Features

- Average Rectified Output Current:I_O=500mA
- Power Dissipation of 410mW



SOD-123



Package Marking and Ordering Information

Product ID	Pack	Marking	Qty(PCS)
B0540W-7-F	SOD-123	B4	3000

Maximum Ratings (Ta=25°C unless otherwise noted)

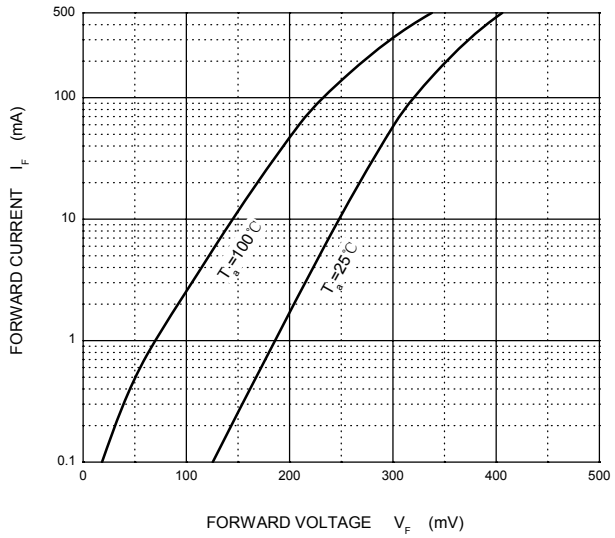
Parameter	Symbol	Limit	Unit
Maximum recurrent peak reverse voltage Maximum RMS voltage	V_{RRM} V_{RMS}	40 28	V
Mean rectifying current	I_O	0.5	A
Non-repetitive Peak forward surge current @t=8.3ms	I_{FSM}	5.5	A
Power Dissipation	Pd	410	mW
Thermal Resistance Junction to Ambient	$R_{\theta JA}$	244	°C/W
Operating Junction Temperature Range	T_j	-40 ~ +125	°C
Storage Temperature Range	T_{stg}	-55 ~ +150	°C

Electrical Characteristics (Ta=25°C unless otherwise specified)

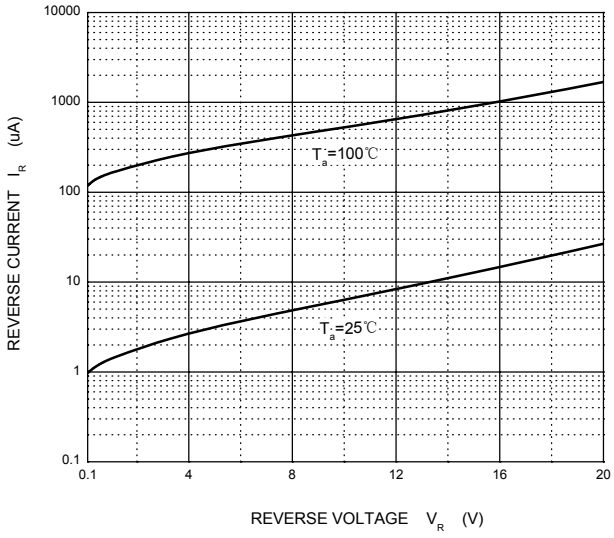
Parameter	Symbol	Min.	Typ.	Max.	Unit	Conditions
Forward voltage	V_F			0.55	V	I_F=500mA
Reverse current	I_R			80	μA	V_R=40V
Capacitance between terminals	C_T		30		pF	V_R=4V, f=1MHZ

Typical Characteristics

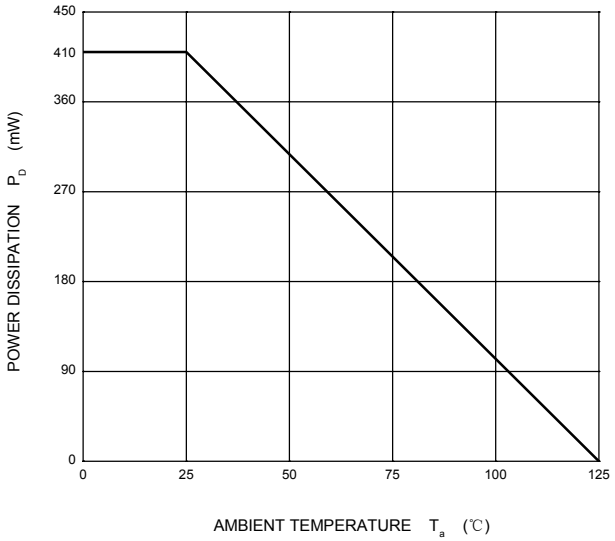
Forward Characteristics



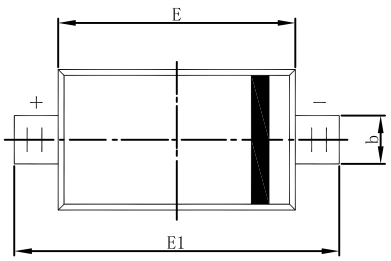
Reverse Characteristics

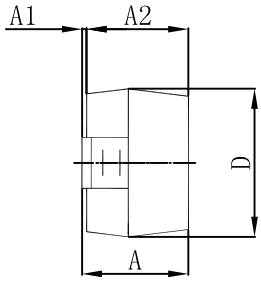


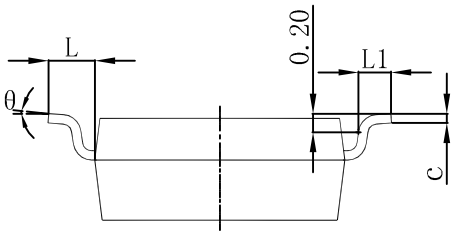
Power Derating Curve



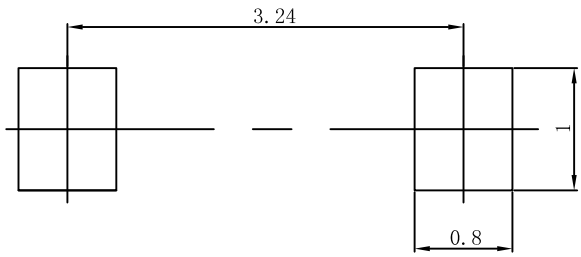
SOD-123 Package Outline Dimensions







Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min	Max	Min	Max
A	1.050	1.250	0.041	0.049
A1	0.000	0.100	0.000	0.004
A2	1.050	1.150	0.041	0.045
b	0.450	0.650	0.018	0.026
c	0.080	0.150	0.003	0.006
D	1.500	1.700	0.059	0.067
E	2.600	2.800	0.102	0.110
E1	3.550	3.850	0.140	0.152
L	0.500 REF		0.020 REF	
L1	0.250	0.450	0.010	0.018
θ	0°	8°	0°	8°



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

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