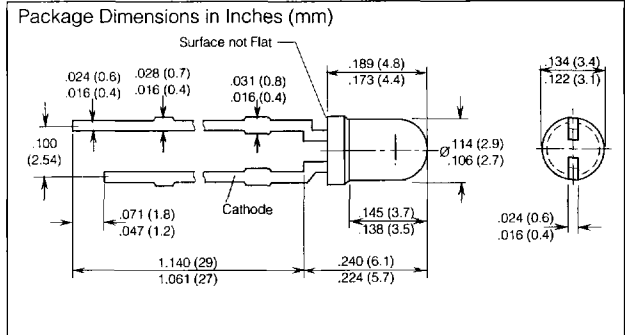
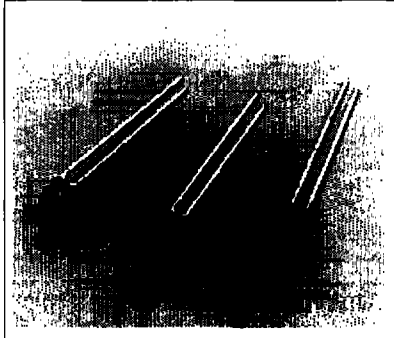


SIEMENS

SUPER-RED LS 3340
ORANGE LO 3340
YELLOW LY 3340
PURE GREEN LP 3340
GREEN LG 3330
T1 (3 mm) LED Lamp



FEATURES

- High Light Output
- Lens:
 - Super-Red, Orange, Yellow: Tinted Clear
 - Green: Colorless Clear
- Viewing Angle 50°
- T1 (3 mm) Package Size
- 1" Lead Length
- IC Compatible

DESCRIPTION

The LS 3340 super-red, LO 3340 orange and the LY 3340 yellow are premium high efficiency light emitting diode lamps fabricated with TSN (transparent substrate nitrogen) technology. The LG 3330 and LP 3340 green series are gallium phosphide (GaP) lamps. All have tinted colored lenses (except green/pure green-colorless lens).

Maximum Ratings

Operating Temperature
 Range (T_{OP}) -55°C to +100°C
 Storage Temperature
 Range (T_{STG}) -55°C to +100°C
 Junction Temperature (T_J) 100°C
 Reverse Voltage (V_R) 5 V
 Forward Current (I_F) 40 mA
 Surge Current (I_{FS}) $t=10 \mu s$ 0.5 A
 Total Power Dissipation
 (P_{TOT}) $T_A=25^\circ C$ 140 mW
 Thermal Resistance Junction
 to Air (R_{THJA}) 400 K/W

Characteristics ($T_A=25^\circ C$) All values typical unless otherwise noted

Parameter	Symbol	Super-			Pure		Unit
		Red	Yellow	Orange	Green	Green	
Peak Wavelength	λ_{PEAK}	635	586	610	565	557	nm
Dominant Wavelength	λ_{DOM}	628.	590	605	570	560	nm
Spectral Bandwidth (50% I_{RELMAX} , $I_F=20$ mA)	$\Delta\lambda$	45	45	40	25	22	nm
Forward Voltage ($I_F=10$ mA)	V_F	2.0 (≤ 2.6)	2.0 (≤ 2.6)	2.0 (≤ 2.6)	2.0 (≤ 2.6)	2.0 (≤ 2.6)	V
Reverse Current ($V_R=5$ V)	I_R	0.01 (≤ 10)	0.01 (≤ 10)	0.01 (≤ 10)	0.01 (≤ 10)	0.01 (≤ 10)	μA
Capacitance ($V_R=0$ V, $f=1$ MHz)	C_0	12	10	8	15	15	pF
Rise Time	t_R	300	300	300	450	450	ns
Fall Time	t_F	150	150	150	200	200	ns

Luminous Intensity (mcd)*		Test				Test			
Part Number	Min.	Max.	Condition	Part Number	Min.	Max.	Condition		
LS 3340-KN	6.3	50	10 mA	LY3340-JM	4	32	10 mA		
LS 3340-MP	16	80	10 mA	LY 3340-LP	10	80	10 mA		
LS 3340-M	16	32	10 mA	LY 3340-L	10	20	10 mA		
LS 3340-N	25	50	10 mA	LY 3340-M	16	32	10 mA		
LO 3340-KN	6.3	20	10 mA	LG 3330-KN	6.3	50	10 mA		
LO 3340-M	10	20	10 mA	LG 3330-L	10	20	10 mA		
LO 3340-MP	10	80	10 mA	LG 3330-LP	10	80	10 mA		
LO 3340-N	16	32	10 mA	LG 3330-M	16	32	10 mA		
				LG 3330-N	25	50	10 mA		
				LP 3340-HO	2.5		10 mA		

* Luminous intensity ratio of one packaging unit $I_{VMAX}/I_{VMIN} \leq 2$.

See graphs 1, 2B, 3A, 4A, 5A, 6A, 7B, 8A, 9A, 10A in the back of this section.