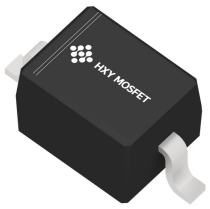
NSR1020MW2T1G
SCHOTTKY BARRIER DIODE

Features
- Peak Forward Current: I_{FM}= 1A
- Power Dissipation of 250mW



SOD-323



Package Marking and Ordering Information

Product ID	Pack	Marking	Qty(PCS)
NSR1020MW2T1G	SOD-323	SJ	3000

Maximum Ratings (Ta=25°C unless otherwise noted)

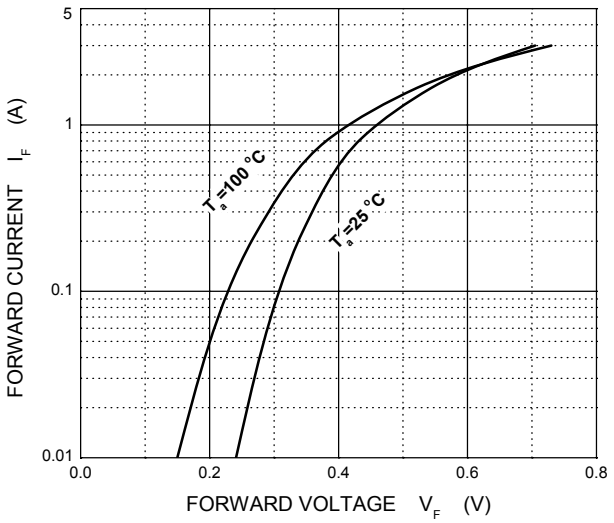
Parameter	Symbol	Value	Unit
Non-Repetitive Peak Reverse Voltage	V_{RM}	20	V
Peak Repetitive Peak Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	V_{RRM} V_{RWM} V_R	20	V
RMS Reverse Voltage	$V_{R(RMS)}$	14	V
Average Rectified Output Current	I_O	1	A
Non-repetitive Peak Forward Surge Current @t=8.3ms	I_{FSM}	9	A
Repetitive Peak Forward Current	I_{FRM}	1.5	A
Power Dissipation	P_D	250	mW
Thermal Resistance Junction to Ambient	$R_{\theta JA}$	200	°C/W
OperationJunction temperature Range Storage Temperature Range	T_J T_{STG}	-40~+125 -55~+150	°C °C

Electrical Characteristics (Ta=25°C unless otherwise specified)

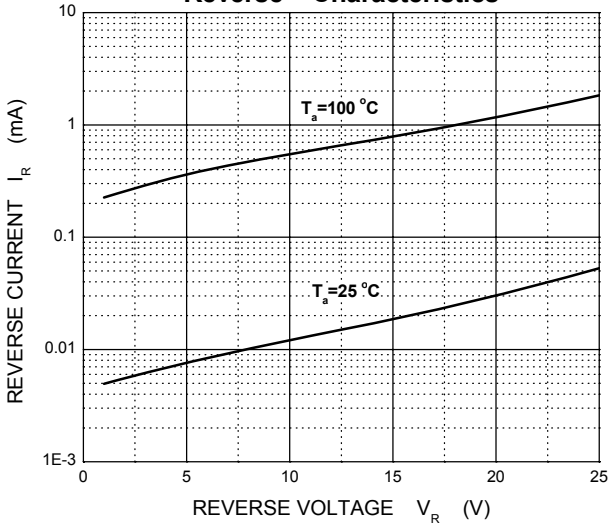
Parameter	Symbol	Test conditions	Min	Max	Unit
Reverse breakdown voltage	$V_{(BR)}$	I_R= 1mA	20		V
Reverse voltage leakage current	I_R	V_R=20V		1	mA
Forward voltage	V_F	I_F=1A I_F=3A		0.45 0.75	V
Diode capacitance	C_D	V_R=4V, f=1MHz		120	pF

Typical Characteristics

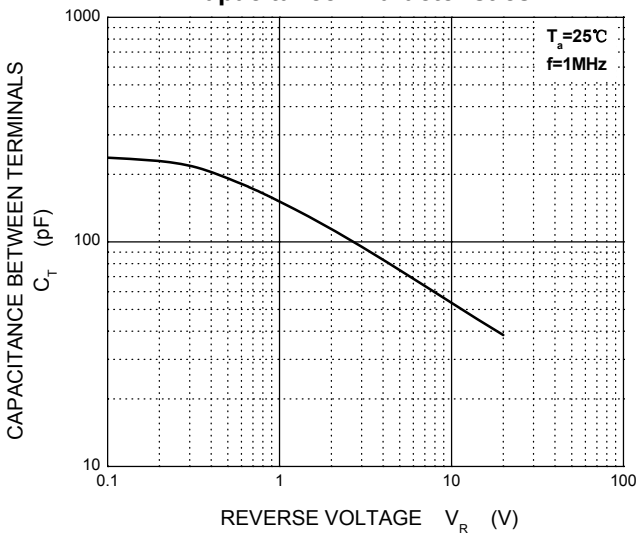
Forward Characteristics



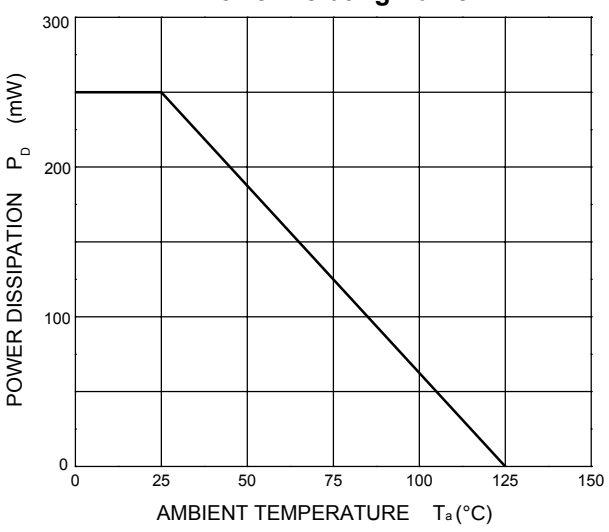
Reverse Characteristics



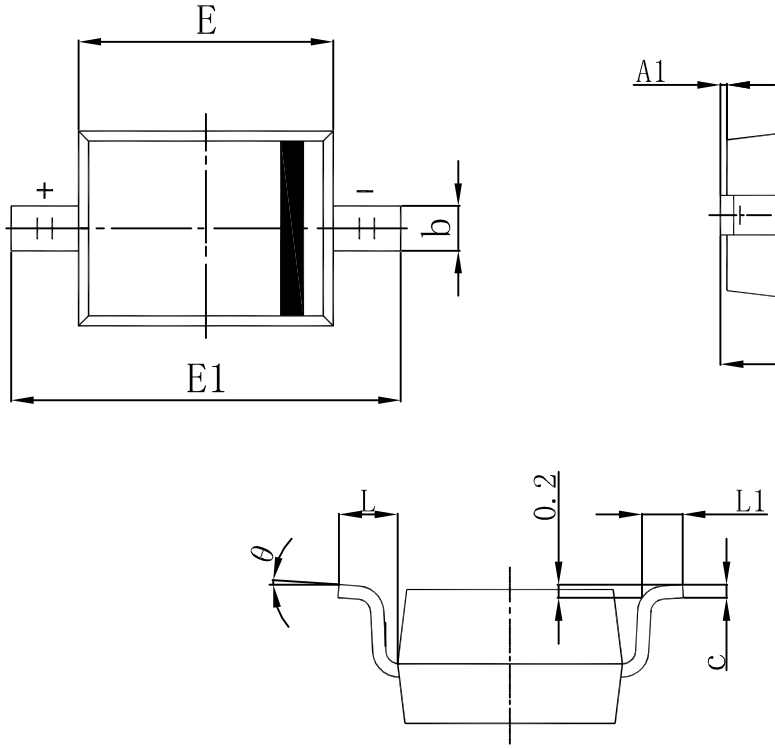
Capacitance Characteristics



Power Derating Curve



SOD-323 Package Outline Dimensions



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min	Max	Min	Max
A		1.100		0.043
A1	0.000	0.100	0.000	0.004
A2	0.800	1.000	0.031	0.039
b	0.250	0.350	0.010	0.014
c	0.080	0.150	0.003	0.006
D	1.200	1.400	0.047	0.055
E	1.600	1.800	0.063	0.071
E1	2.500	2.750	0.098	0.108
L	0.475 REF		0.019 REF	
L1	0.250	0.400	0.010	0.016
θ	0°	8°	0°	8°

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HSEN3611D3 PESDLC2FD3V3BH AQ15C-01FTG BV05C-H HACPDQC5V0-HF HSG3D15B3.3MA
TPSMB28A-VR HESDSLC3V3D3B HSEN2411D3 RLSD32A121V PESDNC2XD5VBL PJSD24CW_R1
HCEZ36V,L3F HPTVSUC3D5VB ESD5LM5.0C-HXY 60N06 HRCLAMP3371ZCTFT PESDSC2FD5VU
TPSMB100CA-VR HESD36VD3B HLY323BC1524L HSD15C.TCT PESDNC2XD5VBF HSTS521050B331
LM393DR-HXY PJEC5V0M1FN2 AZ4007-01H AZ4836-01L ESD5L5.0C-HXY HAZ4007-01H