

Schottky Barrier Diode

- ◇ Low Forward Voltage Drop
- ◇ SOD523 Micro SMD package
- ◇ RoHS compliant / Green EMC
- ◇ Matte Tin (Sn) Lead finish
- ◇ Cathode Band / Device marking
- ◇ Surface Mount Package Ideally Suited
for Automatic Insertion

PINNING

PIN	DESCRIPTION
1	Cathode
2	Anode

SOD-523


Absolute Maximum Ratings ($T_a = 25\text{ }^{\circ}\text{C}$)

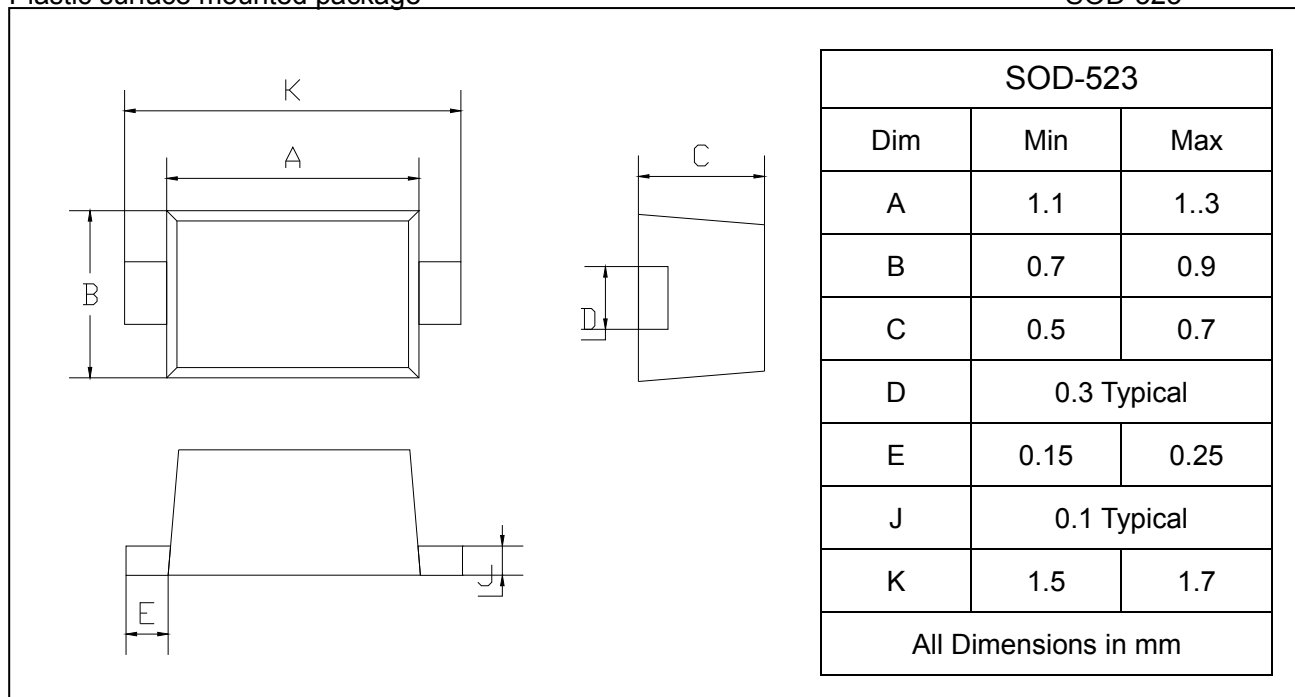
Symbol	Parameter	Value	Units
V_{RRM}	Repetitive Peak Reverse Voltage	40	V
$I_{F(AV)}$	Average Forward Rectified Current	1	A
I_{FSM}	Non-Repetitive Peak Forward Surge Current (@ $t=8..3\text{ms}$)	6	A
T_J	Operating Junction Temperature	125	$^{\circ}\text{C}$
T_{STG}	Storage Temperature Range	-50 to +125	$^{\circ}\text{C}$

Characteristics at $T_a = 25\text{ }^{\circ}\text{C}$

Symbol	Parameter	Conditions	Min	Max	Units
V_F	Forward Voltage	$I_F = 0.3\text{A}$		0.5	V
		$I_F = 1\text{A}$		0.68	V
I_R	Reverse current	$V_R = 40\text{V}$		100	μA
V_{BR}	Reverse breakdown voltage	$I_R = 0.5\text{mA}$	40		V
C_T	Capacitance	$V_R = 0\text{V}$, $f = 1\text{MHz}$		100	pF

Plastic surface mounted package

SOD-523



SOLDERING FOOTPRINT

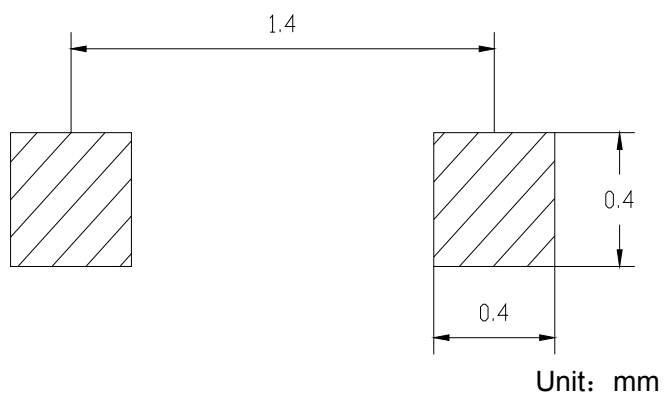


Fig. 1 - Forward Current Derating Curve

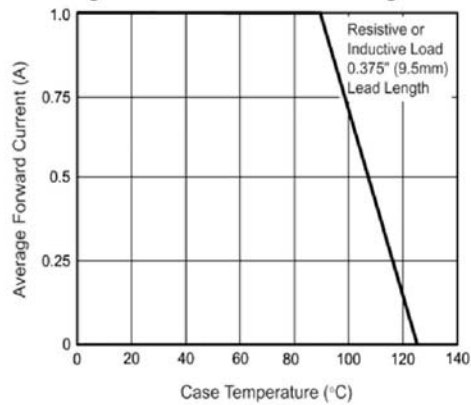


Fig. 2 - Maximum Non-Repetitive Peak Forward Surge Current

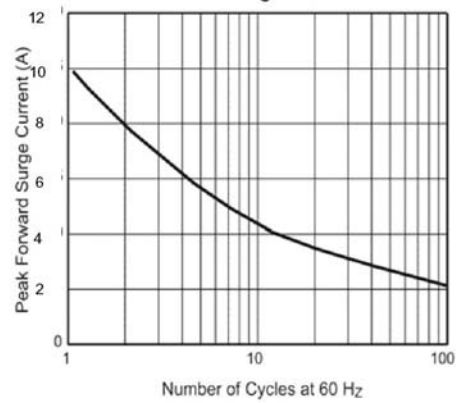


Fig. 3 - Typical Instantaneous Forward Characteristics

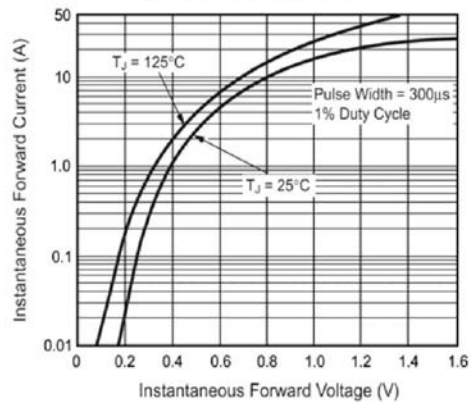


Fig. 4 - Typical Reverse Characteristics

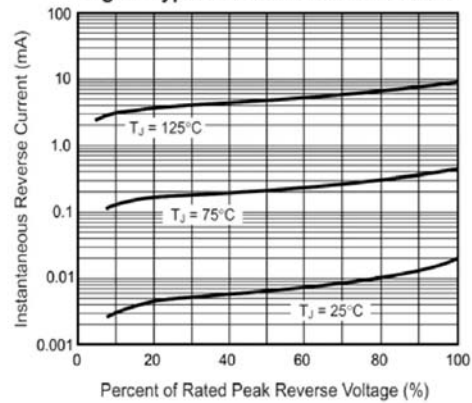


Fig. 5 - Typical Junction Capacitance

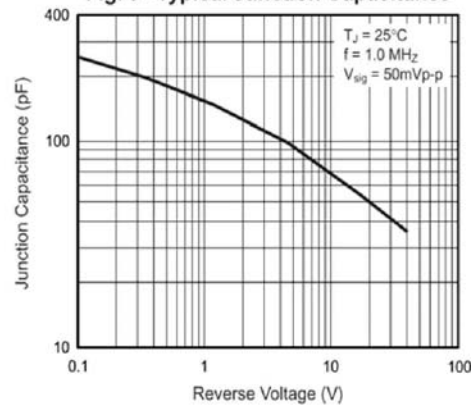


Fig. 6 - Typical Transient Thermal Impedance

