

**Features**

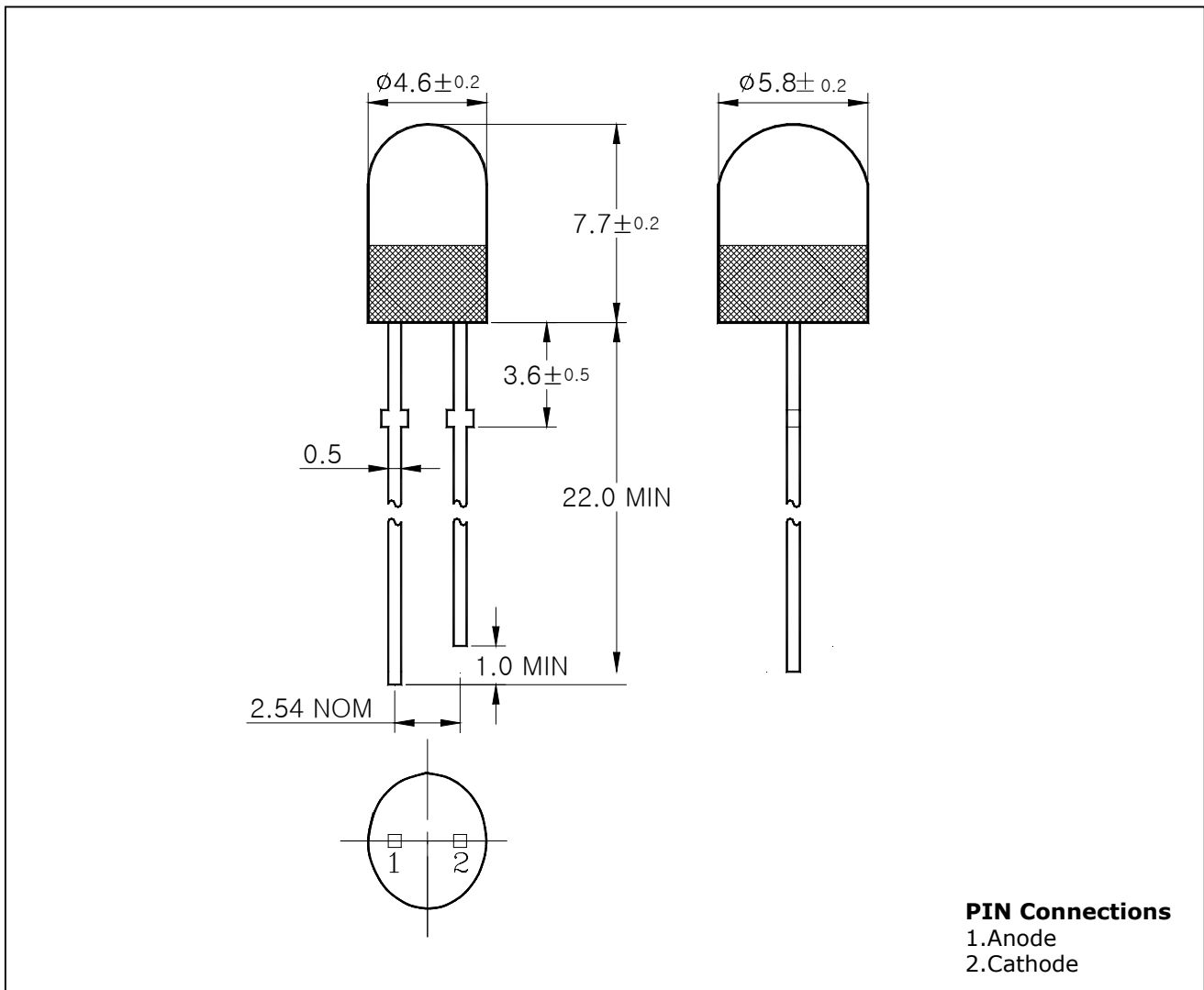
- Red Colored lens type
- Ellipse type(X=4.6mm, Y=5.8mm)
- Super luminosity
- Flangeless package
- High power LEDs
- Oval shape
- Lens Color : Red
- View Angle : 70° / 34°

**Application**

- Full color displays
- Message boards
- Variable message signs(VMS)

**Outline Dimensions**

unit : mm

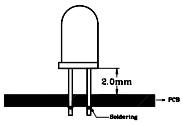


## Absolute maximum ratings

Characteristic	Symbol	Ratings	Unit
Power Dissipation	$P_D$	110	mW
Forward Current	$I_F$	40	mA
*1Peak Forward Current	$I_{FP}$	65	mA
Reverse Voltage	$V_R$	4	V
Operating Temperature	$T_{opr}$	-25 ~ 85	°C
Storage Temperature	$T_{stg}$	-30 ~ 100	°C
*2Soldering Temperature	$T_{sol}$	260°C for 5 seconds	

\*1.Duty ratio = 1/16, Pulse width = 0.1ms

\*2.Keep the distance more than 2.0mm from PCB to the bottom of LED package



## Electrical Characteristics

Characteristic	Symbol	Test Condition	Min.	Typ.	Max.	Unit
Forward Voltage	$V_F$	$I_F= 20mA$	1.8	2.0	2.5	V
*4Luminous Intensity	$I_V$	$I_F= 20mA$	350	650	1170	mcd
Peak Wavelength	$\lambda_p$	$I_F= 20mA$	-	630	-	nm
Spectrum Bandwidth	$\Delta \lambda$	$I_F= 20mA$	-	17	-	nm
Reverse Current	$I_R$	$V_R=4V$	-	-	10	uA
*3Half Angle	$\theta_{1/2}$	$I_F= 20mA$	-	$\pm 17$	-	deg
			-	$\pm 35$	-	

\*3.  $\theta_{1/2}$  is the off-axis angle where the luminous intensity is 1/2 the peak intensity

\*4. Luminous Intensity Maximum tolerance for each Grade Classification limit is  $\pm 18\%$

\*4. Luminous Intensity classification

O	P	Q
350~520	520~780	780~1170

## Characteristic Diagrams

Fig. 1  $I_F - V_F$

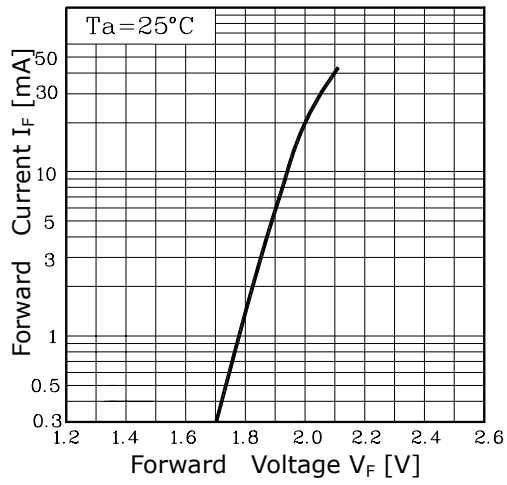


Fig. 2  $I_V - I_F$

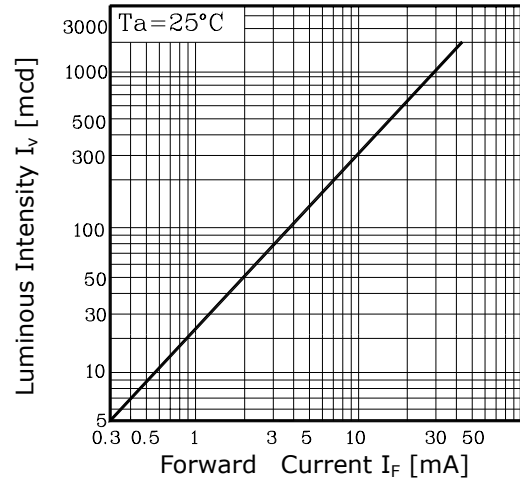


Fig. 3  $I_F - T_a$

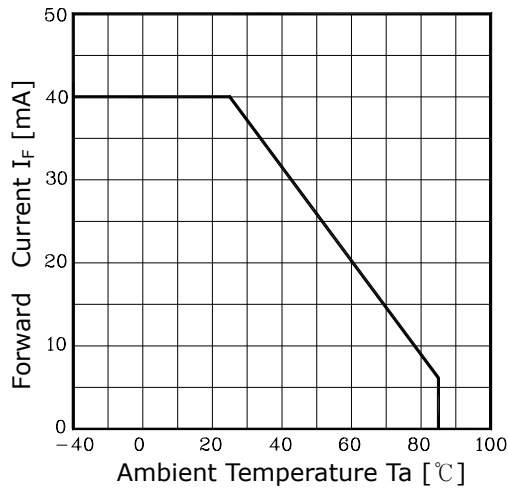


Fig. 4 Spectrum Distribution

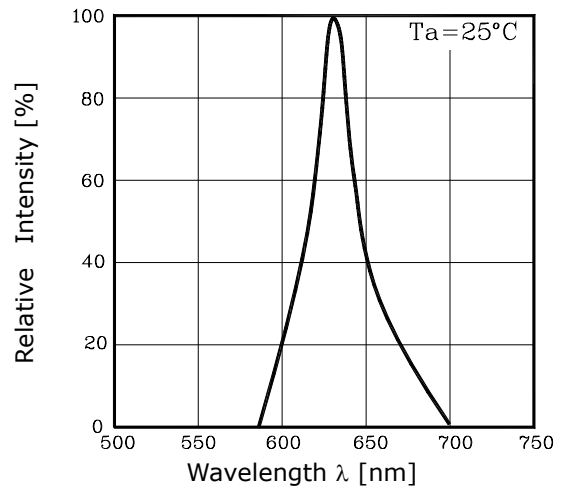


Fig. 5-1 Radiation Diagram(X)

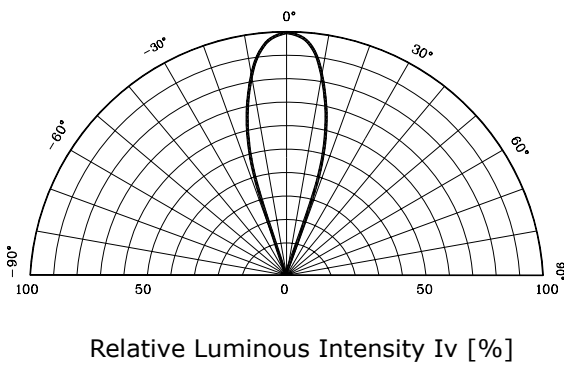
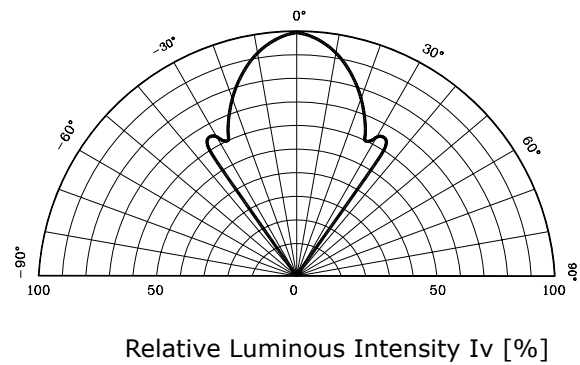


Fig. 5-2 Radiation Diagram(Y)



**These AUK products are intended for usage in general electronic equipments(Office and communication equipment, measuring equipment, domestic electrification, etc.).**

**Please make sure that you consult with us before you use these AUK products in equipments which require high quality and/or reliability, and in equipments which could have major impact to the welfare of human life(atomic energy control, airplane, spaceship, traffic signal, combustion central, all types of safety device, etc.).**

**AUK cannot accept liability to any damage which may occur in case these AUK products were used in the mentioned equipments without prior consultation with AUK.**