



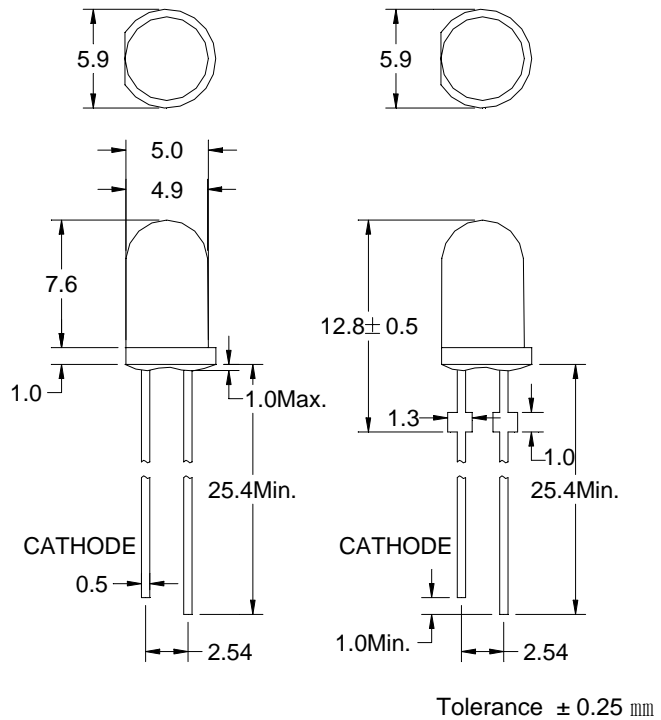
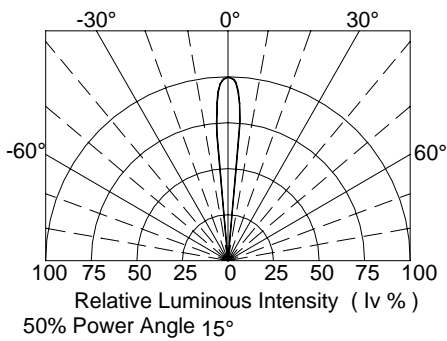
BVU-5E1TT4

PACKAGE CONFIGURATION

DESCRIPTION

Dice Material : AlInGaP Yellow
 Light Color : Yellow Color
 Lens Color : Water Transparent
 Stand-Off P/N : BVU-5E1TT4 R

RADIATION PATTERN



ABSOLUTE MAXIMUM RATINGS AT Ta = 25 °C

PARAMETER	MAX.	UNIT
Power Dissipation (PD)	80	mW
Continuous Forward Current (IF)	30	mA
Peak Forward Current (1/10 Duty Cycle , 0.1ms Pulse Width) (IFP)	160	mA
Reverse Voltage (VR)	5	V
Derating Linear From 50 °C	0.4	mA/°C
Operating Temperature Range (Topr)	-40 °C to + 100 °C	
Storage Temperature Range (Tstg)	-40 °C to + 100 °C	
Lead Solder Temperature 1.6 mm Below Package 260 °C for 5 seconds (Tsltd)		

ELECTRICAL / OPTICAL CHARACTERISTICS AT Ta = 25 °C

SYMBOL	PARAMETER	TEST COND.	MIN.	TYP.	MAX.	UNIT
V _F	Forward Voltage	I _F = 20 mA		2.3	2.8	V
I _R	Reverse Current	V _R = 5V			100	μA
λ _p	Peak Emission Wavelength	I _F = 20 mA		592		nm
λ _d	Dominant Wavelength	I _F = 20 mA		590		nm
2θ _{1/2}	Viewing Angle	I _F = 20 mA		15		Deg
I _v	Luminous Intensity	I _F = 20 mA	2800	4125		mcd

BIN GRADE LIMITS (IF=20 mA)

LUMINOUS INTENSITY / mcd

BIN GRADE LIMITS (IF=20 mA)

DOMINANT WAVELENGTH / nm

Bin	N	O	P	Q	R	S	Bin	YC	YD	YE	YF	YG
Min.	2800	3600	4650	6000	7800	10000	Min.	583	586	589	592	595
Max.	3600	4650	6000	7800	10000	13000	Max.	586	589	592	595	598

Tolerance ± 15% mcd

*Bright View reserves the rights to alter specifications and remove availability of products at any time without notice.

*Dominant Wavelength, λ_d is according to CIE Chromaticity Diagram base on color of lamps.

*θ_{1/2} is the off-axis angle where the luminous intensity is one half the on-axis intensity.



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TYPICAL ELECTRICAL / OPTICAL CHARACTERISTIC CURVES

FIG. 1 Forward Current vs. Forward Voltage
($T_a = 25^\circ\text{C}$)

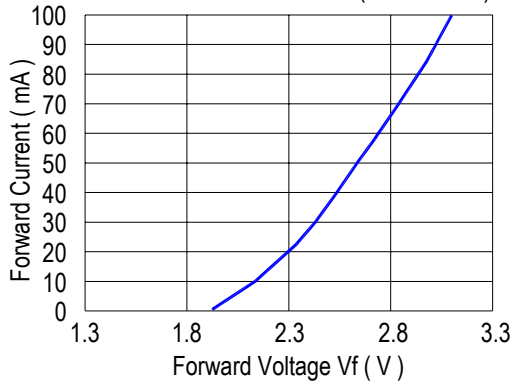


FIG. 2 Relative Intensity vs. Forward Current
($T_a = 25^\circ\text{C}$)

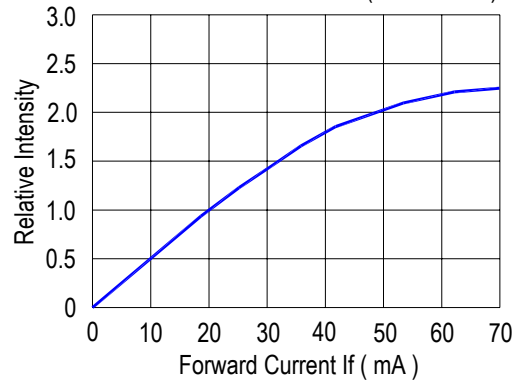


FIG. 3 Relative Voltage vs. Temperature

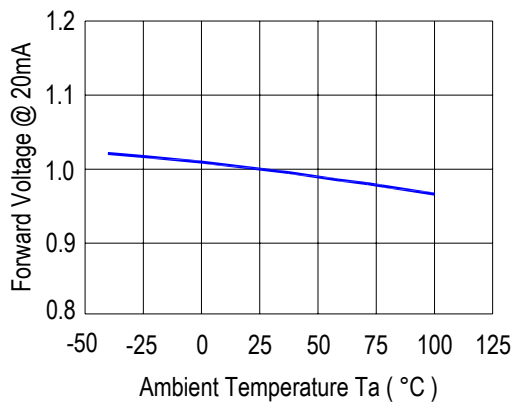


FIG. 4 Relative Intensity vs. Temperature

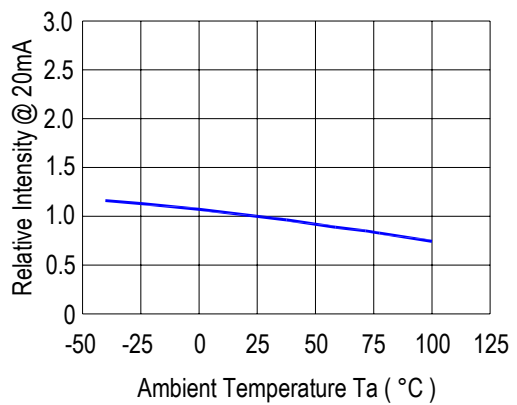


FIG. 5 Relative Intensity vs. Wavelength (λ_p)
($T_a = 25^\circ\text{C}$)

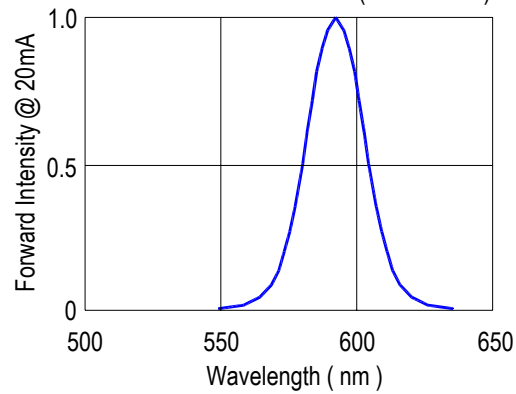
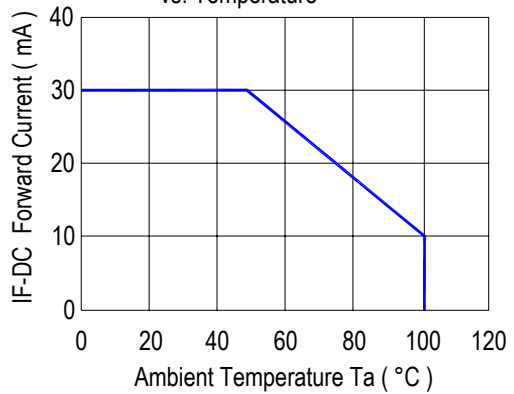


FIG. 6 Maximum Forward Current
vs. Temperature





BVU-5E1TT4

Apply to LAMP(DIP) series.

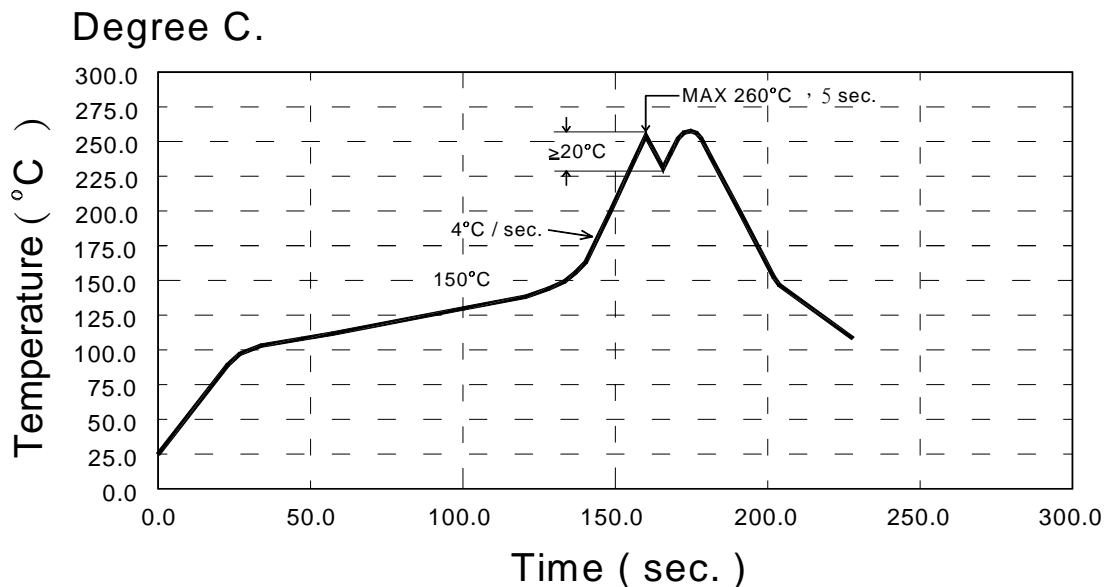
Description:

(1) Manual soldering (Solder Iron)

- (1.1) Temperature at tip of the iron: 300°C Max.
- (1.2) It's banned to load any stress on the resin during soldering.
- (1.3) Soldering time: 3 sec. Max.(one time only)
- (1.4) Leave 3mm of minimum distance from the base of epoxy.

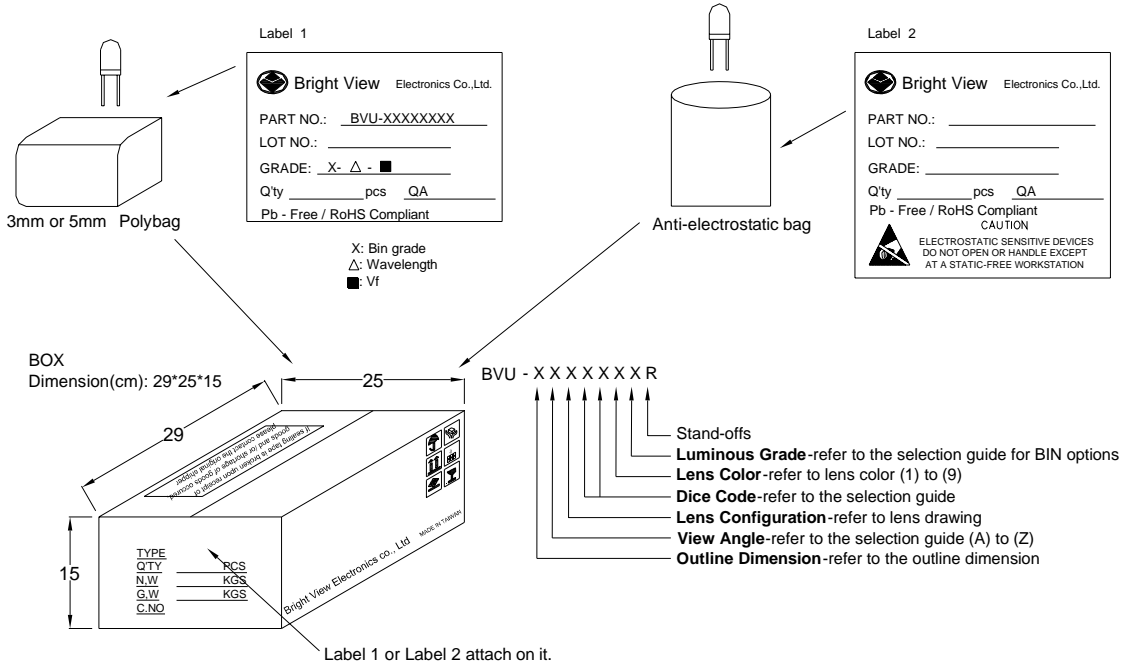
(2) Dip Soldering(Wave soldering-Solder Bath)

- (2.1) Leave 3mm of minimum distance from the base of the epoxy.
Soldering beyond the base of the tie bar(stand off) is recommended.
- (2.2) When soldering, do not put stress on the LEDs during heating.
- (2.3) Cutting the leadframes at high temperatures may cause LED failure.
- (2.4) Never take next process until the component is cooled down to room temperature after reflow.
- (2.5) After soldering, do not warp the circuit board.
- (2.6) The recommended dip soldering profile is the following:

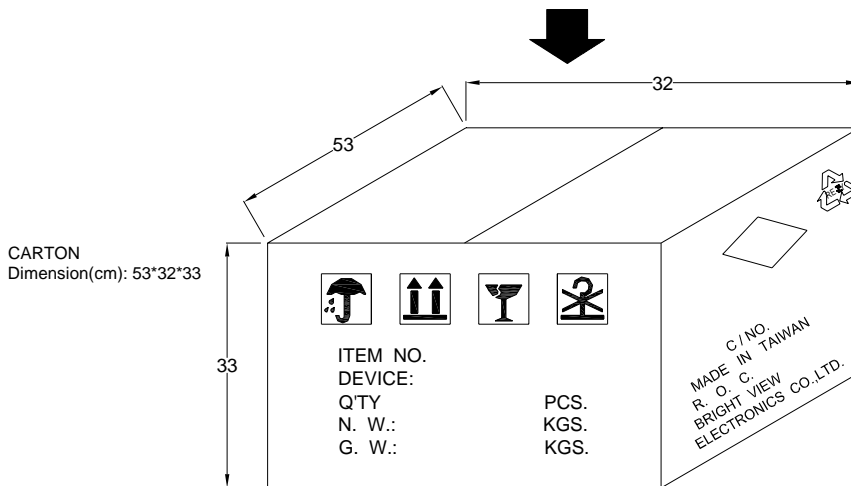




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Device	Q'ty / Polybag (pcs)	Polybag / Box A	Fig.
5mm(T-1 3/4)	1000pcs	14 bags	Label 1
3mm(T-1)	1000pcs	20 bags	Label 1
Blue / Green / White	500pcs	18 bags	Label 2



4 Boxes / Carton
5mm : 56,000pcs
3mm : 80,000pcs
Blue / Green / White : 36,000pcs