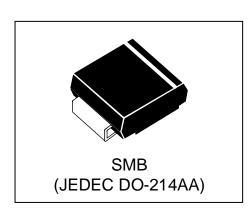


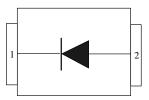
WSRxx03B

SCHOTTKY BARRIER RECTIFIERS

Features

- 3A Schottky barrier diode
- Schottky barrier rectifier
- Guarding protection
- Low forward voltage
- Reverse energy tested
- High current capability
- Extremely low thermal resistance
- RoHS Compliant & HF
- Device meets MSL1 requirement





Mechanical Data

Case: SMB(JEDEC DO-214AA), molded plastic body

Mounting position: any

Polarity: Color band denotes cathode end

Absolute Maximum Ratings and Electronics characteristics

Ratings@25°C ambient temperature unless otherwise specified

Parameter	Symbol	WSR4003B	WSR6003B	WSR10003B	WSR15003B	WSR20003B	UNITS
Maximum repetitive peak reverse voltage	V _{RRM}	40	60	100	150	200	V
Maximum RMS voltage	V _{RMS}	28	42	70	105	140	V
Maximum DC blocking voltage	V_{DC}	40	60	100	150	200	V
Maximum average forward rectified current	I _{F(AV)}	3.0			А		
Peak forward surge current 8.3mssingle half-sine-wave	I _{FSM}	70			А		
Maximum instantaneous forward voltage at IF=3.0A	VF	0.55	0.7	0.85	0.9	95	V
Maximum DC reverse current (Ta= 25°C) At rated DC blocking voltage (Ta=100°C)	I _R	0.5 10 5			mA		
Typical thermal resistance(junction to ambient)	RθJA	55			°C/W		
Operating temperature range	TJ	-55 ~ +125			$^{\circ}$		
Storage temperature range	T _{STG}	-55 ~ +150			$^{\circ}$		

Typical characteristics (Ta=25°C, unless otherwise noted)

Fig. 1 - PEAK FORWARD SURGE CURRENT

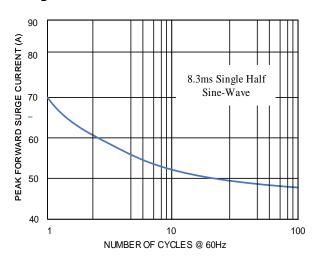


Fig. 2 - FORWARD CURRENT DERATING CURVE

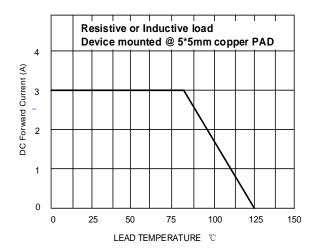


Fig.3 Typical Forward Characteristic

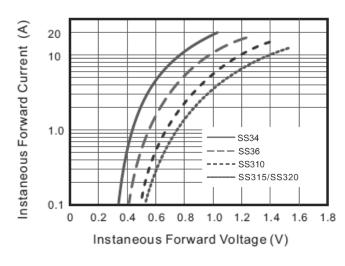
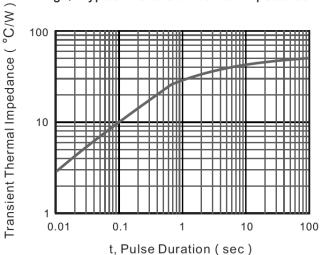


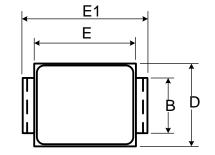
Fig.4- Typical Transient Thermal Impedance

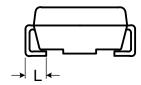


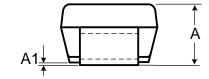
Note: The above typical parameters or typical characteristics are only indicative and do not make specific guarantees. If detailed values are required, additional communication and provision are required.

Outline Drawing

Ref. (mm)	Millimeters		
	Min.	Max.	
Α	1.990	2.610	
A1	-	0.300	
В	1.850	2.200	
E	4.060	4.750	
E1	5.080	5.590	
D	3.300	3.940	
L	0.760	1.520	

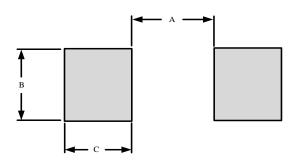






Recommended Solder Pad Layout

DIM(mm)	MILLIMETERS	
Α	2.74	
В	2.26	
С	2.16	



Marking Code

Part Number	WSR4003B	WSR6003B	WSR10003B	WSR15003B	WSR20003B
Marking Code	SS34	SS36	SS310	SS315	SS320

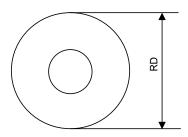
Package Information

Tape & Reel: 3000 pcs.

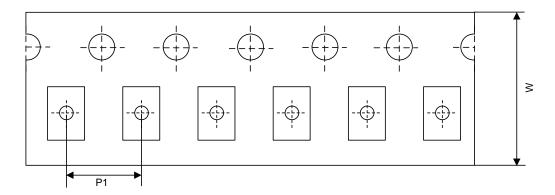
Tape and Reel Information

RD	Reel Dimensions	13 inch
W	Overall width of the carrier tape	12 mm
P1	Pitch between successive cavity centers	8 mm

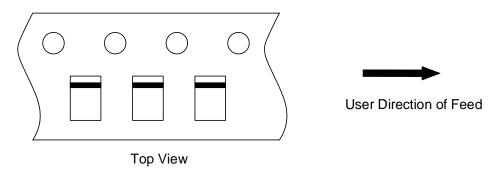
Reel Dimensions Schematic diagram



Tape Dimensions Schematic diagram



Quadrant Assignments for PIN1 Orientation in tape



Contact Information

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WAYON website: http://www.way-on.com

For additional information, please contact your local Sales Representative.

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Product Specification Statement

The product specification aims to provide users with a reference regarding various product parameters, performance, and usage. It presents certain aspects of the product's performance in graphical form and is intended solely for users to select product and make product comparisons, enabling users to better understand and evaluate the characteristics and advantages of the product. It does not constitute any commitment, warranty, or guarantee.

The product parameters described in the product specification are numerical values, characteristics, and functions obtained through actual testing or theoretical calculations of the product in an independent or ideal state. Due to the complexity of product applications and variations in test conditions and equipment, there may be slight fluctuations in parameter test values. WAYON shall not guarantee that the actual performance of the product when installed in the customer's system or equipment will be entirely consistent with the product specification, especially concerning dynamic parameters. It is recommended that users consult with professionals for product selection and system design. Users should also thoroughly validate and assess whether the actual parameters and performance when installed in their respective systems or equipment meet their requirements or expectations. Additionally, users should exercise caution in verifying product compatibility issues, and WAYON assumes no responsibility for the application of the product.

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