/ Absolute Maximum Ratings(Ta=25)

Parameter	Symbol	Rating							Unit
		RS5ABF	RS5BBF	RS5DBF	RS5GBF	RS5JBF	RS5KBF	RS5MBF	
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS voltage	V_{RMS}	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current @ Fig.1	$I_{F\ AV}$	5							A
Peak Forward Surge Current,8.3ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method)	I_{FSM}	150							A
Peak Forward Surge Current,1.0ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method)	I_{FSM}	300							A
I^2t Rating for fusing (3ms ≤ t ≤ 8.3ms)	I^2t	93.3							A^2s
Typical Junction Capacitance(1)	C_j	38					70		pF
Typical Thermal Resistance (2)	$R_{\theta JA}$ $R_{\theta JC}$ $R_{\theta JL}$	42 10 15							/W
Operating and Storage Temperature Range	T_j,T_{stg}	-55~+150							

Note:

1 Measured at 1 MHz and applied reverse voltage of 4V D.C

2 P.C.B. mounted with 1.5" X 1.5" (3.81 X 3.81 cm) copper pad areas.

/ Electrical Characteristics(Ta=25)

Parameter	Symbol	Test Conditions	Rating							Unit
			RS5ABF	RS5BBF	RS5DBF	RS5GBF	RS5JBF	RS5KBF	RS5MBF	
Maximum Forward Voltage	V_F	I_F=5A	1.3							V
Maximum DC Reverse Current at Rated DC Blocking Voltage	I_R	T_a=25	10							μA
		T_a=125	150							μA
Maximum Reverse Recovery Time	t_{rr}	I_F=0.5A I_R=1A I_{rr}=0.25A	150				250	500		ns

/ Electrical Characteristic Curve

Fig.1 Maximum Average Forward Current Rating

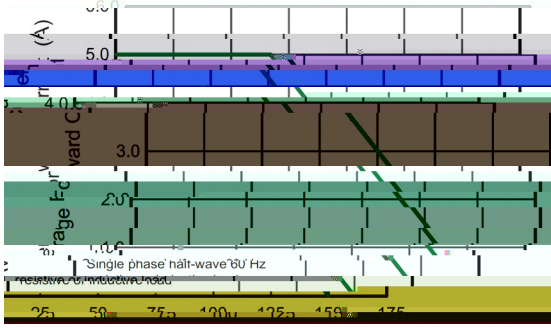


Fig.2 Typical Reverse Characteristics

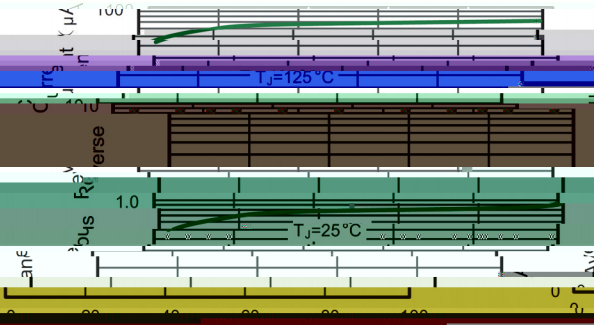


Fig.3 Typical Instantaneous Forward Characteristics

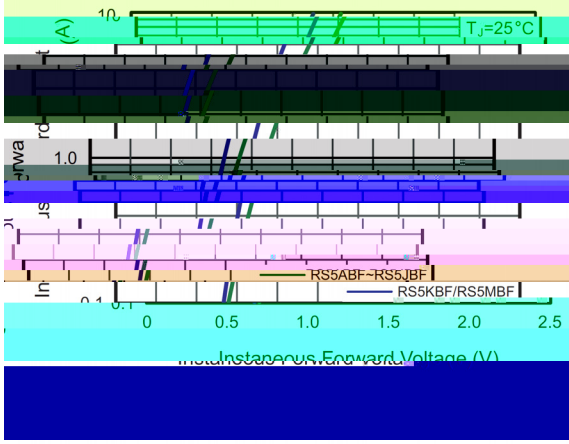


Fig.4 Typical Junction Capacitance

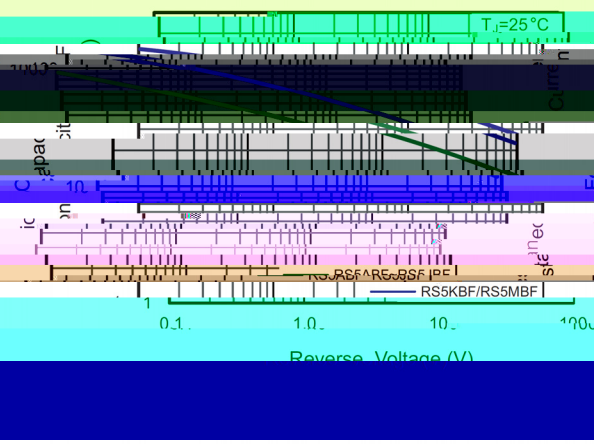
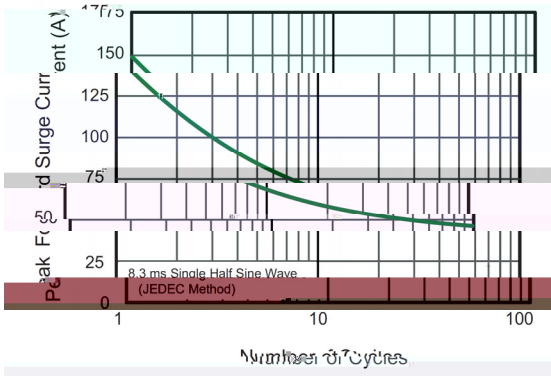
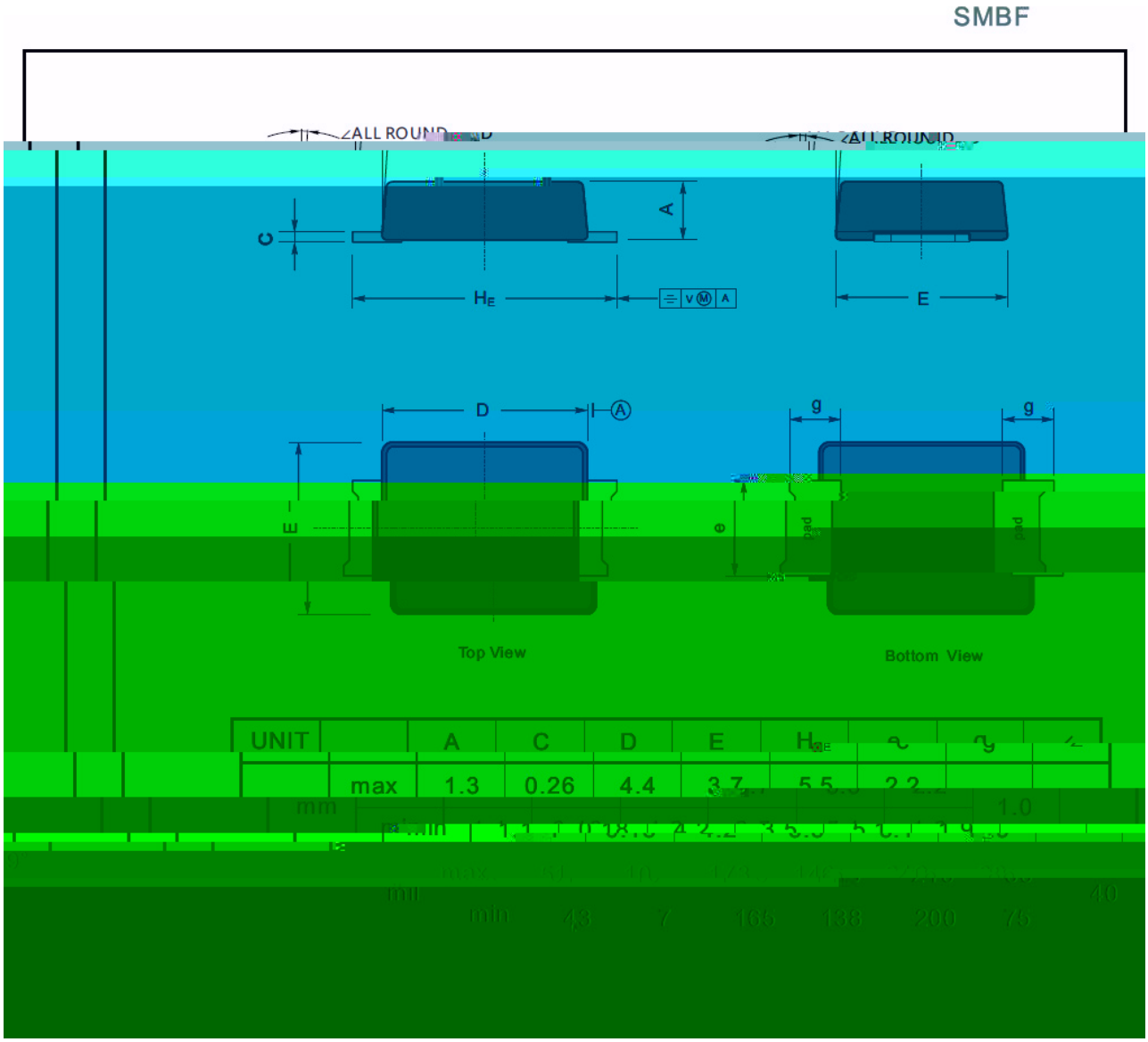


Fig.5 Maximum Non-Repetitive Peak Forward Surge Current



/ Package Dimensions



UNIT		A	C	D	E	H_E			
mm	max	1.3	0.26	4.4	3.7	5.5	2.2		1.0
	min								
mil	max								
	min	43	7	165	138	200	75		40

/ Marking Instructions



R5AB

****

Note:

R5AB	Product Type Code
****	Lot No. Code, code change with Lot No

Marking

Type number	Marking code
RS5ABF	R5AB
RS5BBF	R5BB
RS5DBF	R5DB
RS5GBF	R5GB
RS5JBF	R5JB
RS5KBF	R5KB
RS5MBF	R5MB

( ) / Temperature Profile for IR Reflow Soldering(Pb-Free)



				Note:
1	150	180	60 90sec;	1.Preheating:150~180 , Time:60~90sec.
2	245±5		5±0.5sec;	2.Peak Temp.:245±5 , Duration:5±0.5sec.
3		2 10	/sec.	3. Cooling Speed: 2~10 /sec.

/ Resistance to Soldering Heat Test Conditions

260±5	10±1 sec.	Temp.:260±5	Time:10±1 sec

/ Packaging SPEC.

/ REEL

Package Type	Units					Dimension		(unit mm³)
	Units/Reel /	Reels/Inner Box /	Units/Inner Box /	Inner Boxes/Outer Box /	Units/Outer Box /	Reel	Inner Box	Outer Box
SMBF	5,000	2	10,000	7	70,000	13 ×12	336X336X40	380X335X366

/ Notices