ELECTRONICS, INC.
44 FARRAND STREET
BLOOMFIELD, NJ 07003
(973) 748–5089

NTE3033
Infrared Photodiode

Features:
- High Sensitivity, High Reliability
- Fast Response, High Speed Modulation
- Peak Sensitivity Wavelength Compatible with Infrared Emitters
- Wide Detection Area, Wide Half Angle

Absolute Maximum Ratings: (T_A = +25°C unless otherwise specified)

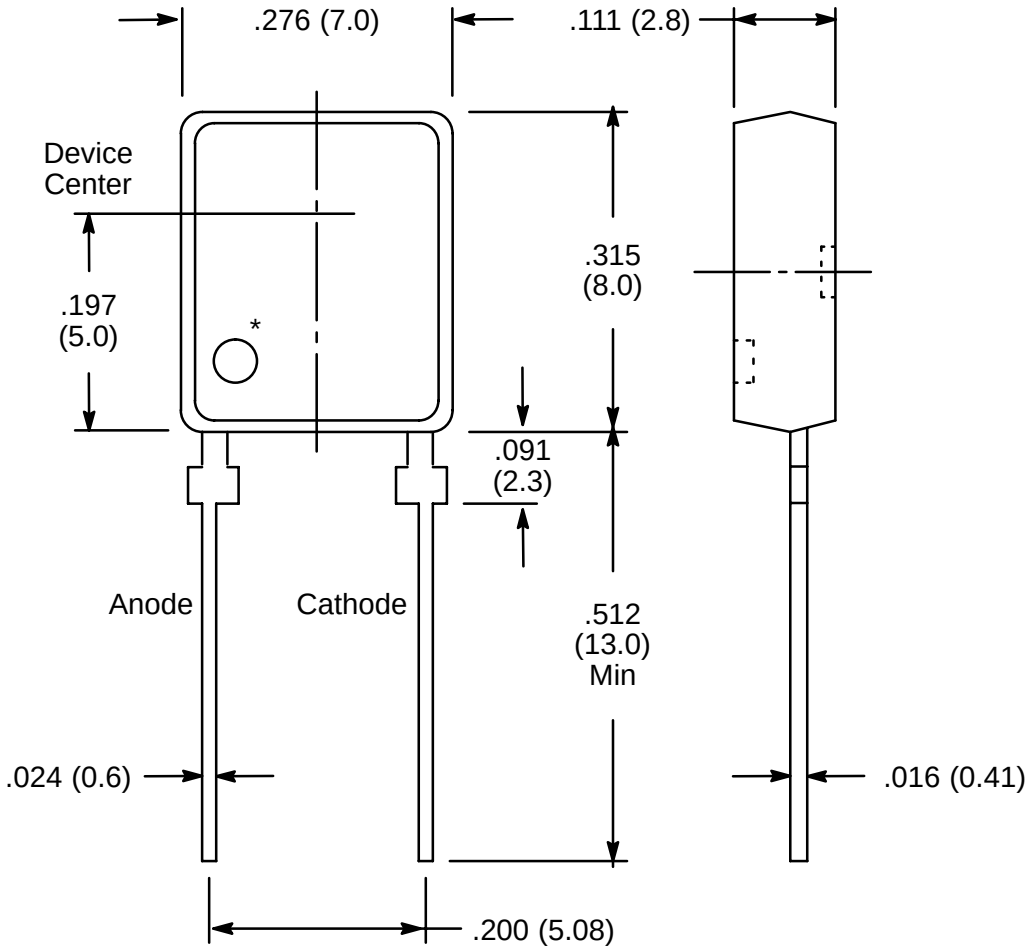
Reverse Voltage, V_R 30V
Power Dissipation, P_D 100mW
Operating Temperature range, T_{opr} . . . . . –30° to +85°C
Storage Temperature Range, T_{stg} . . . . . –40° to +100°C

Electro–Optical Characteristics: (T_A = +25°C unless otherwise specified)

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Dark Current	I_D	V_R = 10V	–	5	50	nA
Light Current	I_L	V_R = 10V, L = 1000 1x, Note 1	35	50	–	μA
Peak Emission Wavelength	λ_P	V_R = 10V	–	900	–	nm
Rise Time	t_r	V_R = 10V, R_L = 1kΩ	–	50	–	ns
		V_R = 10V, R_L = 100kΩ	–	5	–	μs
Fall Time	t_f	V_R = 10V, R_L = 1kΩ	–	50	–	ns
		V_R = 10V, R_L = 100kΩ	–	5	–	μs
Capacitance	C_t	V_R = 0, f = 1MHz	–	70	–	pF
Beam Angle		Note 2	–	65	–	deg

Note 1. Source: Tungsten filament lamp 2856°K

Note 2. The angle when the light current is halved.



* Denotes Anode mark