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E480232

### **Features**

- · AEC-Q101 Qualified
- · Excellent Clamping Capability
- · For Surface Mount Applications
- · Glass Passivated Junction
- · Halogen Free
- High Temp Soldering: 260°C / 10 Seconds At Terminals
- For Bidirectional Devices Add "C" to The Suffix of The Part Number: i.e.SMA6J13CAHE3 for 5% Tolerance
- · Moisture Sensitivity Level 1
- Epoxy Meets UL 94 V-0 Flammability Rating
- Lead Free Finish/RoHS Compliant (Note1) ("P" Suffix Designates RoHS Compliant. See Ordering Information)

### **Mechanical Data**

· Polarity: Indicated by Cathode Band Except Bi-directional Types

# **Maximum Ratings**

- Operating Junction Temperature Range: -55°C to +150°C
- Storage Temperature Range: -55°C to +150°C
- Typical Thermal Resistance: 33°C/W Junction to Lead

Peak Pulse Power Surge Current with a 10/1000µs Waveform	I <sub>PPM</sub>	See the Table	Note 2
Peak Pulse Power Dissipation	P <sub>PPM</sub>	600 W(Min.)	Note 2
Power Dissipatoin on Infinite Heatsink	P <sub>D</sub>	3.0 W	T <sub>L</sub> = 75°C
Peak Forward Surge Current Unidirectional Only	I <sub>FSM</sub>	60 A	Note 3

### Note:

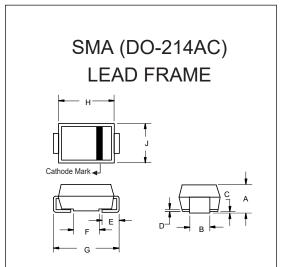
- 1. High temperature solder exemption applied, see EU directive annex 7a.
- 2. Non-repetitive current pulse per Fig.3 and derated above  $T_A \!\!=\! 25~^{\circ}\text{C}$  per Fig.4
- Measured on 8.3 ms single half sine-wave or equivalent square wave, duty cycle = 4 pulses per minute maximum

### Pin Configuration:



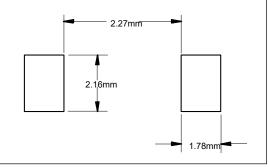


# 600 Watt TVS 13 to 40 Volts



DIMENSIONS						
DIM INCI		HES	MM		NOTE	
DIIVI	MIN	MAX	MIN	MAX	NOTE	
Α	0.075	0.096	1.90	2.44		
В	0.050	0.064	1.27	1.63		
С	0.002	0.008	0.051	0.203		
D		0.020		0.51		
E	0.030	0.060	0.76	1.52		
F	0.065	0.091	1.65	2.32		
G	0.189	0.220	4.80	5.59		
Н	0.157	0.187	4.00	4.75		
J	0.090	0.115	2.25	2.92		

### SUGGESTED SOLDER PAD LAYOUT





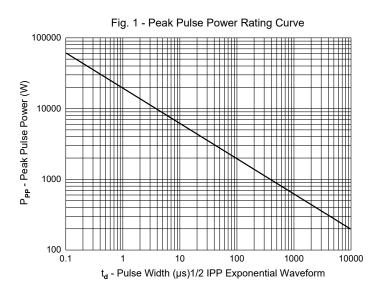
# Electrical Characteristics @ 25°C Unless Otherwise Specified

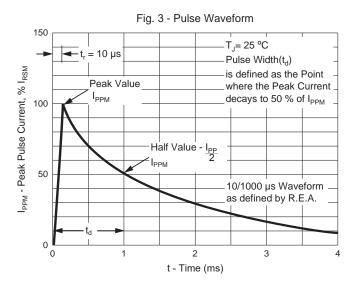
M( Part N	-	Breakdown Voltage V <sub>BR</sub> @ I <sub>T</sub>				Maximum Reverse Surge Current I <sub>pp</sub> (A) @10x1000us	Maximum Clamping Voltage V <sub>c</sub> (Volts)	Device Marking Code		
Uni-polar	Bi-polar	Min. (V)	Max. (V)	I <sub>T</sub> (mA)	$@V_{WM}$		sinewave	@I <sub>pp</sub>	Uni	Bi
SMA6J13AHE3	SMA6J13CAHE3	14.4	15.9	1	1.0	13	27.9	21.5	LG	UG
SMA6J14AHE3	SMA6J14CAHE3	15.6	17.2	1	1.0	14	25.9	23.2	LK	UK
SMA6J15AHE3	SMA6J15CAHE3	16.7	18.5	1	1.0	15	24.6	24.4	LM	UM
SMA6J16AHE3	SMA6J16CAHE3	17.8	19.7	1	1.0	16	23.1	26.0	LP	UP
SMA6J17AHE3	SMA6J17CAHE3	18.9	20.9	1	1.0	17	21.7	27.6	LR	UR
SMA6J18AHE3	SMA6J18CAHE3	20.0	22.1	1	1.0	18	20.5	29.2	LT	UT
SMA6J19AHE3	SMA6J19CAHE3	21.1	23.3	1	1.0	19	19.5	30.8	LB	UB
SMA6J20AHE3	SMA6J20CAHE3	22.2	24.5	1	1.0	20	18.5	32.4	LV	UV
SMA6J22AHE3	SMA6J22CAHE3	24.4	26.9	1	1.0	22	16.9	35.5	LX	UX
SMA6J24AHE3	SMA6J24CAHE3	26.7	29.5	1	1.0	24	15.4	38.9	LZ	UZ
SMA6J26AHE3	SMA6J26CAHE3	28.9	31.9	1	1.0	26	14.3	42.1	ME	WE
SMA6J28AHE3	SMA6J28CAHE3	31.1	34.4	1	1.0	28	13.2	45.4	MG	WG
SMA6J30AHE3	SMA6J30CAHE3	33.3	36.8	1	1.0	30	12.4	48.4	MK	WK
SMA6J33AHE3	SMA6J33CAHE3	36.7	40.6	1	1.0	33	11.3	53.3	MM	WM
SMA6J36AHE3	SMA6J36CAHE3	40.0	44.2	1	1.0	36	10.3	58.1	MP	WP
SMA6J40AHE3	SMA6J40CAHE3	44.4	49.1	1	1.0	40	9.3	64.5	MR	WR

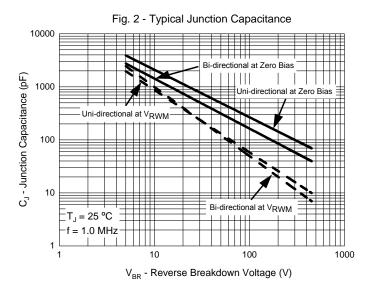
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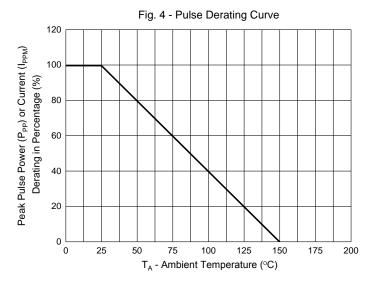


## **Curve Characteristics**











### **Ordering Information**

Device	Packing	
Part Number-TP	Tape&Reel:5Kpcs/Reel	

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Rev.3-1-06302019 4/4 MCCSEMI.COM