PRODUCT SPECIFICATION

FYS-10012BUHR-21-L4.0

Descriptions:
■1.00 Inch Single Digit Display
■Common Anode
■Emitting Color：Ultra Hi Red
■Chip Material:AlGaInP
■Gray Face
■White Segment

CUSTOMER APPROVED SIGNATURES	APPROVED BY	CHECKED BY	PREPARED BY

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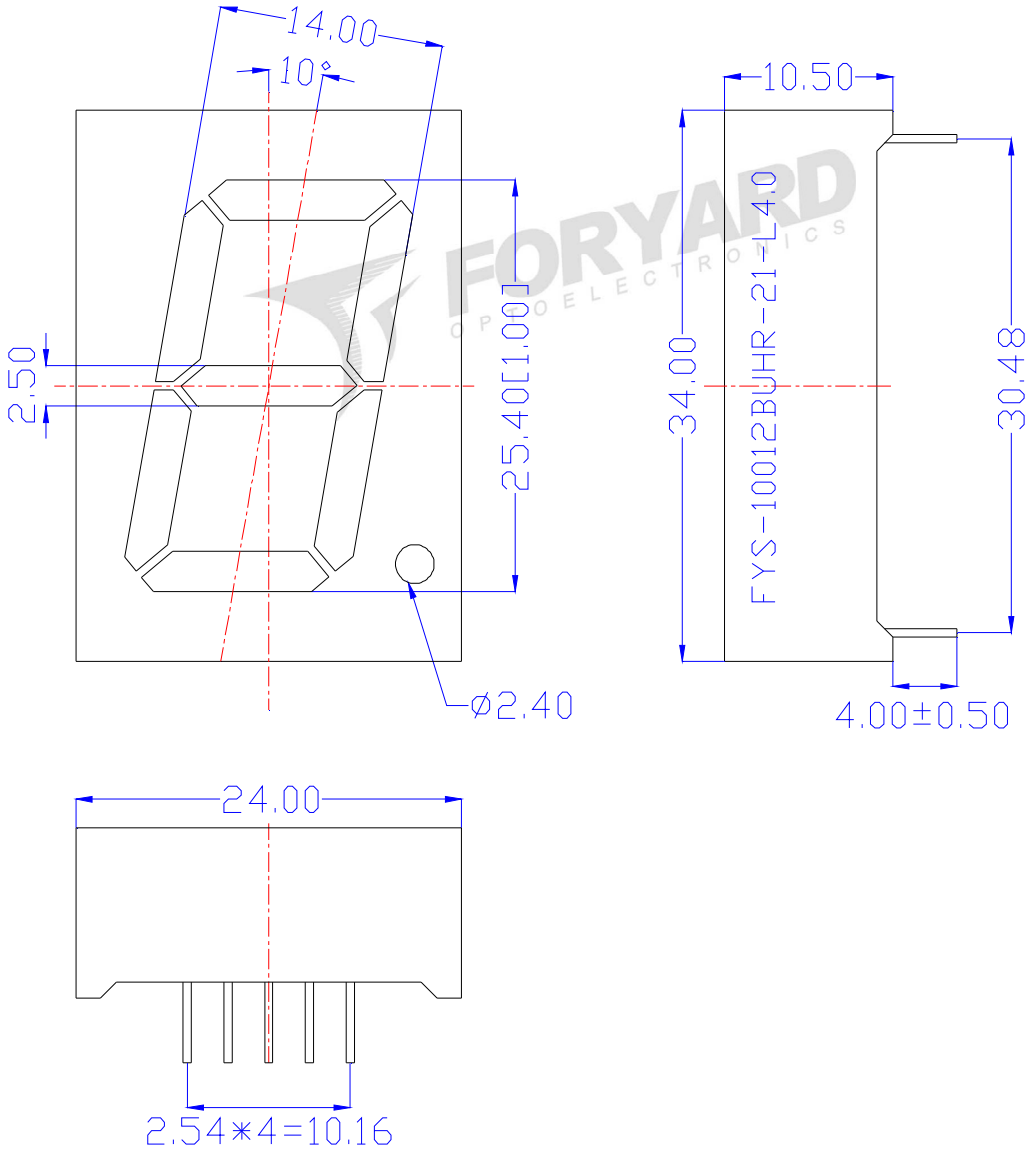
■ Features -

1. 1.00 inch (25.40mm) digit 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 Φ0.51[.020]mm
2. Dimension in millimeter [inch], tolerance is ±0.25 [.010] and angle is ±1° unless otherwise noted.
3. Bending≤Length*1%.
4. The specifications,characteristics and technical data described in the datasheet are subject to change without prior notice.

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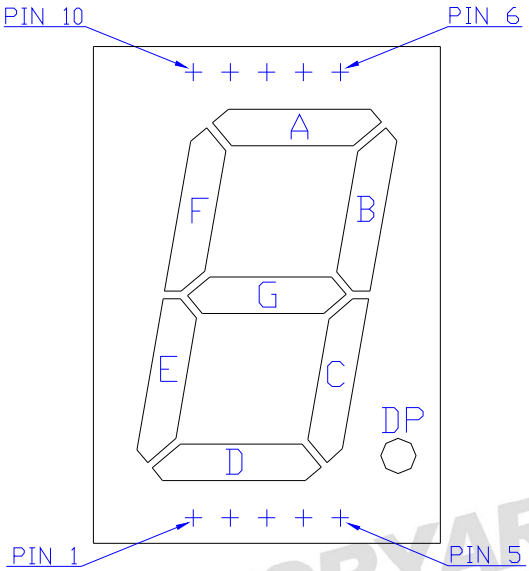
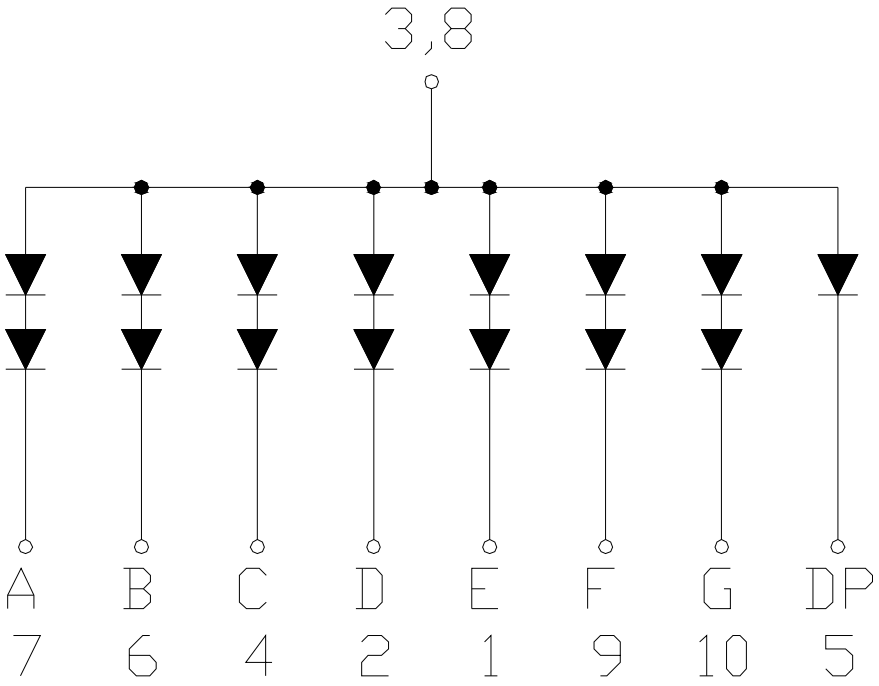
■ All Light On Segments Feature & Pin Position



■ Internal Circuit Diagrams -



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■ Absolute maximum ratings

(Ta=25℃)

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	℃
Storage Temperature	Tstr	—	-40	+85	℃

■ Electrical-Optical Characteristics

● Color Code & Chip Characteristics:(Test Condition:IF=20mA) (Ta=25℃)

Emitting Color		Dice Material	Peak Wave Length(λ_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
Segment-to-Segment Luminous Intensity ratio(Iv-M) 1.5:1							

Note:

1.Luminous Intensity is based on the Foryard standards.

2.Pay attention about static for InGaN

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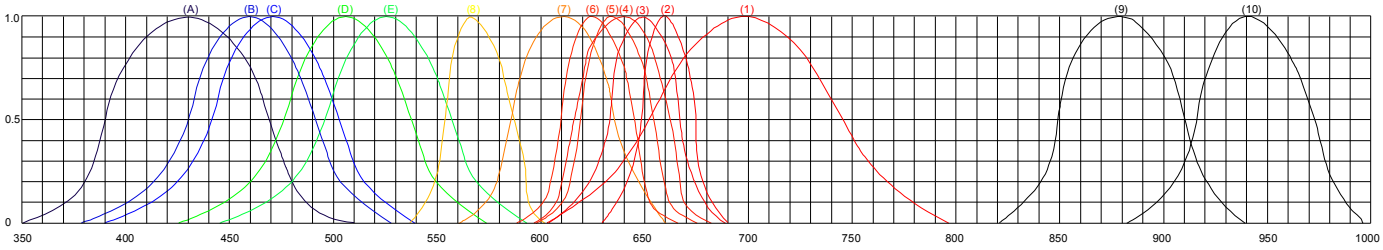
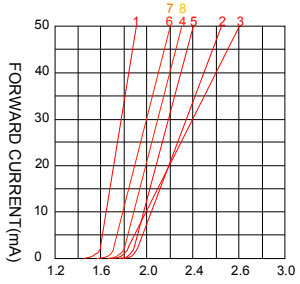
■ Typical Electrical / Optical Characteristics Curves

(Ta = 25℃ Unless Otherwise Noted)

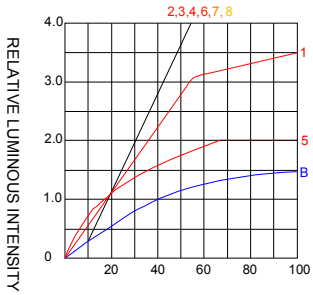


Wavelength(nm)
RELATIVE INTENSITY Vs WAVELENGTH(λ p)

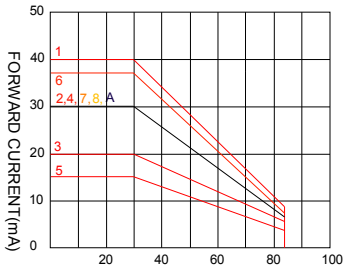
(1)-GaP 700nm/Red
(2)-AlGaAs/SH 660nm/Hi Red
(3)-AlGaAs/DH 650nm/Super Red
(4)-AlGaInP/640nm/Ultra Hi Red
(5)-AlGaInP/635nm/Ultra Red
(6)-GaAlP/AlGaInP/625nm/Orange
(7)-GaAsP/AlGaInP 610nm/Amber
(8)-GaP 570nm/Yellow Green
(9)-GaAlAs 880mm
(10)-GaAs/GaAs & GaAlAs/GaAs 940nm
(A)-GaN/SiC 430nm/Blue
(B)-InGaN/SiC 460nm/Blue
(C)-InGaN/SiC 470nm/Blue
(D)-InGaN/SiC 505nm/Ultra Green
(E)-InGaN/SiC 525nm/Ultra Green



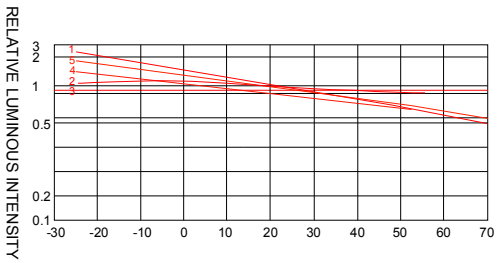
FORWARD VOLTAGE(Vf)
FORWARD CURRENT VS.
FORWARD VOLTAGE



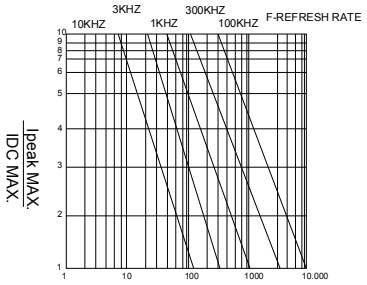
FORWARD CURRENT (mA)
RELATIVE LUMINOUS
INTENSITY VS FORWARD
CURRENT



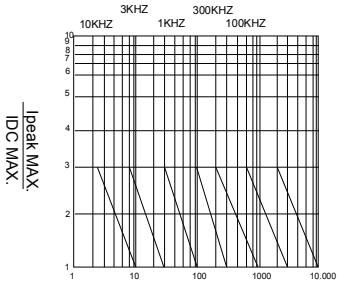
AMBIENT TEMPERATURE Ta(℃)
FORWARD CURRENT VS. AMBIENT
TEMPERATURE



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

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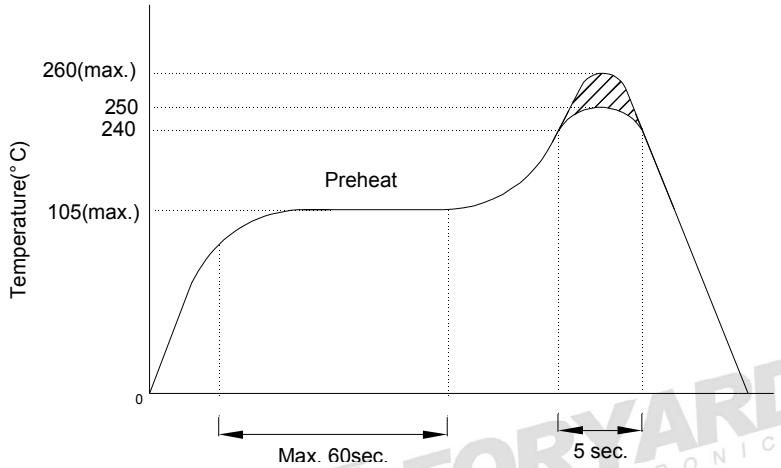
■ Precautions For Use -

1. Recommended Soldering conditions-Wave Soldering



2. Soldering Iron

Basic SPEC. is ≦5sec. When 260℃. If temperature is higher, time should be shorter (+10℃→ -1sec.).

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

Surface temperature of the device should be under 230℃.

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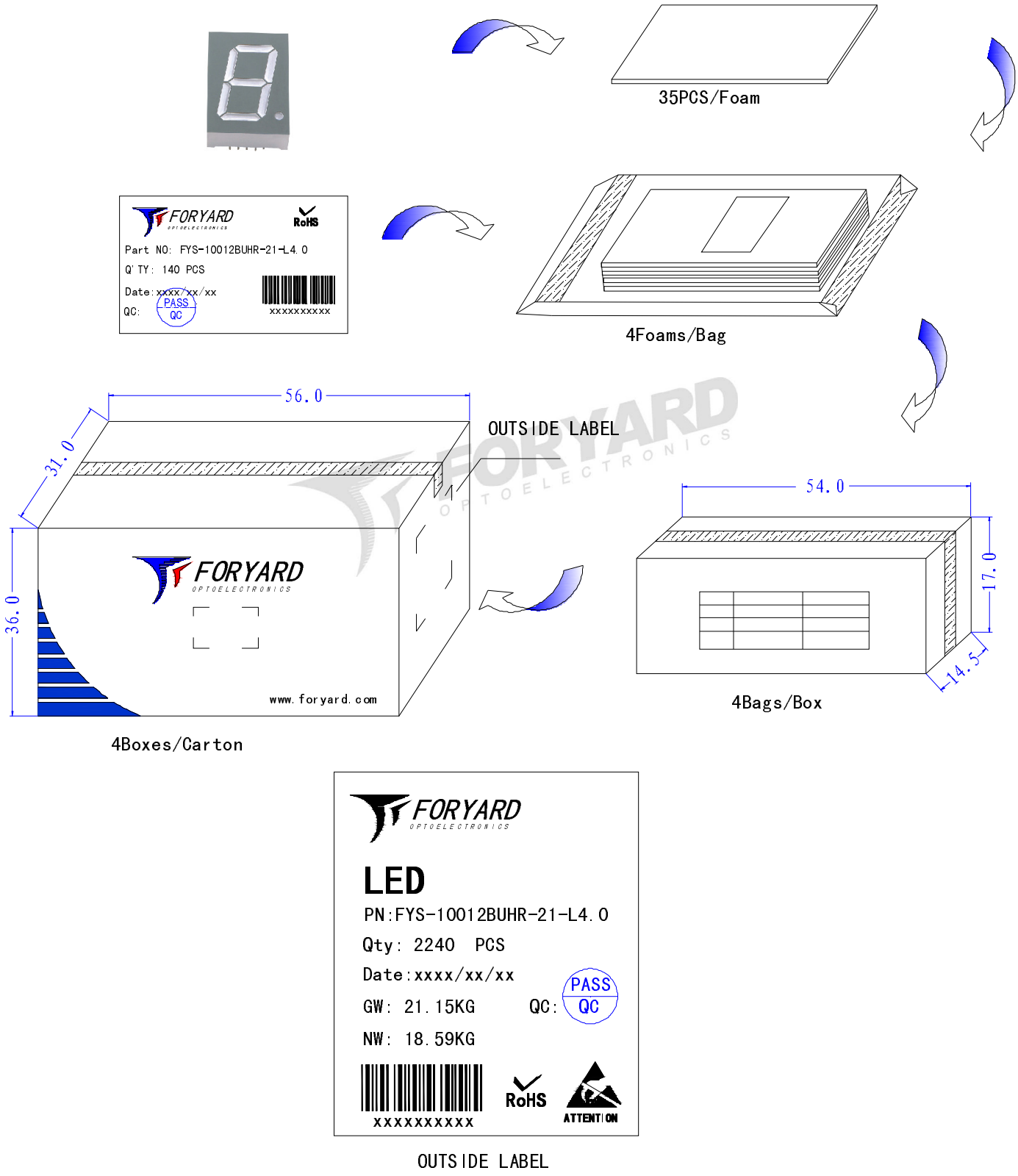
■ Packing Diagram



OUTSIDE LABEL

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