

Part Number: TBA40-11EGWA

High Efficiency Red
Green

Features

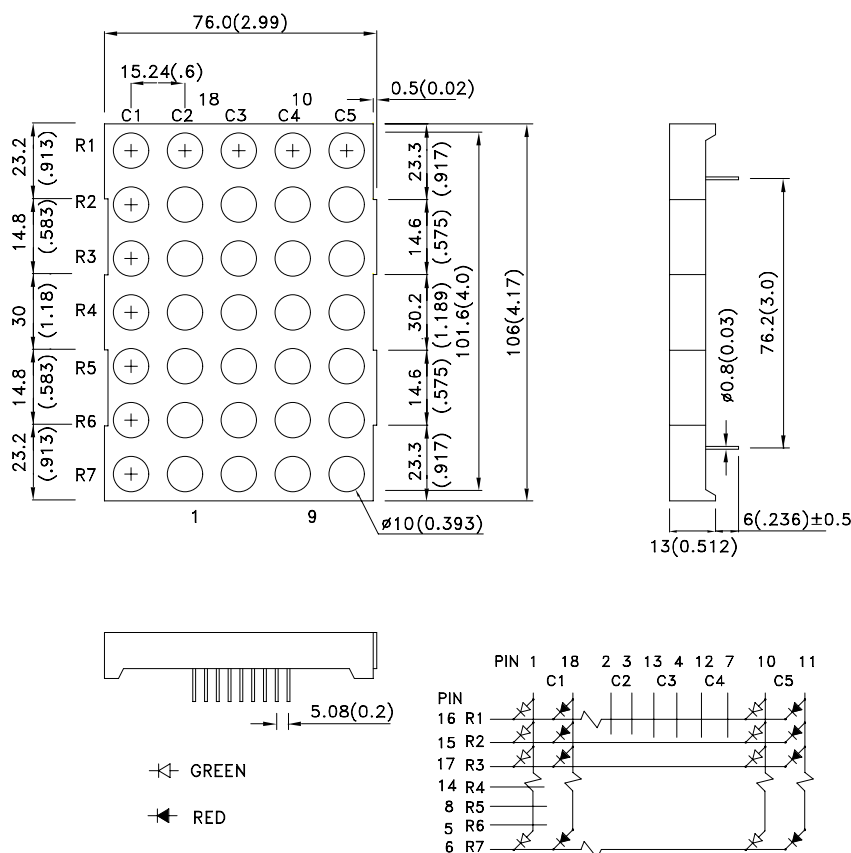
- 4.0 INCH MATRIX HEIGHT.
- DOT SIZE 10mm.
- LOW CURRENT OPERATION.
- HIGH CONTRAST AND LIGHT OUTPUT.
- COMPATIBLE WITH ASCII AND EBCDIC CODES.
- STACKABLE HORIZONTALLY.
- COLUMN CATHODE AND COLUMN ANODE AVAILABLE.
- EASY MOUNTING ON P.C. BOARDS OR SOCKETS.
- MULTICOLOR AVAILABLE.
- MECHANICALLY RUGGED.
- STANDARD : GRAY FACE, WHITE DOT.
- 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 & Internal Circuit Diagram



Notes:

1. All dimensions are in millimeters (inches), Tolerance is $\pm 0.25(0.01")$ unless otherwise noted.
2. Specifications are subject to change without notice.



Selection Guide

Part No.	Dice	Lens Type	Iv (ucd) [1] @ 10mA		Description
			Min.	Typ.	
TBA40-11EGWA	High Efficiency Red (GaAsP/GaP)	WHITE DIFFUSED	8000	33000	Column Anode
	Green (GaP)		12000	42000	

Note:

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

Electrical / Optical Characteristics at TA=25°C

Symbol	Parameter	Device	Typ.	Max.	Units	Test Conditions
λ_{peak}	Peak Wavelength	High Efficiency Red Green	627 565		nm	I _F =20mA
λ_D [1]	Dominant Wavelength	High Efficiency Red Green	625 568		nm	I _F =20mA
$\Delta\lambda_{1/2}$	Spectral Line Half-width	High Efficiency Red Green	45 30		nm	I _F =20mA
C	Capacitance	High Efficiency Red Green	15 15		pF	V _F =0V;f=1MHz
V _F [2]	Forward Voltage (Per Dot)	High Efficiency Red Green	4.0 4.4	5.0 5.0	V	I _F =20mA
I _R	Reverse Current (Per Dot)	High Efficiency Red Green		10 10	uA	V _R =10V

Notes:

1.Wavelength: +/-1nm.

2. Forward Voltage: +/-0.1V.

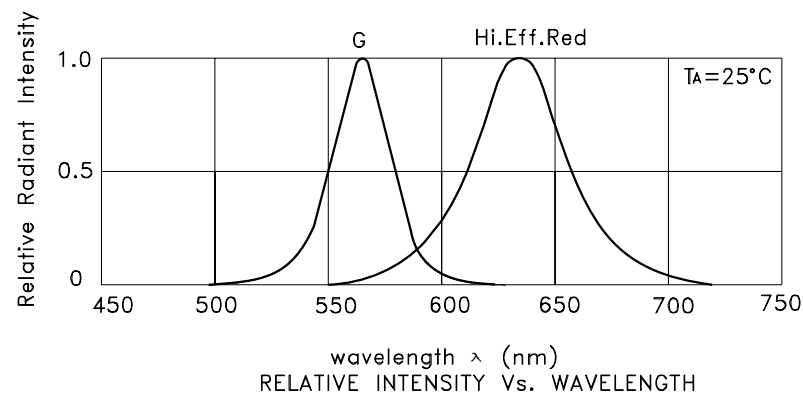
Absolute Maximum Ratings at TA=25°C

Parameter	High Efficiency Red	Green	Units
Power dissipation (Per Dot)	150	125	mW
DC Forward Current (Per Dot)	30	25	mA
Peak Forward Current [1] (Per Dot)	160	140	mA
Reverse Voltage (Per Dot)	10		V
Operating/Storage Temperature	-40°C To +85°C		
Lead Solder Temperature [2]	260°C For 3-5 Seconds		

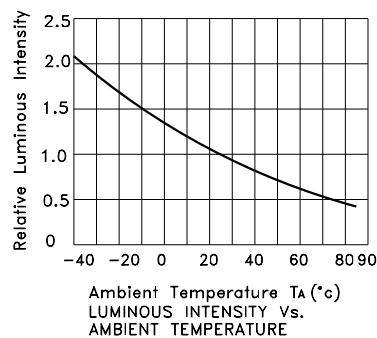
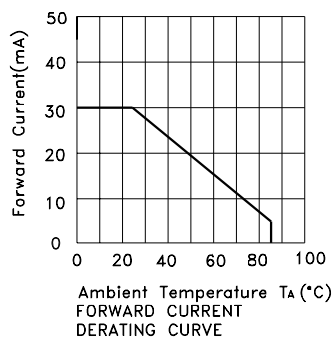
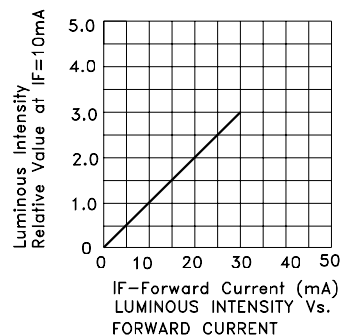
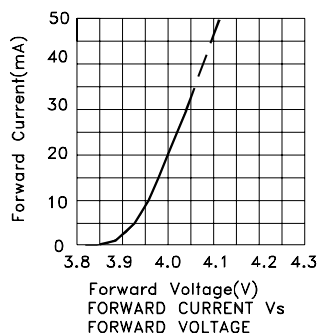
Notes:

1. 1/10 Duty Cycle, 0.1ms Pulse Width.

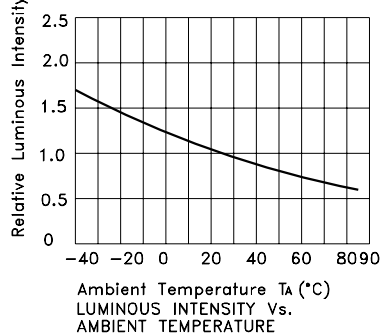
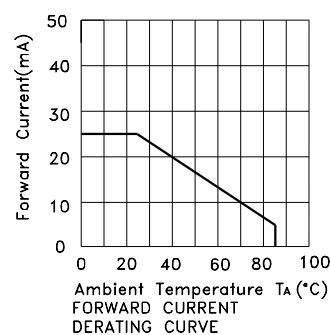
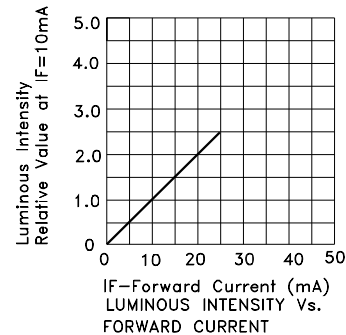
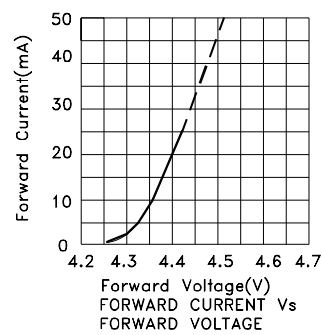
2. 2mm below package base.



TBA40-11EGWA
High Efficiency Red

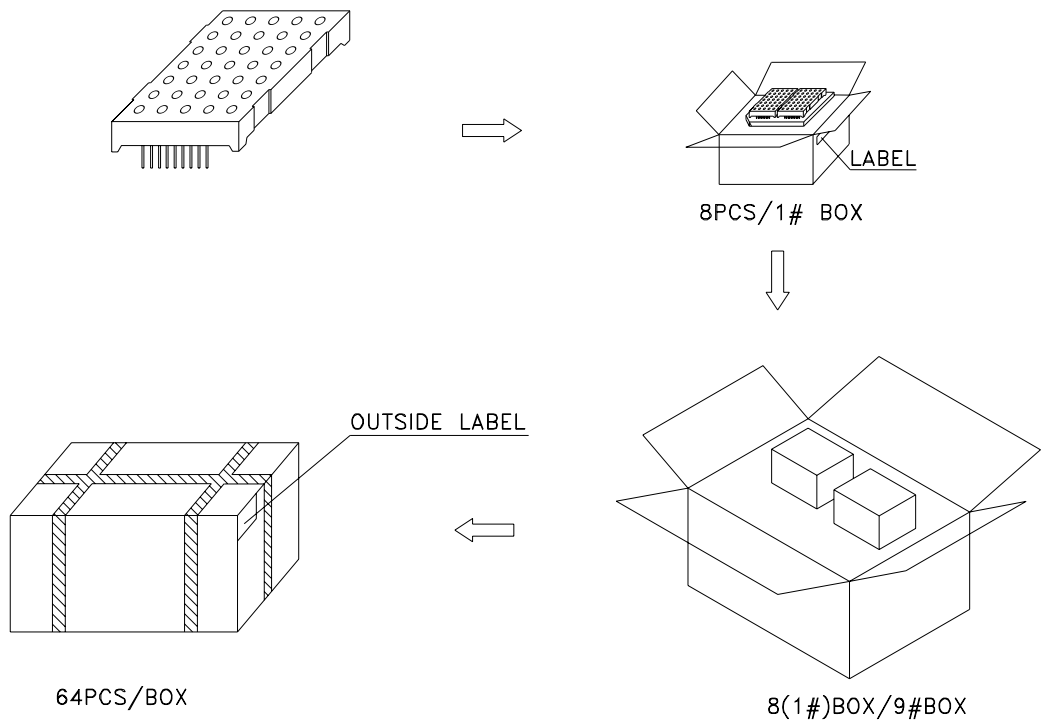


Green



PACKING & LABEL SPECIFICATIONS

TBA40-11EGWA



Inside LABEL Paste On The 1#BOX

Kingbright	TYPE:TBX40-11XXX	PASSED xx xx xx FQC	Date
QTY:8 PCS	CODE: xx		
xxxxxxxxxx-xxxx		RoHs Compliant	
LOT NO.		Number OF FQC	

Outside LABEL Paste On The Box

BOX Number	xxxx	xxxx
xxxxxxxxxx-xxxx		
TBX40-11XXX	64	PCS
xxxxxxxxxx-xxxx		
QA xx xx xx PASSED		
RoHs Compliant		

Number OF QA

Date