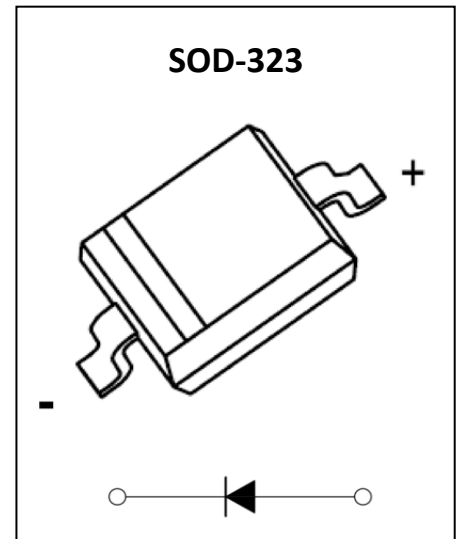
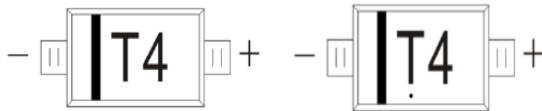


1N4148WS Fast Switching Diodes

Feature

- Fast Switching Speed
- High Conductance
- For General Purpose Switching Applications

MARKING:



ABSOLUTE MAXIMUM RATINGS ($T_A=25^\circ\text{C}$ unless otherwise noted)

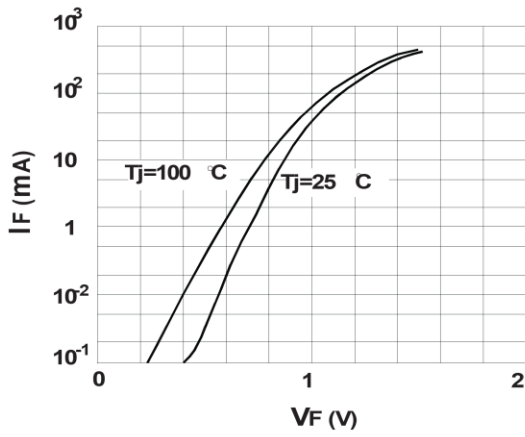
Parameter	Symbol	Value	Unit
Non-Repetitive Peak Reverse Voltage	V_{RM}	100	V
Repetitive Peak Reverse Voltage	V_{RRM}	100	V
Working Peak Reverse Voltage	V_{RWM}		
DC Blocking Voltage	V_R		
RMS Reverse Voltage	$V_{R(RMS)}$	71	V
Mean rectifying current	I_O	0.15	A
Forward Continuous Current	I_{FM}	0.3	A
Non-repetitive Peak Forward Surge Current @ $t=1\ \mu\text{s}$	I_{FSM}	2	A
Power Dissipation	P_D	0.2	W
Junction Temperature	T_J	155	$^\circ\text{C}$
Storage Temperature	T_{STG}	-55 ~ +150	$^\circ\text{C}$

ELECTRICAL CHARACTERISTICS ($T_A=25^\circ\text{C}$ unless otherwise noted)

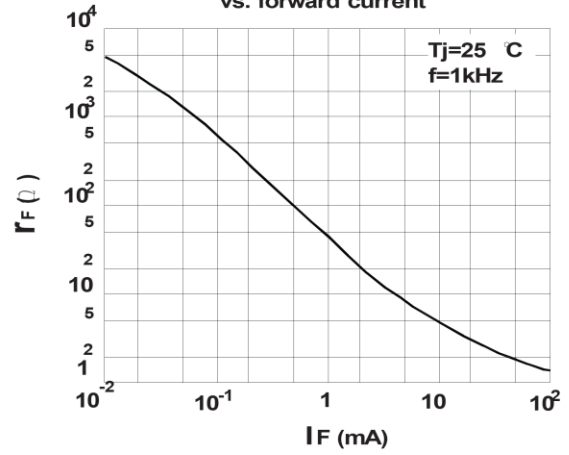
Parameter	Symbol	Test Condition	Min	Max	Unit
Forward Voltage	V_F	$I_F = 1\text{mA}$		0.715	V
		$I_F = 10\text{mA}$		0.855	V
		$I_F = 50\text{mA}$		1.0	V
		$I_F = 150\text{mA}$		1.25	V
Reverse Current	I_R	$V_R = 20\text{V}$		25	nA
		$V_R = 75\text{V}$		1	μA
Diode Capacitance	C_D	$V_R=0\text{V}$, $f=1\text{MHz}$		2	pF
Reverse Recovery Time	t_{rr}	$I_F=I_R=10\text{mA}$, $I_{tr}=0.1 \cdot I_R$, $R_L=100\Omega$		4	ns

Typical Electrical and Thermal Characteristics

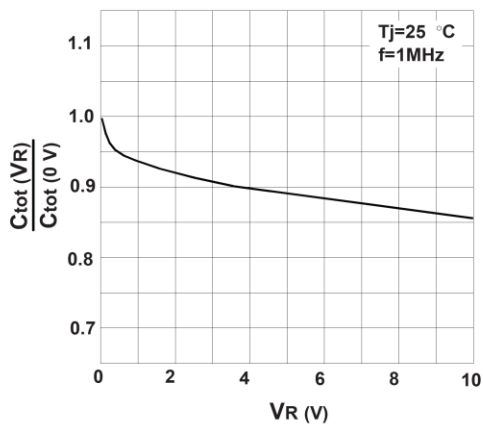
Forward characteristics



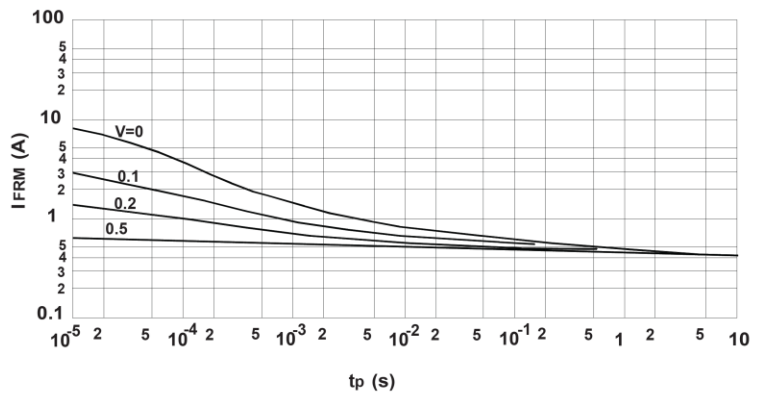
Dynamic forward resistance vs. forward current



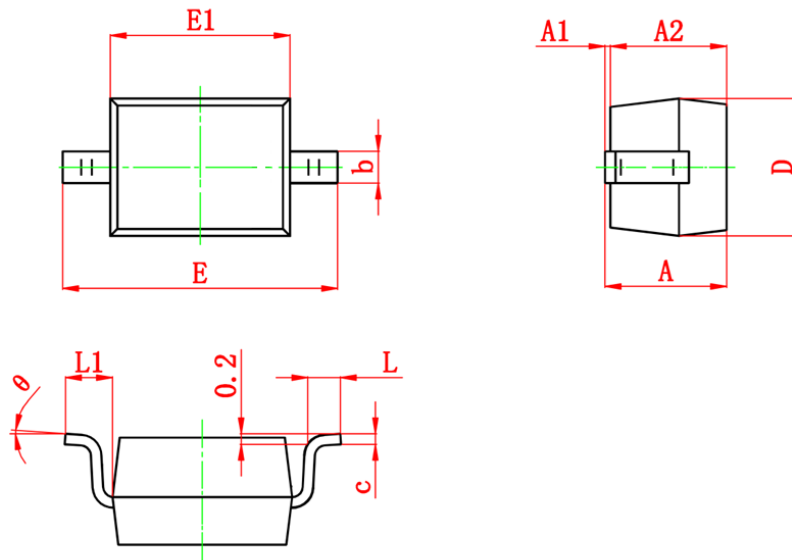
Reverse capacitance vs. reverse voltage



Ammissible repetitive peak forward current vs. pulse duration



SOD-323 Package Outline Dimensions



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min.	Max.	Min.	Max.
A	1.150MAX		0.045MAX	
A1	0.000	0.100	0.000	0.004
A2	0.800	0.900	0.031	0.035
b	0.250	0.400	0.010	0.016
c	0.080	0.180	0.003	0.007
D	1.200	1.400	0.047	0.055
E	2.500	2.800	0.098	0.110
E1	1.600	1.800	0.063	0.071
L	0.200	0.450	0.008	0.018
L1	0.475REF		0.019REF	
θ	0°	8°	0°	8°