

Phototransistor

OPT6794

The OPT6794 is a high-sensitivity NPN silicon phototransistor mounted in a clear plastic package. With lensed package this small phototransistor is designed to optimize the mechanical resolution coupling efficiency, cost and reliability.

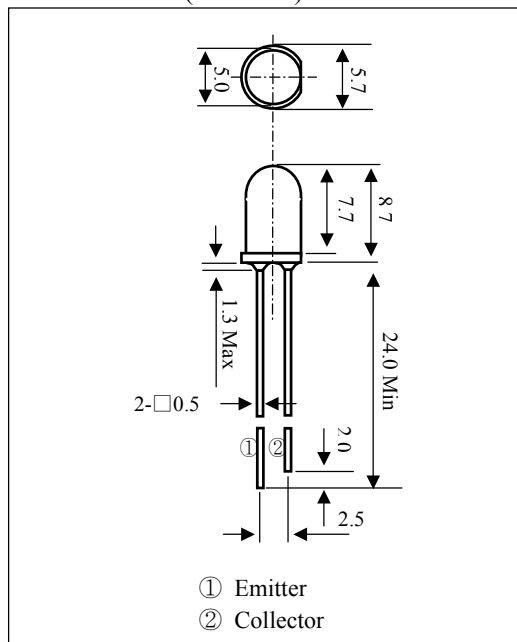
FEATURES

- Lensed for high sensitivity
- High reliability and stable characteristics
- Low-cost

APPLICATIONS

- Optical counters
- Optical detectors
- Camera stroboscopes

DIMENSIONS(Unit:mm)



* Please take proper steps in order to secure reliability and safety in required conditions and environments for this device.

MAXIMUM RATINGS

(Ta=25°C)

Item	Symbol	Rating	Unit
C-E Voltage.	V_{CEO}	35	V
E-C Voltage.	I_F	6	V
Collector current.	I_c	20	mA
Collector Power dissipation.	P_c	50	mW
Operating temp.	$T_{opr.}$	-25~+85	°C
Storage temp.	$T_{stg.}$	-30~+100	°C
Soldering temp. ^{*1}	$T_{sol.}$	260°C within 5 seconds	

^{*1}Lead Soldering Temperature (2mm from case for 5sec.).

ELECTRO-OPTICAL CHARACTERISTICS

(Ta=25°C)

Item	Symbol	Conditions	Min.	Typ.	Max.	Unit
Collector dark current.	I_{CEO}	$V_{CEO}=10V, E_v=0$	-	1	100	nA
Light current. ^{*2}	I_{CEL}	$V_{CE}=3V, E_v=1000LUX$	0.5	4.0	-	mA
C-E Saturation Voltage	$V_{CE(SAT)}$	$I_c=0.2mA, 2000LUX$	-	0.2	0.4	V
Switching speeds	Rise time	t_r	-	2.5	-	μsec.
	Fall time	t_f	-	3.8	-	μsec.
Spectral Sensitivity	λ		450~1050			nm
Peak Sensitivity wavelength	λ_p			880		nm
Half angle	$\Delta \theta$			±17		deg.

^{*2} Tungsten lamp of a color temperature of T=2856° K