



Silicon Switching Diode Series

1N914UR & 1N4148UR-1



Features

- Available in JAN, JANTX, and JANTXV per MIL-PRF-19500/116
- Metallurgically Bonded
- Hermetically Sealed
- Double Plug Construction



Maximum Ratings

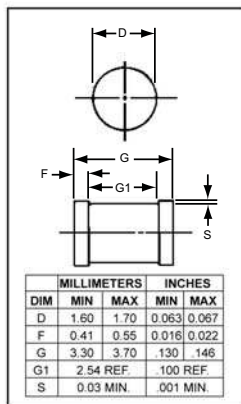
Operating & Storage Temperature: -65°C to +175°C
 Surge Current A, sine 8.3ms: 2.0 A
 Surge Current B, square 8.3ms: 0.704 A
 Operating Current: 125mA, $T_A = +75^\circ\text{C}$
 Derating Factor: 2.0 mA/°C above $T_A = +25^\circ\text{C}$
 D.C. Reverse Voltage (VRWM): 75V

Electrical Specifications @ +25 °C (Unless Otherwise Specified)

| JEDEC TYPE Number | V_{BR} @ 100 μA | V_{RWM} | I_O | V_{f1} $I_F = 10 \text{ mA}$ | V_{f2} $I_F = 50 \text{ mA}$ | T_{rr} (Note 1) | I_{R1} @ 20 Vdc | I_{R2} @ 75 Vdc | I_{R3} @ 20 Vdc $T_A = 150^\circ\text{C}$ | I_{R4} @ 75 Vdc $T_A = 150^\circ\text{C}$ | Capacitance @ 0V | Capacitance @ 1.5 V |
|-------------------------|---------------------------------|------------|-------|-----------------------------------|-----------------------------------|----------------------|----------------------|----------------------|---|---|---------------------|------------------------|
| | Volts | Volts (pk) | mA | Vdc | Vdc | nsec | nA | μA | μA | μA | pF | PF |
| 1N914UR | 100 | 75 | 75 | 0.8 | 1.2 | 5 | 25 | 0.5 | 35 | 75 | 4.0 | 2.8 |
| 1N4148UR-1 | 100 | 75 | 200 | 0.8 | 1.2 | 5 | 35 | 0.5 | 35 | 75 | 4.0 | 2.8 |

Note1: $I_F = I_R = 10 \text{ mA}$, $R_L = 100 \text{ ohms}$.

Outline Drawing



LEADED DESIGN DATA

CASE: DO-213AA, Hermetically sealed glass case. (MELF, SOD-80, LL34)

LEAD FINISH: Tin / Lead

THERMAL RESISTANCE: ($R_{\theta JC}$): 100 °C/W maximum at L = 0 inch

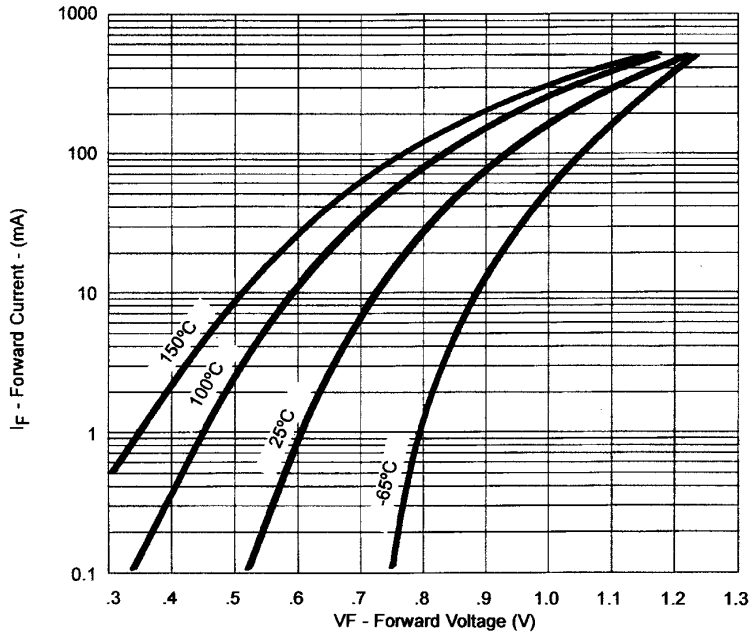
THERMAL IMPEDANCE: ($Z_{\theta JX}$): 25 °C/W maximum

POLARITY: Diode to be operated with the banded (cathode) end positive.

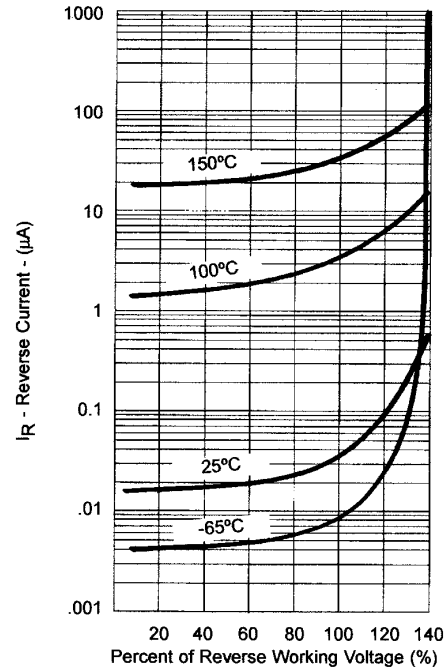
MOUNTING POSITION: Any.



Graphs



Typical Forward Current vs Forward Voltage



Typical Reverse Current vs Reverse Voltage

NOTE : All temperatures shown on graphs are junction temperatures

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