## TOSHIBA InGaAlP LED

# TLPGE18T,TLFGE18T,TLGE18T,TLPYE18T

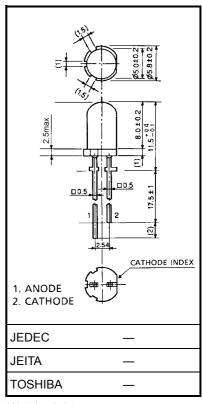
## Panel Circuit Indicator

Unit: mm

- 5 mm package
- InGaAlP technology
- All plastic mold type
- Transparent lens
- Line-up: 3 colors (pure green, green, pure yellow)
- High intensity light emission
- Excellent low current light output
- Straight lead type is also available TLPGE18TP, TLFGE18TP, TLGE18TP, TLPYE18TP
- Applications: outdoor message signboards, safety equipment, backlight, etc.

## Line-up

Product Name	Color	Material			
TLPGE18T	Pure Green				
TLFGE18T	Green	InGaAλP			
TLGE18T	Green				
TLPYE18T	Pure Yellow				



Weight: 0.31 g

## Maximum Ratings (Ta = 25°C)

Product Name	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)	
TLPGE18T	50	4	120			
TLFGE18T	50	4	120	− <del>4</del> 0~100	−40 <b>~</b> 120	
TLGE18T	50	4	120	<del>-40</del> -100	<del>-40</del> ~120	
TLPYE18T	50	4	120			



## **Electrical and Optical Characteristics (Ta = 25°C)**

Product Name	Typ. Emission Wavelength		Luminous Intensity I <sub>V</sub>		Forward Voltage V <sub>F</sub>		Reverse Current I <sub>R</sub>					
	$\lambda_{d}$	λР	Δλ	IF	Min	Тур.	lF	Тур.	Max	lF	Max	V <sub>R</sub>
TLPGE18T	558	(562)	14	20	85	200	20	2.1	2.4	20	50	4
TLFGE18T	565	(568)	15	20	85	300	20	2.0	2.4	20	50	4
TLGE18T	571	(574)	17	20	272	700	20	2.0	2.4	20	50	4
TLPYE18T	580	(583)	14	20	272	750	20	2.0	2.4	20	50	4
Unit		nm		mA	m	cd	mA	\	/	mA	μА	V

## **Precautions**

Please be careful of the following:

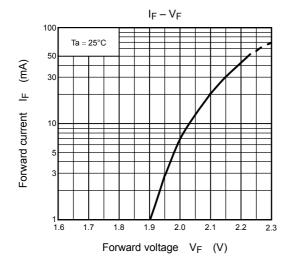
- Soldering temperature: 260°C max, soldering time: 3 s max (soldering portion of lead: below the lead stopper)
- If the lead is formed, the lead should be formed up to 5 mm from the body of the device without forming stress to the resin. Soldering should be performed after lead forming.

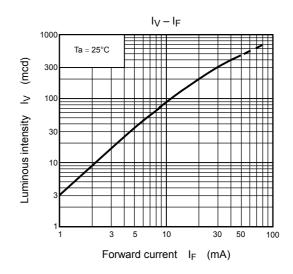
2

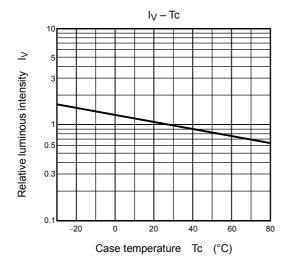
• This visible LED lamp also emits some IR light.

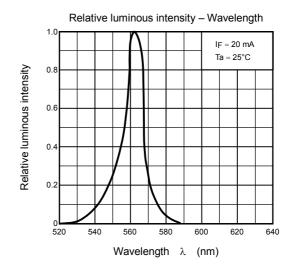
If a photodetector is located near the LED lamp, please ensure that it will not be affected by this IR light.

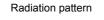
## **TLPGE18T**



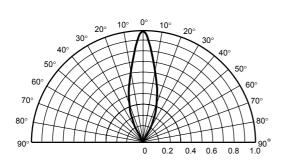


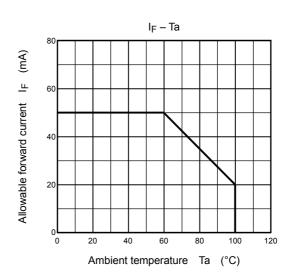




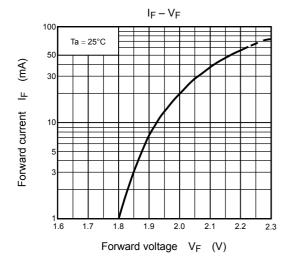


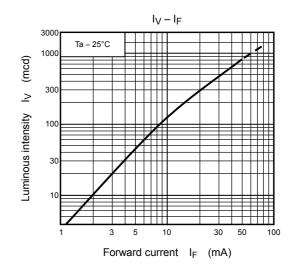
Ta = 25°C

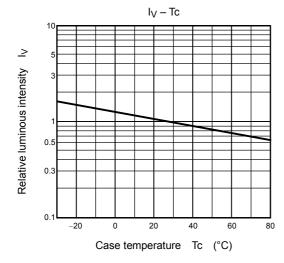


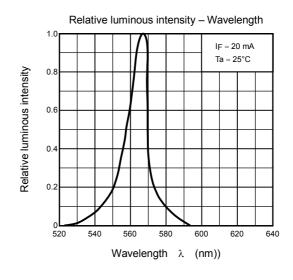


## **TLFGE18T**





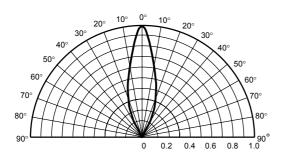


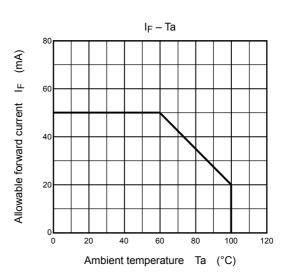




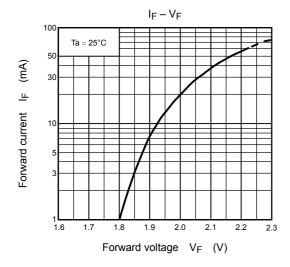
 $Ta = 25^{\circ}C$ 

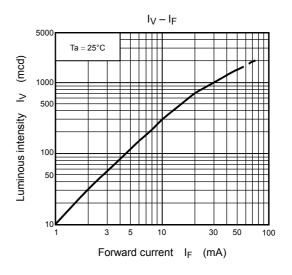
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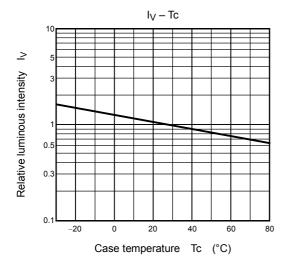


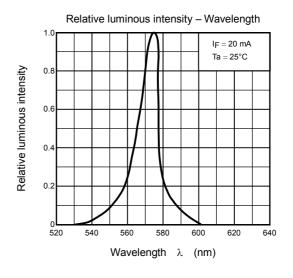


## **TLGE18T**



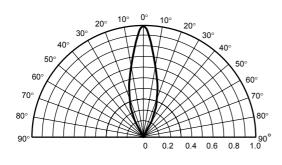


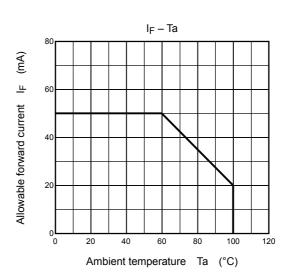




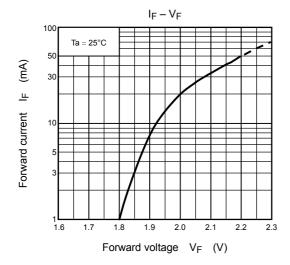


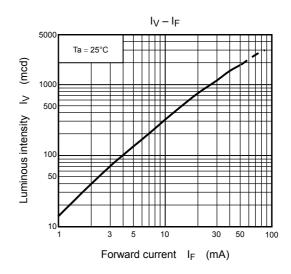
 $Ta = 25^{\circ}C$ 

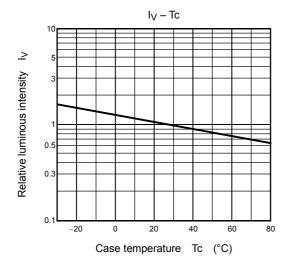


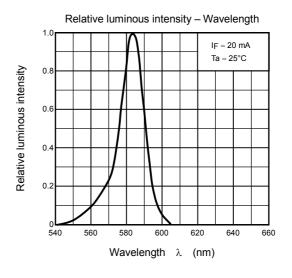


## **TLPYE18T**



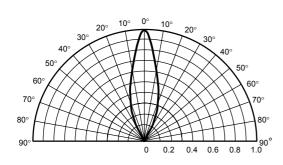


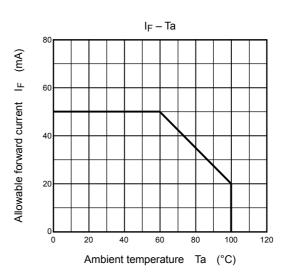






 $Ta = 25^{\circ}C$ 





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