

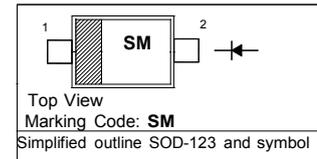
## Surface Mount Schottky Barrier Diodes

### Features

- Low forward voltage
- Low reverse capacitance

### PINNING

PIN	DESCRIPTION
1	Cathode
2	Anode



### Absolute Maximum Ratings ( $T_a = 25\text{ }^\circ\text{C}$ )

Parameter	Symbol	Value	Unit	
Peak Repetitive Reverse Voltage	SD101AW	60	V	
	SD101BW	50		
	SD101CW	40		
Reverse Voltage	SD101AW	60	V	
	SD101BW	50		
	SD101CW	40		
Forward Continuous Current	$I_{FM}$	15	mA	
Power Dissipation	$P_d$	400	mW	
Non-Repetitive Peak Forward Surge Current	$I_{FSM}$	at $t = 1\text{ s}$	50	mA
		at $t = 10\text{ }\mu\text{s}$	2	A
Operating and Storage Temperature Range	$T_j, T_{stg}$	- 65 to + 125	$^\circ\text{C}$	

### Characteristics at $T_a = 25\text{ }^\circ\text{C}$

Parameter	Symbol	Min.	Max.	Unit
Reverse Breakdown Voltage at $I_R = 10\text{ }\mu\text{A}$	SD101AW	60	-	V
	SD101BW	50	-	
	SD101CW	40	-	
Forward Voltage at $I_F = 1\text{ mA}$  at $I_F = 15\text{ mA}$	SD101AW	-	0.41	V
	SD101BW	-	0.4	
	SD101CW	-	0.39	
	SD101AW	-	1	
	SD101BW	-	0.95	
	SD101CW	-	0.9	
Reverse Current at $V_R = 50\text{ V}$ at $V_R = 40\text{ V}$ at $V_R = 30\text{ V}$	SD101AW	-	200	nA
	SD101BW	-	200	
	SD101CW	-	200	
Total Capacitance at $V_R = 0\text{ V}$ , $f = 1\text{ MHz}$	SD101AW	-	2	pF
	SD101BW	-	2.1	
	SD101CW	-	2.2	
Reverse Recovery Time at $I_F = I_R = 5\text{ mA}$ , $I_{rr} = 0.1X I_R$ , $R_L = 100\text{ }\Omega$	$t_{rr}$	-	1	ns



**CHINA BASE**  
INTERNATIONAL

**SOD-123**



**SD101AW-SD101CW**

www.china-base.com.hk

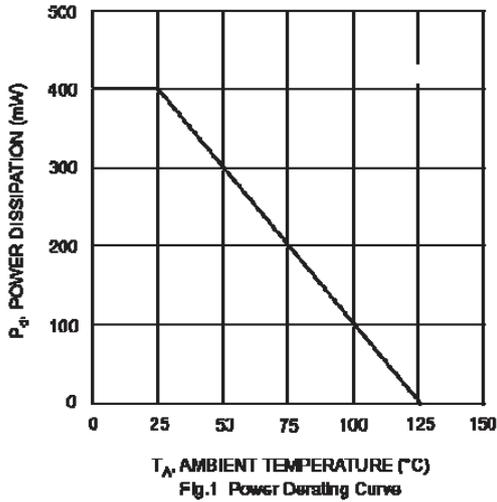


Fig. 1 Power Derating Curve

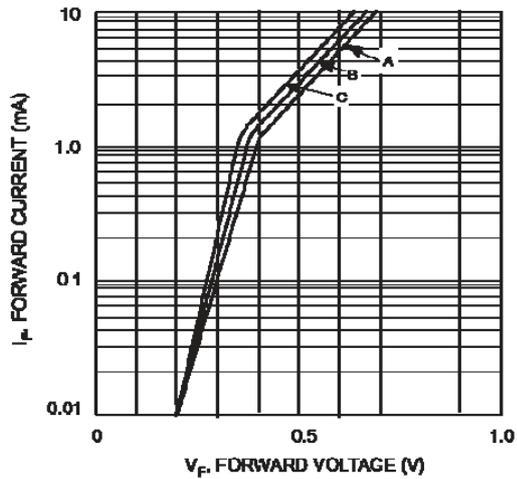


Fig. 2 Typical Forward Characteristic

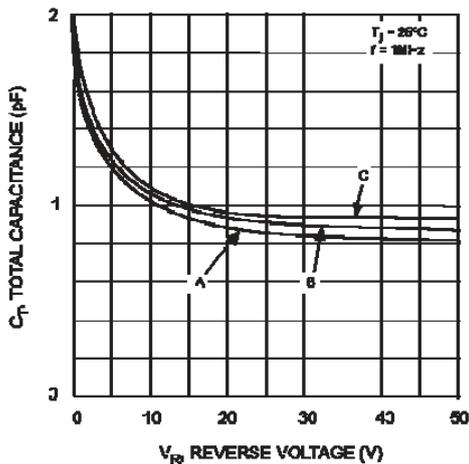


Fig. 3 Typical Total Capacitance vs Reverse Voltage

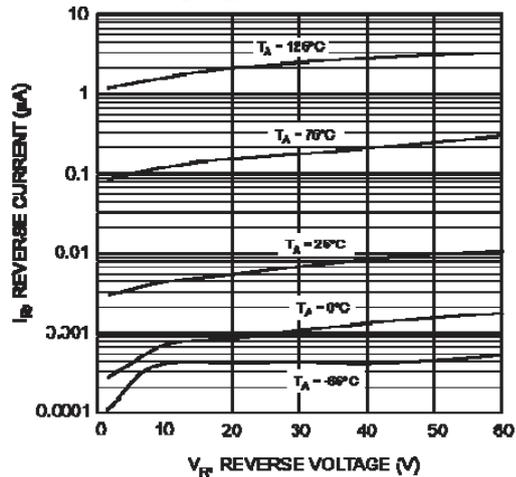


Fig. 4 Typical Reverse Characteristics