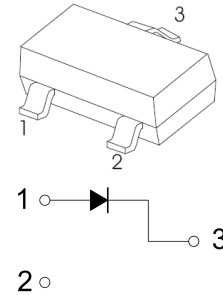


SCHOTTKY BARRIER DIODE

SOT-23



FEATURES

- Low Forward Voltage
- Fast Reverse Recovery Time
- High Forward Current

APPLICATIONS

- High Speed Switching

MARKING: H9



Solid dot = Green molding compound device, if none, the normal device.

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

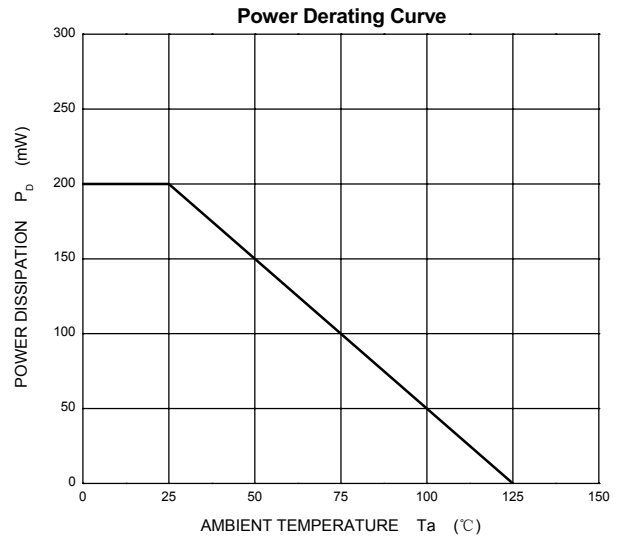
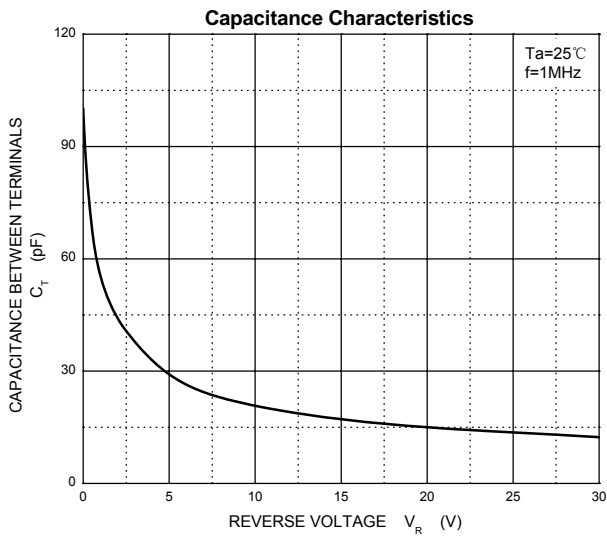
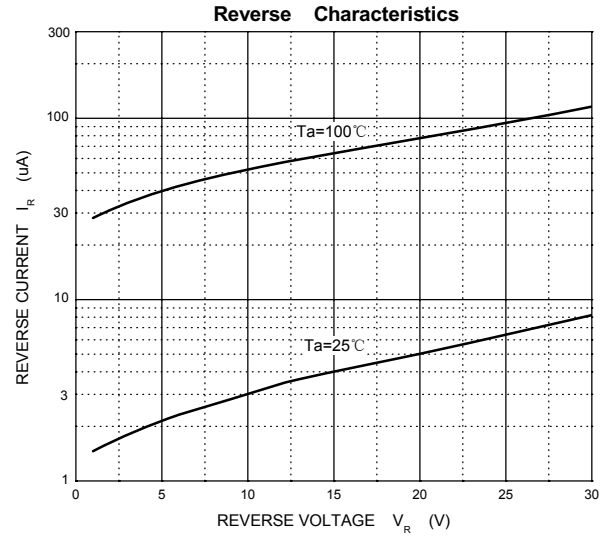
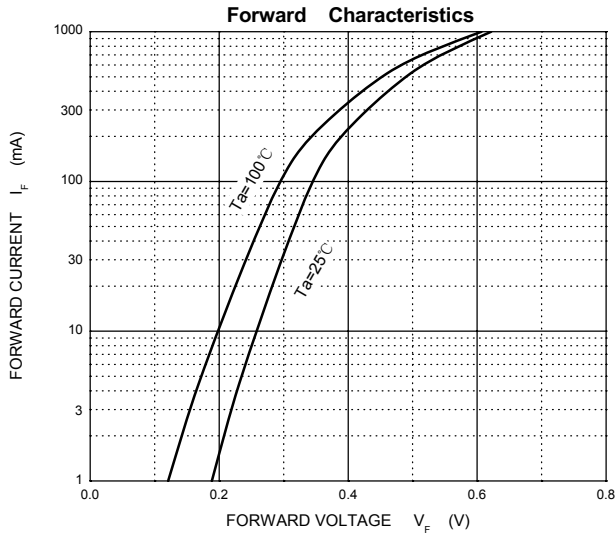
Symbol	Parameter	Value	Unit
$V_R$	DC Blocking Voltage	20	V
$I_O$	Forward Continuous Current	500	mA
$I_{FM}$	Peak Forward Current	1.5	A
$I_{FSM}$	Non-repetitive Peak Forward Surge Current@ $t=8.3\text{ms}$	5	A
$P_D$	Power Dissipation	200	mW
$R_{\theta JA}$	Thermal Resistance From Junction To Ambient	500	$^{\circ}\text{C/W}$
$T_j$	Junction Temperature	125	$^{\circ}\text{C}$
$T_{stg}$	Storage Temperature	-55~+150	$^{\circ}\text{C}$

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

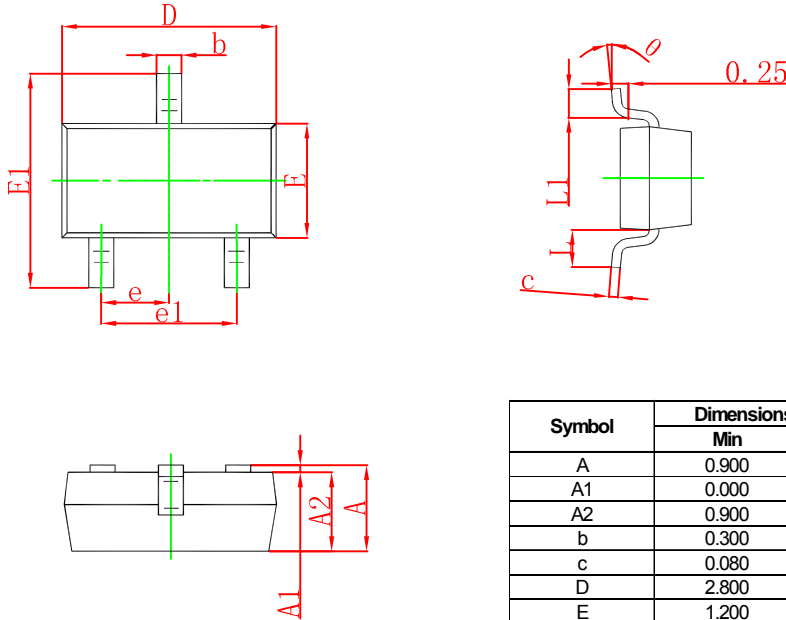
Parameter	Symbol	Test conditions	Min	Typ	Max	Unit
Reverse voltage	$V_{(BR)}$	$I_R=100\mu\text{A}$	20			V
Reverse current	$I_R$	$V_R=10\text{V}$			20	$\mu\text{A}$
		$V_R=20\text{V}$			100	
Forward voltage	$V_F$	$I_F=10\text{mA}$			0.35	V
		$I_F=100\text{mA}$			0.43	
		$I_F=500\text{mA}$			0.55	
Total capacitance	$C_{tot}$	$V_R=0\text{V}$ , $f=1\text{MHz}$		120		pF
Reverse recovery time	$t_{rr}$	$I_F=I_R=50\text{mA}$ , $V_R=6\text{V}$		20		ns



Typical Characteristics

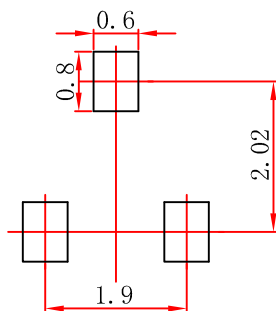


SOT-23 Package Outline Dimensions



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min	Max	Min	Max
A	0.900	1.150	0.035	0.045
A1	0.000	0.100	0.000	0.004
A2	0.900	1.050	0.035	0.041
b	0.300	0.500	0.012	0.020
c	0.080	0.150	0.003	0.006
D	2.800	3.000	0.110	0.118
E	1.200	1.400	0.047	0.055
E1	2.250	2.550	0.089	0.100
e	0.950 TYP		0.037 TYP	
e1	1.800	2.000	0.071	0.079
L	0.550 REF		0.022 REF	
L1	0.300	0.500	0.012	0.020
θ	0°	8°	0°	8°

SOT-23 Suggested Pad Layout



Note:  
 1. Controlling dimension: in millimeters.  
 2. General tolerance: ± 0.05mm.  
 3. The pad layout is for reference purposes only.