F Series (FFD-040;FFD-100;FFD-200)

Features

- Low Operating Voltage
- High Responsivity
- Ultra-Fast Rise and Fall Time
- www.dsolateduPhotodiode Chip

- Large Active Area
- Wide Spectral Range
- Low NEP

Operating Data and Specifications at 23°C: Typical Performance at 15 V Bias

Characteristic	FFD-040	FFD-100	FFD-200	Units
Active Area	0.81	5.1	20	Sq. mm
Spectral Range	4	400 —1150		→ nm
Responsivity	0.6	0.6	0.6	A/W at 850 nm
Bandwidth	150	150	150	MHz into 50 ohms
Rise Time	2	2	2	nS into 50 ohms
Operating Voltage	0-100	0-100	0-100	V
Breakdown Voltage ¹	>125	>125	>125	V
Capacitance	1.8	8.5	30	pF
Dark Current	2	5	10	nA
Series Resistance	150	50	20	ohms
Noise Current	25	40	56	10-15 A/Hz ^{1/2} at 1 KHz
NEP (850,10 MHz,1)	40	66	93	10 ⁻¹⁵ W/Hz ^{1/2}
Response Linearity	<1%	<1%	<1%	Over 7 decades
Operating Temperature	4	-55 to +125		→ °C
Package Style	TO-462	TO-5	TO-8	

Notes

- 1. Breakdown voltage measured at 100 microamps dark current.
- 2. Optional package: TO-5 with aperture.

Typical Spectral Response

