



## SSCSBAT46D2

### Schottky Barrier Diode

#### ● Features

- ◇ High breakdown voltage
- ◇ Low turn-on voltage
- ◇ Guard ring construction for transient protection

#### ● PIN configuration



**SOD-323**

#### ● Applications

- ◇ Low Voltage Rectification
- ◇ High-Efficiency DC-DC Conversion
- ◇ Switch Mode Power Supply
- ◇ Inverse Polarity Protection



**Circuit Diagram**



**Marking**

#### ● Absolute maximum rating @T<sub>A</sub>=25°C

Parameter	Symbol	Value	Unit
Peak Repetitive Peak Reverse Voltage	V <sub>RRM</sub>		
Working Peak Reverse Voltage	V <sub>RWM</sub>	100	V
DC Blocking Voltage	V <sub>R</sub>		
Forward Continuous Current	I <sub>F</sub>	150	mA
Repetitive Peak Forward Current @t<1.0s	I <sub>FRM</sub>	350	mA
Non-repetitive Peak Forward Surge Current @t=8.3ms	I <sub>FSM</sub>	750	mA
Power Dissipation	P <sub>D</sub>	200	mW
Typical Thermal Resistance	R <sub>θJA</sub>	500	°C/W
Operating Temperature	T <sub>J</sub>	125	°C
Storage Temperature	T <sub>STG</sub>	-55~ +150	°C

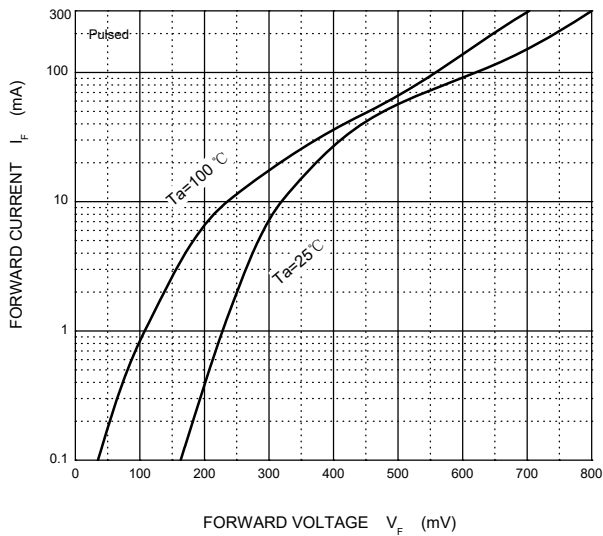


## Electrical Characteristics @T<sub>A</sub>=25°C

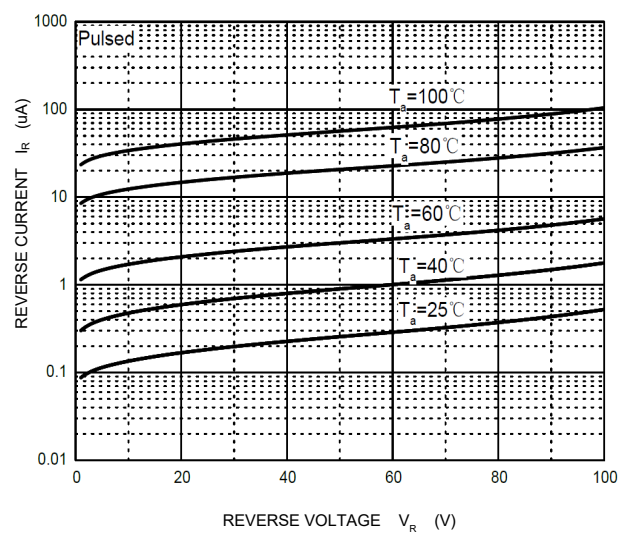
Parameter	Symbol	Conditions	Min.	Typ.	Max.	Unit
Reverse Voltage	V <sub>R</sub>	I <sub>R</sub> = 100μA	100			V
Forward Voltage	V <sub>F</sub>	I <sub>F</sub> = 0.1mA			0.25	V
		I <sub>F</sub> = 10mA			0.45	
		I <sub>F</sub> = 250mA			1	
Reverse Current	I <sub>R</sub>	V <sub>R</sub> = 1.5V			0.3	uA
		V <sub>R</sub> = 10V			0.5	
		V <sub>R</sub> = 50V			1.0	
		V <sub>R</sub> = 75V			2.0	
Junction Capacitance	C <sub>J</sub>	V <sub>R</sub> = 1V, f = 1MHz		12		pF

## Typical Performance Characteristics

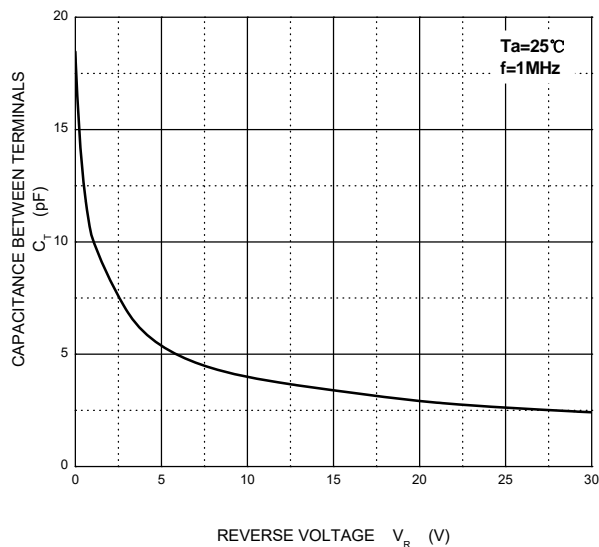
### Forward Characteristics



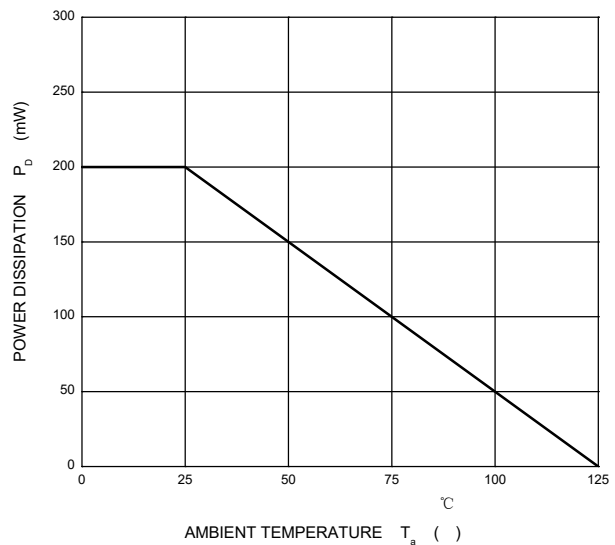
### Reverse Characteristics



### Capacitance Characteristics



### Power Derating Curve





## ● Package Information

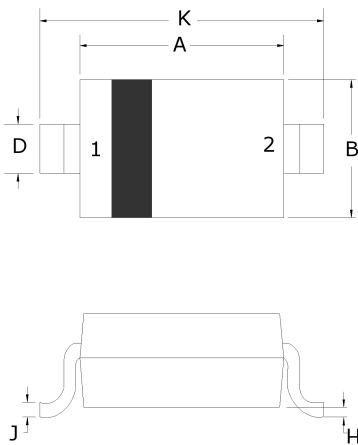
### Ordering Information

Device	Package	Marking	Qty per Reel	Reel Size
SSCSBAT46D2	SOD-323	S9	3000	7 Inch

### Mechanical Data

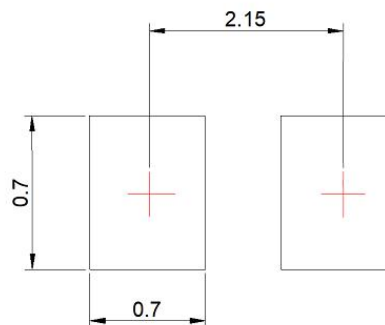
Case: SOD-323

Case Material: Molded Plastic. UL Flammability



DIM	Millimeters	
	Min	Max
A	1.60	1.80
B	1.2	1.40
C	0.80	0.90
D	0.25	0.35
E	0.15REF	
H	0	0.10
J	0.08	0.15
K	2.50	2.70

### Recommended Pad outline (Unit: mm)





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