

### **3mm RIGHT ANGLE LED INDICATOR**

Part Number: WP42WUM/EGW

High Efficiency Red

### **Features**

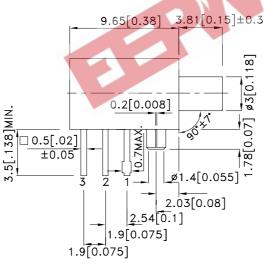
- PRE-TRIMMED LEADS FOR PC MOUNTING.
- I.C.COMPATIBLE.
- BLACK CASE ENHANCES CONTRAST RATIO.
- WIDE VIEWING ANGLE.
- HIGH RELIABILITY-LIFE MEASURED IN YEARS.
- UL RATING:94V-0.
- HOUSING MATERIAL: TYPE 66 NYLON.
- RoHS COMPLIANT.

## **Description**

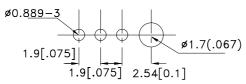
The High Efficiency Red source color devices are made with Gallium Arsenide Phosphide on Gallium Phosphide Orange Light Emitting Diode.

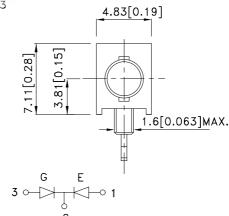
The Green source color devices are made with Gallium Phosphide Green Light Emitting Diode.

# **Package Dimensions**



RECOMMENDED PCB LAYOUT





- 1 ANODE RED
- 2 COMMON CATHODE
- 3 ANODE GREEN

- 1. All dimensions are in millimeters (inches).
- 2. Tolerance is ±0.25(0.01") unless otherwise noted.
- 3. Lead spacing is measured where the leads emerge from the package.4. Specifications are subject to change without notice.





SPEC NO: DSAF1868 **REV NO: V.4** DATE: MAY/21/2007 PAGE: 1 OF 5 APPROVED: WYNEC **CHECKED: Allen Liu** DRAWN: Y.L.LI ERP: 1102001386

### **Selection Guide**

Part No.	Dice	Lens Type	lv (mcd) [2] @ 20mA		Viewing Angle [1]
		,	Min.	Тур.	201/2
WP42WUM/EGW	High Efficiency Red (GaAsP/GaP)	WHITE DIFFUSED	4	13	- 100°
	Green (GaP)	WHITE DIFFOSED	4	13	

- 1. 01/2 is the angle from optical centerline where the luminous intensity is 1/2 the optical centerline value.

  2. Luminous intensity/ luminous Flux: +/-15%.

# Electrical / Optical Characteristics at TA=25°C

Symbol	Parameter	Device	Тур.	Max.	Units	Test Conditions
λpeak	Peak Wavelength	High Efficiency Red Green	627 565	200	nm	I==20mA
λD [1]	Dominant Wavelength	High Efficiency Red Green	625 5 <b>68</b>		nm	I==20mA
Δλ1/2	Spectral Line Half-width	High Efficiency Red Green	45 <b>30</b>		nm	I==20mA
С	Capacitance	High Efficiency Red Green	15 15		pF	VF=0V;f=1MHz
VF [2]	Forward Voltage	High Efficiency Red Green	2 2.2	2.5 2.5	V	I==20mA
lR	Reverse Current	High Efficiency Red Green		10 10	uA	V <sub>R</sub> = 5V

### Notes:

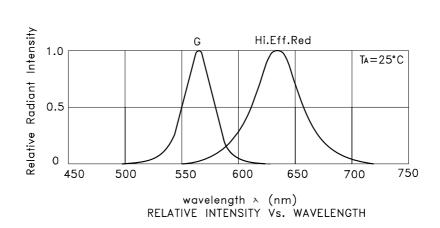
- 1.Wavelength: +/-1nm.
- 2. Forward Voltage: +/-0.1V.

# Absolute Maximum Ratings at TA=25°C

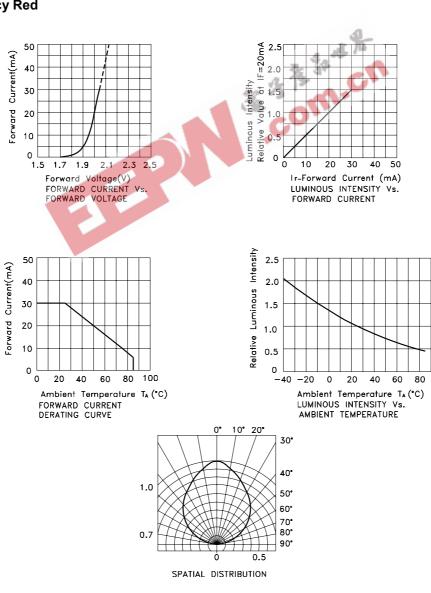
Parameter	High Efficiency Red	Green	Units		
Power dissipation	75	62.5	mW		
DC Forward Current	30	25	mA		
Peak Forward Current [1]	160	140	mA		
Reverse Voltage	ţ	V			
Operating / Storage Temperature	-40°C To +85°C				
Lead Solder Temperature [2]	260°C For 3 Seconds				
Lead Solder Temperature [3]	260°C For 5 Seconds				

- 1. 1/10 Duty Cycle, 0.1ms Pulse Width.
- 2. 2mm below package base.
   5mm below package base.

PAGE: 2 OF 5 SPEC NO: DSAF1868 **REV NO: V.4 DATE: MAY/21/2007 APPROVED: WYNEC CHECKED: Allen Liu** DRAWN: Y.L.LI ERP: 1102001386



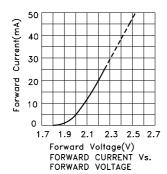
# WP42WUM/EGW High Efficiency Red

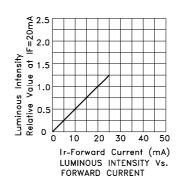


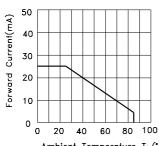
 SPEC NO: DSAF1868
 REV NO: V.4
 DATE: MAY/21/2007
 PAGE: 3 OF 5

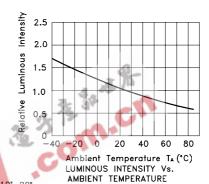
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## Green





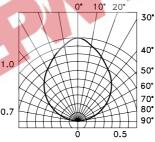




PAGE: 4 OF 5

ERP: 1102001386

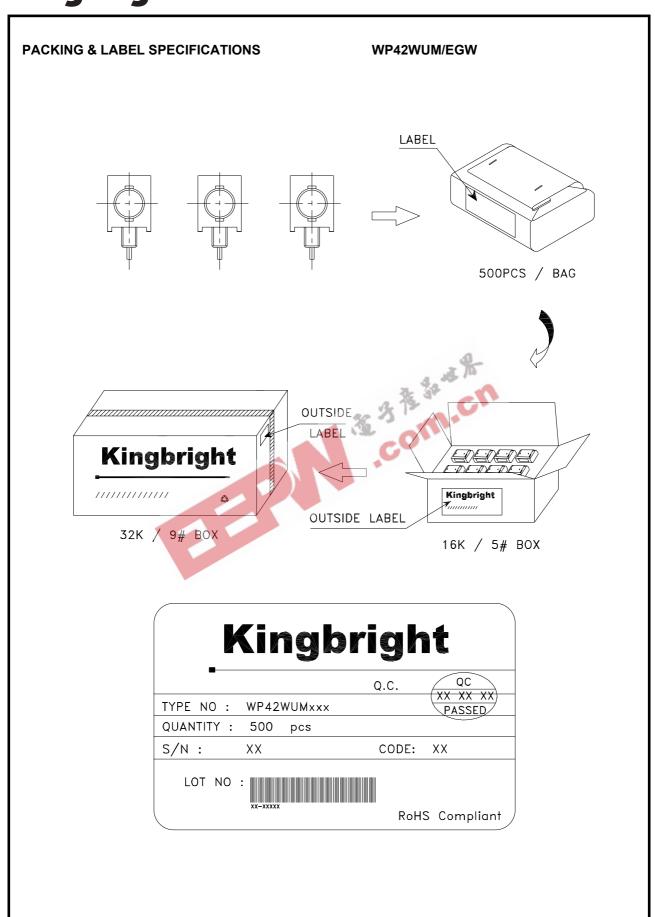




SPATIAL DISTRIBUTION

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