

MSKSEMI 美森科

SEMICONDUCTOR



ESD



TVS



TSS



MOV



GDT



PLED

ESD9B5V-MS

Product specification

FEATURES

- 80W peak pulse power per line ($t_P = 8/20\mu s$)
- SOD-923 package
- Replacement for MLV(0402)
- Bidirectional configurations
- Response time is typically $< 1ns$
- Low clamping voltage
- RoHS compliant
- Transient protection for data lines to
IEC61000-4-2(ESD) $\pm 30KV$ (air), $\pm 30KV$ (contact)
IEC61000-4-4 (EFT) 40A (5/50ns)


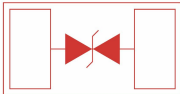

MACHANICAL DATA

- Lead finish:100% matte Sn(Tin)
- Mounting position: Any
- Qualified max reflow temperature:260 °C
- Device meets MSL 1 requirements
- Pure tin plating: 7 ~ 17 μm
- Pin flatness: $\leq 3mil$

APPLICATIONS

- Cellular phones
- Portable devices
- Digital cameras
- Power supplies

Reference News

PACKAGE OUTLINE	PIN CONFIGURATION	Marking
		
SOD-923		

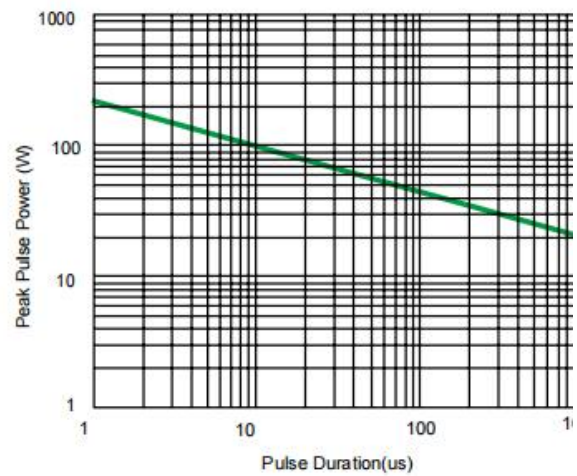
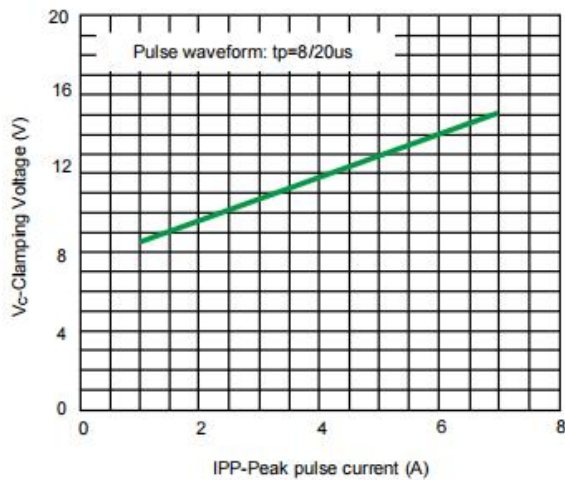
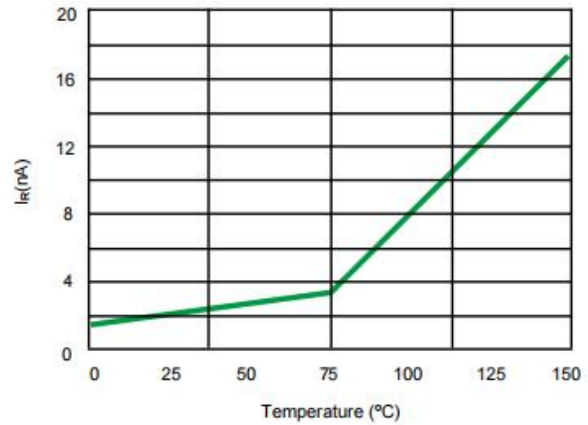
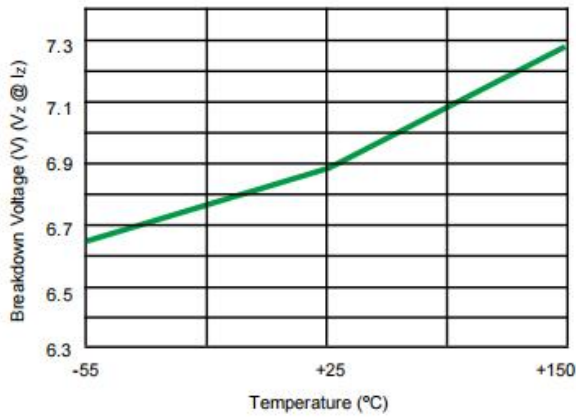
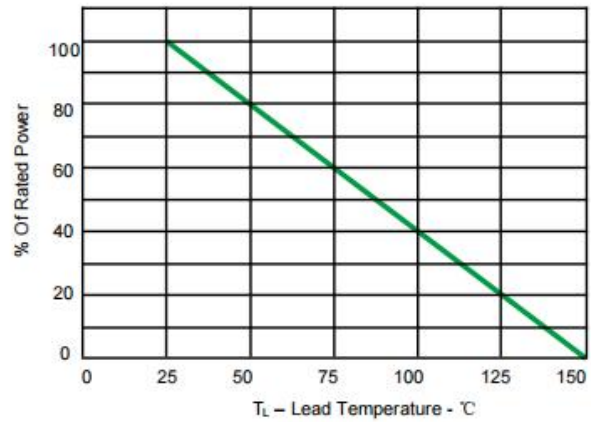
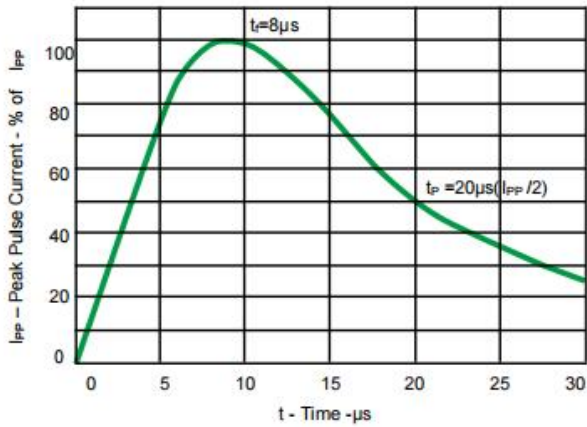
ABSOLUTE MAXIMUM RATING

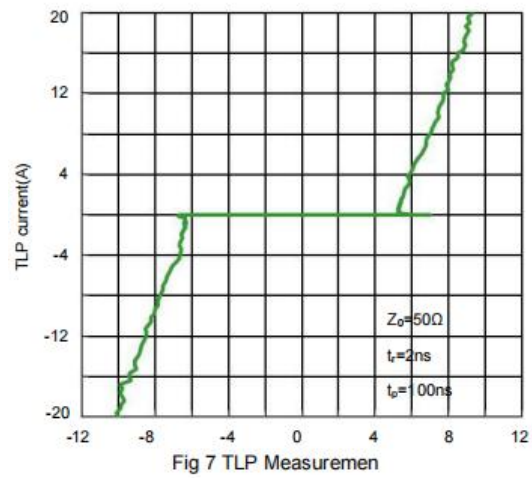
Rating	Symbol	Value	Units
Peak Pulse Power (tp=8/20μs)	Ppp	80	W
Operating Temperature	TJ	-55 to + 150	°C
Storage Temperature	TSTG	-55 to + 150	°C

ELECTRICAL CHARACTERISTICS (Tamb=25°C)

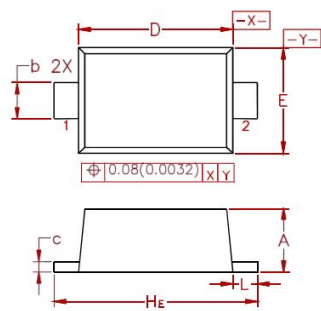
Parameter	Symbol	Conditions	Min.	Typ.	Max.	Units
Peak Reverse Working Voltage	VRWM				5	V
Breakdown Voltage	VBR	It = 1mA	5.6	6.7	7.8	V
Reverse Leakage Current	IR	VRWM=5V T=25C			1.0	A
Maximum Reverse Peak Pulse Current	IPP			5		A
Clamping Voltage	VC	IPP=1A			8	V
Clamping Voltage	VC	IPP=3A			13	V
Clamping Voltage	VC	IPP=5A			15	V
Junction Capacitance	Cj	VR=0V f = 1MHz		12	15	pF

ELECTRICAL CHARACTERISTICS CURVE



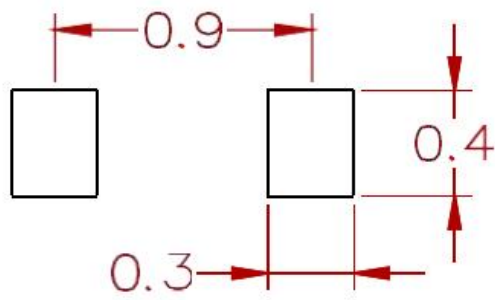


PACKAGE MECHANICAL DATA



Dim	Millimeters			Inches		
	Min	Nom	Max	Min	Nom	Max
A	0.36	0.40	0.43	0.014	0.016	0.017
b	0.15	0.20	0.25	0.006	0.008	0.010
c	0.07	0.12	0.17	0.003	0.005	0.007
D	0.75	0.80	0.85	0.030	0.031	0.033
E	0.55	0.60	0.65	0.022	0.024	0.026
HE	0.95	1.00	1.05	0.037	0.039	0.041
L	0.05	0.10	0.15	0.002	0.004	0.006

Suggested Pad Layout



Dimensions: Millimeters

REEL SPECIFICATION

P/N	PKG	QTY
ESD9B5V-MS	SOD-923	8000

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