UV/Blue Enhanced Photodiodes

Series 2

Special characteristics

- long-term stability
- high shunt resistance and high sensitivity
- UV/ Blue enhanced

Application
Optimized
Solutions

General ratings

Type No.		Order number	Active area		Dimensional outline	Absolute maximum ratings	
Chip	Package		Size (mm)	Area (mm^2)	Window material	Operating temperatur	Storage temperatur
PC1-2	TO52	500153	⌀ 1.13	1	UV clear glass	-40 ... +100 °C	-55 ... +125 °C
PC2-2	TO5	500044	⌀ 1.60	2			
PC5 -2	TO5	500046	⌀ 2.52	5			
PC10-2	TO5	500041	⌀ 3.57	10			
PC20-2	TO8	500043	⌀ 5.05	20			
PC50-2	BNC	500045	⌀ 7.98	50	Quartz glass	+15 ... +60 °C	-15 ... +80 °C
PC100-2	BNC	500039	⌀ 11.28	100			
PR33-2	TO8	500052	5.5 x 6.1	33	UV clear glass	-40 ... +100 °C	-55 ... +125 °C
PS20-2	TO8	500049	4.5 x 4.5	20			
PS100-2	CERpin	500047	10 x 10	100	Quartz glass	-20 ... +60 °C	-20 ... +80 °C

Electrical and optical characteristics (Typical values at 22 °C)

Type No.		Spectral Responsivity (A/W)			Dark current	Capacitance	Rise time	Shunt Resistance	N.E.P
		at 200 nm	at 340 nm	at 850 nm	at 5 V (nA)	at 5 V (pF)	at 410 nm, 5 V, 50 Ω (µs)	at 10 mV (MΩ)	(W/Hz$^{1/2}$)
PC1-2	TO52	-	typ. 0.17	typ. 0.42	0.2	30	0.1	2,000	8* 10^{-15}
PC2-2	TO5				0.4	60			1* 10^{-14}
PC5 -2	TO5				1.0	100	0.2	1,000	1.5* 10^{-14}
PC10-2	TO5					160	0.3	500	1.6* 10^{-14}
PC20-2	TO8				2.0	280	0.6	100	2.5* 10^{-14}
PC50-2	BNC	0.1			5.0	650	1.0	70	6* 10^{-14}
PC100-2	BNC				10.0	1,100	2.0	40	1* 10^{-13}
PR33-2	TO8	-			2.0	450	0.6	100	2* 10^{-14}
PS20-2	TO8				0.2	250		300	1.1* 10^{-14}
PS100-2	CERpin	0.1			0.5	1,100	2.0	200	1.8* 10^{-14}

RoHS compliant

Silicon Sensor GmbH
Ostendstrasse 1 12459 Berlin Tel.: +49 (0)30 / 63 99 23 - 0 Fax: +49 (0)30 / 63 99 23 33 E-Mail: sales@silicon-sensor.de www.silicon-sensor.de

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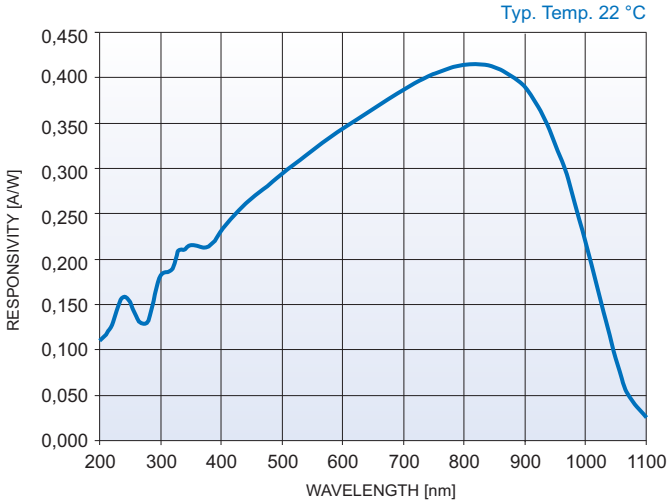
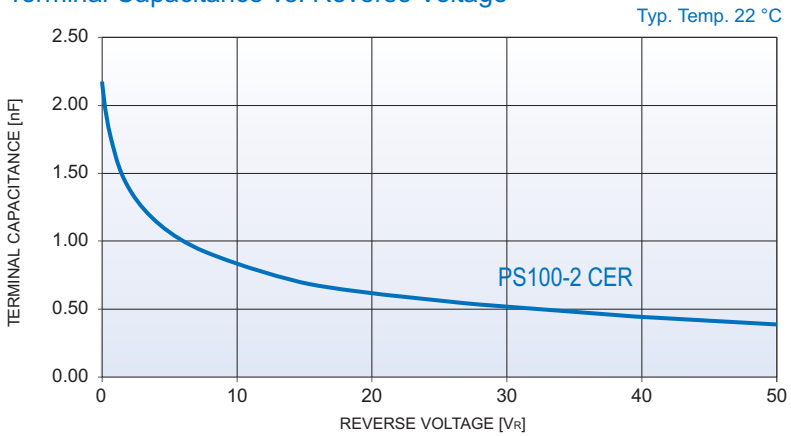
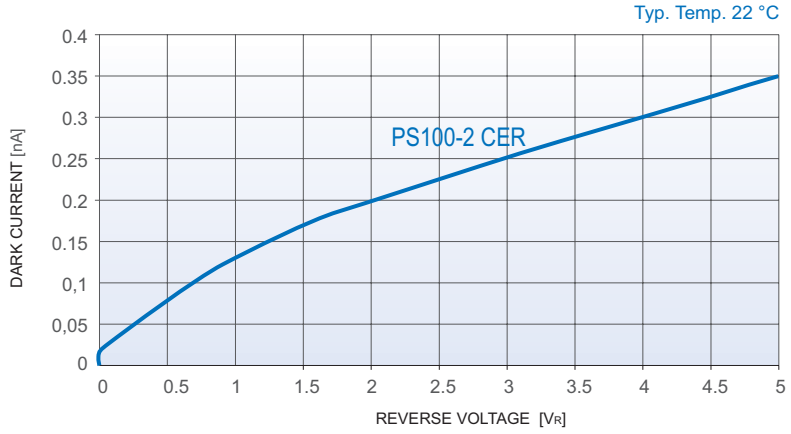
Typical Spectral Response



Terminal Capacitance vs. Reverse Voltage



Dark Current vs. Reverse Voltage



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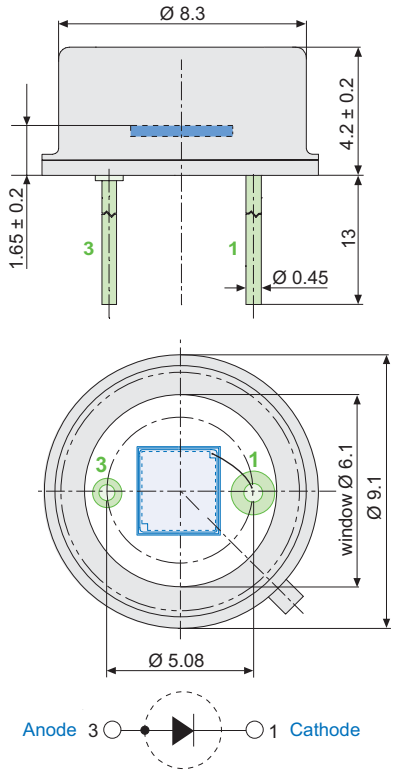
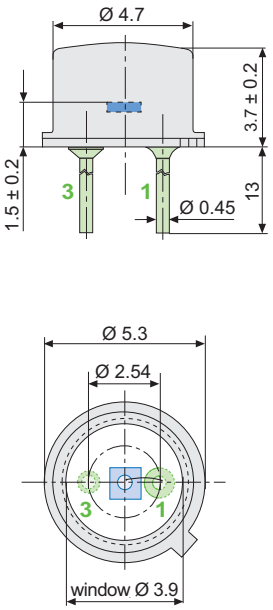
scale 4:1

TO5



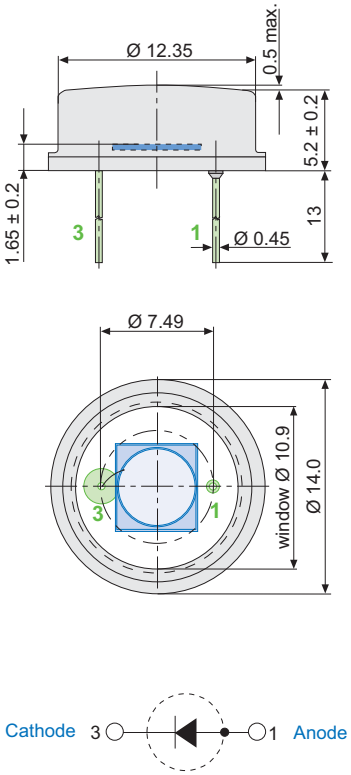
scale 4:1

TO52



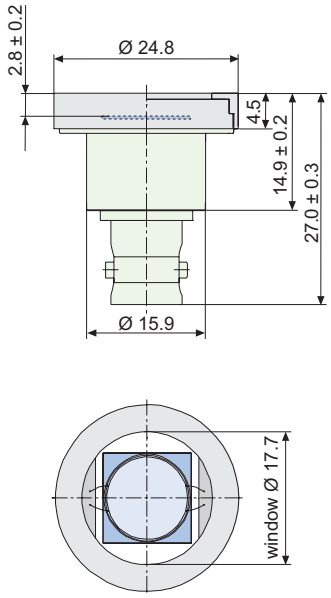
scale 2:1

TO8



scale 1:1

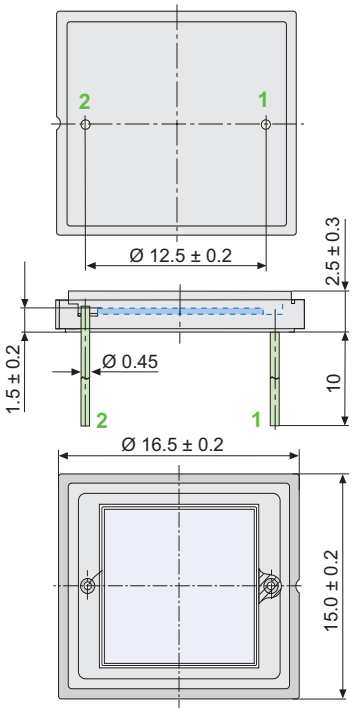
BNC



Centre pin = Anode
Case = Cathode

scale 2:1

CER pin



Pin-Connection

Pin-No.	Connection
1	Cathode
2	Anode

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