



Surface Mount Schottky Barrier Diode



Forward Current - 300 mA
Reverse Voltage - 30 V

Description

- Low Power Loss, High Efficiency
- Low Forward Voltage Schottky Rectifier
- High Current Capability
- High Surge Capability

Mechanical Data

- Case: SOD123 Package
- Case Material: "Green" Molding Compound UL Flammability Classification Rating 94V-0
- Terminals: Matte tin plated, solderable per MIL-STD-750, method 2026
- Component in accordance to RoHS
- Halogen Free

Note: Products with logo  or  are made by HY Electronic (Cayman) Limited.

Ordering Information

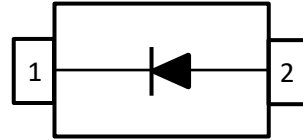
- Package :SOD123
- Reel Size :7 (inches)
- Quantity Per Reel :3,000/Tape & Reel
- Quantity One Box :45,000/Tape & Reel

Package Outline

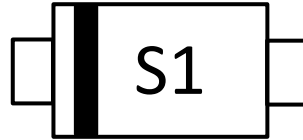


SOD123 Top View

Device Schematic & PIN Configuration



Product Type Marking Code



Maximum Ratings (@TA = +25°C, unless otherwise specified.)

Absolute Ratings

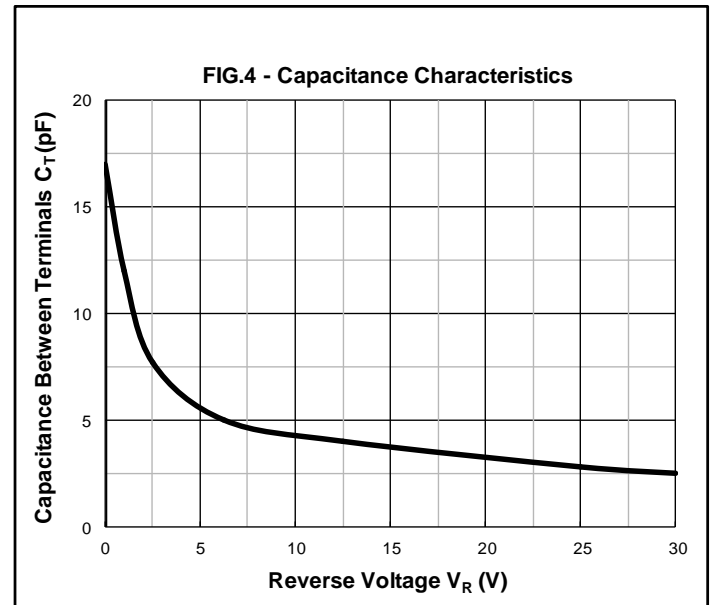
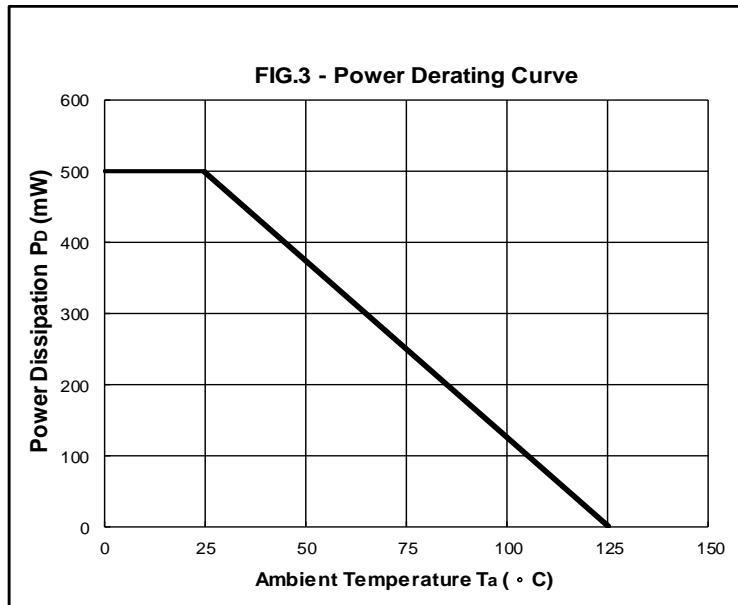
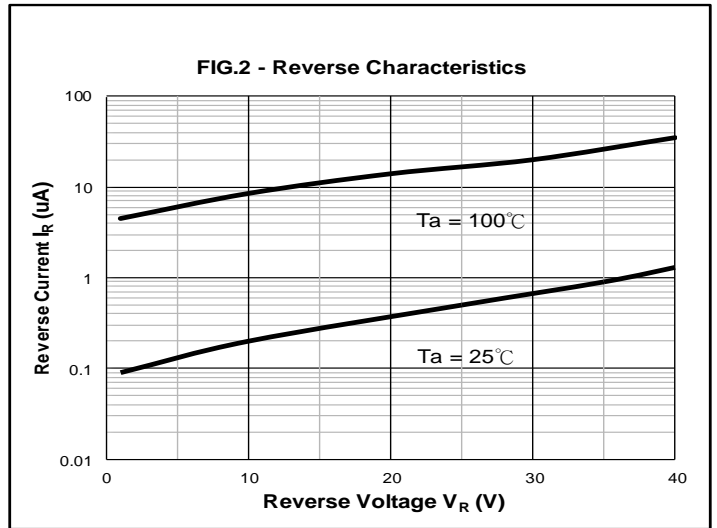
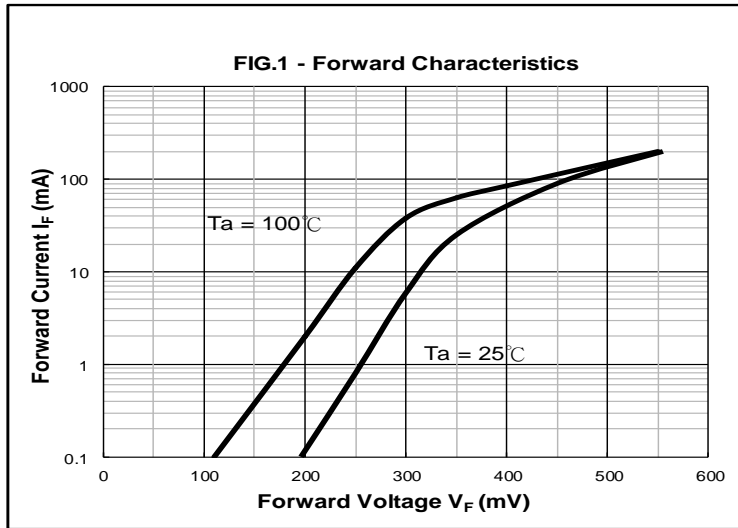
Parameter	Symbol	Value	Unit
Repetitive Peak Reverse Voltage	V _{RRM}	30	V
RMS Voltage	V _{RMS}	21	V
DC Blocking Voltage	V _{DC}	30	V
Forward Rectified Current	I _{FM}	300	mA
Peak Forward Surge Current @ t = 8.3ms	I _{FSM}	600	mA
Power Dissipation	P _D	500	mW
Storage Temperature Range	T _{STG}	-50 to +150	°C
Thermal Resistance from Junction to Ambient	R _{θJA}	250	°C/W

Electrical Characteristics

Parameter	Test Conditions	Symbol	Min	Typ	Max	Unit
Reverse Voltage	I _R =100uA	V _{BR}	30	-	-	V
Reverse Current	V _R =25V	I _R	-	-	2	uA
Forward Voltage	I _F =0.1mA	V _F	-	-	0.24	V
	I _F =1mA		-	-	0.32	
	I _F =10mA		-	-	0.40	
	I _F =30mA		-	-	0.50	
	I _F =100mA		-	-	0.80	
Junction Capacitance	V _R = 1V, F = 1MHz	C _J	-	-	10	pF

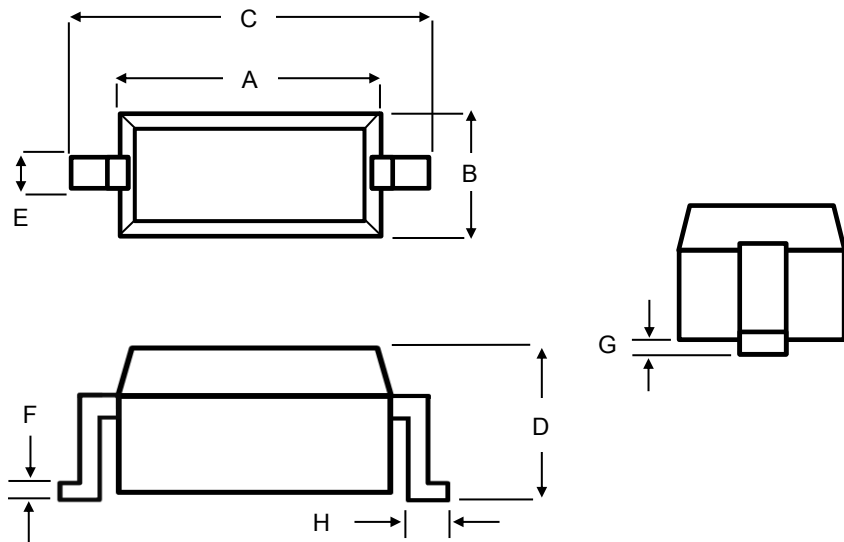


Rating and Characteristic Curves



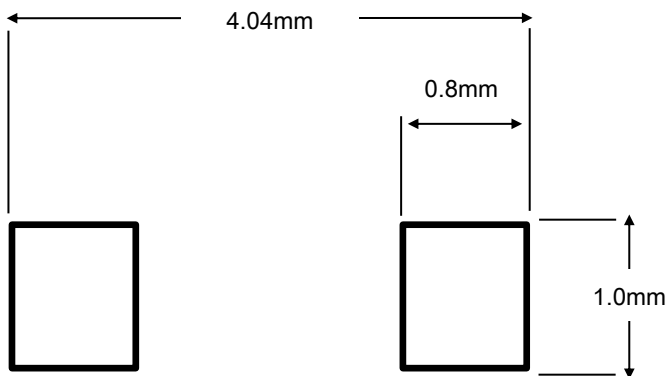


Package Outline Dimensions



SOD123 Package		
Dim	Min	Max
A	2.60	2.80
B	1.50	1.70
C	3.55	3.85
D	1.05	1.25
E	0.45	0.65
F	0.08	0.15
G	-	0.10
H	0.25	0.45
All Dimensions in mm		

Suggested Soldering Pad Layout



Note:

- 1. The pad layout is for reference purposes only.
- 2. General tolerance $\pm 0.05\text{mm}$



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