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SK310B SCHOTTKY RECTIFIER

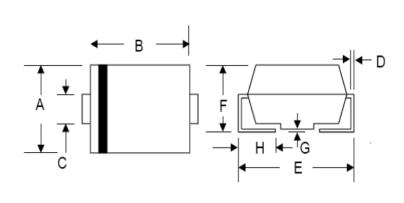
Applications:

- Switching power supply
- Converters
- Free-Wheeling diodes
- Reverse battery protection

Features:

- Small foot print, surface mountable
- Very low forward voltage drop
- High frequency operation
- Guard ring for enhanced ruggedness and long term reliability
- Green products in compliance the ROHS directive
- This is a Pb Free device
- All SMC parts are traceable to the wafer lot
- Additional testing can be offered upon request

Mechanical Dimensions (In mm)



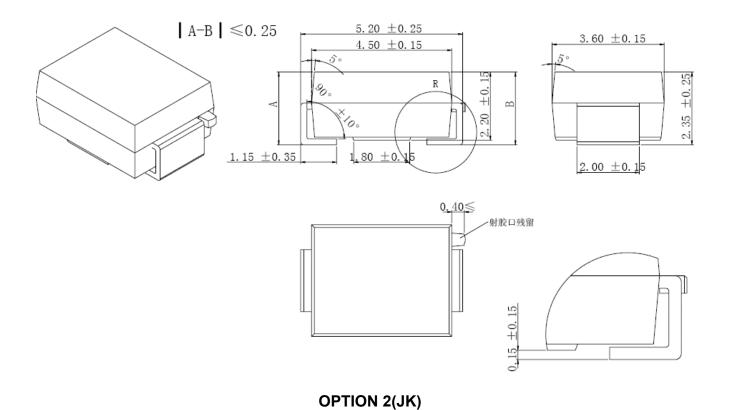
SMB/DO-214AA					
Dim	Min	Max	Min	Max	
Α	3.30	3.94	0.130	0.155	
В	4.06	4.70	0.160	0.185	
С	1.91	2.11	0.075	0.083	
D	0.152	0.305	0.006	0.012	
E	5.08	5.59	0.2	0.220	
F	2.13	2.44	0.084	0.096	
G	0.051	0.203	0.002	0.008	
Н	0.76	1.27	0.029	0.05	
	in mm		In inch		

OPTION 1





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Marking Diagram:



Where XXXXX is YYWWL

B = Package type

3 = Forward Current (3A) 10 = Reverse Voltage (100V)

YY = Year WW = Week L = Lot Number

Cautions: Molding resin

Epoxy resin UL:94V-0

Ordering Information:

Device	Package	Shipping
SK310B	SMB (Pb-Free)	3000pcs / reel

For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specification.

Maximum Ratings:

Characteristics	Symbol	Condition	Max.	Units
Peak Repetitive Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	$egin{array}{c} V_{RRM} \ V_{RWM} \ V_{R} \end{array}$	-	100	V
Average Forward Current	I _{F(AV)}	50% duty cycle @T _L =115℃ rectangular wave form(L=0.375")	3.0	Α
Peak One Cycle Non-Repetitive Surge Current	I _{FSM}	8.3 ms, half Sine pulse	110	А

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Electrical Characteristics:

Characteristics	Symbol	Condition	Max.	Units
Forward Voltage Drop*	V_{F1}	@ 3A, Pulse, T _J = 25℃	0.85	V
	V_{F2}	@ 3A, Pulse, T _J = 125℃	0.80	V
Reverse Current*	I _{R1}	$@V_R = \text{rated } V_R$ $T_J = 25^{\circ}C$	0.6	mA
	I _{R2}	$@V_R = \text{rated } V_R$ $T_J = 125 ^{\circ}C$	20	mA
Typical Junction Capacitance	Cj	@V _R = 5.0 V, Tc=25℃ f _{SIG} = 1MHz	250	pF

^{*} Pulse Width < 300µs, Duty Cycle <2%

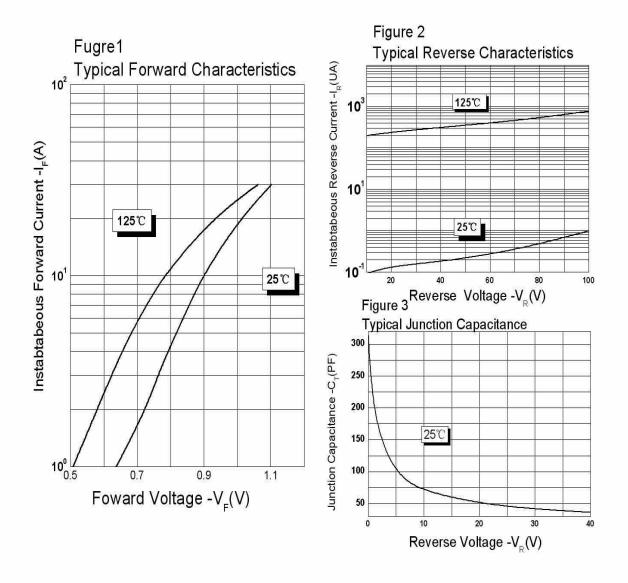
Thermal-Mechanical Specifications:

Characteristics	Symbol	Condition	Specification	Units
Junction Temperature	T_J	-	-55 to +150	$^{\circ}$
Storage Temperature	T _{stg}	-	-55 to +150	$^{\circ}$
Repetitive peek reverse current	I _{RRM}	Tp=2us F=1KHZsquare	1	А
Maximum Thermal Resistance Junction to Lead	$R_{ heta JL}$	DC operation	17	°C/W
Maximum Thermal Resistance, Case to Heat Sink	$R_{ heta JA}$	DC operation	75	°C/W
Approximate Weight	wt	-	0.68	g
Case Style		SMB		

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