



Features

- Average Forward Current: $I_{F(AV)}=1A$
- Polarity: Color band denotes cathode



SMA
(DO-214AC)



Package Marking and Ordering Information

Product ID	Pack	Marking	Qty(PCS)
ES1A-ES1J	SMA (DO-214AC)	ES1x	2000

x: From A-J

Maximum Ratings ($T_a=25^\circ\text{C}$ unless otherwise noted)

Item	Symbol	Unit	Test Conditions	ES1							
				A	B	C	D	E	G	H	J
Repetitive Peak Reverse Voltage	V _{RRM}	V		50	100	150	200	300	400	500	600
Maximum RMS Voltage	V _{RMS}	V		35	70	105	140	210	280	350	420
Average Forward Current	I _{F(AV)}	A	60Hz Half-sine wave, Resistance load, T _L =75℃	1.0							
Surge(Non-repetitive)Forward Current	I _{FSM}	A	60Hz Half-sine wave, 1 cycle, Ta=25℃	30							
Operation Junction and Storage Temperature Range	T _J ,T _{STG}	℃		-55 ~ +150							

Electrical Characteristics($T_a=25^\circ\text{C}$ unless otherwise specified)

Item	Symbol	Unit	Test Condition	ES1						
				A	B	C	D	E	G	H
Peak Forward Voltage	V _F	V	I _F =1.0A	0.95			1.25		1.70	
Maximum reverse recovery time	t _{tr}	ns	I _F =0.5A, I _R =1.0A, I _{rr} =0.25A	35						
Peak Reverse Current	I _{RRM1}	μA	V _{RM} =V _{RRM}	Ta =25℃		5				
	Ta =100℃			100						
Thermal Resistance(Typical)	R _{θJ-A}	℃/W	Between junction and ambient		85					
	R _{θJ-L}		Between junction and terminal		35					

Notes:

Thermal resistance from junction to ambient and from junction to lead mounted on P.C.B. with 0.2" x 0.2" (5.0 mm x 5.0 mm) copper pad areas



Typical Characteristics

FIG.1: FORWARD CURRENT DERATING CURVE

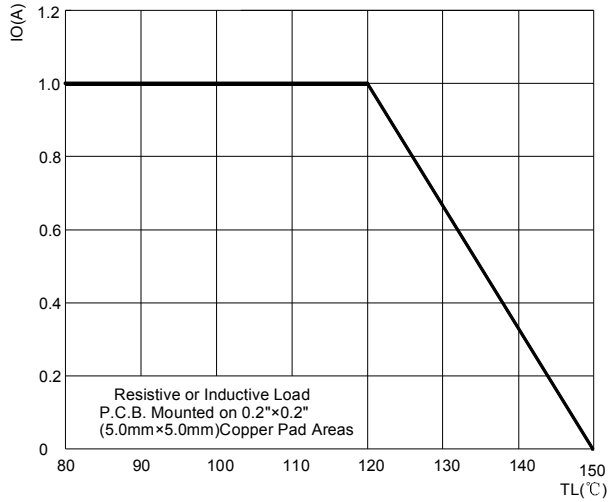


FIG.2: MAXIMUM NON-REPETITIVE FORWARD URGE CURRENT

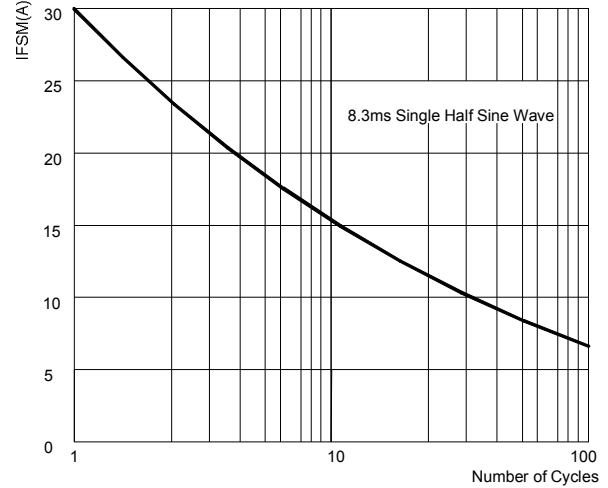


FIG.3: TYPICAL FORWARD CHARACTERISTICS

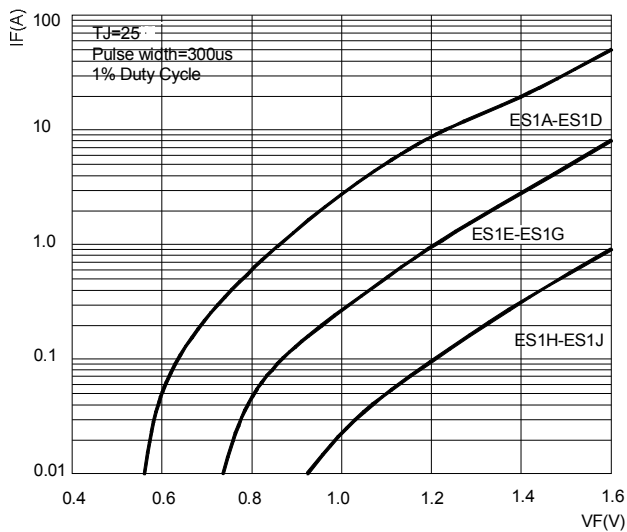


FIG.4: TYPICAL REVERSE CHARACTERISTICS

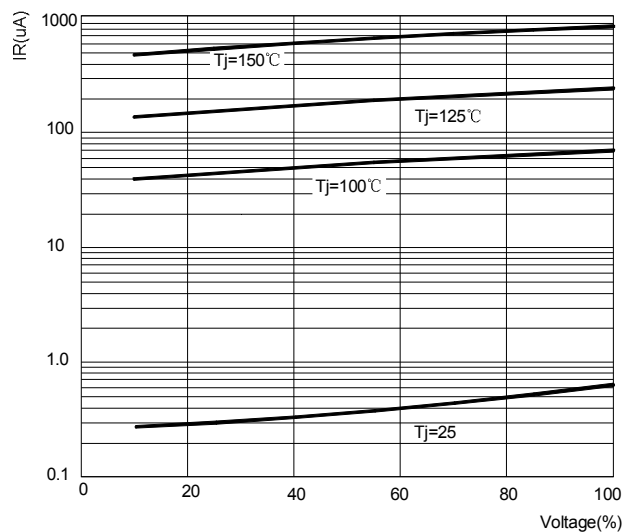
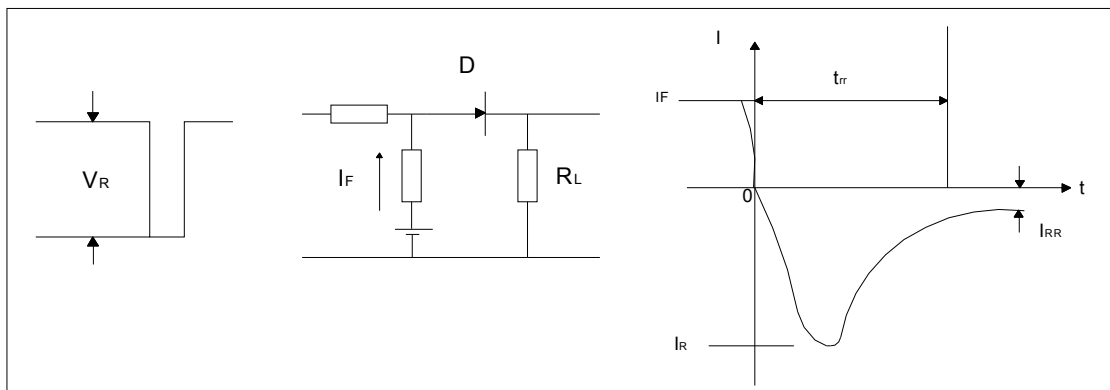


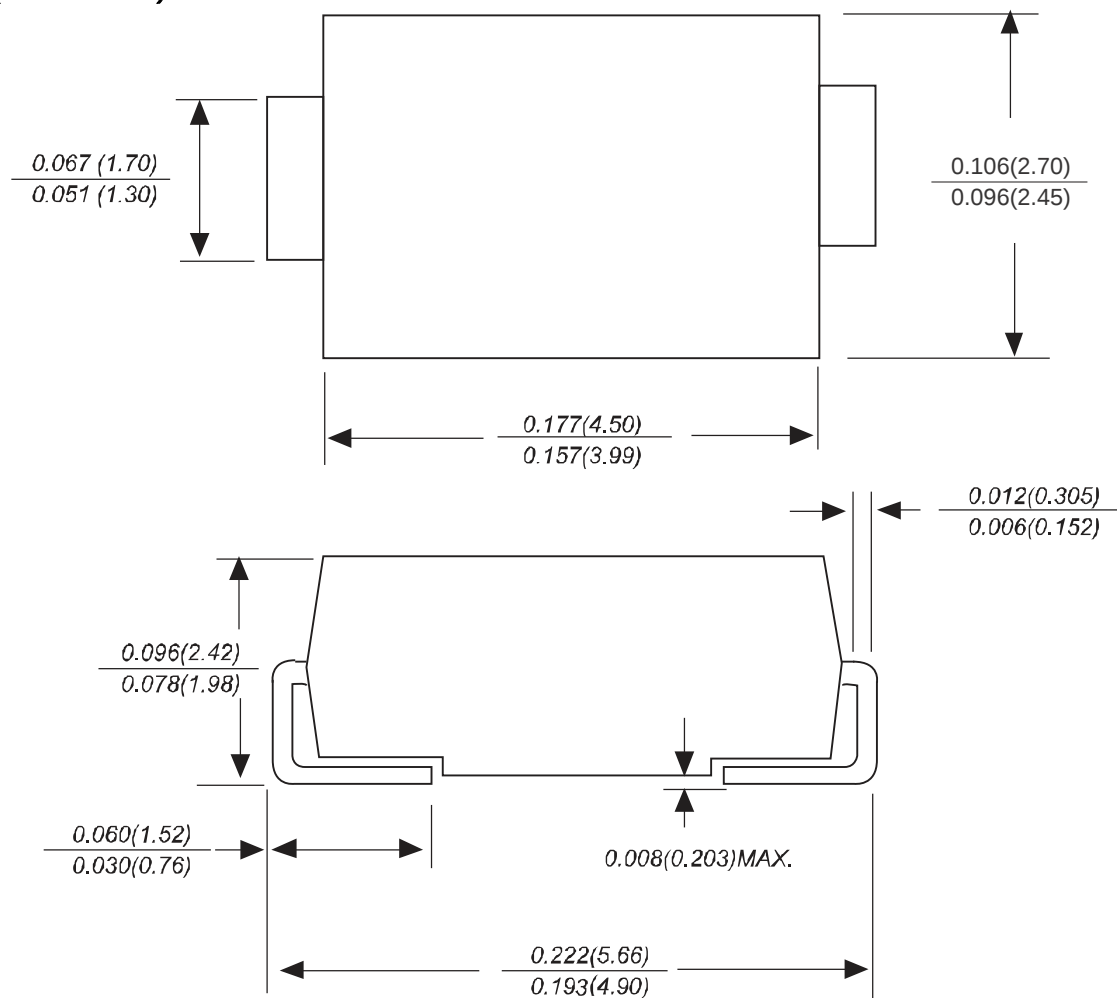
FIG.5: Diagram of circuit and Testing wave form of reverse recovery time





Package Outline Dimensions

SMA(DO-214AC)



Dimensions in inches and (millimeters)



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