

SURFACE MOUNT TRANSIENT VOLTAGE SUPPRESSOR

P4SMAJ48A

Features

For surface mounted applications in order to optimize board space.

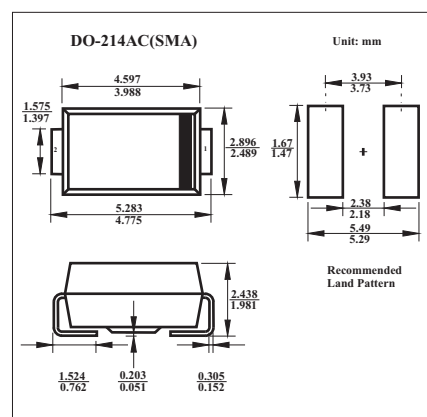
Low profile package

Built-in strain relief

Glass passivated junction

Excellent clamping capability

Low inductance

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

Parameter	Symbol	Ratings	Units
Peak Power Dissipation at $T_a=25^\circ\text{C}$, $T_P=1\text{ms}$ (Note 1,2,5)	PPPM	Minimum 400	W
Steady State Power Dissipation (Note 3)	PM(AV)	1	W
Peak Forward Surge Current (Note 4)	IFSM	40	A
Peak Pulse Current Current on 10/1000 μs waveform (Note 1,2,5)	IPPM	See Table	A
Operating and Storage Temperature Range	T_j, T_{STG}	-55 to +150	$^\circ\text{C}$

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

Part Number	Reverse Stand-off Voltage	Breakdown Voltage		Test Current	Reverse Leakage	Max. Clamp Voltage	Peak Pulse Current
	VRWM	VBR @ IT		IT	IR @ VRWM	VC @ IPP	IPP
		Min.	Max.				
	V	V	V	mA	μA	V	A
P4SMAJ48A	48	53.3	61.3	1.0	5	77.4	5.2

NOTES:

1. Non-repetitive current pulse and derated above $T_a = 25^\circ\text{C}$
2. Mounted on 5.0mm² copper pad to each terminal.
3. lead temperature at 75°C .
4. 8.3ms single half sine-wave, duty cycle= 4 pulses per minutes maximum.
5. Peak pluse power waveformis 10/1000 μs .

Marking

Marking	JX
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Typical Characteristics

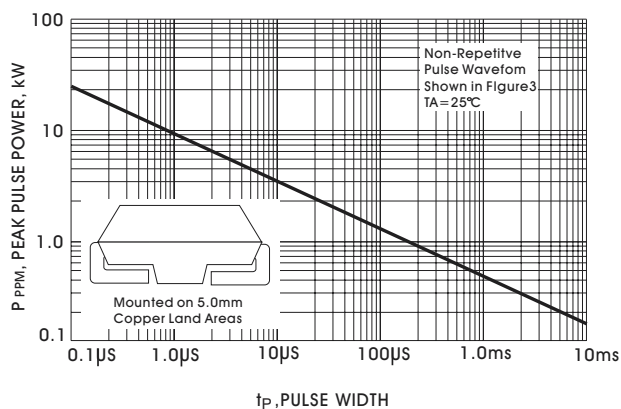


Figure 1, Peak Pulse Power Rating Curve

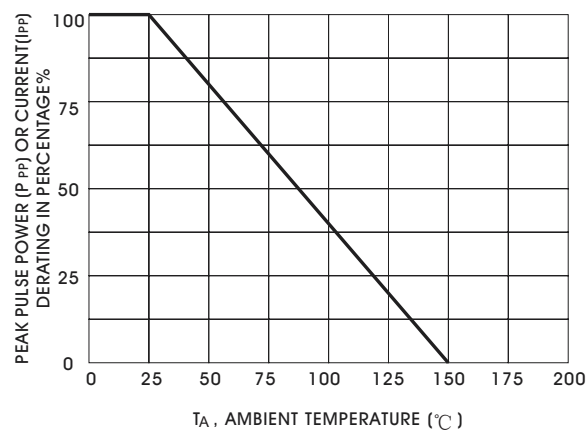


Figure 2, Derating Curve

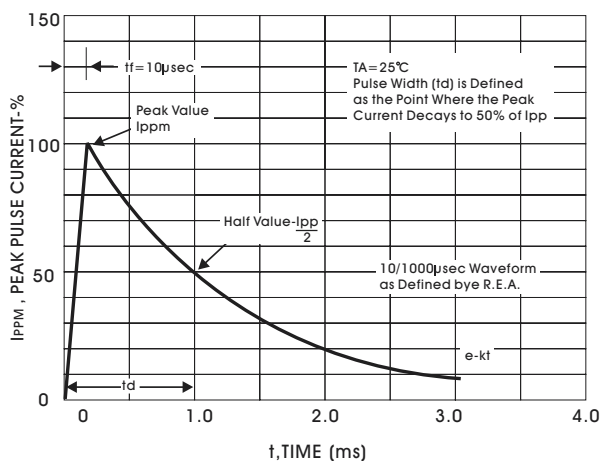


Figure 3, Pulse Waveform

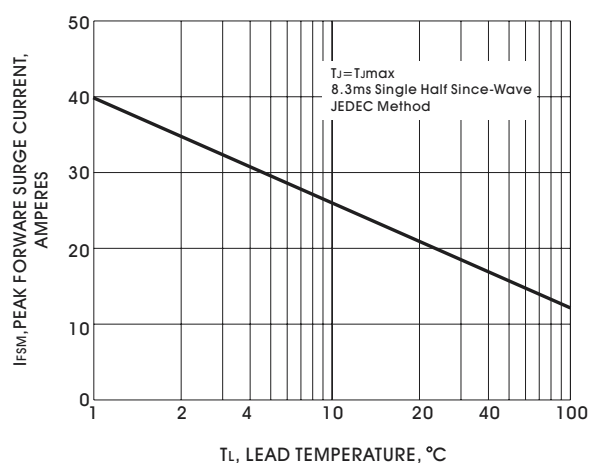


Figure 4, Maximum Non-Repetitive Peak Forward Surge Current

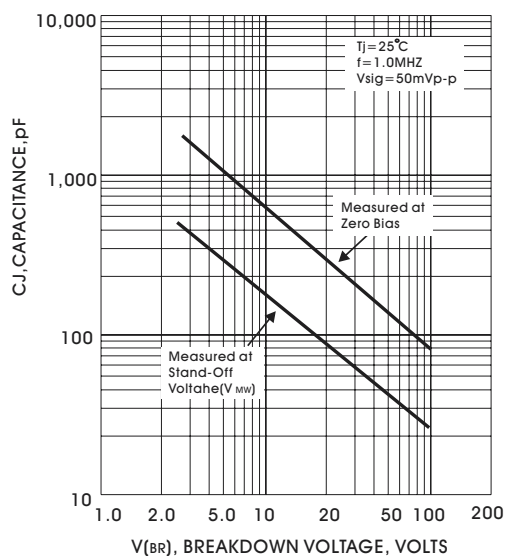


Figure 5, Typical Capacitance