Kingbright

15mmx15mm LIGHT BAR

DE/4SGD

SUPER BRIGHT GREEN

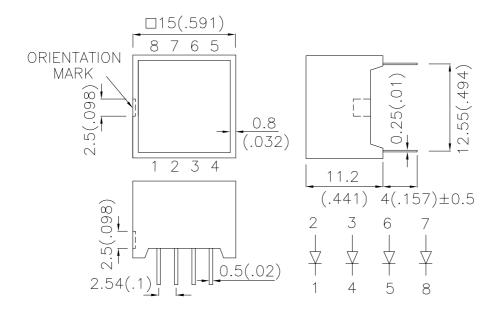
Features

- •UNIFORM LIGHT EMITTING AREA.
- •EASILY MOUNTED ON P.C. BOARDS OR INDUSTRY STANDARD SOCKETS.
- •FLUSH MOUNTABLE.
- •EXCELLENT ON/OFF CONTRAST.
- •CAN BE USED WITH PANELS AND LEGEND MOUNTS.
- •MECHANICALLY RUGGED.
- ●I.C. COMPATIBLE.
- ●RoHS COMPLIANT.

Description

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

Package Dimensions & Internal Circuit Diagram



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.

SPEC NO: DSAE8488 APPROVED: J. Lu

REV NO: V.2 CHECKED: Joe Lee

DATE: MAR/23/2005 DRAWN: B.H.LI

PAGE: 1 OF 3

Kingbright

Selection Guide

Part No.	Dice	Lens Type	lv (m @ 20	,	Viewing Angle
			Min. Typ.		2 θ 1/2
DE/4SGD	SUPER BRIGHT GREEN (GaP)	GREEN DIFFUSED	18	80	120°

Electrical / Optical Characteristics at Ta=25°C

Symbol	Parameter	Device	Тур.	Max.	Units	Test Conditions
λpeak	Peak Wavelength	Super Bright Green	565		nm	IF=20mA
λD	Dominant Wavelength	Super Bright Green	568		nm	IF=20mA
Δλ1/2	Spectral Line Half-width	Super Bright Green	30		nm	IF=20mA
С	Capacitance	Super Bright Green	15		pF	VF=0V;f=1MHz
VF	Forward Voltage	Super Bright Green	2.2	2.5	V	IF=20mA
IR	Reverse Current	Super Bright Green		10	uA	VR = 5V

Absolute Maximum Ratings at Ta=25°C

Parameter	Super Bright Green		
Power dissipation	105	mW	
DC Forward Current	25	mA	
Peak Forward Current [1]	140	mA	
Reverse Voltage	5	V	
Operating/Storage Temperature	-40°C To +85°C		
Lead Solder Temperature [2]	260°C For 5 Seconds		

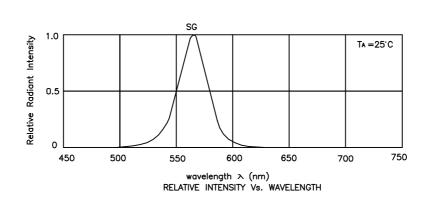
- 1. 1/10 Duty Cycle, 0.1ms Pulse Width.
- 2. 5mm below package base.

DATE: MAR/23/2005 **SPEC NO: DSAE8488** REV NO: V.2 PAGE: 2 OF 3 DRAWN: B.H.LI

APPROVED: J. Lu **CHECKED:** Joe Lee

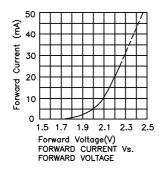
 $^{1.\,\}theta1/2$ is the angle from optical centerline where the luminous intensity is 1/2 the optical centerline value.

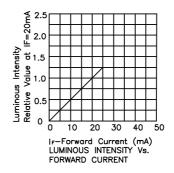
Kingbright

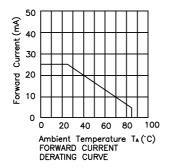


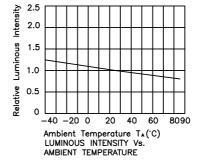
Super Bright Green

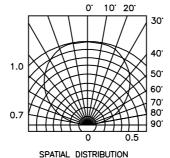
DE/4SGD











Remarks:

If special sorting is required (e.g. binning based on forward voltage, luminous intensity, or wavelength), the typical accuracy of the sorting process is as follows:

- 1. Wavelength: +/-1nm
- 2. Luminous Intensity: +/-15%
- 3. Forward Voltage: +/-0.1V

Note: Accuracy may depend on the sorting parameters.

SPEC NO: DSAE8488 REV NO: V.2 DATE: MAR/23/2005 PAGE: 3 OF 3
APPROVED: J. Lu CHECKED: Joe Lee DRAWN: B.H.LI