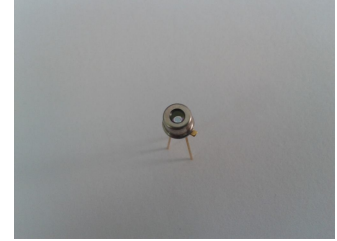


## 0.5mm Silicon PIN photodiode

Model: LSSPD-0.5

### Features:

- High responseivity
- High speed
- Low dark current
- Low capacitance
- Flat window



### Applications:

- Optical communications
- Laser ranging
- Industrial automatic control
- Optical power meter
- Science analysis and experiment



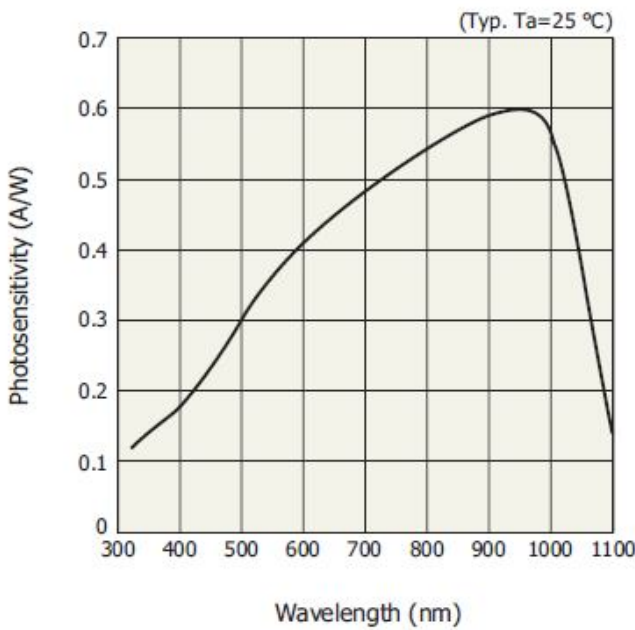
### Absolute maximum ratings:

parameter	symbol	value	unit
Operating temperature	Top	-40~+100	°C
Storage temperature	Tstg	-45~+125	°C
Forward current	I <sub>f</sub>	10	mA
Reverse current	I <sub>r</sub>	1000	uA

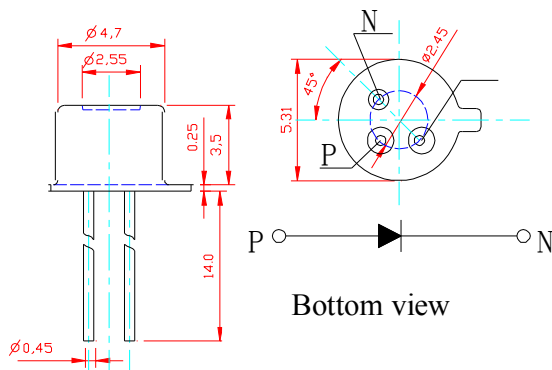
### Electrical and optical characteristics:(T=25°C, Vr=10V)

parameter	symbol	unit	Value (typ.)
Active area	Φ	mm	0.5×0.5
Spectral range	λ	nm	400-1100
Responsivity	Re (λ=1064nm )	mA/mW	0.2
	Re (λ=905nm )	mA/mW	0.45
	Re(λ=650nm)	mA/mW	0.2
Response time	Tr (R <sub>L</sub> =50Ω, 905nm)	ns	5
Dark current	I <sub>D</sub>	nA	0.5
Reverse Breakdown voltage	V <sub>BR</sub> (I <sub>R</sub> =100uA)	V	170
Junction capacitance	C <sub>j</sub> (f=1MHz)	pF	5
Operating voltage	V <sub>R</sub>	v	0-15
package	TO-46		

## The typical Sensitivity curve



## The package and Lead



## Order information

LSSPD-0.5-X

X=0	TO-46 Can with flat window cap
X=SMFP	SM Fiber coupling with FC-PC connector
X=SMFA	SM Fiber coupling with FC-APC connector
X=SMSA	SM Fiber coupling with SC-APC connector
X=5MMFA	50um MM Fiber coupling with FC-APC connector
X=6MMFA	62.5um MM Fiber coupling with FC-APC connector
X=JKFC	TO-46 Can with FC receptacle
X=Other	By customer's request

## The cautions

- 1: The suitable ESD protection is required in storage, transportation and using
- 2: The fiber bending radius no less than 20mm for avoiding fiber damaged, Be sure the fiber coupling facet is clean before connecting it to opto-circuit.