

200mW SOD-323
SURFACEMOUNTSmall
OutlineFlatLeadPlasticPackage
Fast SwitchingDiode

Green Product



SOD-323 Flat Lead



ELECTRICAL SYMBOL

AbsoluteMaximumRatings $T_A = -25^\circ\text{C}$ unless otherwise noted

Symbol	Parameter	Value	Units
P_D	Power Dissipation	200	mW
T_{STG}	Storage Temperature Range	-65 to +150	$^\circ\text{C}$
T_J	Operating Junction Temperature	+150	$^\circ\text{C}$
V_{RSM}	Non-Repetitive Peak Reverse Voltage	100	V
V_{RRM}	Repetitive Peak Reverse Voltage	75	V
I_{FRM}	Repetitive Peak Forward Current	300	mA
I_o	Continuous Forward Current	150	mA

These ratings are limiting values above which the serviceability of the diode may be impaired.

Specification Features:

- Fast Switching Device ($T_{RR} < 4.0\text{ns}$)
- General Purpose Diodes
- Flat Lead SOD-323 Small Outline Plastic Package
- Surface Device Type Mounting
- RoHS Compliant
- Green EMC
- Matte Tin (Sn) Lead Finish
- Band Indicates Cathode

DEVICE MARKING CODE:

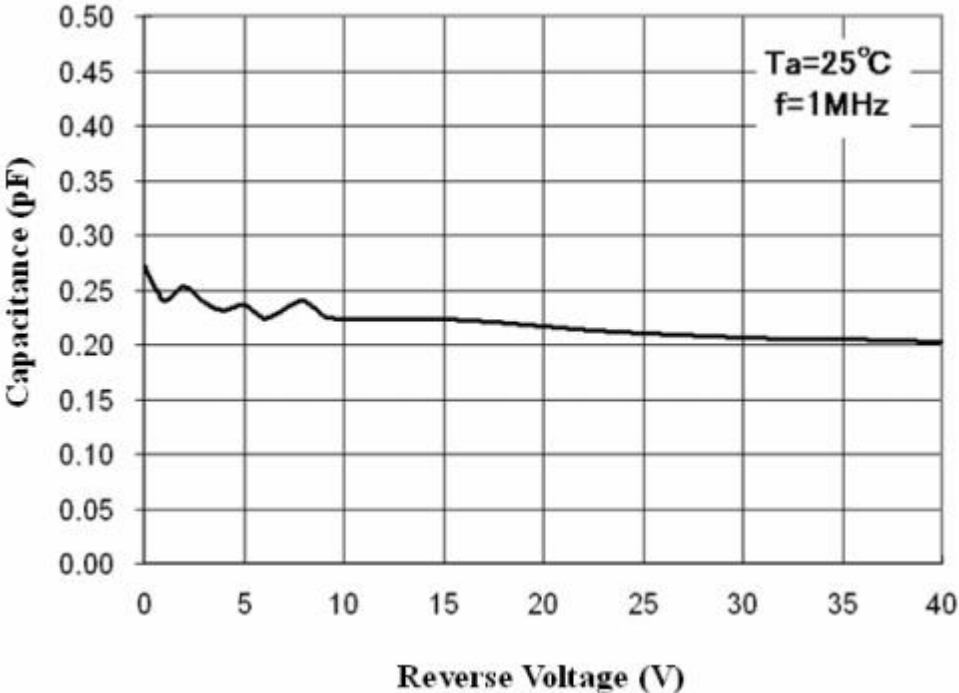
Device Type	Device Marking
1N4148WS	S1
1N4448WS	S2
1N914BWS	S3

Electrical Characteristics $T_A = 25^\circ\text{C}$ unless otherwise noted

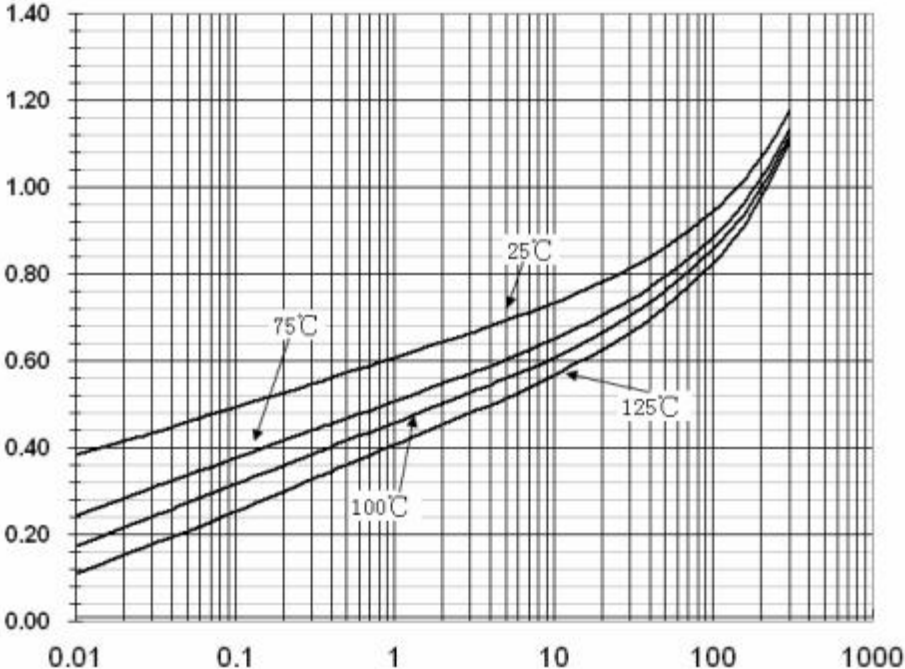
Symbol	Parameter	Test Condition	Limits		Unit
			Min	Max	
B_V	Breakdown Voltage	$I_R = 100\mu\text{A}$ $I_R = 5\mu\text{A}$	100 75		Volts
I_R	Reverse Leakage Current	$V_R = 20\text{V}$ $V_R = 75\text{V}$		25 5	nA μA
V_F	Forward Voltage	1N4448WS, 1N914BWS $I_F = 5\text{mA}$ 1N4148WS $I_F = 10\text{mA}$ 1N4448WS, 1N914BWS $I_F = 100\text{mA}$	0.62	0.72 1.0 1.0	Volts
T_{RR}	Reverse Recovery Time	$I_F = 10\text{mA}$ $I_R = 60\text{mA}$ $R_L = 100\Omega$ $I_{RR} = 1\text{mA}$		4	nS
C	Capacitance	$V_R = 0\text{V}$, $f = 1\text{MHz}$		4	pF

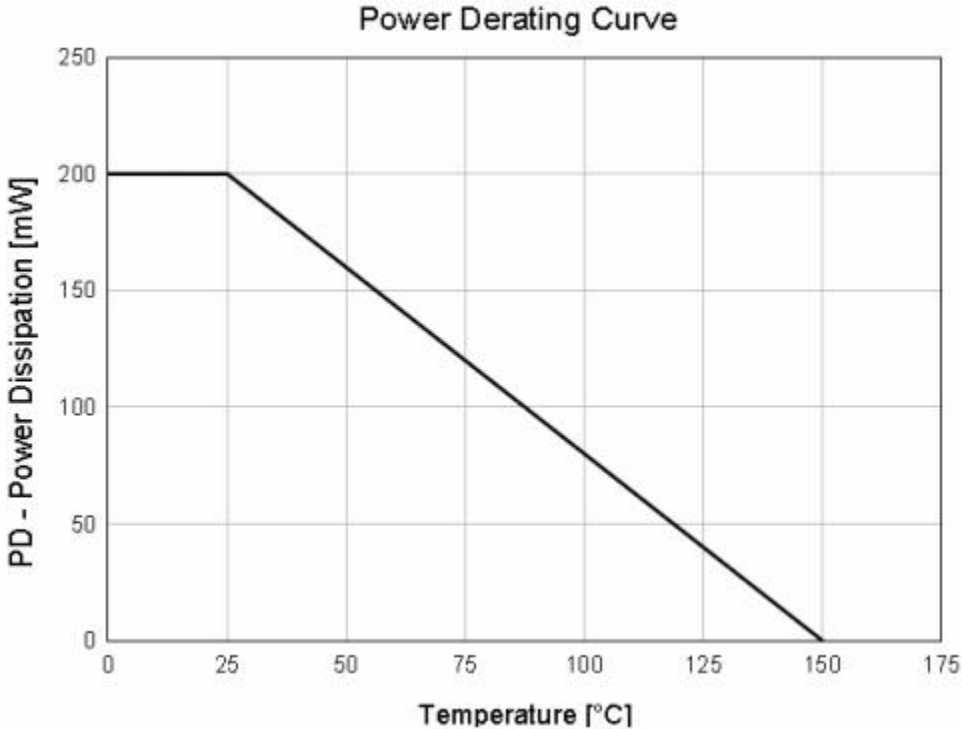
Typical Performance Characteristics

Total Capacitance

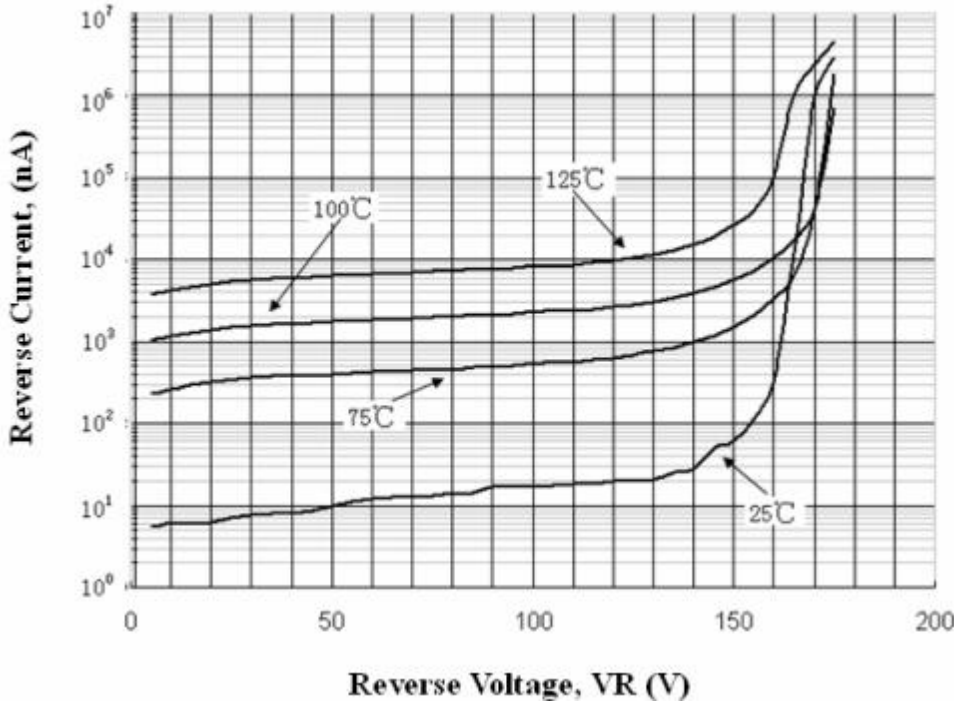


Forward Voltage vs Ambient Temperature

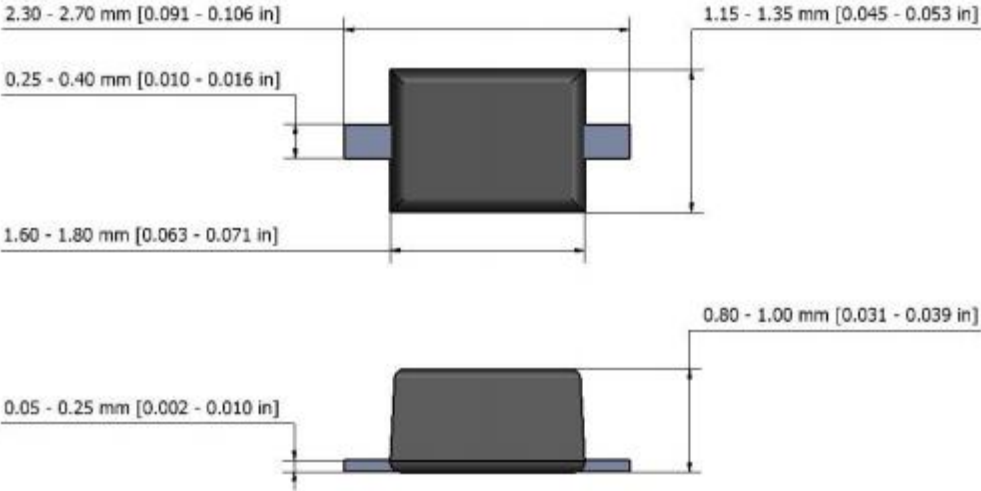




ReverseCurrentvsReverseVoltageReverse



SOD-323PackageOutline



NOTE: The above package outline is similar to JEITASC-90.