



# SB1200AH

## SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER

**VOLTAGE** 200Volt **CURRENT** 1 Ampere

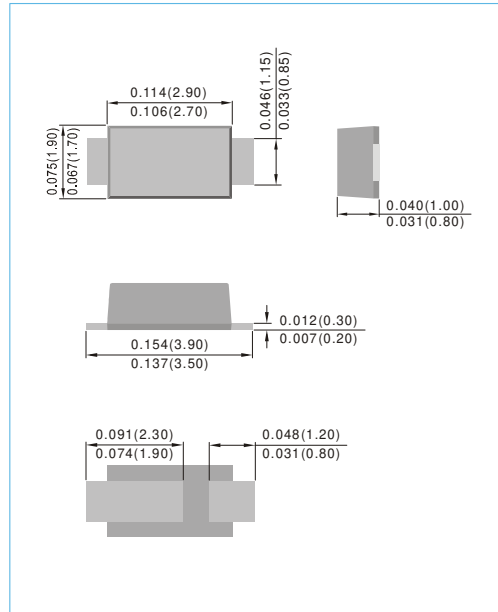
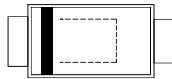
**SOD-123HE** Unit : inch(mm)

### FEATURES

- Fast switching speed
- Surface mount package ideally suited for automatic insertion
- Electrical identical standard JEDEC.
- High conductor
- Lead free in compliance with EU RoHS2.0 (2011/65/EU & 2015/865/EU directive)
- Green molding compound as per IEC61249 Std. . (Halogen Free)

### MECHANICAL DATA

- Case: SOD-123HE, Plastic
- Terminals: Solderable per MIL-STD-750, Method 2026
- Apporx. Weight: 0.0006 ounces, 0.0184 grams
- Polarity: Color band denotes cathode end



## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (T<sub>A</sub>=25°C unless otherwise noted)

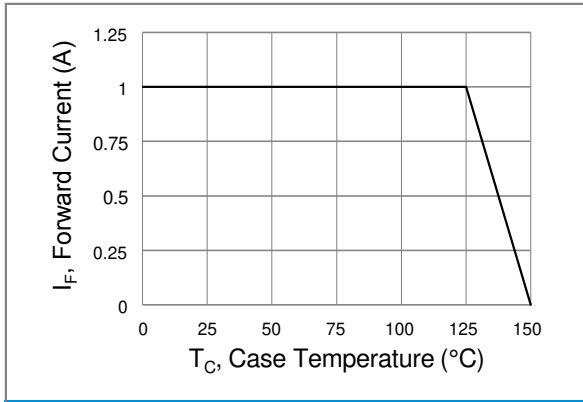
PARAMETER	SYMBOL	VALUE	UNITS
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	200	V
Maximum RMS Voltage	V <sub>RMS</sub>	140	V
Maximum DC Blocking Voltage	V <sub>R</sub>	200	V
Maximum Average Forward Current	I <sub>O</sub>	1	A
Peak Forward Surge Current : 8.3ms single half sine-wave superimposed on rated load	I <sub>FSM</sub>	30	A
Maximum Forward Voltage at 1A	V <sub>F</sub>	0.85	V
Maximum DC Reverse Current at 200V (Note 3)	I <sub>R</sub>	1.8	μA
Maximum DC Reverse Current at 100V (Note 3)	T <sub>J</sub> =25°C	2	μA
	T <sub>J</sub> =75°C	2	
	T <sub>J</sub> =85°C	6	
Typical Junction Capacitance at V <sub>R</sub> =0V, f=1MHz	C <sub>J</sub>	85	pF
Typical Thermal Resistance, Junction to Ambient (Note 2) Junction to Case (Note 1)	R <sub>θJA</sub>	185	°C/W
	R <sub>θJC</sub>	20	
Operating Junction Temperature and Storage Temperature Range	T <sub>J</sub> , T <sub>STG</sub>	-55 to +150	°C

### NOTES :

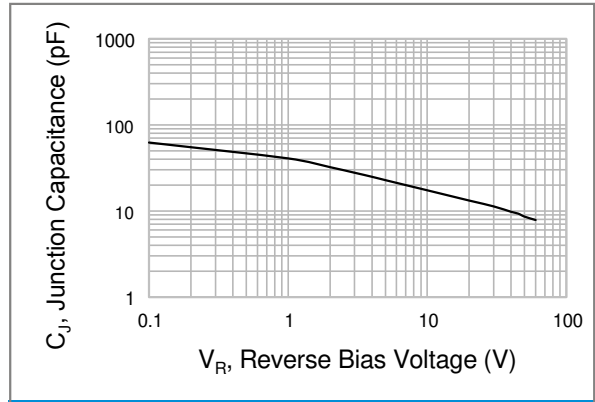
- 1.Mounted on a FR4 PCB, single-sided copper, with 100cm<sup>2</sup> copper pad area.
- 2.Mounted on a FR4 PCB, single-sided copper, mini pad.
- 3.Short duration pulse test used to minimize self-heating effect.



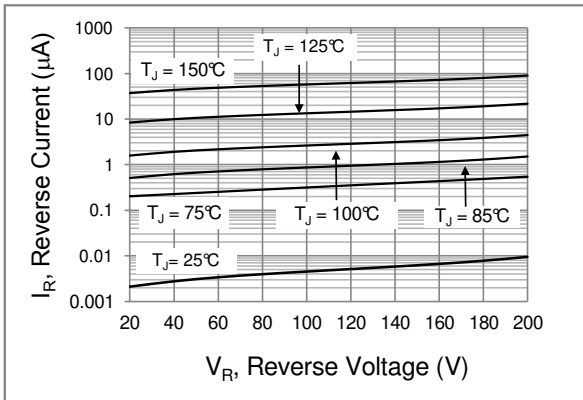
# SB1200AH



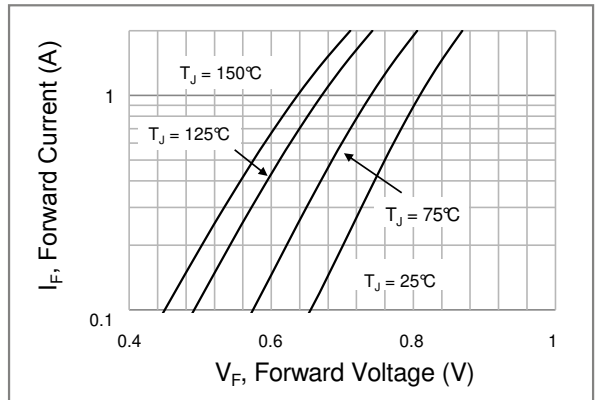
**Fig.1 Forward Current Derating Curve**



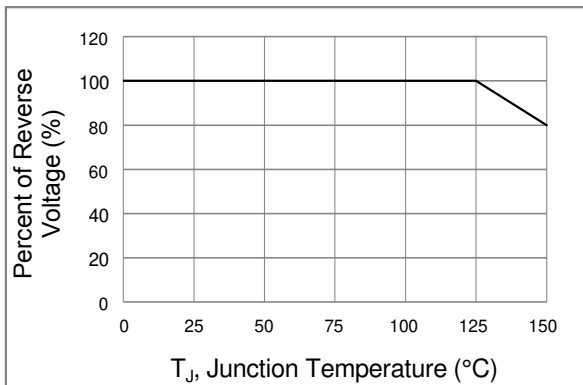
**Fig.2 Typical Junction Capacitance**



**Fig.3 Typical Reverse Characteristics**



**Fig.4 Typical Forward Characteristics**



**Fig.5 Operating Temperature Derating Curve**

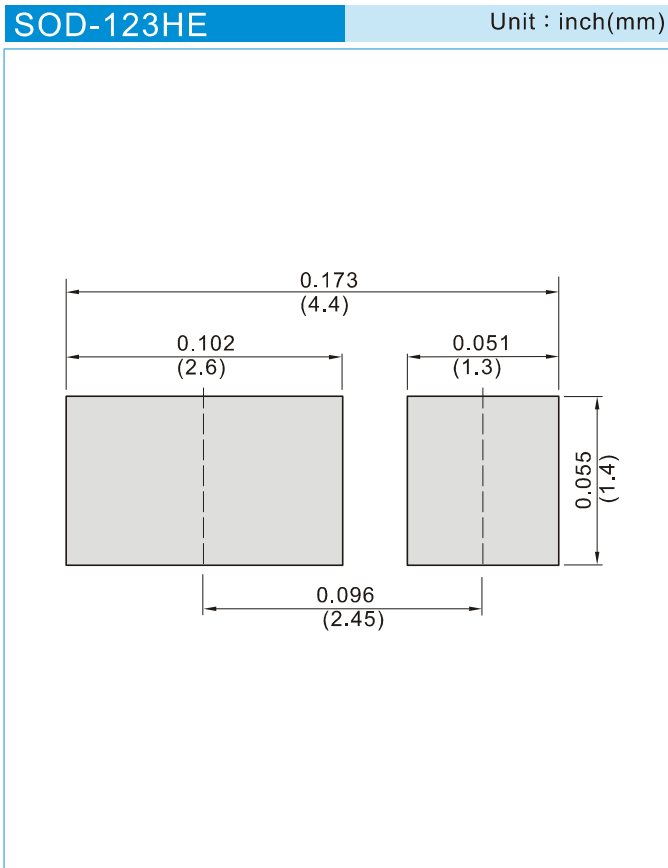


# SB1200AH

## PART NO PACKING CODE VERSION

Part No Packing Code	Package Type	Packing Type	Marking	Version
SB1200AH_R1_00001	SOD-123HE	3K pcs / 7" reel	2AH	Halogen free
SB1200AH_R2_00001	SOD-123HE	10K pcs / 13" reel	2AH	Halogen free

## MOUNTING PAD LAYOUT





## SB1200AH

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