

3.125 Gbps 1310/1550 nm PIN

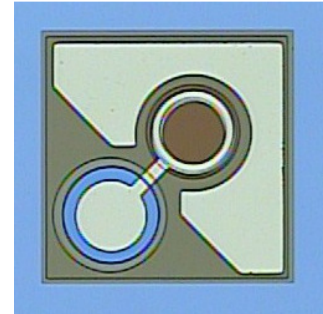
DI2B-7050

Part Number: DI2B-7050

Applications: 1.25, 2.5, 3.125 Gbps

Absolute Maximum Ratings (T = 25°C):

Parameter	Symbol	Unit	Value	Note
Forward Current	I _F	mA	10	
Reverse Voltage	V _R	V	20	
Die-Attach Temperature		°C	330	60 Seconds Max
Operating Temperature	T _{op}	°C	-40 to 90	
Storage Temperature	T _{stg}	°C	-40 to +100	



Electro-optical Characteristics (T = 25°C, unless noted otherwise):

Parameter	Symbol	Unit	Min.	Typ.	Max.	Test Condition
Aperture	D	μm	48	50	52	
Responsivity	R	A/W	0.85 0.90	0.90 0.95		λ = 1310 nm λ = 1550 nm
Dark Current	I _D	nA		0.1	1.0	V _R = 5 V
Breakdown Voltage	V _B	V	20			I _R = 1 μA
Capacitance	C	pF		0.5	0.6	V _R = 2 V f = 1 MHz
Rise/Fall Time	τ _r /τ _f	ps		70	80	V _R = 2 V 20-80%, R _L = 50Ω
Cut-off Frequency	f _C	GHz	4.0	4.5		V _R = 2 V R _L = 50Ω

Chip configuration:

1. Top contact: Anode; Bottom contact: Cathode.
2. Anode bond-pad diameter: 55 μm
3. Die size: 250 μm (width) x 250 μm (length) x 130 μm (thickness)
Tolerance: +/-12.5 μm