

PNA3W01L (PN307)

PIN Photodiode

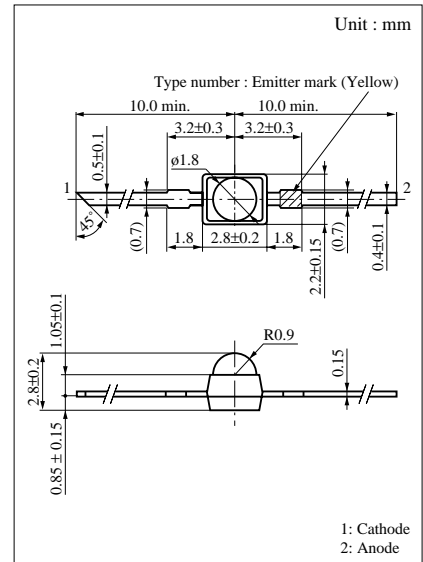
For optical control systems

■ Features

- High sensitivity, high reliability
- Peak sensitivity wavelength matched with infrared light emitting diodes : $\lambda_p = 800$ nm (typ.)
- Double end type small size package

■ Absolute Maximum Ratings (Ta = 25°C)

Parameter	Symbol	Ratings	Unit
Reverse voltage (DC)	V_R	30	V
Power dissipation	P_D	10	mW
Operating ambient temperature	T_{opr}	-25 to +85	°C
Storage temperature	T_{stg}	-30 to +100	°C



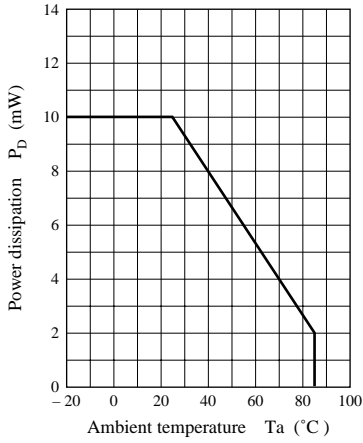
■ Electro-Optical Characteristics (Ta = 25°C)

Parameter	Symbol	Conditions	min	typ	max	Unit
Dark current	I_D	$V_R = 10V$			50	nA
Photo current	I_L	$V_R = 10V, L = 1000 \text{ lx}^*$	5			μA
Peak sensitivity wavelength	λ_p	$V_R = 10V$		800		nm
Acceptance half angle	θ	Measured from the optical axis to the half power point		24		deg.

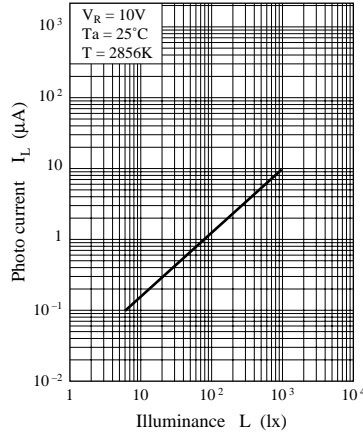
* Measurements were made using a tungsten lamp (color temperature T = 2856K) as a light source.

(Note) The part number in the parenthesis shows conventional part number.

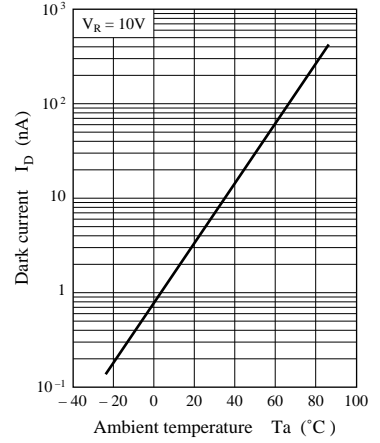
$P_D - T_a$



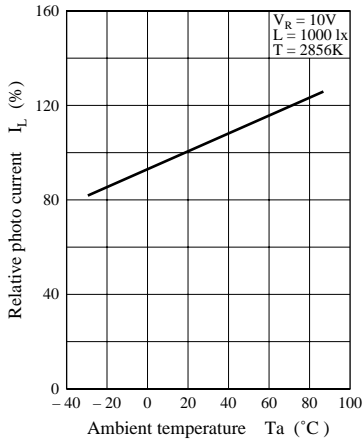
$I_L - L$



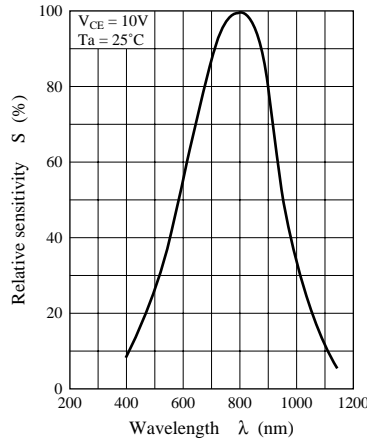
$I_D - T_a$



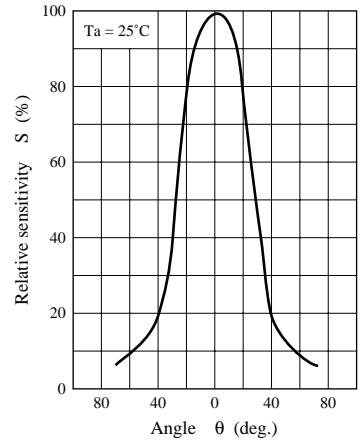
$I_L - T_a$



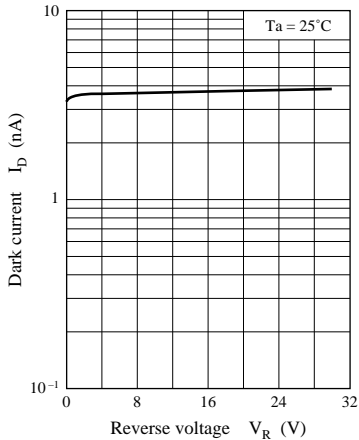
Spectral sensitivity characteristics



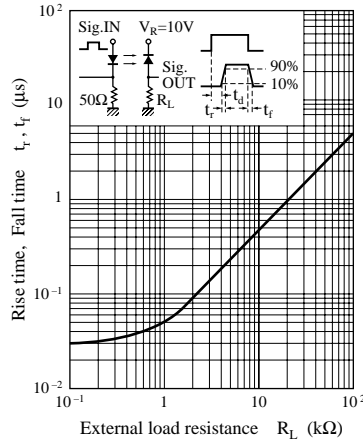
Directional characteristics



$I_D - V_R$



$t_r, t_f - R_L$



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