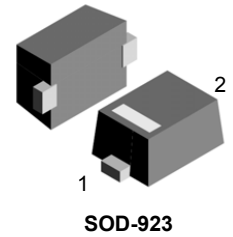


Features

- High voltage, fast switching
- Low leakage current
- SOD-923 micro SMD package
- RoHS compliant / Green EMC
- Matte Tin (Sn) lead finish
- Cathode band / device marking



Schematic Diagram

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

Parameter	Symbol	Value	Units
Repetitive Peak Reverse Voltage	V_{RRM}	40	V
DC Blocking Voltage	V_R	40	V
Forward Current	I_F	200	mA
Non-Repetitive Peak Forward Current ¹	I_{FSM}	600	mA
Junction Temperature	T_J	125	$^{\circ}\text{C}$
Storage Temperature	T_{STG}	-65 to +125	$^{\circ}\text{C}$

Note: 1. 8.3ms single half sine-wave.

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

Parameter	Symbol	Conditions	Max	Units
Forward Voltage	V_F	$I_F=1\text{mA}$	0.38	V
		$I_F=40\text{mA}$	1	
Reverse Current	I_R	$V_R=30\text{V}$	200	nA
Capacitance	C	$V_R=0\text{V}$, $f=1\text{MHz}$	5	pF
Reverse Recovery Time	t_{rr}	$I_F=I_R=10\text{mA}$, $I_{RR}=1\text{mA}$, $R_L=100\Omega$	5	nS

Typical Characteristic Curves

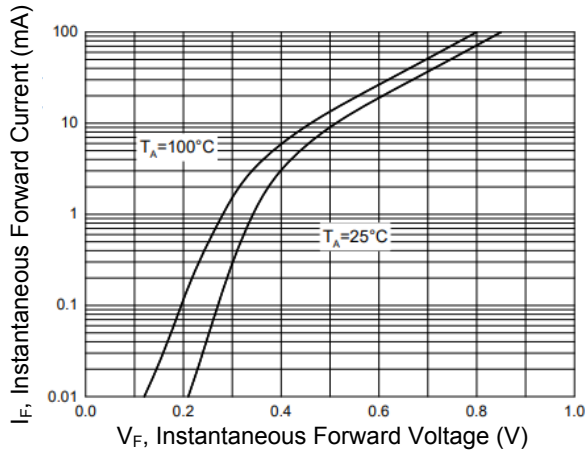


Figure 1. Forward Characteristics

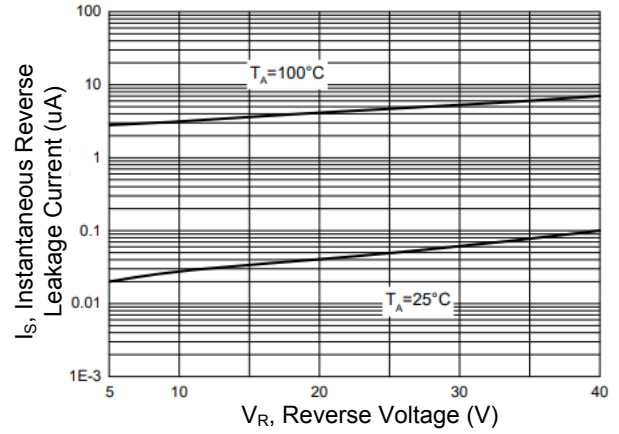


Figure 2. Reverse Characteristics

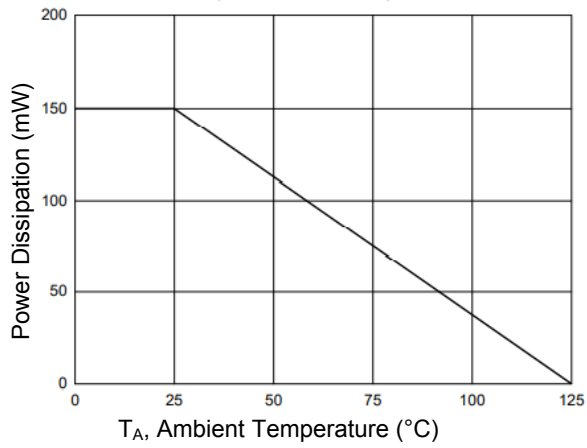
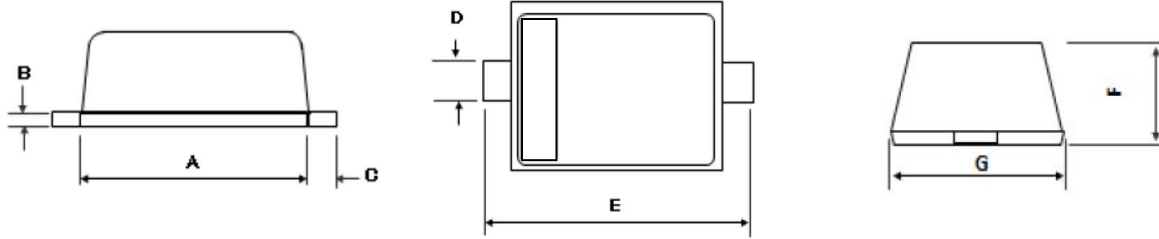


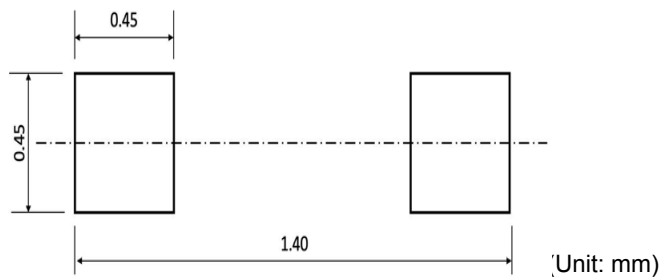
Figure 3. Power Derating Curve

Package Outline Dimension (SOD-923)



Symbol	Dimensions in Millimeters		Dimensions in Inches	
	Min	Max	Min	Max
A	0.700	0.900	0.028	0.035
B	0.050	0.200	0.002	0.008
C	0.050	0.150	0.002	0.006
D	0.150	0.300	0.006	0.012
E	0.900	1.100	0.035	0.043
F	0.390	0.450	0.015	0.018
G	0.550	0.650	0.022	0.026

Recommended Pad Layout



Order Information

Device	Package	Marking	Carrier	Quantity
GSBAS40MC9	SOD-923	C9	Tape & Reel	8,000 pcs / 7" Reel

For more information, please contact us at: inquiry@goodarksemi.com