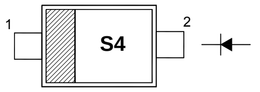
SD103AWS...SD103CWS-HAF

Surface Mount Schottky Barrier Diodes

PINNING

PIN	DESCRIPTION
1	Cathode
2	Anode



Top View
Marking Code: **S4**
Simplified outline SOD-323 and symbol

Features

- Low Forward Voltage
- Halogen and Antimony Free(HAF), RoHS compliant

Absolute Maximum Ratings (T_a = 25 °C)

Parameter		Symbol	Value	Unit
Peak Repetitive Reverse Voltage	SD103AWS SD103BWS SD103CWS	V_{RRM}	40 30 20	V
Reverse Voltage	SD103AWS SD103BWS SD103CWS	V_R	40 30 20	V
Average Forward Rectified Current		$I_{F(AV)}$	350	mA
Non-Repetitive Peak Forward Surge Current at t = 1 s		I_{FSM}	2	A
Power Dissipation		P_{tot}	200	mW
Operating and Storage Temperature Range		T_j, T_{stg}	- 65 to + 125	°C

Characteristics at T_a = 25 °C

Parameter		Symbol	Min.	Typ.	Max.	Unit
Reverse Breakdown Voltage at I_R = 10 μA	SD103AWS SD103BWS SD103CWS	$V_{(BR)R}$	40 30 20	- - -	- - -	V
Reverse Leakage Current at V_R = 30 V at V_R = 20 V at V_R = 10 V	SD103AWS SD103BWS SD103CWS	I_R	- - -	- - -	5 5 5	μA
Forward Voltage at I_F = 20 mA at I_F = 200 mA		V_F	- -	- -	0.37 0.6	V
Total Capacitance at V_R = 0 V, f = 1 MHz		C_T	-	50	-	pF
Reverse Recovery Time at I_F = I_R = 200 mA, I_{rr} = 0.1 I_R, R_L = 100 Ω		t_{rr}	-	10	-	ns

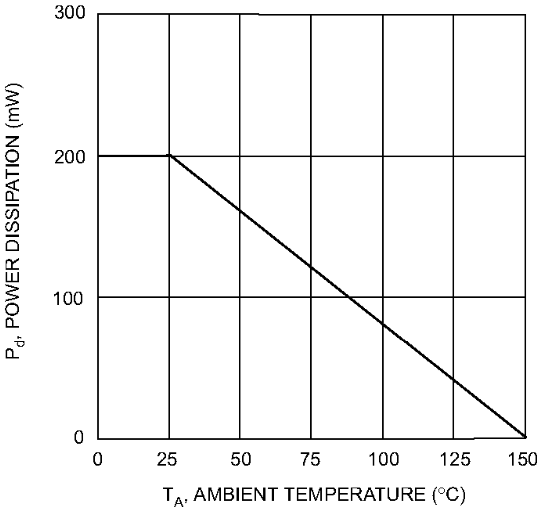


Fig. 1 Power Derating Curve

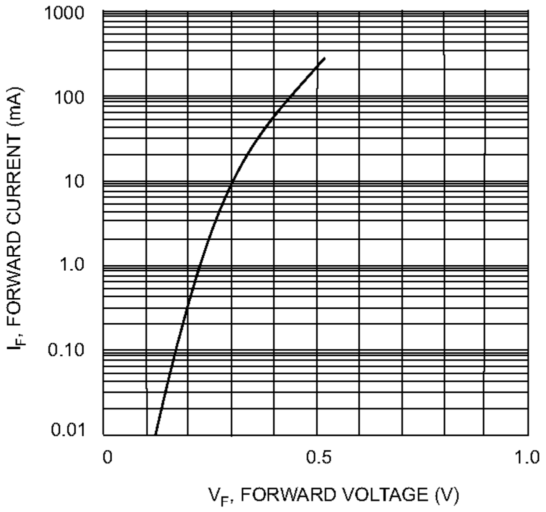


Fig. 2 Typical Forward Characteristics

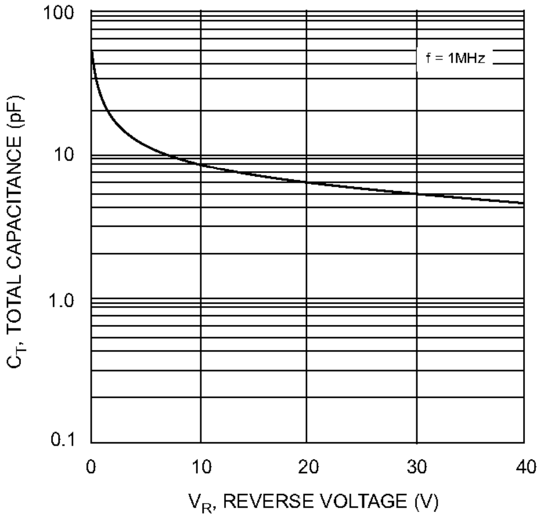
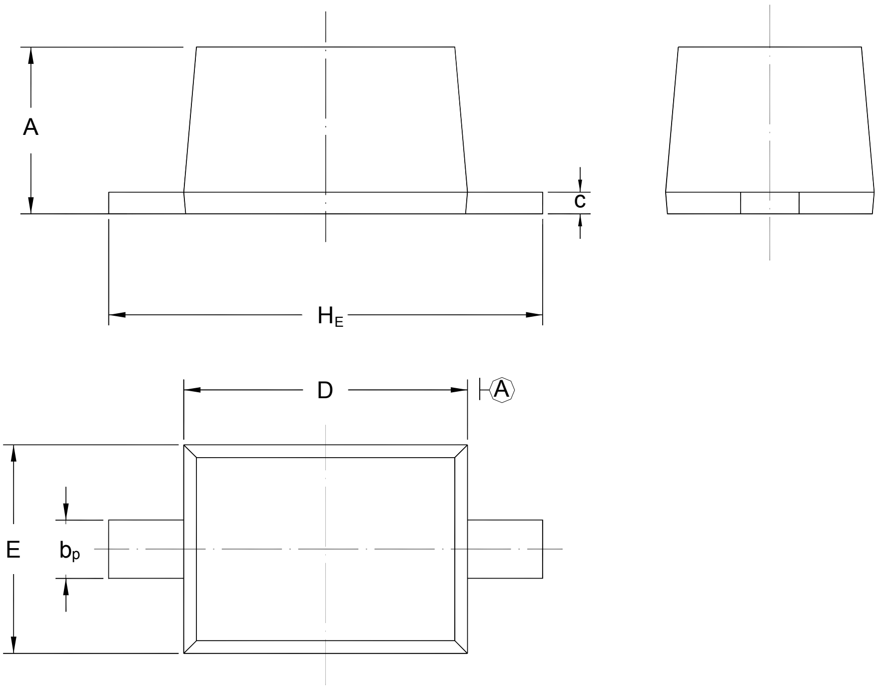


Fig. 3 Total Capacitance vs Reverse Voltage

PACKAGE OUTLINE

Plastic surface mounted package; 2 leads **SOD-323**



UNIT	A	b_p	C	D	E	H_E
mm	1.10 0.80	0.40 0.25	0.15 0.10	1.80 1.60	1.35 1.15	2.80 2.30