

**TOSHIBA**

TLOU124, TLSU124, TLYU124

TENTATIVE

TOSHIBA InGaAlP LED

# TLOU124, TLSU124, TLYU124

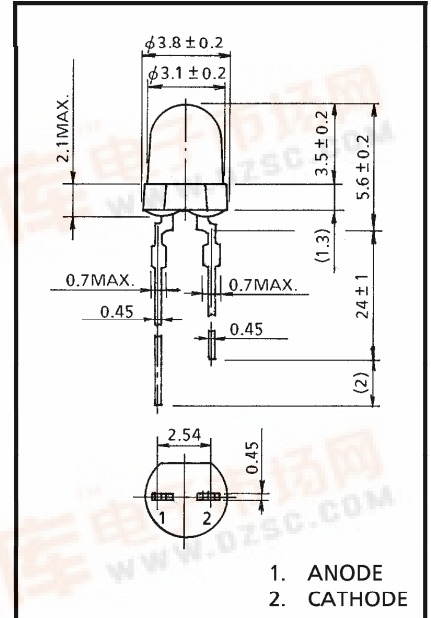
PANEL CIRCUIT INDICATOR

Unit in mm

- InGaAlP LED
- All Plastic Mold Type
- Colored Lasterless Lens
- Lineup : 3 Colors (Red, Orange, Yellow)
- Suitable for High-Brightness and Less Electricity Consumption.
- All Plastic Molded Lens, Provides an Excellent ON-OFF Contrast Ratio.
- Applications : Backlight, Light for Decoration, Switches, Various Indicator, Personal Equipment

LINEUP

PRODUCT	COLOR	MATERIAL
TLOU124	ORANGE	InGaAlP
TLSU124	RED	InGaAlP
TLYU124	YELLOW	InGaAlP



JEDEC	—
EIAJ	—
TOSHIBA	4-4E1A

Weight : 0.14 g

MAXIMUM RATINGS (Ta = 25°C)

PRODUCT	FORWARD CURRENT I <sub>F</sub> (mA)	REVERSE VOLTAGE V <sub>R</sub> (V)	POWER DISSIPATION P <sub>D</sub> (mW)	OPERATING TEMPERATURE T <sub>opr</sub> (°C)	STORAGE TEMPERATURE T <sub>stg</sub> (°C)
TLOU124	30	4	72	-20~75	-30~100
TLSU124	30	4	72	-20~75	-30~100
TLYU124	30	4	75	-20~75	-30~100

ELECTRICAL AND OPTICAL CHARACTERISTICS (Ta = 25°C)

PRODUCT	TYP. EMISSION WAVELENGTH			LUMINOUS INTENSITY			FORWARD VOLTAGE			REVERSE CURRENT	
	$\lambda_p$	$\Delta\lambda$	$I_F$	$I_V$			$V_F$			$I_R$	
				MIN	TYP.	$I_F$	TYP.	MAX	$I_F$	MAX	$V_R$
TLOU124	612	15	20	47.6	180	20	2.0	2.4	20	50	4
TLSU124	636	17	20	47.6	100	20	2.0	2.4	20	50	4
TLYU124	590	13	20	47.6	110	20	2.1	2.5	20	50	4
UNIT	nm		mA	mcd		mA	V		mA	$\mu$ A	V

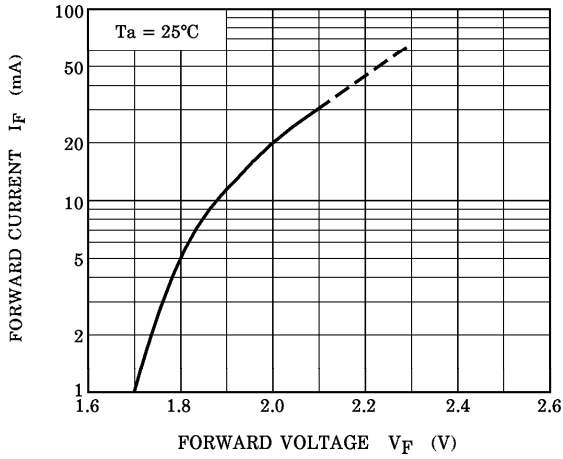
PRECAUTION

Please be careful of the followings

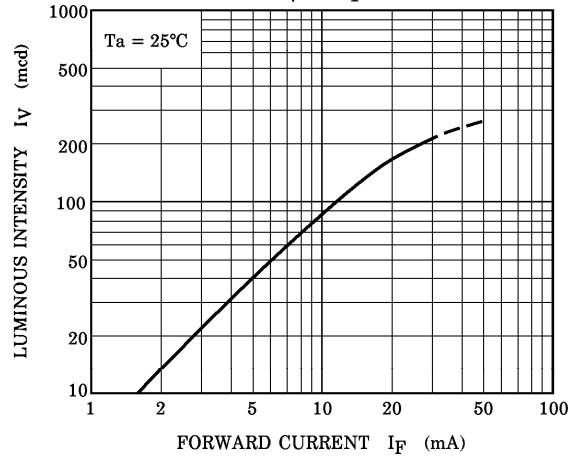
- Soldering temperature : 260°C max      Soldering time : 3 s max  
(Soldering portion of lead : up to 2 mm from the body of the device)
- If the lead is formed, the lead should be formed up to 5 mm from the body of the device without forming stress to the resin. Soldering should be performed after lead forming.
- This visible LED lamp also emits some IR light. If a photodetector is located near the LED lamp, please ensure that it will not be affected by this IR light.

**TLOU124**

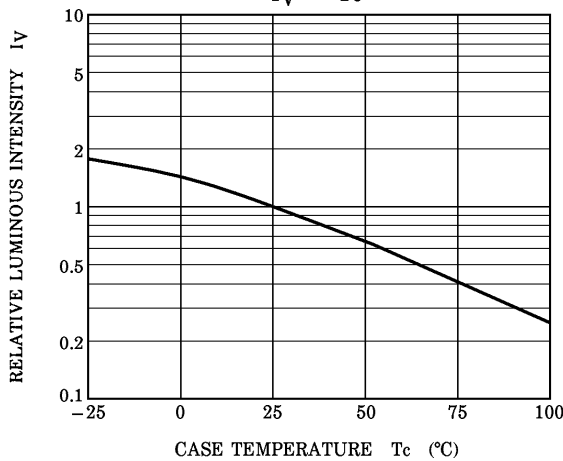
**$I_F - V_F$**



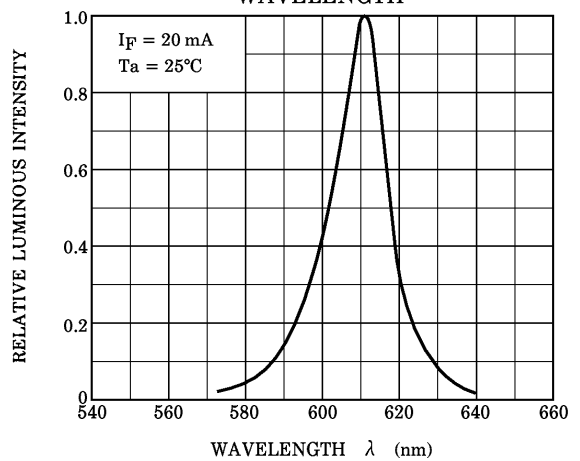
**$I_V - I_F$**



**$I_V - T_c$**

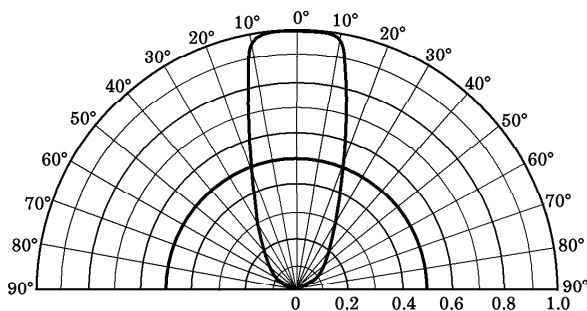


**RELATIVE LUMINOUS INTENSITY - WAVELENGTH**

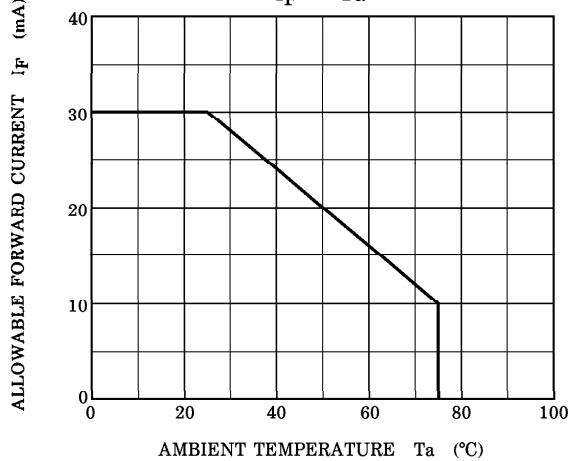


**RADIATION PATTERN**

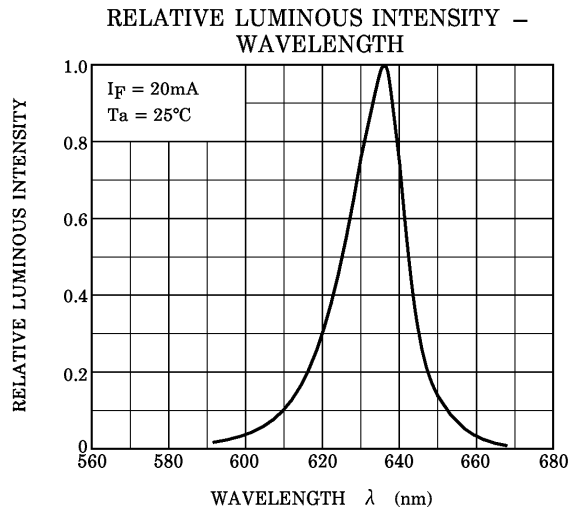
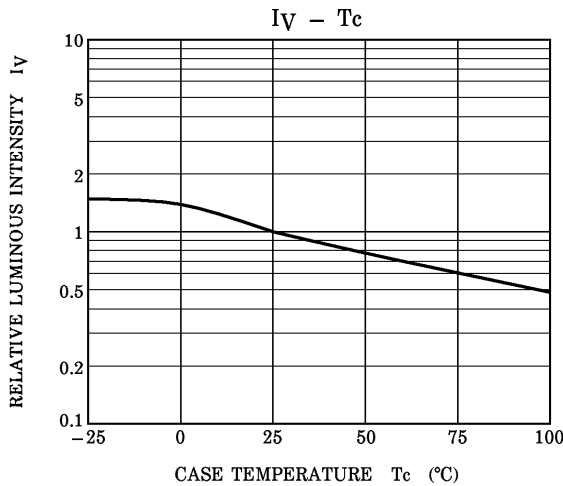
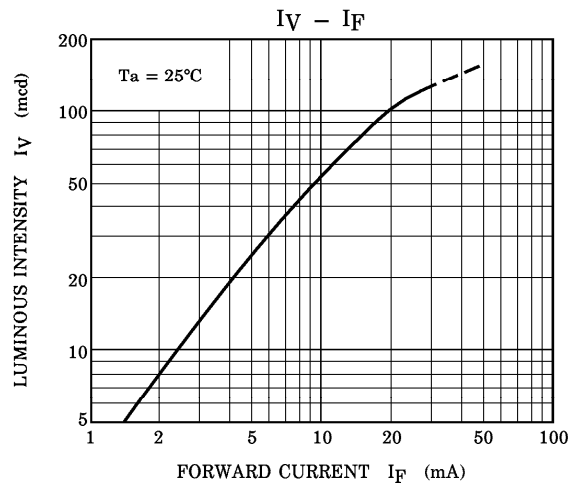
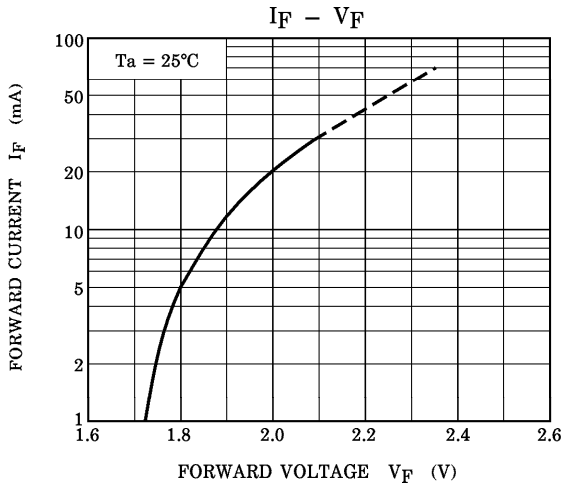
$T_a = 25^\circ\text{C}$



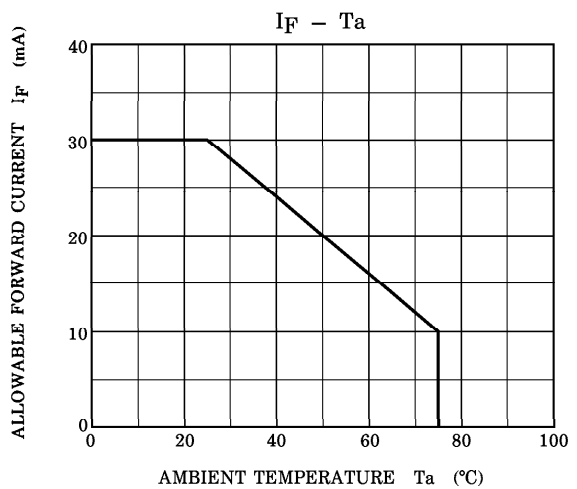
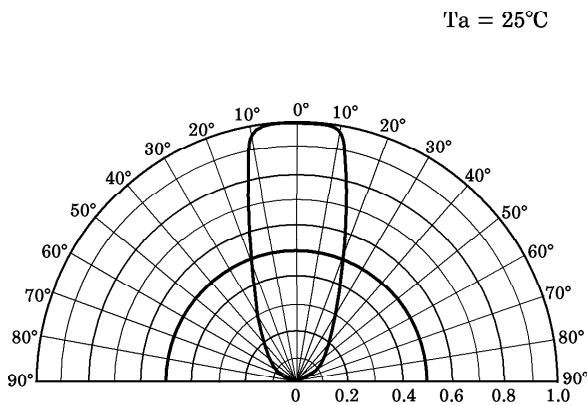
**$I_F - T_a$**



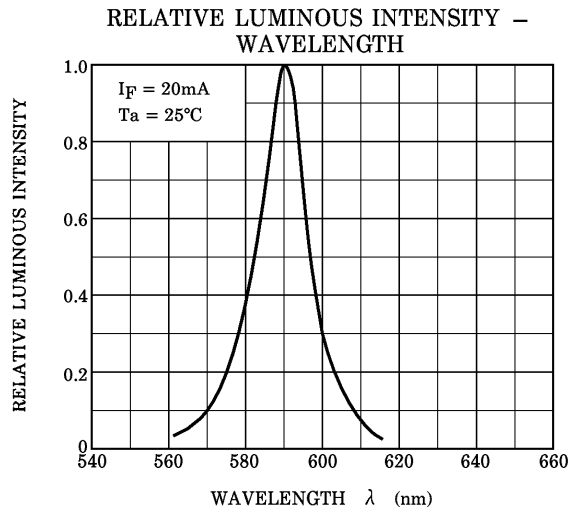
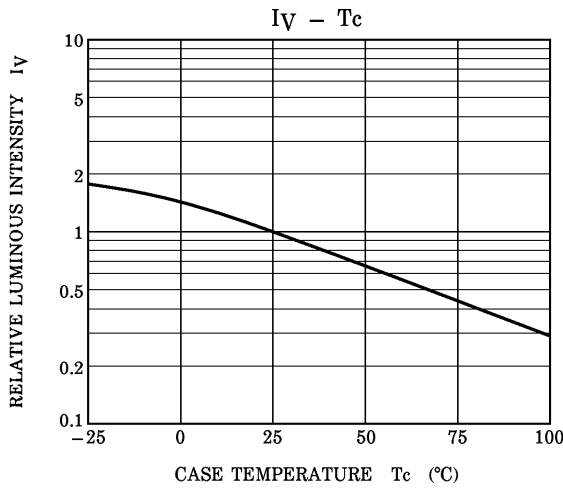
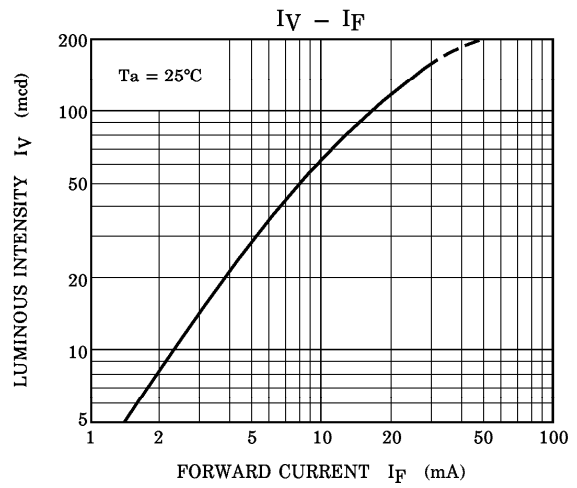
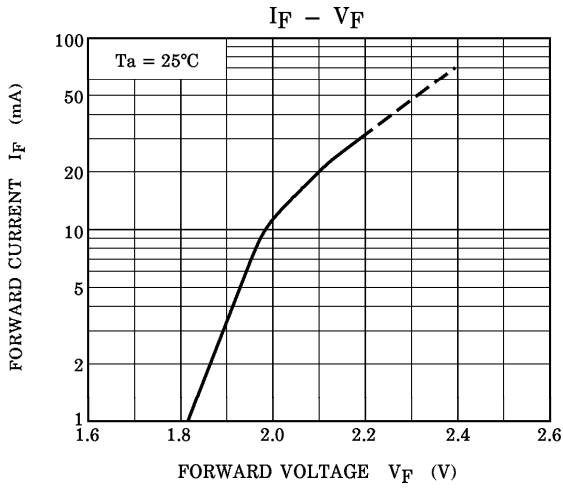
**TLSU124**



**RADIATION PATTERN**

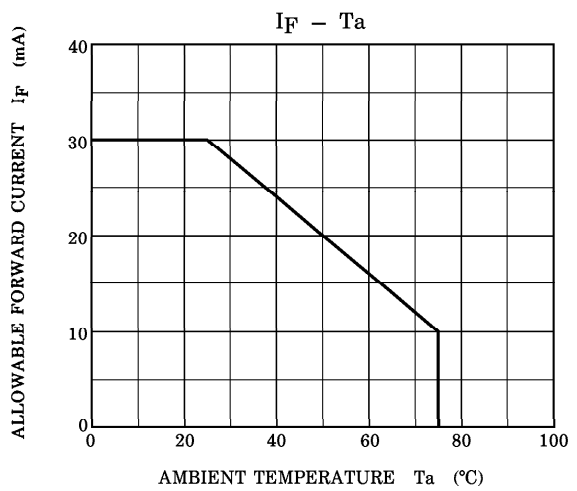
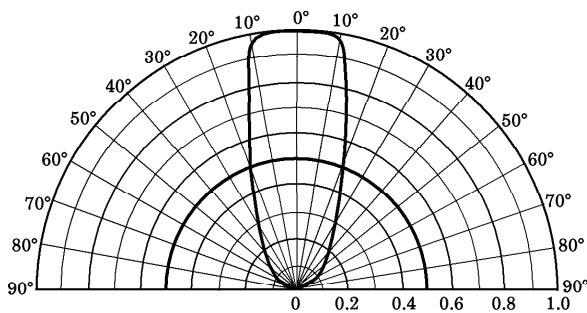


**TLYU124**



**RADIATION PATTERN**

$T_a = 25^\circ\text{C}$



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