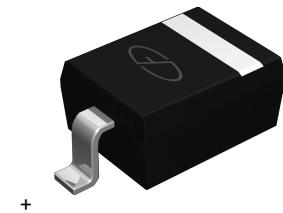


Features

- Low Forward Voltage Drop
- Guard Ring Die Construction for Transient Protection
- Ideal for Low Logic Level Applications
- Low Capacitance



SOD-323



Schematic Diagram

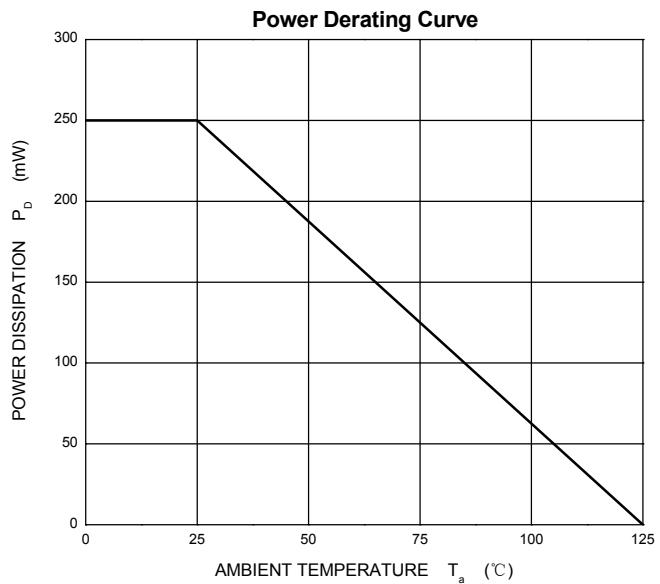
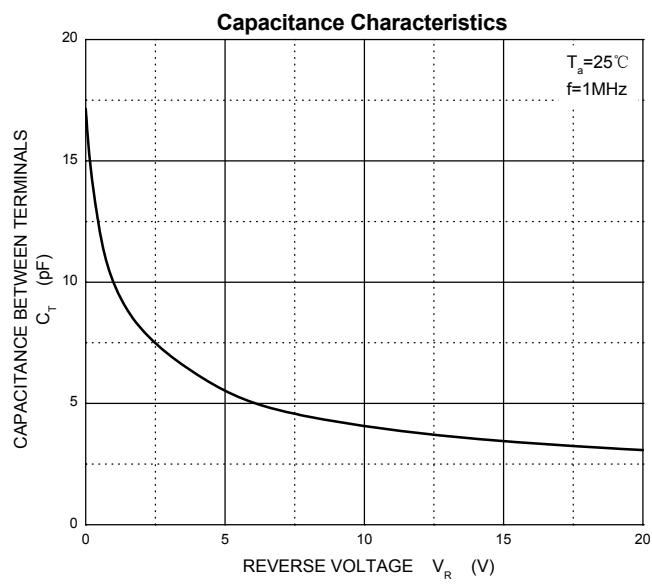
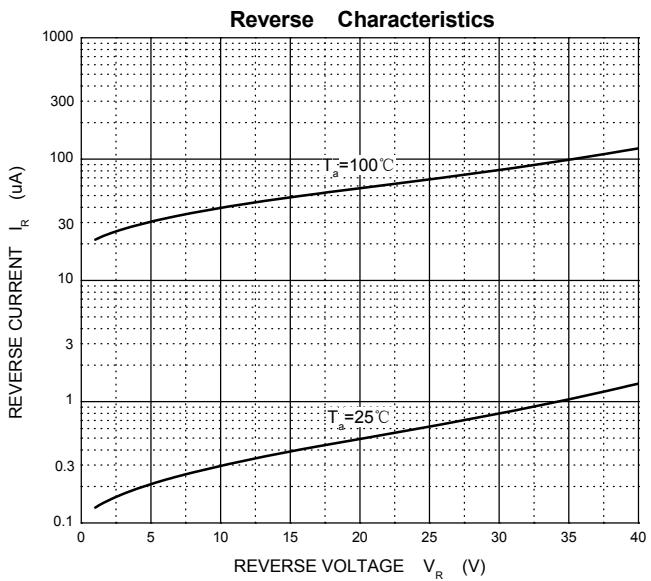
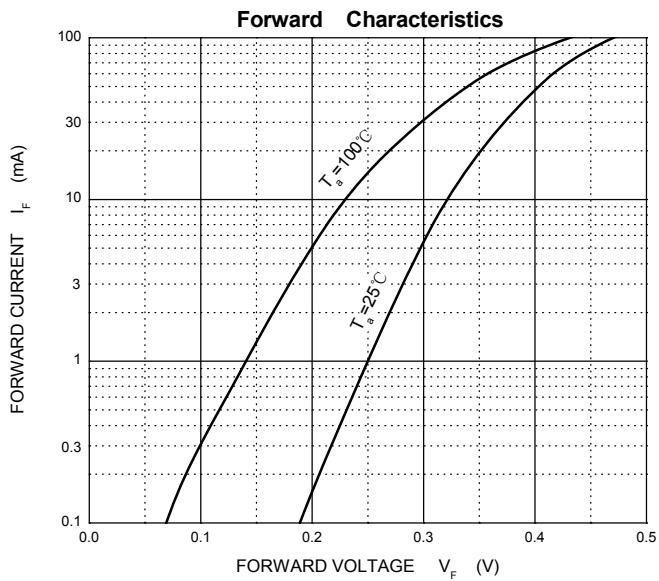
Absolute Maximum Ratings ($T_A=25^\circ\text{C}$ unless otherwise noted)

Parameter	Symbol	Value	Unit
Peak Repetitive Peak Reverse Voltage	V_{RRM}		
Working Peak Reverse Voltage	V_{RWM}	30	V
DC Blocking Voltage	V_R		
Forward Continuous Current	I_F	100	mA
Non-repetitive Peak Forward Surge Current @ $t=8.3\text{ms}$	I_{FSM}	2	A
Power Dissipation $T_c=25^\circ\text{C}$	P_D	250	mW
Thermal Resistance from Junction to Ambient	$R_{\theta JA}$	400	°C/W
Junction Temperature	T_J	125	°C
Storage Temperature	T_{STG}	-55 to +150	°C

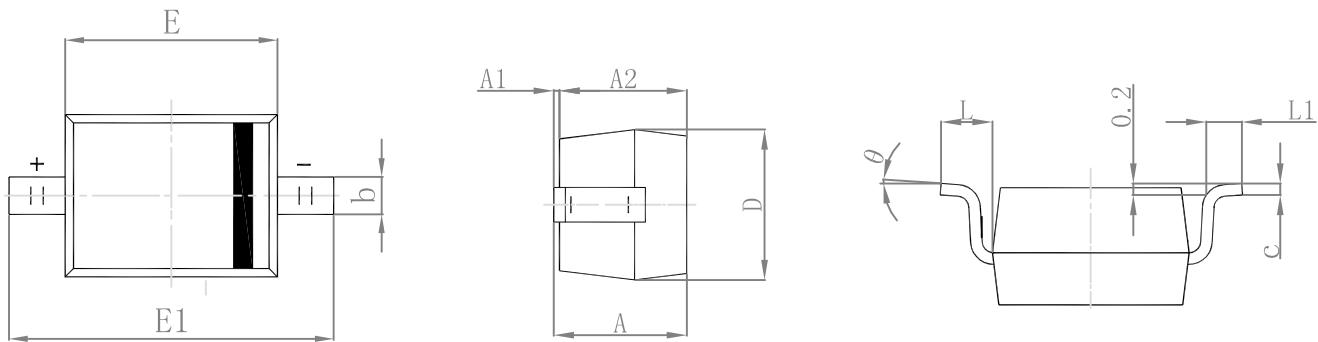
Electrical Characteristics ($T_A=25^\circ\text{C}$ unless otherwise noted)

Parameter	Conditions	Symbol	Min.	Typ.	Max.	Unit
Reverse Breakdown Voltage	$I_R=100\mu\text{A}$	V_R	30	-	-	V
Forward Voltage	$I_F=2\text{mA}$	V_F	-	300	-	mV
	$I_F=15\text{mA}$		-	360	-	
	$I_F=50\text{mA}$		-	430	550	
	$I_F=100\text{mA}$		-	500	800	
Reverse Current	$V_R=25\text{V}$	I_R	-	-	1	μA
Capacitance Between Terminals	$V_R=10\text{V}, f=1\text{MHz}$	C_T	-	7	-	pF

Typical Characteristics Curves

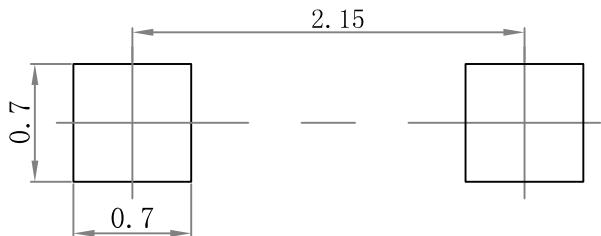


Package Outline Dimensions SOD-323



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min.	Max.	Min.	Max.
A		1.000		0.039
A1	0.000	0.100	0.000	0.004
A2	0.800	0.900	0.031	0.035
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	2.550	2.750	0.100	0.108
L	0.475 REF.		0.019 REF.	
L1	0.250	0.400	0.010	0.016
θ	0°	8°	0°	8°

Suggested Pad Layout



Note:

1. Controlling dimension: in millimeters.
2. General tolerance: $\pm 0.05\text{mm}$.
3. The pad layout is for reference purposes only.

Marking and Ordering Information

Device	Package	Marking	Quantity	HSF Status
GSD107WS	SOD-323	SG	3000pcs / Reel	RoHS Compliant