIENT  
TEMPERATURE



**AMBIENT TEMPERATURE  
Ta(°C)**



**tp-PULSE DURATION uS**  
(1,2,3,4,6,8,B,D,J,K)



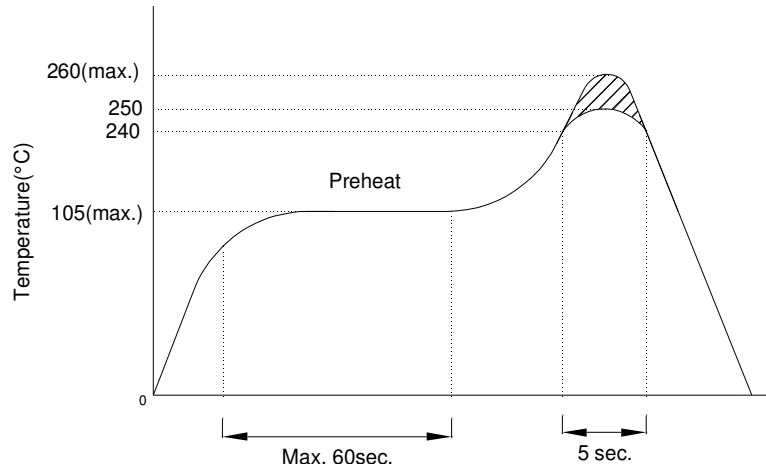
**tp-PULSE DURATION uS**  
(5)

NOTE:25°C free air temperature unless otherwise specified

**Model No. : OA-R102510BEUHRUG-XX**

## ■ Precautions For Use -

### 1. Recommended Soldering conditions-Wave Soldering



### 2. Soldering Iron

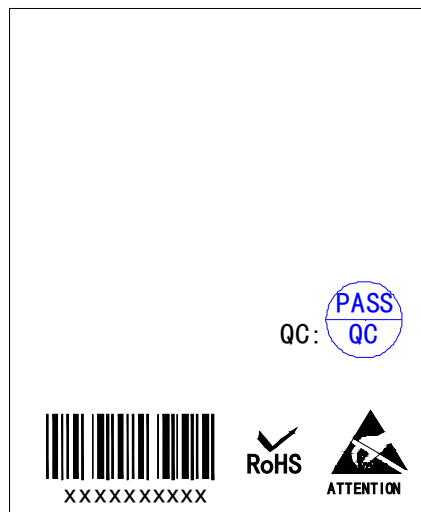
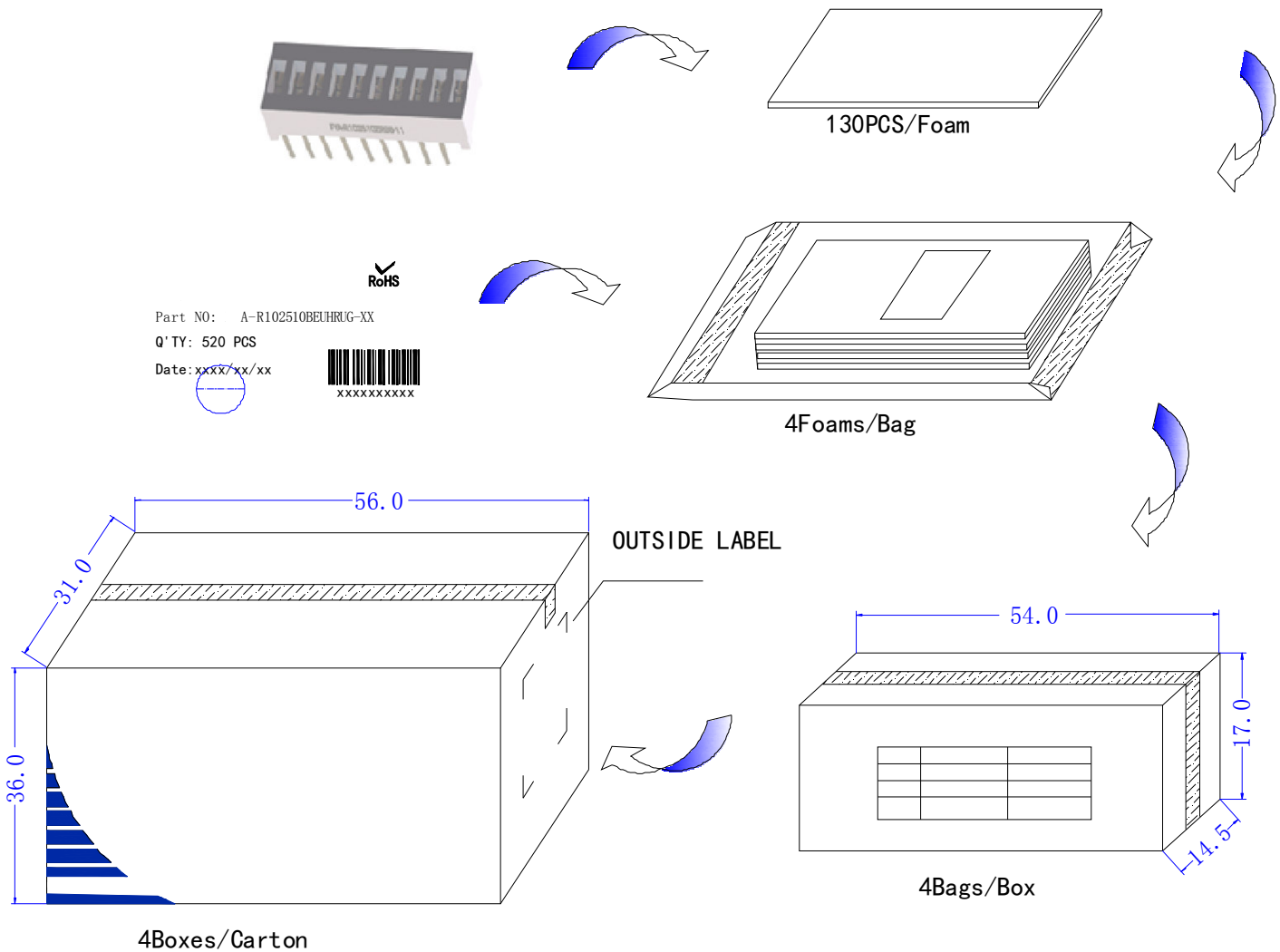
Basic SPEC. is  $\leq 5$ sec. When  $260^{\circ}\text{C}$ . If temperature is higher, time should be shorter ( $+10^{\circ}\text{C} \rightarrow -1$ sec.).

Power dissipation of iron should be smaller than 15W, and temperature should be controllable.

Surface temperature of the device should be under  $230^{\circ}\text{C}$ .

## Model No. : OA-R102510BEUHRUG-XX

### ■ Packing Diagram



OUTSIDE LABEL

Note: The specifications are subject to change without notice. Please contact us for updated information.