



Features

- Low Forward Voltage Drop
- Fast Switching Time
- Surface Mount Package Ideally Suited for Automatic Insertion



SOD-323



Package Marking and Ordering Information

Product ID	Pack	Marking	Qty(PCS)
BAT42WS-7-F	SOD-323	S8	3000

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

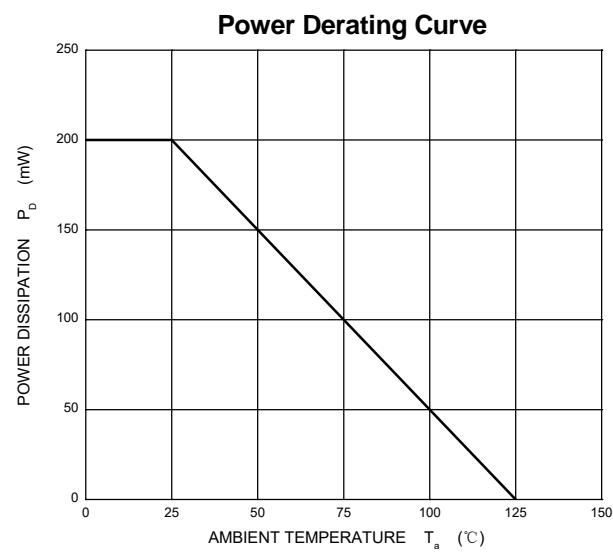
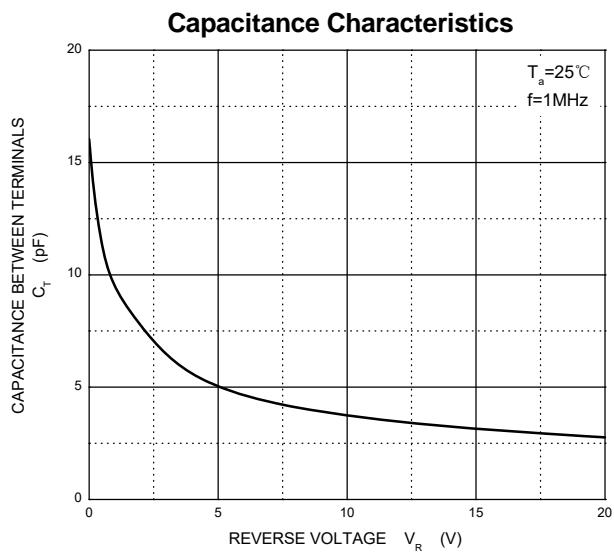
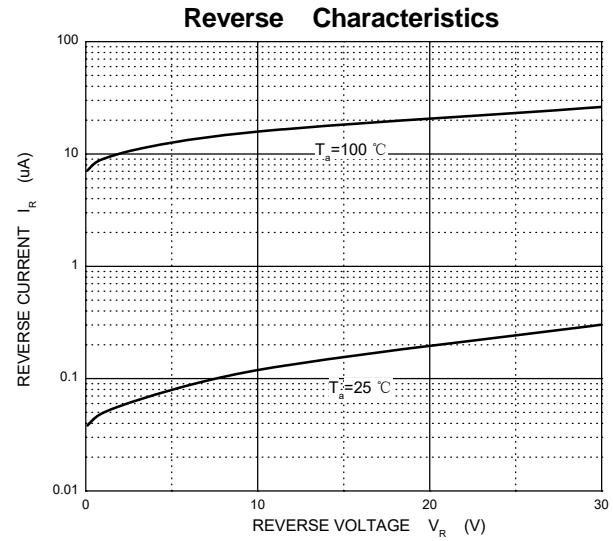
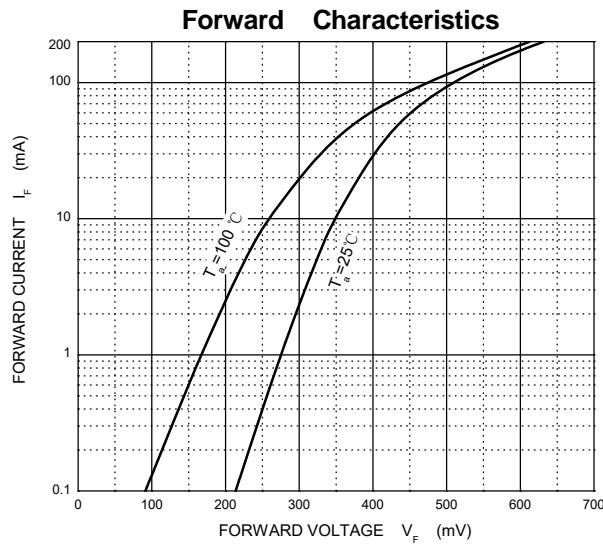
Parameter	Symbol	Limit	Unit
Peak Repetitive Peak Reverse Voltage	V _{RRM}		
Working Peak Reverse Voltage	V _{RWM}	30	V
DC Blocking Voltage	V _R		
RMS Reverse Voltage	V _{R(RMS)}	21	V
Forward Continuous Current	I _{FM}	200	mA
Repetitive Peak Forward Current @t<1.0s	I _{FRM}	500	mA
Non-repetitive Peak Forward Surge Current @t=8.3ms	I _{FSM}	4.0	A
Power Dissipation	P _D	200	mW
Thermal Resistance Junction to Ambient	R _{θJA}	500	°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	Max	Unit	Conditions
Reverse breakdown voltage	V _(BR)	30		V	I _R =10μA
Forward voltage	V _F	0.26	0.33	V	I _F =2mA
	V _F		0.45	V	I _F =15mA
Reverse current	I _R		0.5	μA	V _R =25V
Capacitance between terminals	C _T		10	pF	V _R =1.0V,f=1.0MHz
Reverse recovery time	t _{rr}		5	ns	I _F =I _R =10mA I _{rr} =0.1XI _R ,R _L =100Ω

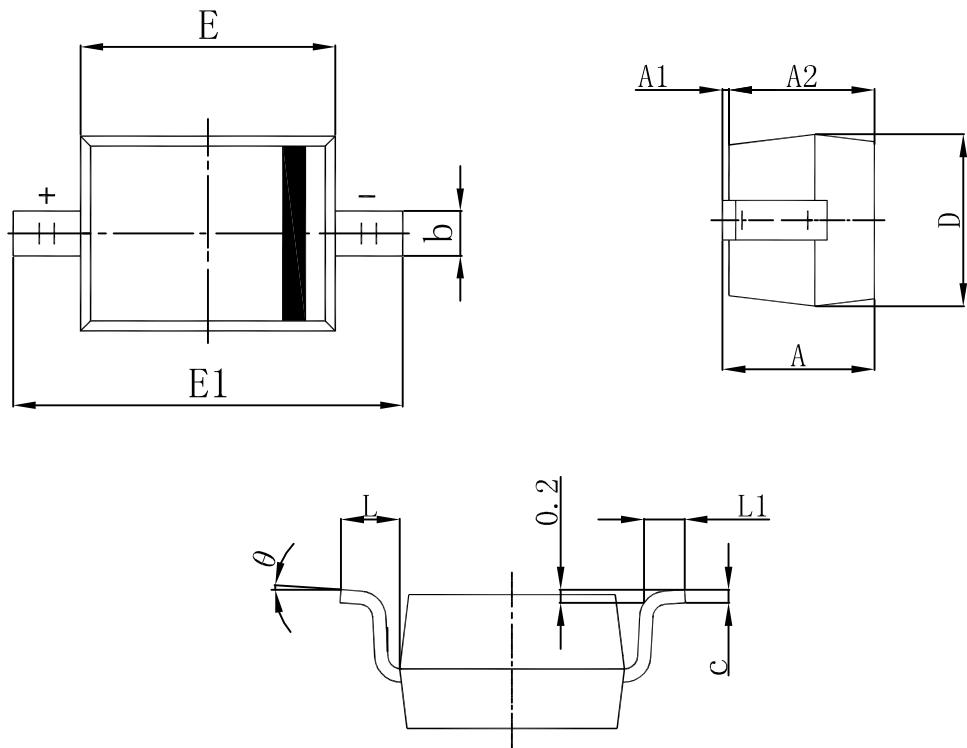


Typical Characteristics





SOD-323 Package Outline Dimensions



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min	Max	Min	Max
A		1.100		0.043
A1	0.000	0.100	0.000	0.004
A2	0.800	1.000	0.031	0.039
b	0.250	0.350	0.010	0.014
c	0.080	0.150	0.003	0.006
D	1.200	1.400	0.047	0.055
E	1.600	1.800	0.063	0.071
E1	2.500	2.750	0.098	0.108
L	0.475 REF		0.019 REF	
L1	0.250	0.400	0.010	0.016
θ	0°	8°	0°	8°



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