

# SB520WT

## SCHOTTKY BARRIER DIODE

### Features

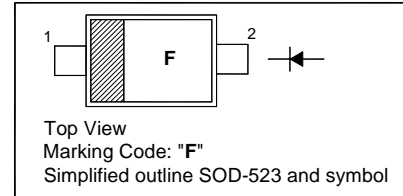
- Ultra small SMD package
- Very low forward voltage

### Applications

- Ultra high speed switching
- Voltage clamping
- Low current rectification

### PINNING

PIN	DESCRIPTION
1	Cathode
2	Anode

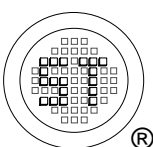


### Absolute Maximum Ratings ( $T_a = 25\text{ }^\circ\text{C}$ )

Parameter	Symbol	Value	Unit
Reverse Voltage	$V_R$	20	V
Continuous Forward Current	$I_F$	500	mA
Repetitive Peak Forward Current (at $t_p = 1\text{ ms}$ )	$I_{FRM}$	3.5	A
Non-Repetitive Peak Forward Surge Current ( $t = 8\text{ ms}$ square wave)	$I_{FSM}$	6	A
Junction Temperature	$T_j$	125	$^\circ\text{C}$
Storage Temperature Range	$T_{stg}$	- 65 to + 150	$^\circ\text{C}$

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

Parameter	Symbol	Max.	Unit
Forward Voltage at $I_F = 0.1\text{ mA}$ at $I_F = 1\text{ mA}$ at $I_F = 10\text{ mA}$ at $I_F = 100\text{ mA}$ at $I_F = 500\text{ mA}$	$V_F$	180 240 290 380 650	mV
Reverse Current at $V_R = 10\text{ V}$	$I_R$	30	$\mu\text{A}$
Diode Capacitance at $V_R = 1\text{ V}$ , $f = 1\text{ MHz}$	$C_d$	30	pF



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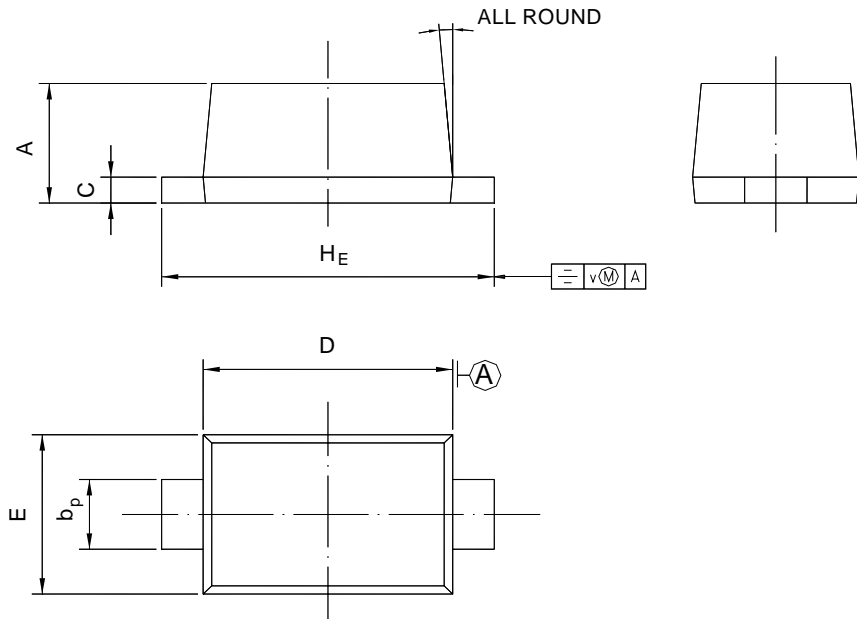
Dated : 23/11/2006

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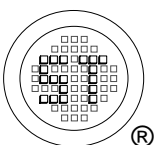
## PACKAGE OUTLINE

Plastic surface mounted package; 2 leads

SOD-523



UNIT	A	b <sub>p</sub>	C	D	E	H <sub>E</sub>	V	
mm	0.70 0.60	0.4 0.3	0.135 0.100	1.25 1.15	0.85 0.75	1.7 1.5	0.1	5°



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