

Lead (Pb) Free Product – RoHS Compliant

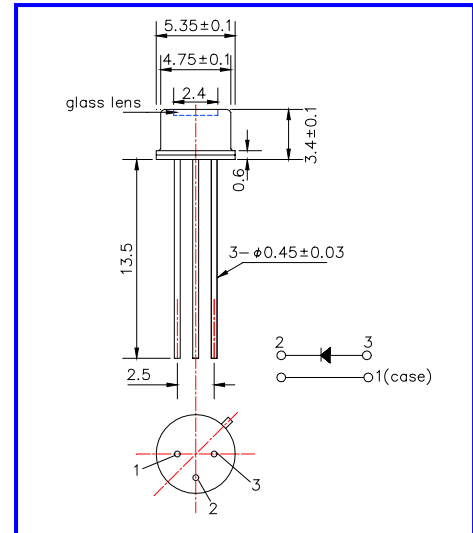
PD018D52 hermetical sealing type photo-diode

PD018D52 is a PIN-photodiode featuring excellent responsivity and high photocurrent. This PIN-photodiode consists of a large chip with 1.6 × 1.6mm active area mounted on the TO-18 (3pins) stem and is hermetical sealed by metal can with flat lens. These devices are designed to be easy of setting up optically with a wide angle of half sensitivity of ±45degrees.

Specifications

- 1)Product Name Hermetical Sealing Type Photo-Diode
- 2)Type No. PD018D52
- 3)Chip
 - (1)Chip Size 1.8mm × 1.8mm
 - (2)Active Area 1.6mm × 1.6mm
- 4)Package
 - (1)Type TO-18 (3pins)
 - (2)Lens Glass Flat Lens
 - (3)Cap Gold Plated

Outer dimension (Unit : mm)



Absolute Maximum Ratings [Ta=25]

Item	Symbol	Maximum Rated Value	Unit
Reverse Breakdown Voltage	$V_{(BR)R}$	170	V
Operating Temperature	T_{OPR}	-25 ~ +100	
Storage Temperature	T_{STG}	-30 ~ +125	
Soldering Temperature	T_{SOL}	240	

‡Soldering condition : Soldering condition must be completed within 2 seconds at 240

Electro-Optical Characteristics [Ta = 25]

Item	Symbol	Condition	Minimum	Typical	Maximum	unit
Reverse Photo Current	I_L	$V_R=10V, L=1000Lx$		15		μA
Reverse Dark Current	I_D	$V_R=10V$			10	nA
Open Circuit Voltage	V_{OC}	$V_R=10V, L=1000Lx$				mV
Spectral Responsivity (Peak)	P			900		nm
Half Angle of Sensitivity				± 45		deg.
Total Capacitance	C_T	$V_R=10V, f=1MHz$		18		pF
Rise/Fall Time (10% ~ 90%)	t_r	$R_L=1K, V_R=10V$		30		ns
	t_f			30		ns