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## Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

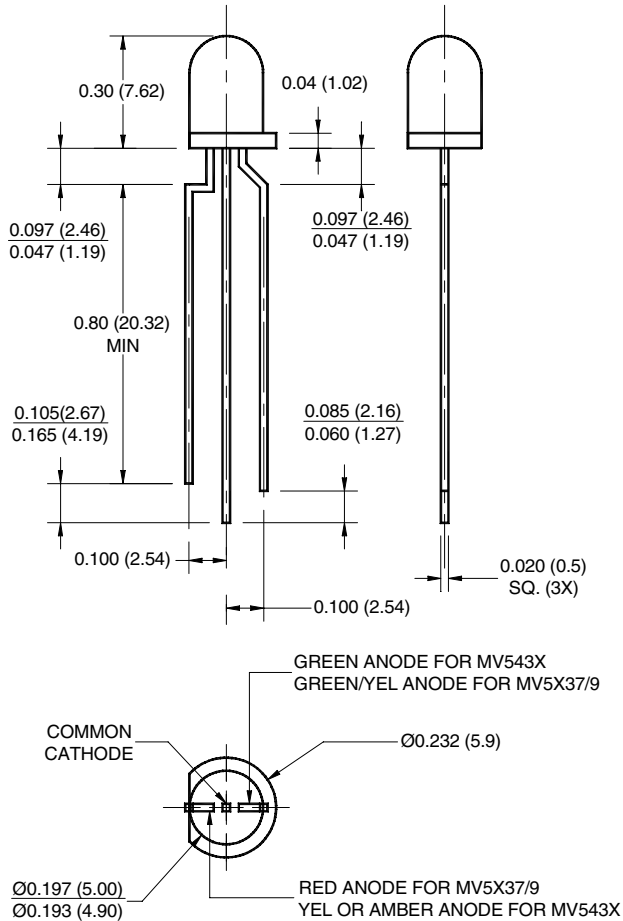
Email & Skype: info@chipsmall.com Web: www.chipsmall.com

Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



# 3 LEAD BICOLOR T-1 3/4 (5 mm) SOLID STATE LAMPS

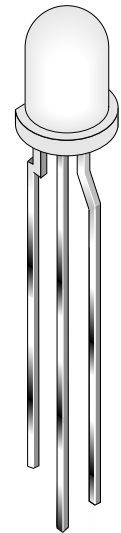
## PACKAGE DIMENSIONS



### NOTES:

1. Dimensions for all drawings are in inches (mm).
2. Tolerance is  $\pm 0.12''$  unless otherwise specified.

GREEN / YELLOW	MV5433
GREEN / ORANGE	MV5438
YELLOW / HER	MV5337
GREEN / HER	MV5437
GREEN / AlGaAs RED	MV5439



## FEATURES

- Popular T-1 3/4 package
- Wide viewing angle
- Solid state reliability
- TTL compatible

## DESCRIPTION

The MV5X3X T-1 3/4 (5 mm) lamp is a three-lead bicolor light source with a central common cathode lead. Each lamp comes with a white diffused lens and has a 100° viewing angle.

## ABSOLUTE MAXIMUM RATINGS ( $T_A = 25^\circ\text{C}$ unless otherwise specified)

Parameter	AlGaAs RED	HER	Green	Yellow	Orange	Units
Continuous Forward Current ( $I_F$ )	30	30	30	20	30	mA
Peak Forward Current ( $I_F$ ) ( $f = 1.0$ KHz, Duty Factor = 1/10)	90	90	90	60	90	mA
Power Dissipation ( $P_D$ )	120	120	120	85	100	mW
Reverse Voltage ( $V_R$ )	5	5	5	5	5	V
Operating Temperature ( $T_{OPR}$ )	-55 to +100					$^\circ\text{C}$
Storage Temperature ( $T_{STG}$ )	-55 to +100					$^\circ\text{C}$
Lead Soldering Time ( $T_{SOL}$ )	260 for 5 sec					$^\circ\text{C}$

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## ELECTRICAL / OPTICAL CHARACTERISTICS (T<sub>A</sub> = 25°C)

Part Number	MV5437 Grn/HER	MV5337 Yel/HER	MV5433 Grn/Yel	MV5438 Grn/Orange	MV5439 Grn/AlGaAs Red	Condition
Luminous Intensity (mcd)						I <sub>F</sub> = 20 mA
Minimum	2/2	2/2	2/2	2/2	2/10	
Typical	6/6	6/6	6/6	6/6	6/25	
Forward Voltage (V)						I <sub>F</sub> = 20 mA
Maximum	3.0/3.0	3.0/3.0	3.0/3.0	3.0/3.0	3.0/2.4	
Typical	2.1/2.1	2.1/2.1	2.3/2.3	2.3/2.3	2.3/1.7	
Peak Wavelength (nm)	565/635	585/635	565/585	565/610	565/660	I <sub>F</sub> = 20 mA
Spectral Line Half Width (nm)	30/45	35/45	30/35	30/40	30/20	I <sub>F</sub> = 20 mA
Viewing Angle (°)	100°	100°	100°	100°	100°	I <sub>F</sub> = 20 mA

## TYPICAL PERFORMANCE CURVES

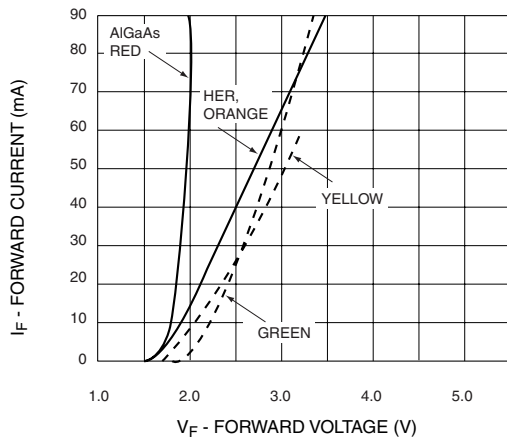


Fig. 1 Forward Current vs. Forward Voltage

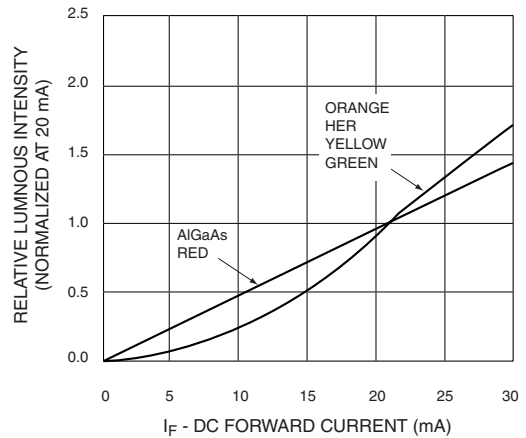
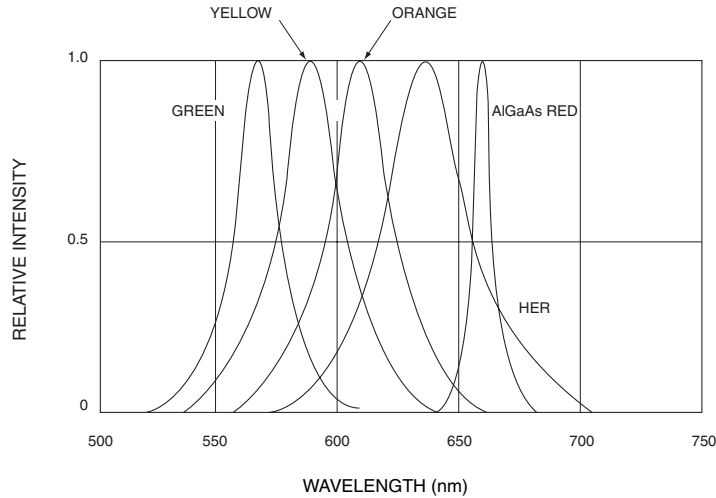


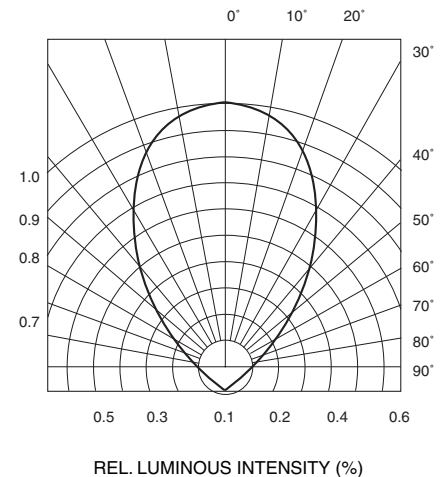
Fig. 2 Relative Luminous Intensity vs. DC Forward Current

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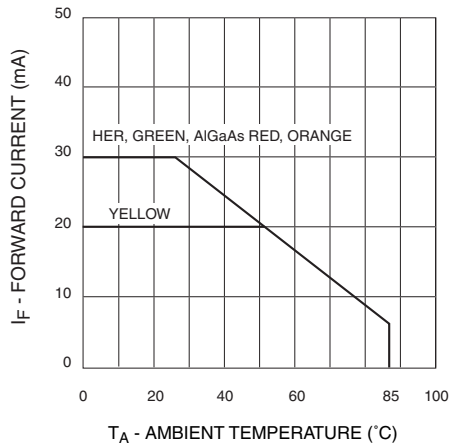
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<b>GREEN / ORANGE</b>	<b>MV5438</b>
<b>YELLOW / HER</b>	<b>MV5337</b>
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**Fig. 3 Relative Intensity vs. Peak Wavelength**



**Fig. 4 Radiation Diagram**



**Fig. 5 Current Derating Curve**

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