

SD92305 Transient Voltage Suppressors
Micro-Packaged Diodes for ESD Protection

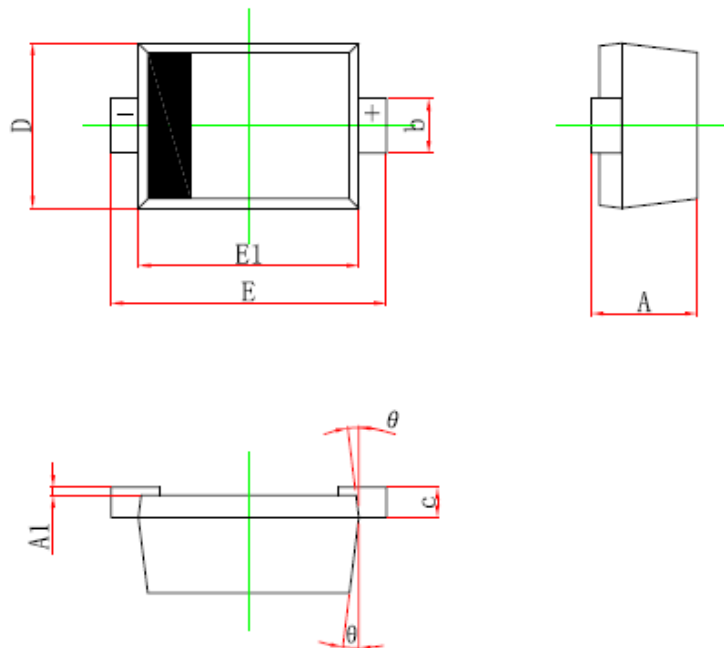
Features:

- Low Clamping Voltage
- Stand-off Voltage: 5 V
- Low Leakage
- Response Time is Typically < 1 ns
- These are Pb-Free Devices
- All SMC parts are traceable to the wafer lot
- Additional testing can be offered upon request

Mechanical Characteristics:

- CASE: Void-free, transfer-molded, thermosetting plastic Epoxy Meets UL 94 V-0
- MOUNTING POSITION: Any
- QUALIFIED MAX REFLOW TEMPERATURE: 260°C

Mechanical Dimensions: In mm / Inches

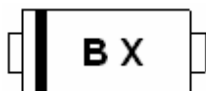


Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min.	Max.	Min.	Max.
A	0.350	0.430	0.014	0.017
A1	0.000	0.050	0.000	0.002
b	0.170	0.270	0.007	0.011
c		0.150		0.006
D	0.550	0.650	0.022	0.026
E	0.900	1.100	0.035	0.043
E1	0.750	0.850	0.030	0.033
θ	7° REF.		7° REF.	

SOD-923



Marking Diagram:



B = SD92305
X = Date Code

Cautions: Molding resin
Epoxy resin UL: 94V-0

Ordering Information

Device	Package	Shipping
SD92305	SOD-923 (Pb-Free)	8000pcs / reel

For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specification.



Maximum Ratings and Electrical Characteristics @ $T_A=25^{\circ}\text{C}$ unless otherwise specified

Parameter	Symbol	Value	Unit
Total Power Dissipation on FR-5 Board (Note 1) @ $T_A = 25^{\circ}\text{C}$	P_D	150	mW
IEC 61000-4-2 (ESD) Contact Air		± 30 ± 30	KV
ESD Voltage Per Human Body Model Per Machine Model		16 400	KV V
Operating Junction and Storage Temperature Range	T_J, T_{STG}	-55 to 150	$^{\circ}\text{C}$
Lead Solder Temperature - Maximum (10 Second Duration)	T_L	260	$^{\circ}\text{C}$

Notes: 1. FR-5 = 1.0 x 0.75 x 0.62 in.

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

Part Number (Uni)	C (PF) Typ.	Working Peak Reverse Voltage (V_{RWM}) (V) Max.	Breakdown Voltage @ I_T (V_{BR}) (V) (Note 2) MIN	P_{pk} (W) (8 x 20 μs) Typ.	Test Current (I_T) (mA)	Clamping Voltage @ IPP (Vc) (V) Max.	Peak Pulse Current (I_{pp}) (A) Max.	Reverse leakage @ V_{RWM} (I_R) (μA) Max.
SD92305	65	5.0	6.2	107	1	12.3	8.7	1.0

Notes: 2. V_{BR} is measured with a pulse test current I_T at an ambient temperature of 25°C .

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