Directly mountable, two-color LEDs (φ5.0 mm)
SPR-325 Series

The SPR-325 series are φ3.2 mm, two-color LEDs which can be directly mounted on a printed circuit board. Red and green elements are built into a single package, and these LEDs are suitable for a wide range of uses.

●Features
1) Two-color emission : red and green.
2) Epoxy resin package with a diameter of 3.2 mm.
3) Milky white lens.
4) High reliability.
5) Lead pitch of 2.5 mm.

●Selection guide

Emitting color / Lens	Red / Green
Milky white	SPR-325MVW

Note: This product is only available on tape.

●External dimensions (Units: mm)

1 : ANODE RED
2 : CATHODE
3 : ANODE GREEN

Tolerances are ±0.2 unless otherwise noted:

●Absolute maximum ratings (Ta = 25°C)

Parameter	Symbol	Red	Green	Unit
Power dissipation	P_D	60	75	mW
Forward current	I_F	20	25	mA
Peak forward current	I_{FP}	60*	60*	mA
Reverse voltage	V_R	3	3	V
Operating temperature	Topr	−25〜+85		°C
Storage temperature	Tstg	−30〜+100		°C
Soldering temperature	—	260°C 5 seconds maximum		—

＊ Pulse width 1ms Duty 1 / 5

ROHM

●Electrical and optical characteristics (Ta = 25°C)

Parameter	Symbol	Conditions	Red			Green			Unit
			Min.	Typ.	Max.	Min.	Typ.	Max.	
Forward voltage	V_F	I_F=10mA	—	2.0	3.0	—	2.1	3.0	V
Reverse current	I_R	V_R=3V	—	—	10	—	—	10	μA
Peak wavelength	λ_P	I_F=10mA	—	650	—	—	563	—	nm
Spectral line half width	$\Delta\lambda$	I_F=10mA	—	40	—	—	40	—	nm
Viewing angle	$2\theta_{1/2}$	Diffused	—	40	—	—	40	—	deg
Luminous intensity	I_V	I_F=10mA	2.2	6.3	—	3.6	10	—	mcd

●Luminous intensity vs. wavelength
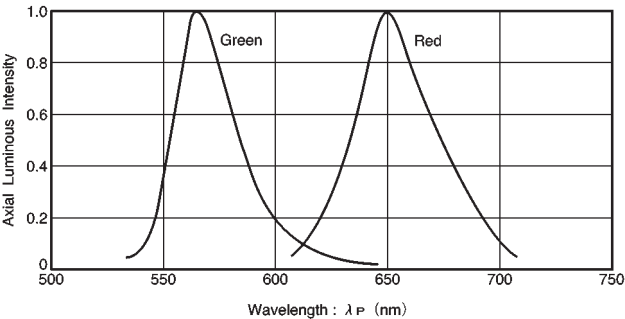
Fig. 1

●Directional pattern
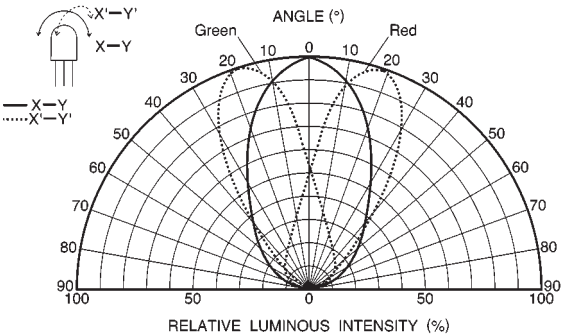
Fig. 2

●Electrical characteristic curves (red, green)
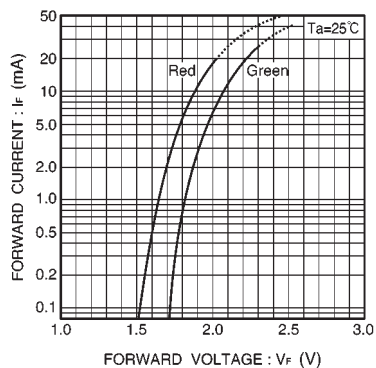
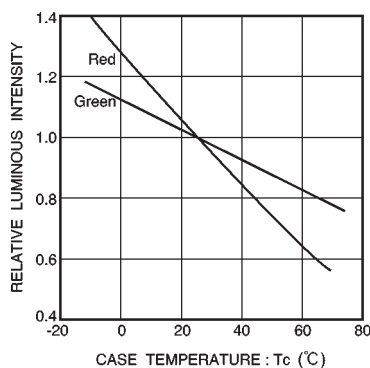Fig. 3 Forward current vs. forward voltage
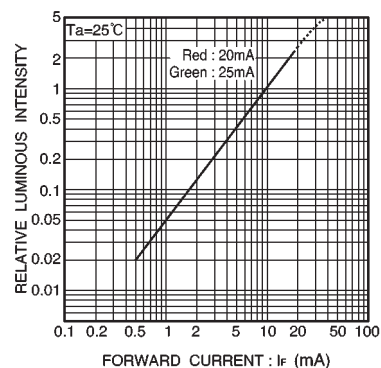
Fig. 4 Luminous intensity vs. case temperature

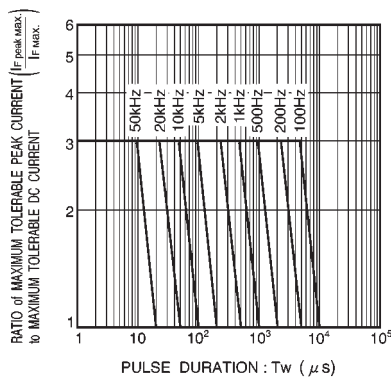Fig. 5 Luminous intensity vs. forward current

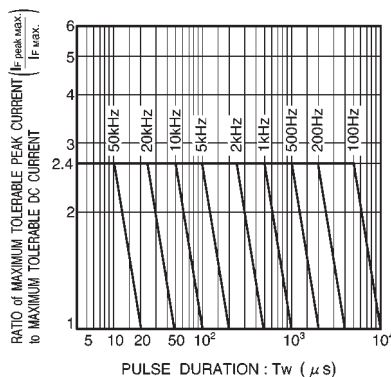Fig. 6 Maximum tolerable peak current vs. pulse duration (red)

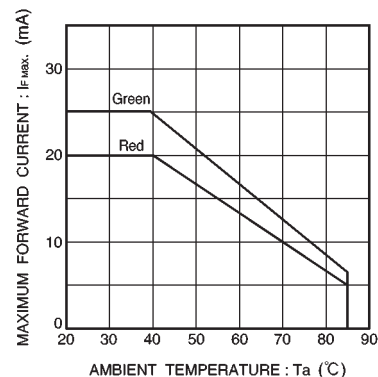Fig. 7 Maximum tolerable peak current vs. pulse duration (green)

Fig. 8 Maximum forward current vs. ambient temperature