

Green Products

SL34B

Technical Data Data Sheet N1313 Rev. -

# **SL34B SCHOTTKY RECTIFIER**

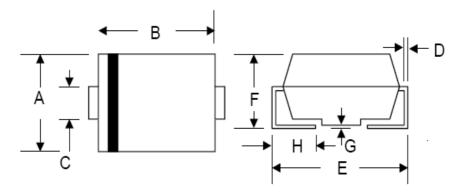
# **Applications:**

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

#### Features:

- Schottky Barrier Chip
- Guard Ring Die Construction for Transient Protection
- High Current Capability
- Low Power Loss, High Efficiency
- High Surge Current Capability
- For Use in Low Voltage, High Frequency Inverters, Free Wheeling, and Polarity Protection Applications
- 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 / Inches)**



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		

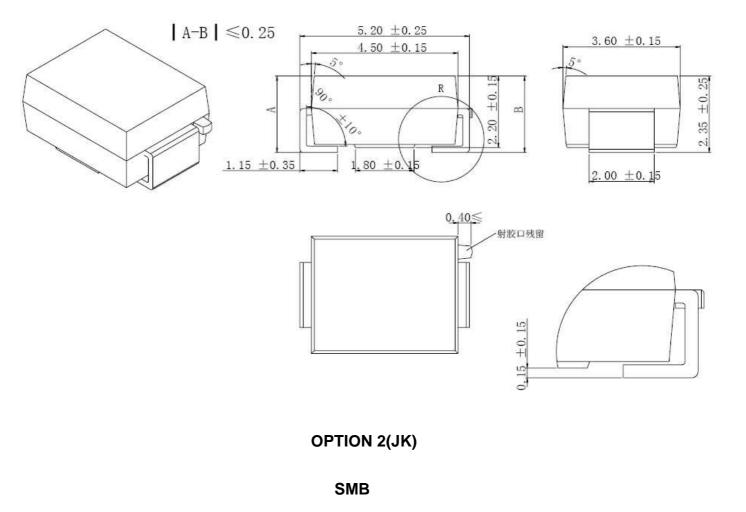
# **OPTION 1**



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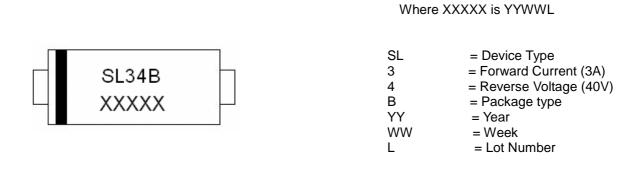




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### Marking Diagram:



Cautions : Molding resin Epoxy resin UL:94V-0

### **Ordering Information:**

Device	Package	Shipping
	SMB	2000, 200 / 2001
SL34B	(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 Inverse Voltage	V <sub>RWM</sub>	-	40	V
Max. Average Forward	I <sub>F(AV)</sub>	50% duty cycle ,rectangular wave form	3.0	А
Max. Peak One Cycle Non-Repetitive Surge Current	I <sub>FSM</sub>	8.3 ms, half Sine pulse	70	А



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## **Electrical Characteristics:**

Characteristics	Symbol	Condition	Max.	Units
Max. Forward Voltage Drop	V <sub>F1</sub>	@ 3A, Pulse, T <sub>J</sub> = 25℃	0.50	V
	V <sub>F2</sub>	@ 3A, Pulse, T <sub>J</sub> = 125℃	0.45	V
Max. Reverse Current	I <sub>R1</sub>	$@V_{R} = rated VR$	1.0	mA
		T <sub>J</sub> = 25℃		
	I <sub>R2</sub>	$@V_{R} = rated VR$	55	mA
		T <sub>J</sub> = 125℃		
Typical Junction Capacitance	Cj	@V <sub>R</sub> = 5.0 V, Tc=25°C	250	pF
		f <sub>SIG</sub> = 1MHz		

\* Pulse Width < 300µs, Duty Cycle <2%

# Thermal-Mechanical Specifications:

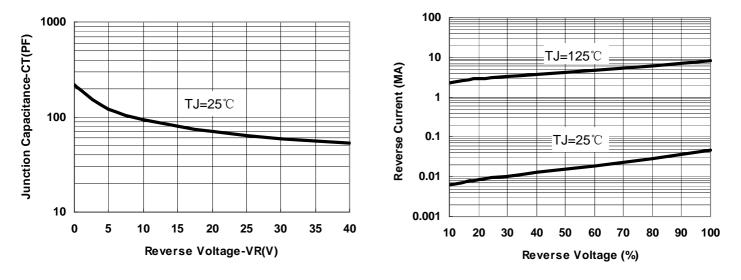
Characteristics	Symbol	Condition	Specification	Units
Max. Junction Temperature	TJ	-	-55 to +125	°C
Max. Storage Temperature	T <sub>stg</sub>	-	-55 to +125	°C
Maximum Thermal Resistance Junction to Case	$R_{ ext{ heta}JC}$	DC operation	8	°C/W
Approximate Weight	wt	-	0.68	g
Case Style		SMB		

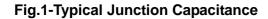


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**Fig.2-Typical Reverse Characteristics** 

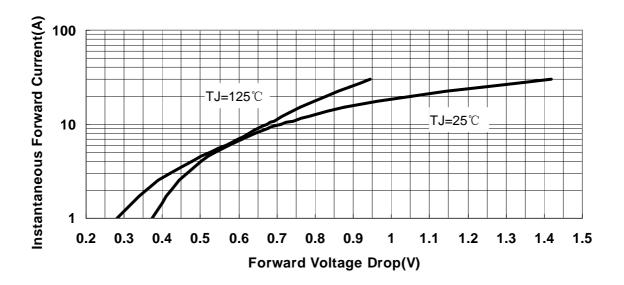


Fig.3-Typical Instantaneous Forward Voltage Characteristics



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