

MSKSEMI 美森科

SEMICONDUCTOR



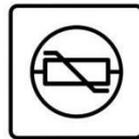
ESD



TVS



TSS



MOV



GDT



PLED

BAW56-MS/BAV70-MS/BAV99-MS

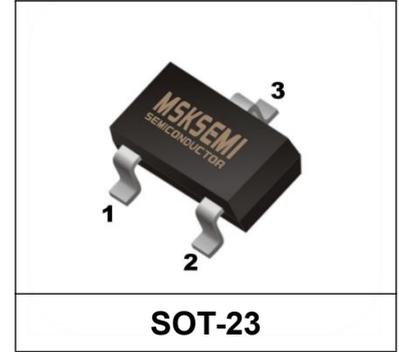
Product specification

Features

- PD:225mW
- High Stability and High Reliability
- Low reverse leakage

Mechanical Data

- PKG: SOT-23
- Epoxy UL: 94V-0
- Mounting Position: Any



Reference News

Pin Configuration			
Marking			
P/N	<p>BAW56 MARKING:A1</p>	<p>BAV70 MARKING:A4</p>	<p>BAV99 MARKING:A7</p>

Maximum Ratings & Thermal Characteristics

(Ratings at 25°C ambient temperature unless otherwise specified.)

Parameters	Symbol	Value	Unit
Reverse Voltage	VR	70	V
Power Dissipation	Pd	225	mW
Operating junction temperature	Tj	150	°C
Storage temperature range	Ts	-65-+ 150	°C
Average Rectified Current	IO	200	mA
Non-repetitive Peak Forward Current	IFM	400	mA
Peak Forward Surge Current @tp= 1 ms; TA=25 °C	IFSM	2.0	A
Typical thermal resistance	RθJA	500	°C/W

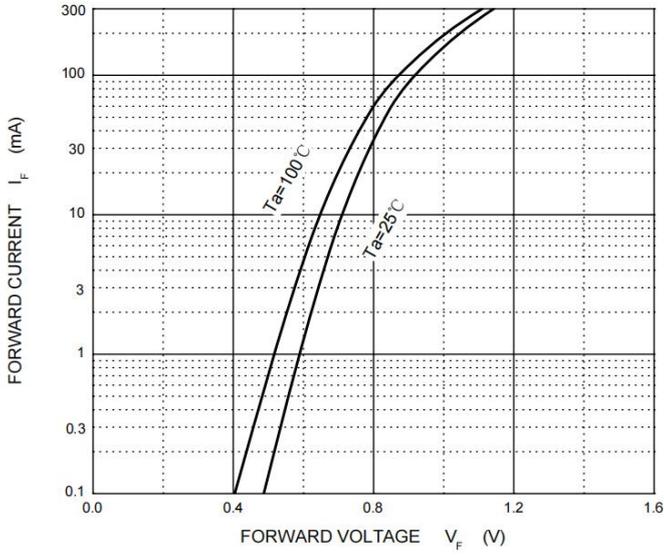
Valid provided that electrodes are kept at ambient temperature.

Electrical Characteristics (Ratings at 25°C ambient temperature unless otherwise specified).

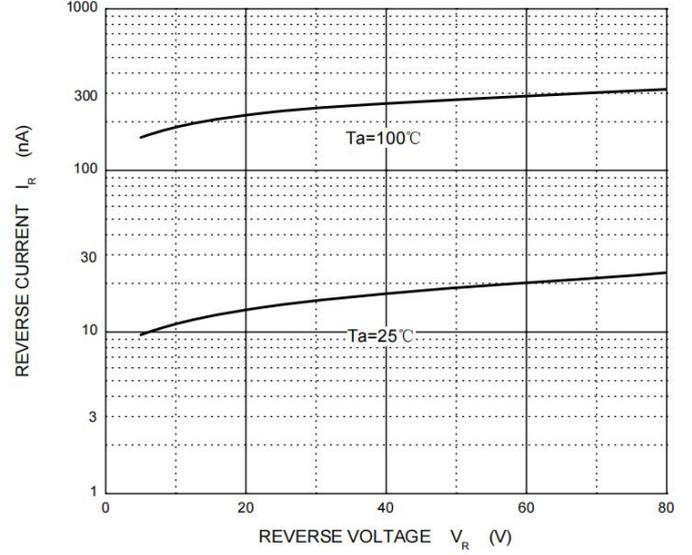
Symbols	Parameter	Test Condition	Limits		Unit
			Min	Max	
VRB	Reverse Voltage	IB=100uA	70	---	V
IR	Reverse Leakage Current	VR=70V	---	2.5	μA
VF	Forward Voltage	IF=1mA	---	0.715	V
		IF=10mA	---	0.855	
		IF=50mA	---	1.00	
		IF=150mA	---	1.25	
TRR	Reverse Recovery Time	IF=IR=10mA, RL=100 Ω IRR=0.1xIR	---	6	nS
CT	Capacitance	VR=0V, f=1MHZ	---	1.5	pF

Typical Characteristics

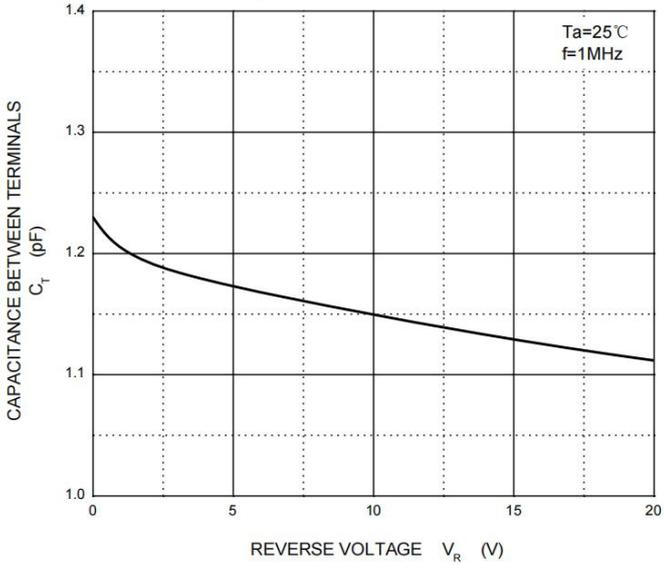
Forward Characteristics



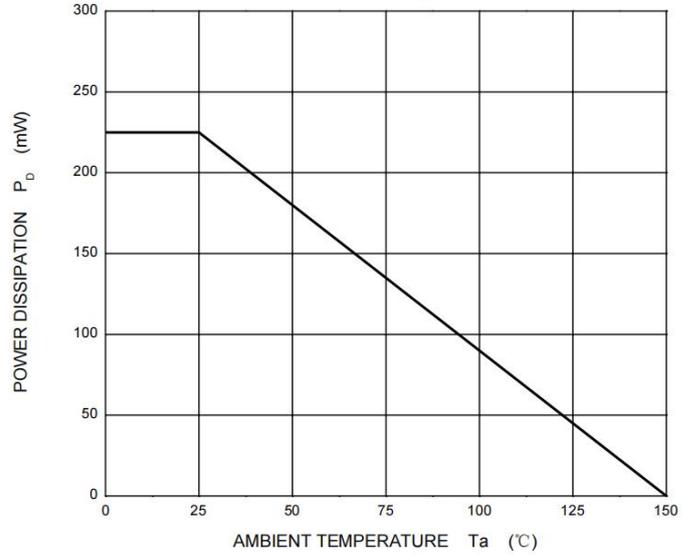
Reverse Characteristics



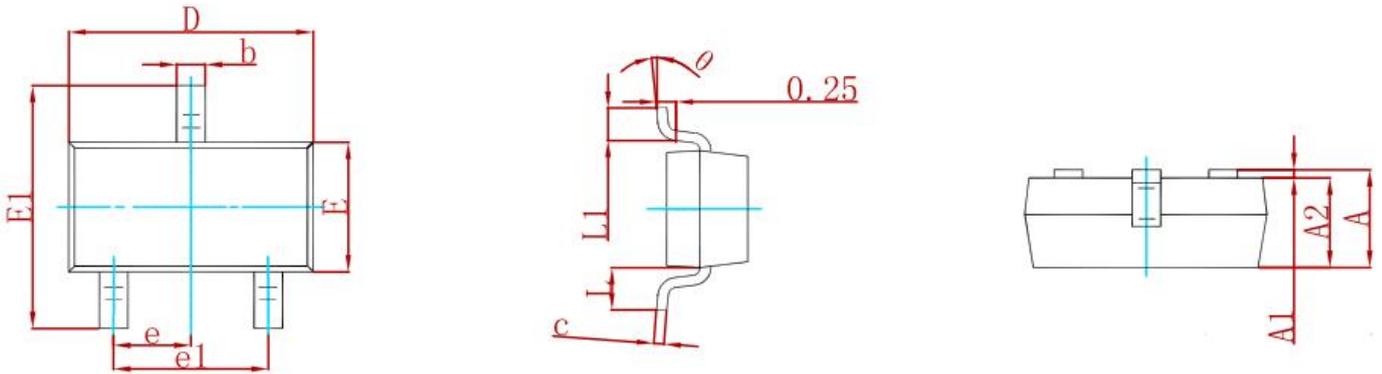
Capacitance Characteristics



Power Derating Curve

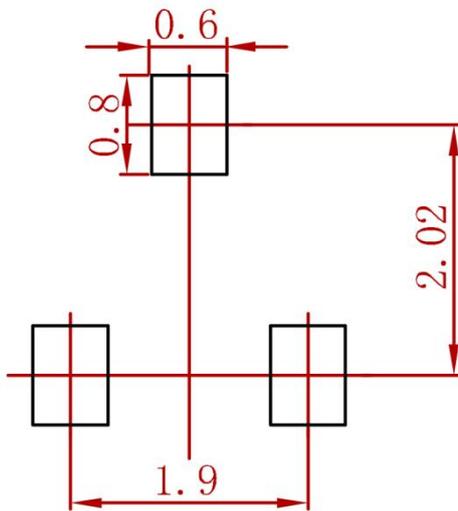


PACKAGE MECHANICAL DATA



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°

Suggested Pad Layout



Note:

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

REEL SPECIFICATION

P/N	PKG	QTY
BAW56-MS/BAV70-MS/BAV99-MS	SOT-23	3000

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