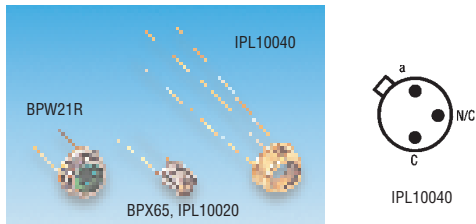


Emitters & Detectors — Continued

Photodiode Detectors – Sealed Metal Package



BPW21R (T039) H = 3.0, Dia = 8.0, Lead pitch = 5.0, Tag: Anode
 BPX65, IPL10020 (TO-18 flat lens) H = 3.9, Dia = 8.25, Lead pitch = 2.5, Tag: Anode
 IPL10040 (TO-5 flat lens) H = 3.9, Dia = 8.25, Lead pitch = 2.5, Tag: Anode

Sensitivity (typ.)	Active Area	Half Angle	Peak Response	Response t _r , t _f (μs)	Mftrs. Mftr.	List No.	Order Code
7nA/lux	7.5mm ²	100°	560nm	3.5	VSH	BPW21R	327-440
0.55A/W	1mm ²	74°	850nm	0.0035	CEN	BPX65	327-451
0.5A/W	0.66mm ²	50°	900nm	0.004	IPL	IPL10020	327-463
0.5A/W	5.5mm ²	100°	900nm	0.01	IPL	IPL10040	327-475

■ with colour correction filter (visible radiation).

OPT138

Order Code	Price Each				
	1+	25+	50+	100+	1K+
.327-440					
.327-451					
327-463					
327-475					

Silicon Avalanche Photodiode (APD) -Hermetically Sealed Metal Package EG & G



- Offers internal photoelectric gain
- Used to detect extremely low light levels - 400 - 1150nm region
- Provides greater detection sensitivity than a PIN photodiode, the latter's sensitivity is limited by pre-amplifier noise
- 0.5mm active diameter
- Fast response time - 0.5ns typically
- Wide operating temperature: -40°C to +70°C

H = 3.89, Dia. = 5.41, Lead Pitch = 1.27, Lead Length = 12.7 0.46 dia. Centre pin Cathode

OPT556

Mftrs. List No.	Order Code	1+	3+	5+	10+	25+
C30902E	139-798					

Photodiode Detectors – Sealed Metal Package CENTRONIC



OSD1-5T (T018) : H = 5.1, Dia. = 4.7, Lead pitch = 2.54, Tag : Anode
 OSD5-5T, OSD15-5T (T05) : H = 3.1, Dia. = 8.1, Lead pitch = 5.1, Tag : Anode

Silicon photodetectors for low light level and high signal to noise ratio applications.



H = 5.1, Dia. = 4.7, Lead pitch = 3.0 Tag : Anode



H = 3.67, Dia. = 4.68

High sensitivity chip suitable for fibre applications and encoder designs

Responsivity (Typ.)	Active Area	Dark Current (max.)	NEP W/Hz ^{1/2}	Cap. (V _r = 12V) pF (max.)	Shunt Res. MΩ (min.)	Risetime ns (Typ.)	Mftrs. List No.
0.21A/W	1mm ²	1nA	2.5 10 ⁻¹⁴	7	250	7	OSD1-5T
0.21A/W	5mm ²	2nA	3.3 10 ⁻¹⁴	35	100	9	OSD5-5T
0.21A/W	15mm ²	5nA	5.5 10 ⁻¹⁴	80	50	12	OSD15-5T
0.55A/W	1mm ²	5nA	3.3 10 ⁻¹⁴	3.5*	—	8	BPX65RT
0.35A/W	0.55mm ²	10nA	6.8 10 ⁻¹⁴	8**	—	1.0	AEPX65

*V_r = 5V, **V_r = 20V

OPT284

Mftrs. List No.	Order Code	1+	5+	10+	25+	50+
OSD1-5T	.548-716					
OSD5-5T	.548-728					
BPX65RT	.548-789					
AEPX65	.548-777					
OSD15-5T	.548-730	1+	10+	25+	50+	

Hybrid Photodetector with Integral Amplifier Visible Enhancement

CENTRONIC



OSI1-V-300K/10M High performance photodiodes with operational amplifiers in a hybrid package. These Opto-Hybrids are useful for high bandwidth applications.
 OSI35-V-100K/25K Opto-Hybrid detectors with integral amplifiers.

OSI1-V-300K/10M : H = 6.35, Dia. = 8.33

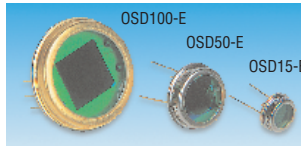
Responsivity (Typ.) @λ = 900nm	Active Area	NEP W/Hz ^{1/2} @ λ = 900nm	Gain Ω	Bandwidth Hz	Risetime (Typ.)	Mftrs. List No.
0.15 V/μW	1mm ²	2 10 ⁻¹²	300K	10M	30ns	OSI1-V-300K/10M
0.58 V/μW	35mm ²	6 10 ⁻¹²	100K	25K	145μs	OSI35-V-100K/25K

OPT276

Mftrs. List No.	Order Code	1+	3+	5+	10+	15+
OSI1-V-300K/10M	.548-790					
OSI35V-100K/25K	.548-807					

Photodiode Detectors – Sealed Metal Package Eye Response Detectors

CENTRONIC



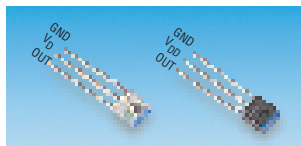
- Silicon photodetectors with colour correcting filters
- Spectral response approximating that of the human eye
- Ideal for photometric applications

Responsivity (Typ.)	Active Area	Dark Current (max.)	NEP W/Hz ^{1/2}	Cap. (V _r = 12V) pF (max)	Shunt Res. MΩ (min.)	Risetime ns (Typ.)	Mftrs. List No.
33A/W	15mm ²	10	5.2 10 ⁻¹⁴	80	5	12	OSD15-E
28A/W	50mm ²	40	9.3 10 ⁻¹⁴	270	1.5	26	OSD50-E
56A/W	100mm ²	100	1.2 10 ⁻¹³	520	1	45	OSD100-E

OPT275

Mftrs. List No.	Order Code	1+	5+	10+	25+	50+
OSD15-E	.548-741					
OSD50-E	.548-753					
OSD100-E	.548-765					

Photodiode with Integral Amplifier Visible and Infra-Red



TSL25X TSL26X Series H = 4.6, W = 4.6, D = 2.5. Lead pitch = 2.0

Optical sensors combining photodiode and transimpedance amplifier on a single monolithic IC. Output voltage is directly proportional to light intensity. Excellent noise immunity and low power consumption.

TSL25X have a wide spectral response and are housed in clear package. TSL26X Series have integral filter to cut out visible light and are housed in black IR-transmissive package. Choice of sensitivities allow easy matching to different light levels.

Supply voltage	Supply current	Spectral Response (nm) Peak	Response t _r , t _f (μs)	Mftrs. List No.
3V to 9V dc (5V nom.)	900μA (typ.)	>30% peak	360	TSL250
		800 340 to 950	90	TSL251
		910 850 to 1030	90	TSL261
		910 850 to 1030	7	TSL262

OPT245

Mftrs. List No.	Order Code	1+	25+	100+	250+
TSL250	.460-898				
TSL251	.460-904				
TSL261	.460-930				
TSL262	.460-941				