

### DESCRIPTION:

The 333 Super Bright series is conventional 5mm LED lamps utilizing higher intensity materials to achieve superior performance.

The semi-conductor materials used are:

GaAlAs for (333HR3C/HR3D)

GaP for (333VGC/VGD, 333YGUC/YGUD)

GaAsP/GaP for (333VYC/VYD)

AlGaInP for (333RS1C/RS1D, 333UY1C/UY1D)

### ABSOLUTE MAXIMUM RATINGS: (Ta=25°C)

Reverse Voltage	5 Volt
Reverse Current (Vr =5V)	100μA
Operating Temperature Range	-40°C To 85°C
Storage Temperature Range	-40°C To 100°C
Lead Soldering Temperature (1.6mm (1/16)From Body)	260°C For 5 Seconds

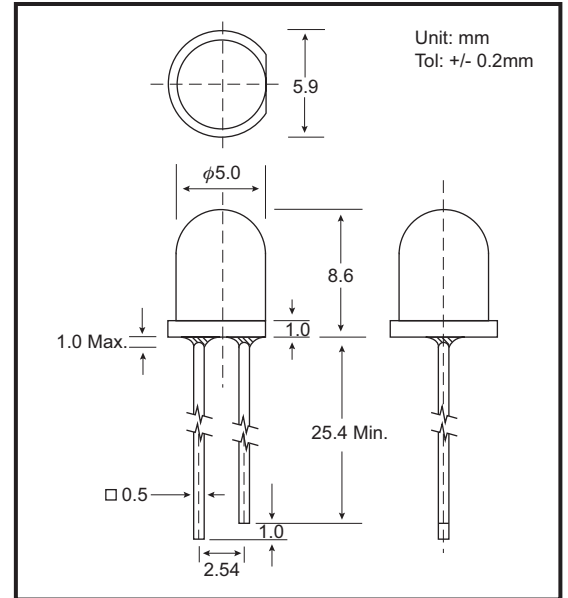
NOTES : 1. All dimensions are in millimeters.

2. Lead spacing is measured where the leads emerge from the package.

3. Protuded resin under flange is 1.5 mm (0.059") Max.

4. Specifications are subject to change without notice.

### PACKAGE DIMENSIONS



### PART NO. SELECTION AND APPLICATION INFORMATION (RATINGS AT 25°C AMBIENT)

Part No.	Emitted Color	Lens Color	Peak Wavelength $\lambda_p$ (nm)	Vf (v)		Rec. If (mA).	Iv (mcd)		View Angle $2\theta_{1/2}$ (Deg)
				Min	Max		Min	Typ.	
GB-333HR3D	Super Red	Red Diffused	660	1.7	2.6	10-20	60.0	80.0	36
GB-333RS1D	Super Red	Red Diffused	635	1.7	2.6	10-20	200.0	250.0	36
GB-333VGD	Super Green	Green Diffused	565	1.7	2.6	10-20	35.0	50.0	36
GB-333YGUD	Super Green	Green Diffused	565	1.7	2.6	10-20	60.0	80.0	36
GB-333VYD	Super Yellow	Yellow Diffused	585	1.7	2.6	10-20	30.0	38.0	36
GB-333UY1D	Super Yellow	Yellow Diffused	590	1.7	2.6	10-20	200.0	250.0	36
GB-333HR3C	Super Red	Water Clear	660	1.7	2.6	10-20	160.0	230.0	16
GB-333RS1C	Super Red	Water Clear	635	1.7	2.6	10-20	800.0	1000.0	16
GB-333VGC	Super Green	Water Clear	565	1.7	2.6	10-20	250.0	350.0	16
GB-333YGUC	Super Green	Water Clear	565	1.7	2.6	10-20	300.0	420.0	16
GB-333VYC	Super Yellow	Water Clear	585	1.7	2.6	10-20	85.0	120.0	16
GB-333UY1C	Super Yellow	Water Clear	590	1.7	2.6	10-20	700.0	1000.0	16

### TESTING CONDITION FOR EACH PARAMETER :

PARAMETER:	SYMBOL	UNIT	TEST CONDITION
REVERSE VOLTAGE	Vr	VOLT	Vr = 5.0 Volt
REVERSE CURRENT	Ir	μA	If = 20mA
FORWARD VOLTAGE	Vf	VOLT	If = 20mA
LUMINOUS INTENSITY	Iv	MCD	If = 20mA
VIEWING ANGLE	$2\theta_{1/2}$	DEGREE	
RECOMMENDED OPERATING CURRENT	If (Rec)	mA	

