

S5AB-S5MB
Feature

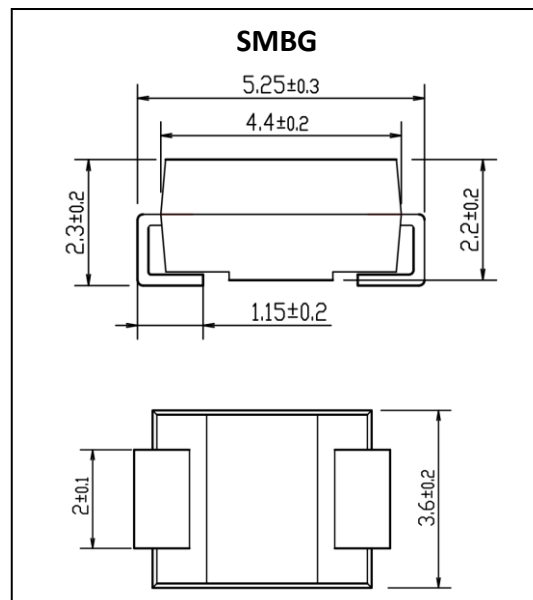
- Low Profile Package
- Ideal For Automated Placement
- Glass Passivated Chip
- High Forward Surge Capability

Application

- Rectifier

Marking

- S5XB or S5X X: From A to M


ABSOLUTE MAXIMUM RATINGS ($T_A=25^{\circ}\text{C}$ unless otherwise noted)

Parameter	Symbol	S5XB							Unit
		A	B	D	G	J	K	M	
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
DC Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	V
Average Forward Current	$I_{F(AV)}$	5							A
Non-repetitive Peak Forward Surge Current 8.3ms Single Half-Sine-Wave @ $T_J = 25^{\circ}\text{C}$	I_{FSM}	150							A
Rating For Fusing($t < 8.3\text{ms}$)	I^2t	93.4							A ² sec
Junction Temperature	T_J	-55 ~ +150							$^{\circ}\text{C}$
Storage Temperature	T_{STG}	-55 ~ +150							$^{\circ}\text{C}$

ELECTRICAL CHARACTERISTICS ($T_A=25^{\circ}\text{C}$ unless otherwise noted)

Parameter	Symbol	Test Condition	S5XB						Unit
			A	B	D	G	J	K	
Peak Forward Voltage	V_F	$I_F = 5\text{A}$	1.1						V
Peak Reverse Current	I_{RRM1}	$V_{RM} = V_{RRM}$	$T_A = 25^{\circ}\text{C}$						μA
	I_{RRM2}		$T_A = 125^{\circ}\text{C}$						μA
Thermal Resistance(Typical)	$R_{\theta J-A}$		60						$^{\circ}\text{C}/\text{W}$
	$R_{\theta J-L}$		25						$^{\circ}\text{C}/\text{W}$
	$R_{\theta J-C}$		23						$^{\circ}\text{C}/\text{W}$

Typical Characteristics

Fig.1-Forward Current Derating Curve

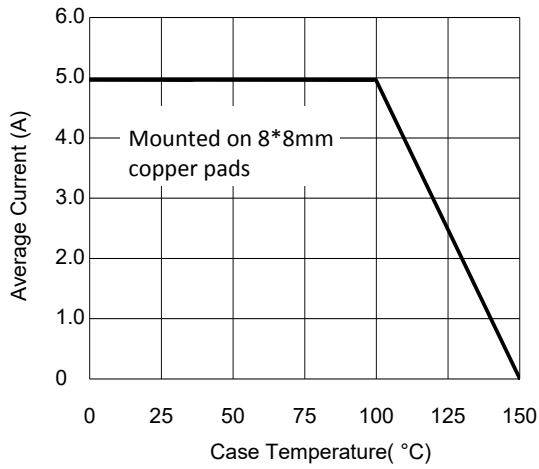


Fig.2- Surge Current Derating Curve

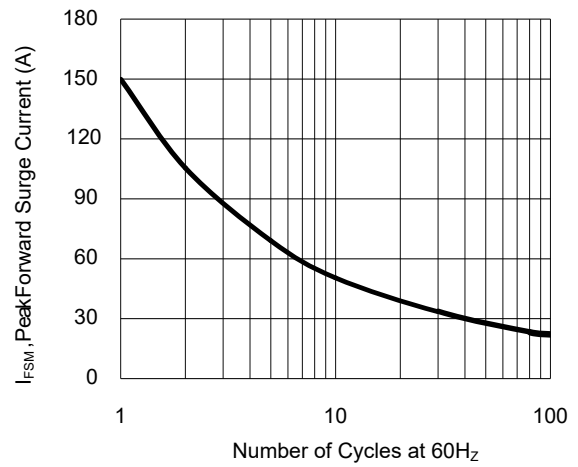


Fig.3- Typical Forward Voltage Characteristic

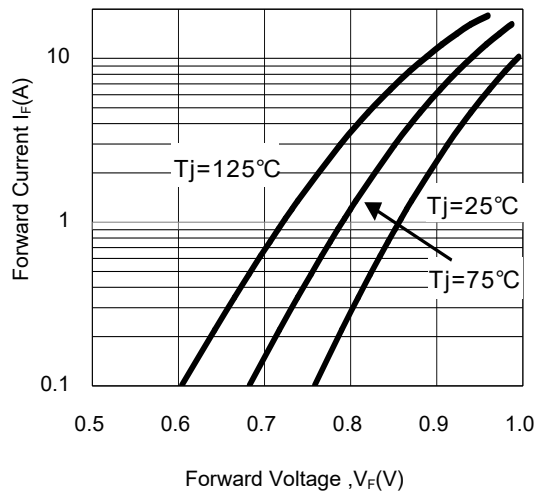
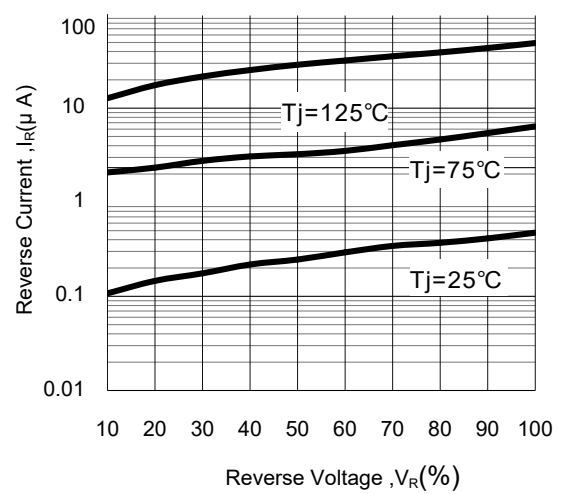


Fig.4- Typical Reverse Characteristic



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