

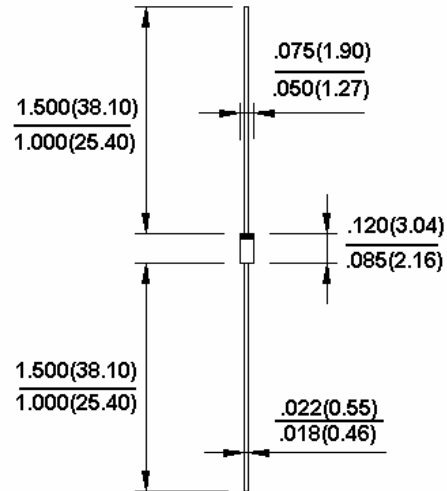
1SS133M

300mW Hermetically Sealed Glass Switching Diode

DO-34

Features

- ◇ Fast switching device($T_{RR}<4.0nS$)
- ◇ DO-34 package (JEDEC DO-204)
- ◇ Through-hole device type mounting
- ◇ Hermetically sealed glass
- ◇ Compression bonded construction
- ◇ All external surfaces are corrosion resistant and leads are readily solderable
- ◇ RoHS compliant
- ◇ Solder hot dip Tin (Sn) lead finish
- ◇ Cathode indicated by polarity band



Dimensions in inches and (millimeters)

Maximum Ratings and Electrical Characteristics

Rating at 25°C ambient temperature unless otherwise specified.

Maximum Ratings

Type Number	Symbol	Value	Units
Power Dissipation	P_d	300	mW
Working Inverse Voltage	W_{IV}	90	V
Average Rectified Current	I_o	150	mA
Non-Repetitive Peak Forward Current	I_{FM}	450	mA
Peak Forward surge Current	I_{FSURGE}	2	A
Operating Junction Temperature	T_J	+ 175	°C
Storage Temperature Range	T_{STG}	-65 to + 200	°C

Electrical Characteristics

Type Number	Symbol	Min	Max	Units
Breakdown Voltage $I_R=500nA$	B_V	80		V
Forward Voltage $I_F=100mA$	V_F		1.2	V
Reverse Leakage Current $V_R=80V$	I_R		500	nA
Junction Capacitance $V_R=0, f=1.0MHz$	C_j	-	4.0	pF
Reverse Recovery Time (Note 1)	t_{rr}	-	4.0	nS

Notes: 1. Reverse Recovery Test Conditions: $I_F=I_R=10mA$, $R_L=100\Omega$, $I_{RR}=1mA$

RATINGS AND CHARACTERISTIC CURVES (1SS133M)

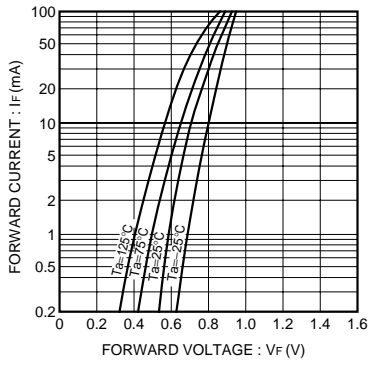


Fig.1 Forward characteristics

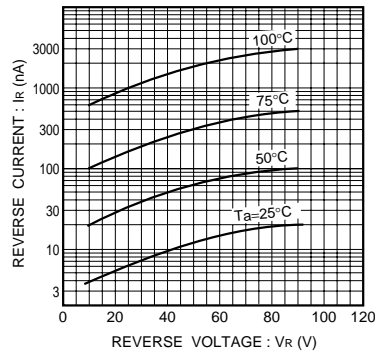


Fig.2 Reverse characteristics

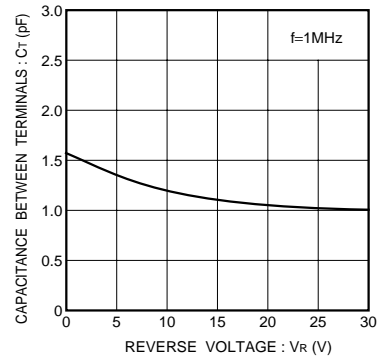


Fig.3 Capacitance between terminals characteristics

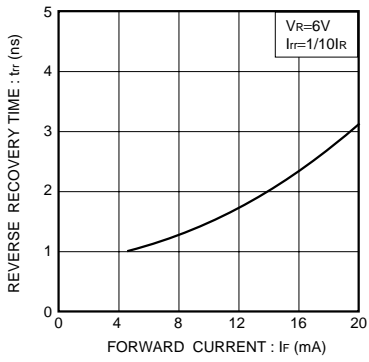


Fig.4 Reverse recovery time characteristics

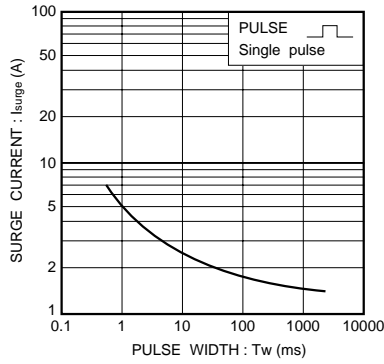


Fig.5 Surge current characteristics

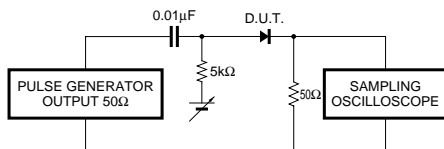


Fig.6 Reverse recovery time (t_r) measurement circuit