



1.8mm j AXIAL LED LAMP

LT02XX-A7 SERIES

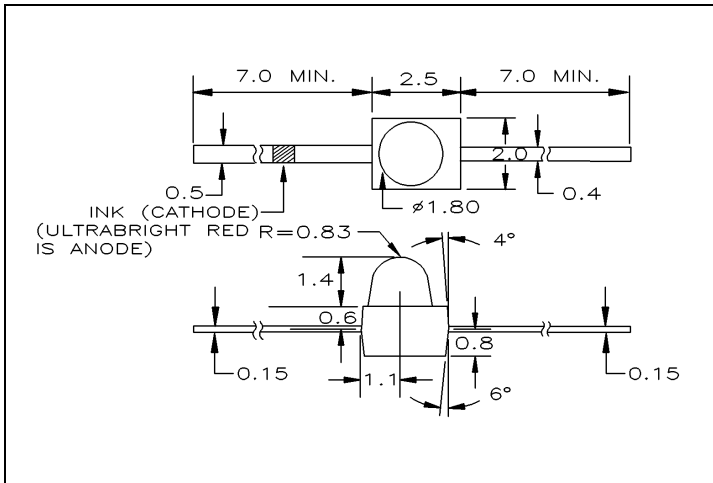
Features

*LOW CURRENT REQUIREMENTS

*HIGH LIGHT OUTPUT

*IC COMPATIBLE

Package Dimensions



NOTES:

- 1.All dimensions are in millimeters.
- 2.Tolerance is ± 0.25 mm unless otherwise noted.
- 3.An epoxy meniscus may extend about 1.0 mm down the leads.
- 4.Burr around bottom of epoxy body may be 0.5 mm MAX.

Absolute Maximum Ratings at $T_A=25^\circ\text{C}$

REVERSE VOLTAGE(<100 μ A).....	ULTRABRIGHT 4.0V, GaAsP RED 3.0V, OTHER 5.0 V
D.C. FORWARD CURRENT.....	30 mA
PULSE CURRENT (1/10 DUTY CYCLE, 0.1ms PULSE WIDTH).....	100 mA
OPERATING TEMPERATURE RANGE.....	-25°C TO +85°C
STORAGE TEMPERATURE RANGE.....	-25°C TO +100°C
LEAD SOLDERING TEMP. (1.6mm FROM BODY).....	260°C FOR 5 SEC.

Electrical/Optical Characteristics at T_A=25°C

PART NUMBER	LED CHIP		LEN'S COLOR	PEAK WAVELENGTH @20mA(nm)	FORWARD VOLTAGE @20mA(V)		LUMINOUS INTENSITY @20mA(mcd)		VIEW ANGLE 2q _{1/2} (deg)
	MATERIAL	EMITTING COLOR			TYP.	MAX.	MIN.	TYP.	
LT0213-A7	GaAsP	RED	W.C.	655	1.7	2.0	1.4	2.3	36
LT0214-A7			R.C.						
LT0213G-A7	GaP	RED	W.C.	700	2.1	3.0	2.0	3.4	36
LT0214G-A7			R.C.						
LT0223-A7	GaP	GREEN	W.C.	567	2.1	2.6	10.0	16.7	36
LT0224-A7			G.C.						
LT0233-A7	GaAsP ON GaP	YELLOW	W.C.	585	2.1	3.0	8.2	13.7	36
LT0234-A7			Y.C.						
LT0243-A7	GaAsP ON GaP	ORANGE	W.C.	635	2.1	3.0	11.6	19.4	36
LT0244-A7			O.C.						
LT0244R-A7			R.C.						
LT0233-A7-UR	InGaAlP ON GaAs	YELLOW	W.C.	593	2.1	2.4	314.2	523.7	36
LT0234-A7-UR			Y.C.						
LT02J3-A7-UR	InGaAlP ON GaAs	REDDISH ORANGE	W.C.	621	2.1	2.4	314.2	523.7	36
LT02J4-A7-UR			O.C.						
LT0273-A7-UR	GaAlAs ON GaAlAs	RED	W.C.	660	1.9	2.5	142.0	236.0	36
LT0274-A7-UR			R.C.						

(1) LEN'S COLOR

R.C RED CLEAR

G.C GREEN CLEAR

Y.C YELLOW CLEAR

O.C ORANGE CLEAR

W.C WATER CLEAR

(2) SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE.

(3) ALL ABOVE COMPONENTS ARE CONSIDERED . DEVIATIONS FROM STATED SPECIFICATIONS WILL REQUIRE A NEW PART NUMBER BE ASSIGNED.

Electrical/Optical Characteristics at T_A=25°C

PART NUMBER	LED CHIP		LEN'S COLOR	PEAK WAVELENGTH @20mA(nm)	FORWARD VOLTAGE @20mA(V)		LUMINOUS INTENSITY @20mA(mcd)		VIEW ANGLE 2q _{1/2} (deg)
	MATERIAL	EMITTING COLOR			TYP.	MAX.	MIN.	TYP.	
LT0211-A7	GaAsP	RED	R.D.	655	1.7	2.0	0.8	1.4	74
LT0212-A7			W.D.						
LT0211G-A7	GaP	RED	R.D.	700	2.1	3.0	1.2	2.0	74
LT0212G-A7			W.D.						
LT0221-A7	GaP	GREEN	G.D.	567	2.1	2.6	5.9	9.9	74
LT0222-A7			W.D.						
LT0231-A7	GaAsP ON GaP	YELLOW	Y.D.	585	2.1	3.0	5.0	8.3	74
LT0232-A7			W.D.						
LT0241-A7	GaAsP ON GaP	ORANGE	O.D.	635	2.1	3.0	7.0	11.7	74
LT0242-A7			W.D.						
LT0241R-A7			R.D.						
LT0231-A7-UR	InGaAlP ON GaAs	YELLOW	Y.D.	593	2.1	2.4	95.2	158.7	74
LT0232-A7-UR			W.D.						
LT02J1-A7-UR	InGaAlP ON GaAs	REDDISH ORANGE	O.D.	621	2.1	2.4	95.2	158.7	74
LT02J2-A7-UR			W.D.						
LT0271-A7-UR	GaAlAs ON GaAlAs	RED	R.D.	660	1.9	2.5	42.0	70.0	74
LT0272-A7-UR			W.D.						

(4) LEN'S COLOR

R.D RED DIFFUSED

G.D GREEN DIFFUSED

Y.D YELLOW DIFFUSED

O.D ORANGE DIFFUSED

W.D WHITE DIFFUSED

(5) SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE.

(6) ALL ABOVE COMPONENTS ARE CONSIDERED . DEVIATIONS FROM STATED SPECIFICATIONS WILL REQUIRE A NEW PART NUMBER BE ASSIGNED.

Typical Electrical/Optical Characteristic Curves (25°C Ambient Temperature Unless Otherwise Noted)

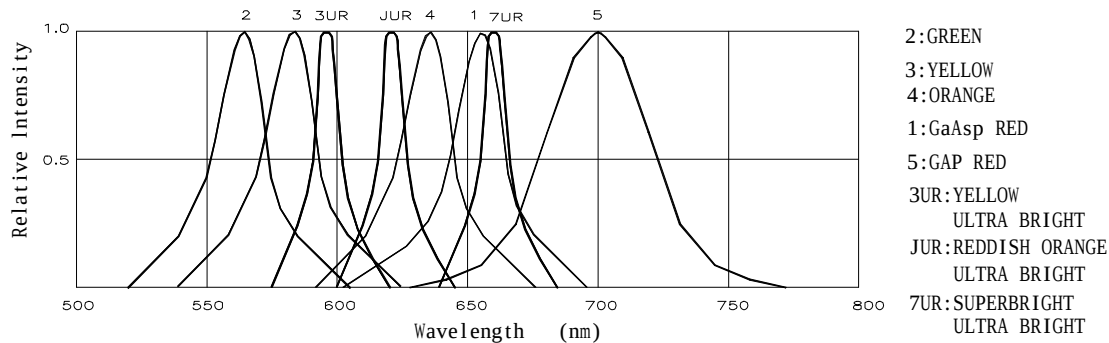


Fig.1 RELATIVE INTENSITY VS. WAVELENGTH

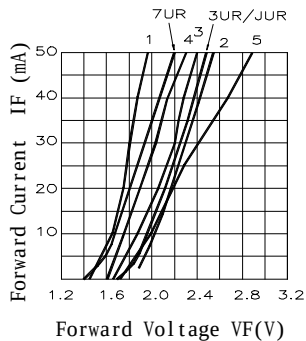


Fig.2 FORWARD CURRENT VS. FORWARD VOLTAGE

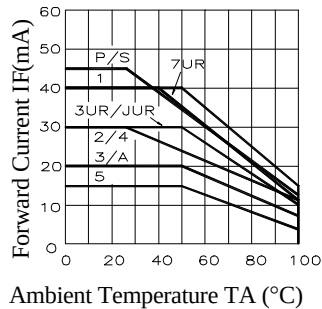


Fig.3 FORWARD CURRENT DERATING CURVE

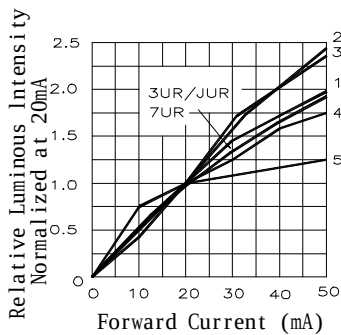


Fig.4 INTENSITY VS. FORWARD CURRENT

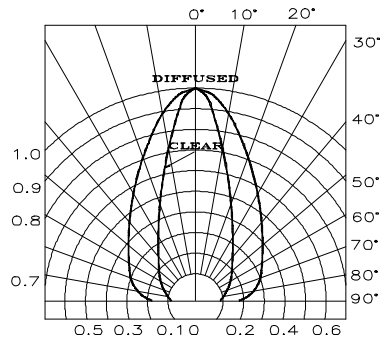


Fig.5 RADIATION PATTERN