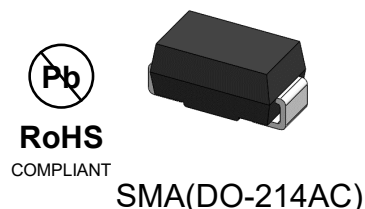


600W, 7 - 90V Transient Voltage Suppressors

Features

- Very fast response time
- Glass passivated junction
- Moisture sensitivity: level 1, per J-STD-020
- Available in unidirectional and bidirectional
- Plastic package has underwriters Laboratory Flammability Classification 94V-0
- Halogen-free according to IEC 61249-2-21 definition
- 600 W peak pulse power capability with a 10/1000 μ s waveform
- AEC-Q101 qualified



Applications

- SMPS
- Adapters
- Monitor

Absolute Maximum Ratings (TA=25°C unless otherwise noted)

Parameter	Symbol	Ratings	Unit
Peak power dissipation with a 10/1000 μ s waveform	P _{PPM}	600	W
Peak pulse current with a 10/1000 μ s waveform	I _{PPM}	See Next Table	A
Power dissipation, on infinite heat sink at T _L =75°C	P _D	3	W
Peak forward surge current, 8.3ms single half-sine wave	I _{FSM}	50	A
Operating junction and storage temperature range	T _J , T _{STG}	-55 to +150	°C

Thermal-Mechanical Specifications (TA=25°C unless otherwise noted)

Parameter	Symbol	Typ	Unit
Thermal Resistance, Junction to Ambient	R _{thJA}	90	°C /W
Thermal Resistance, Junction to Case	R _{thJC}	20	°C /W
Thermal Resistance, Junction to Lead	R _{thJL}	25	°C /W

Electrical Characteristics (TA = 25 °C unless otherwise noted)

Part Number (Uni)	Part Number (Bi)	Marking		Breakdown Voltage VBR (V)		Test Current I _T (mA)	Stand off Voltage V _{WM} (V)	Maximum reverse leakage at VWM I _D (μA)	Maximum Peak Pulse Current I _{ppM} (A)	Maximum Clamping Voltage at I _{PPM} V _c (V)
		UNI	BI							
				Min	Max					
ASMA6J7.0A	ASMA6J7.0CA	AKM	AAM	7.78	8.60	10	7.0	200	50.0	12.0
ASMA6J7.5A	ASMA6J7.5CA	AKP	AAP	8.33	9.21	1.0	7.5	100	46.5	12.9
ASMA6J8.0A	ASMA6J8.0CA	AKR	AAR	8.89	9.83	1.0	8.0	50	44.1	13.6
ASMA6J8.5A	ASMA6J8.5CA	AKT	AAT	9.44	10.4	1.0	8.5	20	41.7	14.4
ASMA6J9.0A	ASMA6J9.0CA	AKV	AAV	10.0	11.1	1.0	9.0	10.0	39.0	15.4
ASMA6J10A	ASMA6J10CA	AKX	AAX	11.1	12.3	1.0	10	5.0	35.3	17.0
ASMA6J11A	ASMA6J11CA	AKZ	AAZ	12.2	13.5	1.0	11	5.0	33.0	18.2
ASMA6J12A	ASMA6J12CA	ALE	ABE	13.3	14.7	1.0	12	5.0	30.2	19.9
ASMA6J13A	ASMA6J13CA	ALG	ABG	14.4	15.9	1.0	13	1.0	27.9	21.5
ASMA6J14A	ASMA6J14CA	ALK	ABK	15.6	17.2	1.0	14	1.0	25.9	23.2
ASMA6J15A	ASMA6J15CA	ALM	ABM	16.7	18.5	1.0	15	1.0	24.6	24.4
ASMA6J16A	ASMA6J16CA	ALP	ABP	17.8	19.7	1.0	16	1.0	23.1	26.0
ASMA6J17A	ASMA6J17CA	ALR	ABR	18.9	20.9	1.0	17	1.0	21.7	27.6
ASMA6J18A	ASMA6J18CA	ALT	ABT	20.0	22.1	1.0	18	1.0	20.5	29.2
ASMA6J20A	ASMA6J20CA	ALV	ABV	22.2	24.5	1.0	20	1.0	18.5	32.4
ASMA6J22A	ASMA6J22CA	ALX	ABX	24.4	26.9	1.0	22	1.0	16.9	35.5
ASMA6J24A	ASMA6J24CA	ALZ	ABZ	26.7	29.5	1.0	24	1.0	15.4	38.9
ASMA6J26A	ASMA6J26CA	AME	ACE	28.9	31.9	1.0	26	1.0	14.3	42.1
ASMA6J28A	ASMA6J28CA	AMG	ACG	31.1	34.4	1.0	28	1.0	13.2	45.4
ASMA6J30A	ASMA6J30CA	AMK	ACK	33.3	36.8	1.0	30	1.0	12.4	48.4
ASMA6J33A	ASMA6J33CA	AMM	ACM	36.7	40.6	1.0	33	1.0	11.3	53.3
ASMA6J36A	ASMA6J36CA	AMP	ACP	40.0	44.4	1.0	36	1.0	10.3	58.1
ASMA6J40A	ASMA6J40CA	AMR	ACR	44.4	49.1	1.0	40	1.0	9.3	64.5
ASMA6J43A	ASMA6J43CA	AMT	ACT	47.8	52.8	1.0	43	1.0	8.6	69.4
ASMA6J45A	ASMA6J45CA	AMV	ACV	50.0	55.3	1.0	45	1.0	8.3	72.7
ASMA6J48A	ASMA6J48CA	AMX	ACX	53.3	58.9	1.0	48	1.0	7.8	77.4
ASMA6J51A	ASMA6J51CA	AMZ	ACZ	56.7	62.7	1.0	51	1.0	7.3	82.4
ASMA6J54A	ASMA6J54CA	ANE	ADE	60.0	66.3	1.0	54	1.0	6.9	87.1
ASMA6J58A	ASMA6J58CA	ANG	ADG	64.4	71.2	1.0	58	1.0	6.4	93.6
ASMA6J60A	ASMA6J60CA	ANK	ADK	66.7	73.7	1.0	60	1.0	6.2	96.8
ASMA6J64A	ASMA6J64CA	ANM	ADM	71.1	78.6	1.0	64	1.0	5.8	103
ASMA6J70A	ASMA6J70CA	ANP	ADP	77.8	86.0	1.0	70	1.0	5.3	113
ASMA6J75A	ASMA6J75CA	ANR	ADR	83.3	92.1	1.0	75	1.0	5.0	121
ASMA6J78A	ASMA6J78CA	ART	ADT	86.7	95.8	1.0	78	1.0	4.8	126

Electrical Characteristics (TA = 25 °C unless otherwise noted)

Part Number (Uni)	Part Number (Bi)	Marking		Breakdown Voltage VBR (V)		Test Current I _T (mA)	Stand off Voltage V _{WM} (V)	Maximum reverse leakage at V _{WM} I _D (μA)	Maximum Peak Pulse Current I _{ppM} (A)	Maximum Clamping Voltage at I _{ppM} V _C (V)
		UNI	BI							
				Min	Max					
ASMA6J85A	ASMA6J85CA	ANV	ADV	94.4	104	1.0	85	1.0	4.4	137
ASMA6J90A	ASMA6J90CA	ANX	ADX	100	111	1.0	90	1.0	4.1	146

Note:

1. Mounted on copper pad area of 0.2x0.2" (5.0 x 5.0mm) to each terminal.

Ratings and Characteristics Curves (T_A = 25°C unless otherwise noted)

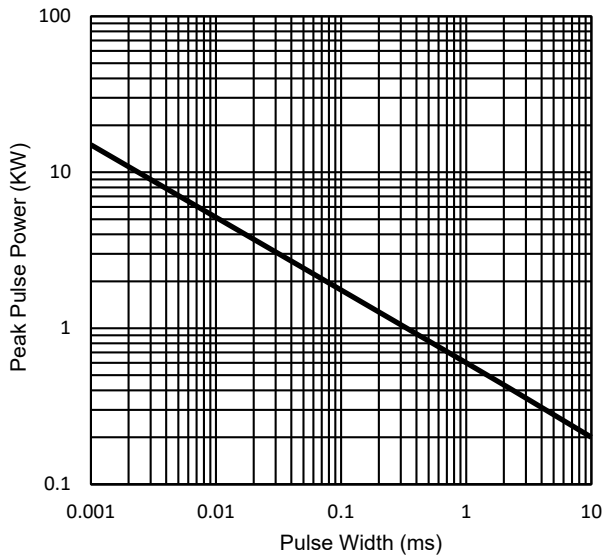


Fig.1 -Peak Pulse Power Derating Curve

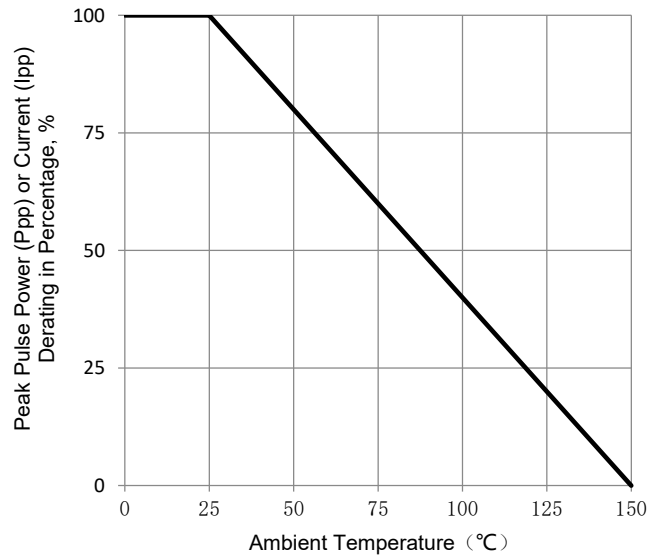


Fig.2 - Pulse Power vs Ambient Temperature

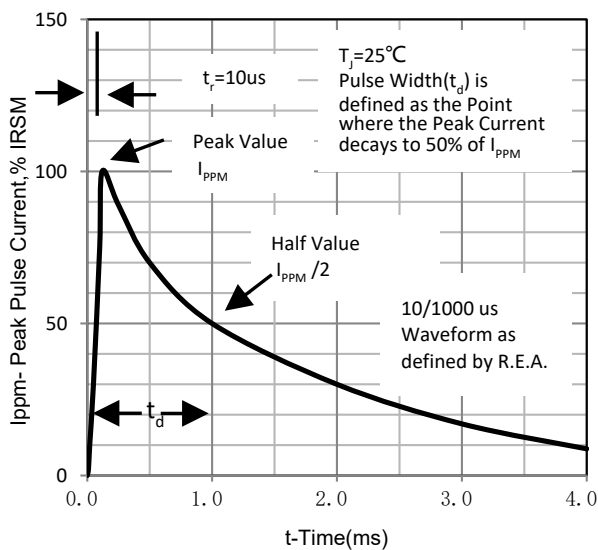


Fig.3 - Pulse Waveform

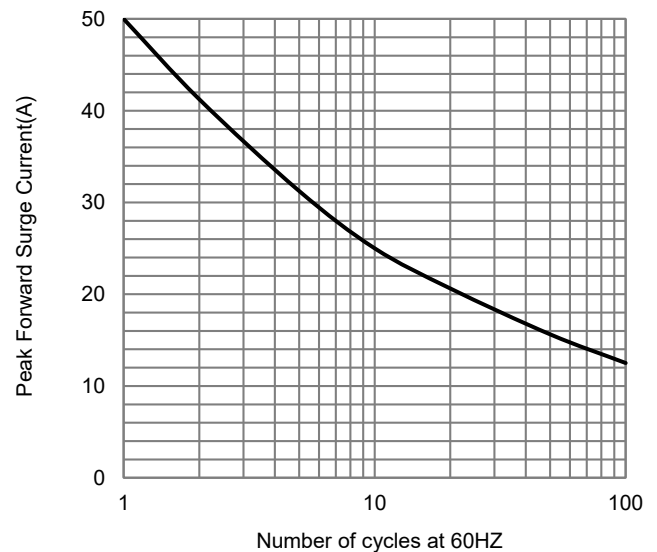
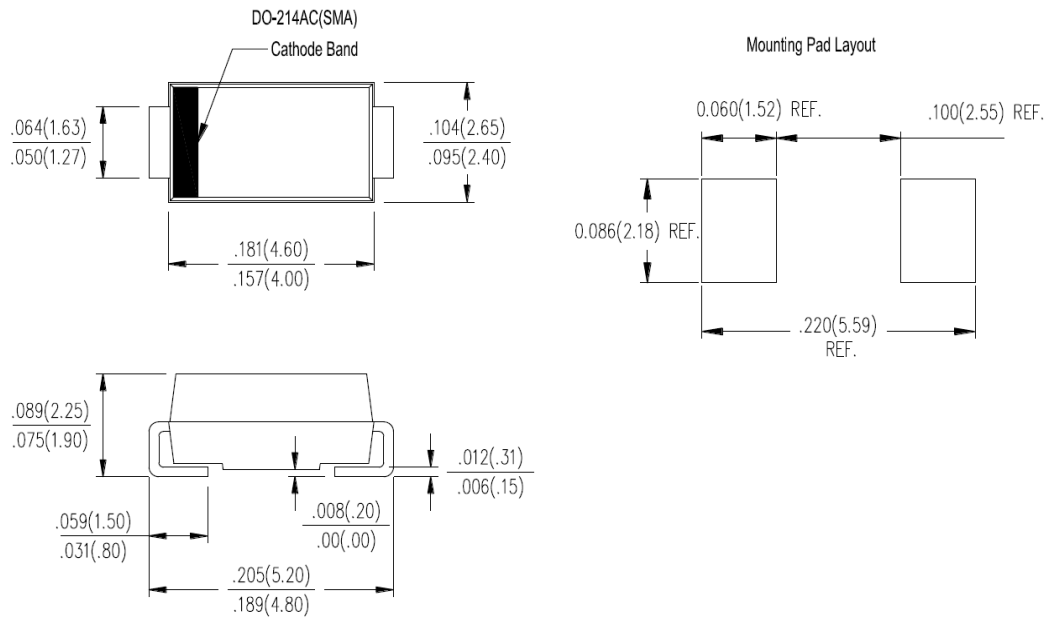


Fig.4 - Maximum Non-Repetitive Surge Current

Package Outline Dimensions

in inches (millimeters)

SMA (DO-214AC)



Disclaimers

These materials are intended as a reference to assist our customers in the selection of the Suzhou Good-Ark product best suited to the customer's application; they do not convey any license under any intellectual property rights, or any other rights, belonging to Suzhou Good-Ark Electronics Co., Ltd. or a third party.

Suzhou Good-Ark Electronics Co., Ltd. assumes no responsibility for any damage, or infringement of any third-party's rights, originating in the use of any product data, diagrams, charts, programs, algorithms, or circuit application examples contained in these materials.

All information contained in these materials, including product data, diagrams, charts, programs and algorithms represents information on products at the time of publication of these materials, and are subject to change by Suzhou Good-Ark Electronics Co., Ltd. without notice due to product improvements or other reasons. It is therefore recommended that customers contact Suzhou Good-Ark Electronics Co., Ltd. or an authorized Suzhou Good-Ark Electronics Co., Ltd. for the latest product information before purchasing a product listed herein. The information described here may contain technical inaccuracies or typographical errors. Suzhou Good-Ark Electronics Co., Ltd. assumes no responsibility for any damage, liability, or other loss rising from these inaccuracies or errors. Please also pay attention to information published by Suzhou Good-Ark Electronics Co., Ltd. by various means, including our website home page.

(<http://www.goodark.com>)

When using any or all of the information contained in these materials, including product data, diagrams, charts, programs, and algorithms, Please be sure to evaluate all information as a total system before making a final decision on the applicability of the information and products. Suzhou Good-Ark Electronics Co., Ltd. assumes no responsibility for any damage, liability or other loss resulting from the information contained herein.

The prior written approval of Suzhou Good-Ark Electronics Co., Ltd. is necessary to reprint or reproduce in whole or in part these materials.

Please contact Suzhou Good-Ark Electronics Co., Ltd. or an authorized distributor for further details on these materials or the products contained herein.