
Features

- 10mm² PIN detector
- Low dark current
- High shunt resistance
- Blue-green enhanced sensitivity

Description

Circular active area PIN photodiode with 10 mm² active area. Metal can type hermetic TO5 package with UV clear glass window.

Application

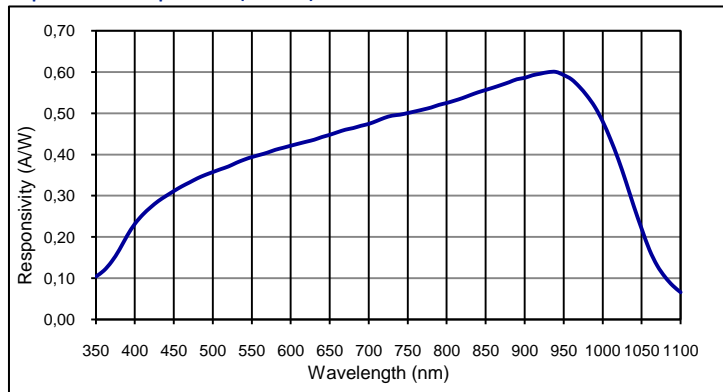
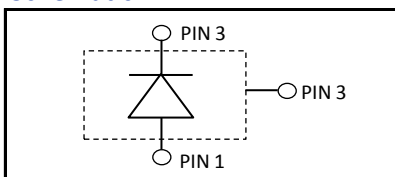
- Precision photometry
- Bar code readers
- Medical equipment
- Pulsed light sensor

RoHS

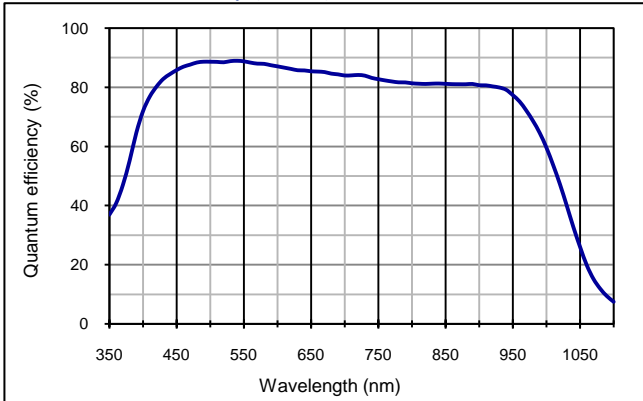
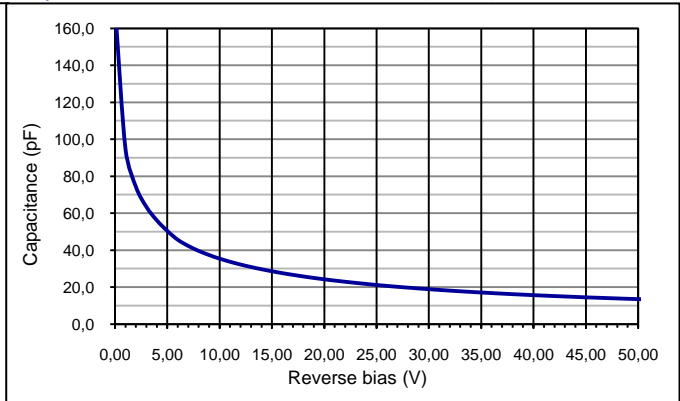
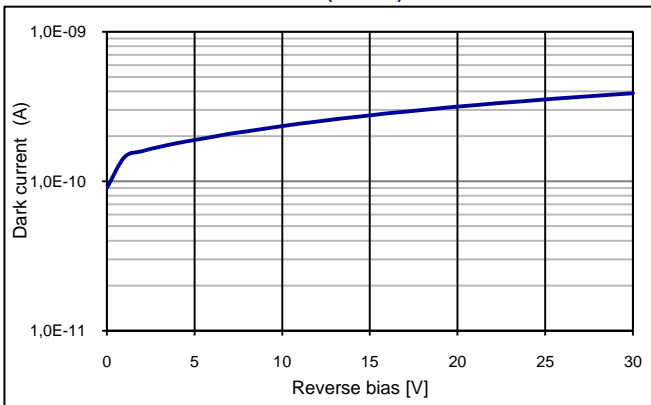
2002/95/EC


Absolute maximum ratings

Symbol	Parameter	Min	Max	Unit
T _{STG}	Storage temp	-55	125	°C
T _{OP}	Operating temp	-40	100	°C
V _{max}	Max reverse voltage		50	V
I _{PEAK}	Peak DC current		10	mA

Spectral response (23 °C)

Schematic

Electro-optical characteristics @ 23 °C

Symbol	Characteristic	Test Condition	Min	Typ	Max	Unit
	Active area		3570 diameter			µm
	Active area		10.0			mm ²
I _D	Dark current	V _R = 10 V		0.2		nA
C	Capacitance	V _R = 0 V		140		pF
		V _R = 10 V		35		pF
	Responsivity	λ = 410 nm		0.22		A/W
		λ = 550 nm		0.37		A/W
t _R	Rise time	V _R = 0 V; λ = 410 nm; R _L = 50 Ω		140		ns
		V _R = 10 V; λ = 410 nm; R _L = 50 Ω		45		ns
	Shunt Resistance	V _R = 10 mV	200	300		MΩ
	N.E.P.	V _R = 10 V; λ = 410 nm		3,6 E-14		W/√Hz
V _{BR}	Breakdown voltage	I _R = 2 µA	50			V

Quantum efficiency (23 °C)

Capacitance as fct of reverse bias (23 °C)

Dark current as fct of bias (23 °C)

Package dimension:

Small quantities: Foam pad, boxed (12 cm x 16.5 cm)

Handling:

Please refer to document "Instructions for handling and processing"

Disclaimer: Due to our strive for continuous improvement, specifications are subject to change within our PCN policy according to JESD46C.

European, International Sales:

 First Sensor AG
 Peter-Behrens-Strasse 15
 12459 Berlin
 Germany
 T +49 30 6399 2399
 F +49 30 639923-752
 sales.opto@first-sensor.com

USA:

 First Sensor Inc.
 5700 Corsa Avenue #105
 Westlake Village
 CA 91362 USA
 T +1 818 706 3400
 F +1 818 889 7053
 sales.us@first-sensor.com