

- 1N4148-1 AVAILABLE IN JAN, JANTX, AND JANTXV
PER MIL-PRF-19500/116
- SWITCHING DIODE
- HERMETICALLY SEALED
- METALLURGICALLY BONDED
- DOUBLE PLUG CONSTRUCTION

1N4148-1

MAXIMUM RATINGS

Operating Temperature: -65°C to +200°C
 Storage Temperature: -65°C to +200°C
 Operating Current: 200 mA @ $T_A = +25^\circ\text{C}$
 Derating Factor: 1.14 mA/°C Above $T_A = +25^\circ\text{C}$
 Surge Current A: 2A, sine wave, $P_W = 8.3\text{ms}$
 Surge Current B: 1.41A, square wave, $P_W = 8.3\text{ms}$

ELECTRICAL CHARACTERISTICS @ 25°C, unless otherwise specified.

V_{BR} @ 100 μA	V_{RWM}	I_0	V_{f1} @ $I_F = 10\text{ mA}$	V_{f2} @ $I_F = 100\text{ mA}$	t_{rr}
Volts	Volts (pk)	mA	V dc	V dc	n sec
100	75	200	0.8	1.2	5

I_{R1} @ 20 V dc	I_{R2} @ 75 V dc	I_{R3} @ 20 V $T_A = 150^\circ\text{C}$	I_{R4} @ 75 V $T_A = 150^\circ\text{C}$	CAPACITANCE @ 0 V	CAPACITANCE @ 1.5 V
nA	μA	μA	μA	pF	pF
25	0.5	35	75	4.0	2.8

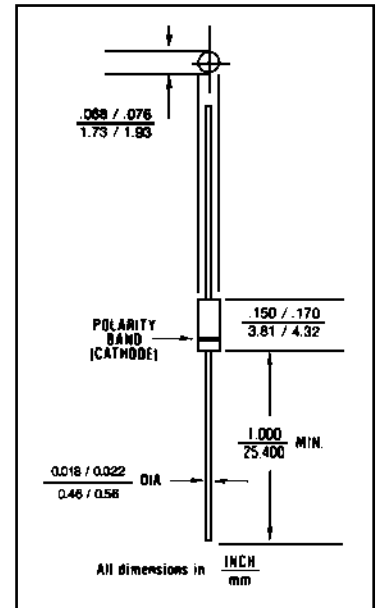


FIGURE 1

DESIGN DATA

CASE: Hermetically sealed
 glass case per MIL-S-19500/116
 D0-35 outline

LEAD MATERIAL: Copper clad steel.

LEAD FINISH: Tin / Lead

THERMAL RESISTANCE: (R_{QJL}):
 250 °C/W maximum at $L = .375$

THERMAL IMPEDANCE: (Z_{QJX}): 70
 °C/W maximum

POLARITY: Cathode end is banded.

MOUNTING POSITION: Any.



COMPENSATED DEVICES INCORPORATED

22 COREY STREET, MELROSE, MASSACHUSETTS 02176
 PHONE (781) 665-1071 FAX (781) 665-7379
 WEBSITE: <http://www.cdi-diodes.com> E-mail: mail@cdi-diodes.com

IN4148-1

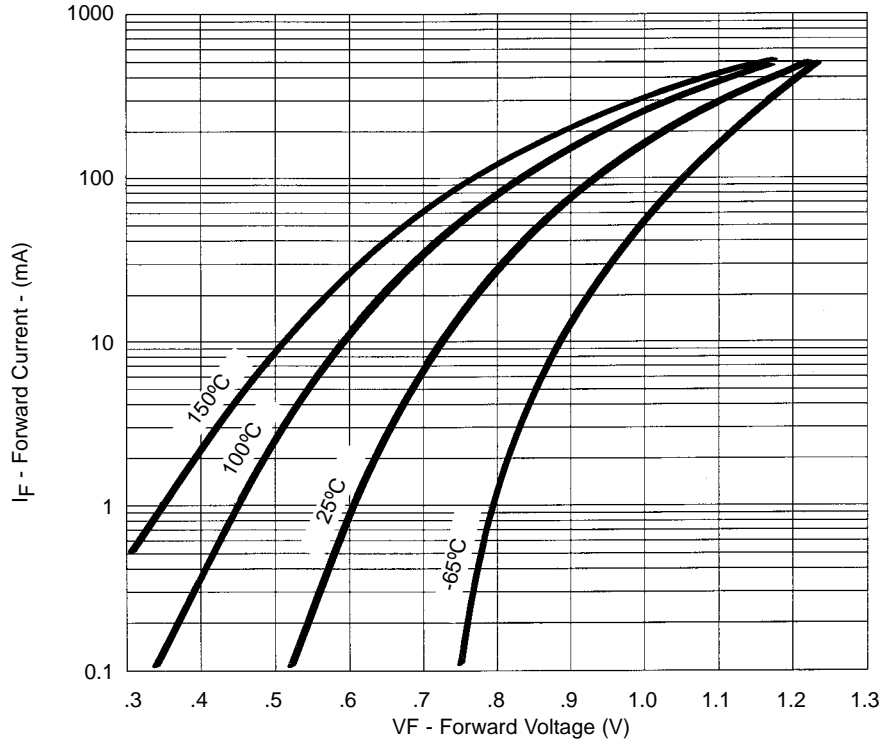


FIGURE 2
Typical Forward Current
vs Forward Voltage

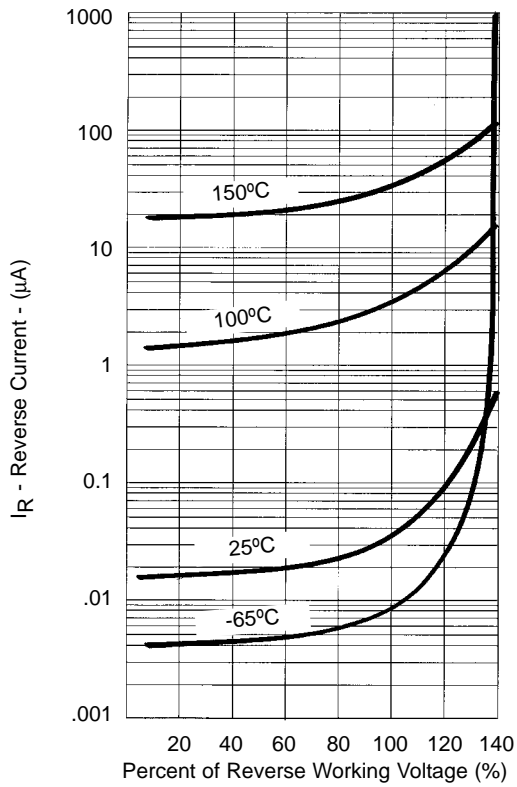


FIGURE 3
Typical Reverse Current
vs Reverse Voltage

NOTE : All temperatures shown on graphs are junction temperatures