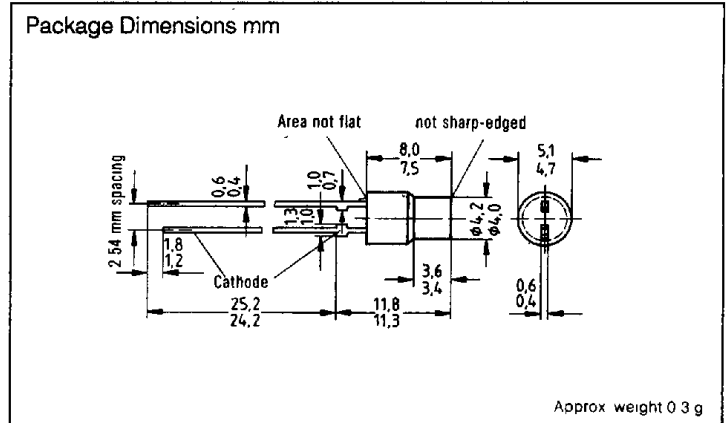
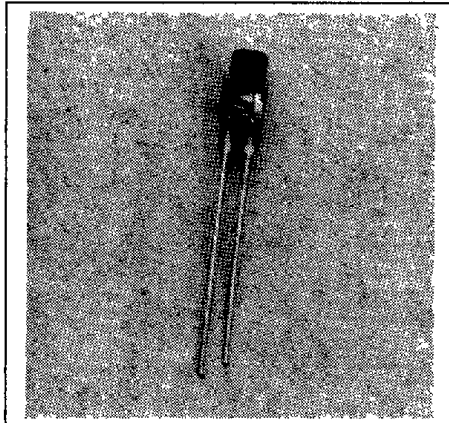


SIEMENS

T-41-23

RED LR H380
SUPER-RED LS H380
YELLOW LY H380
GREEN LG H380
CYLINDRICAL LED LAMP



FEATURES

- Red Partly Diffused Lens, LR H380 and LS H380
- Yellow Partly Diffused Lens, LY H380
- Green Partly Diffused Lens, LG H380
- Cylindrical Shape
- Minimum Lead Length 1"
- 1/10" Lead Spacing
- I/C Compatible

DESCRIPTION

The LR H380 is a standard red GaAsP LED lamp. The LS H380 and LY H380 are light emitting diode lamps fabricated with TSN (transparent substrate nitrogen) technology. The LG H380 is a gallium phosphate LED lamp. All the series have a diffused lens which forms an evenly dispersed circular head-on light.

Maximum Ratings

Reverse Voltage (V_R)	.....	5 V
Forward Current (I_F)	.....	45 mA
Surge Current ($t \leq 10 \mu s$) (I_{FS})	.....	1 A
Storage Temperature (T_{STG})	.....	-55°C to +100°C
Junction Temperature (T_J)	.....	100°C
Power Dissipation (P_{TOT}) $T_A=25^\circ C$	.....	150 mW
Thermal Resistance Junction to Air (R_{th-ja})	.....	500 K/W

Characteristics ($T_A=25^\circ C$)

Parameter	Symbol	LR H380 Red	LS H380 Super-Red	LY H380 Yellow	LG H380 Green	Unit
Wavelength of Emitted Light	λ_{PEAK}	660	635	586	565	nm
Dominant Wavelength	λ_{DOM}	645	628	590	567	nm
Viewing Angle (Limits for 50% of Luminous Intensity I_v , shielded against lateral emission of light)	ϕ	100	100	100	100	Deg
Forward Voltage ($I_F=10$ mA)	V_F	1.6 (≤ 2.0)	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)	μA
Capacitance ($V_R=0$ V)	C_D	25	12	10	15	pF
Rise Time	t_r	120	300	300	450	ns
Fall Time	t_f	50	150	150	200	ns

Luminous Intensity (mcd)

Part Number	Min.	Max.	Test Condition	Part Number	Min.	Max.	Test Condition
LR H380-BD	0.16	0.8	10 mA	LY H380-EH	0.63	5	10 mA
LR H380-C	0.25	0.5	10 mA	LY H380-F	1	2	10 mA
LR H380-D	0.4	0.8	10 mA	LY H380-G	1.6	3.2	10 mA
LS H380-EH	0.63	0.5	10 mA	LY H380-GK	1.6	12.5	10 mA
LS H380-G	1.6	3.2	10 mA	LY H380-H	2.5	5	10 mA
LS H380-GK	1.6	12.5	10 mA	LG H380-EH	0.63	5	10 mA
LS H380-H	2.5	5	10 mA	LG H380-F	1	2	10 mA
LS H380-J	4	8	10 mA	LG H380-G	1.6	3.2	10 mA
				LG H380-GK	1.6	12.5	10 mA
				LG H380-H	2.5	5.0	10 mA

See graph numbers 1, 3A, 5A, 6A, 7A, 8, 9, 10 on pages 42 - 48