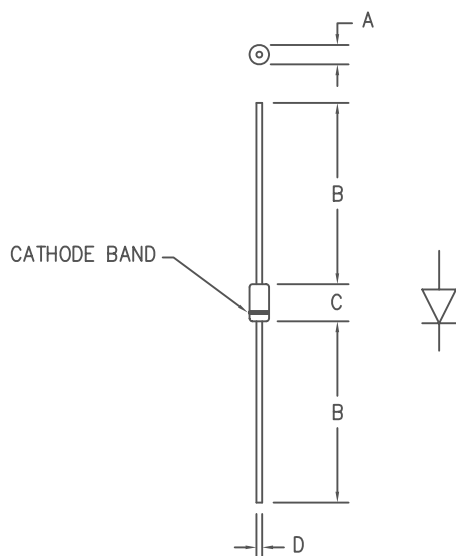


1 Amp Schottky Rectifier MSG104 — MSG106



Dim.	Inches		Millimeter		Notes
	Minimum	Maximum	Minimum	Maximum	
A	.081	.107	2.057	2.718	Dia.
B	1.10	---	27.94	---	
C	.160	.205	4.064	5.207	
D	.028	.034	.711	.864	Dia.

GLASS HERMETIC DO41

Microsemi Catalog Number	Working Peak Reverse Voltage	Repetitive Peak Reverse Voltage
MSG104	40V	40V
MSG105	50V	50V
MSG106	60V	60V

- Schottky Barrier Rectifier
- Guard Ring Protection
- 175°C Junction Temperature
- V_{RRM} 40 to 60 Volts
- Hermetic Package

Electrical Characteristics

Average forward current	$I_F(AV)$ 1.0 Amps	$T_L = 140^\circ\text{C}$ Square wave
Maximum surge current	I_{FSM} 75 Amps	8.3ms, half sine, $T_J = 175^\circ\text{C}$
Max peak forward voltage	V_{FM} .69 Volts	$I_{FM} = 1.0A; T_J = 25^\circ\text{C}^*$
Max peak reverse current	I_{RM} 100 μA	$V_{RRM}, T_J = 25^\circ\text{C}$
Typical junction capacitance	C_J 53pF	$V_R = 5.0V, T_J = 25^\circ\text{C}$

*Pulse test: Pulse width 300 μsec , Duty cycle 2%

Thermal and Mechanical

Storage temperature range	T_{STG}	-65°C to 175°C
Operating junction temp range	T_J	-65°C to 175°C
Maximum thermal resistance	$L = 1/4"$ $R_{\theta JL}$	30°C/W Junction to Lead
Weight		.012 ounces (0.38 grams) typical



8700 East Thomas Road, P.O. Box 1390
Scottsdale, AZ 85252
PH: (480) 941-6300
FAX: (480) 947-1503
www.microsemi.com

05-25-07 Rev. 3

MSG104 — MSG106

Figure 1
Typical Forward Characteristics

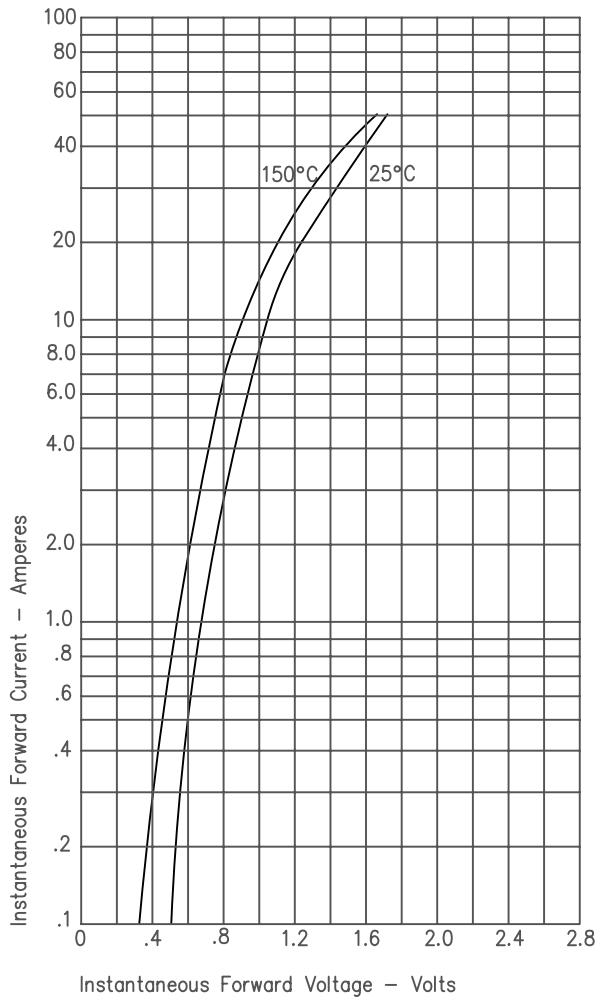


Figure 3
Typical Junction Capacitance

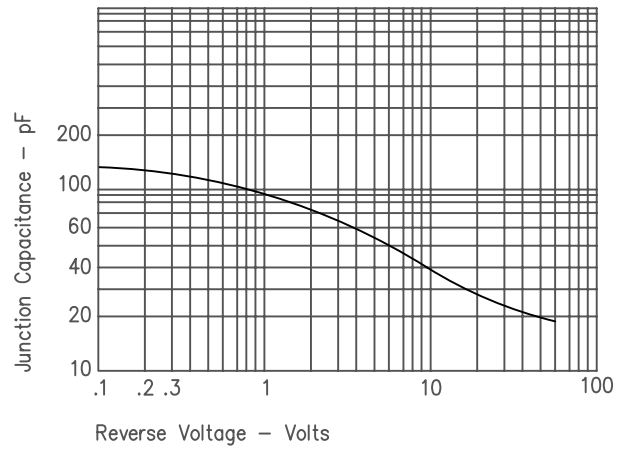


Figure 2
Typical Reverse Characteristics

