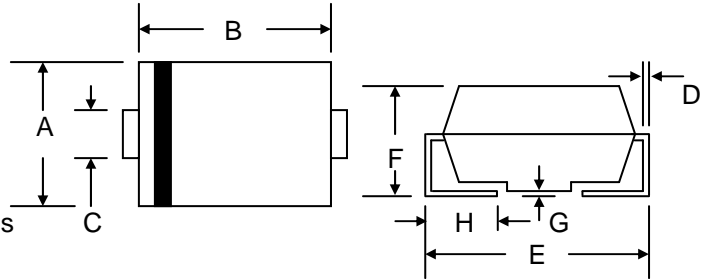


Features

- Low Forward Voltage
- Epitaxial Construction with Oxide Passivation
- Guard Ring for Transient and ESD Protection
- Surge Overload Rating to 30A Peak
- Low Power Loss
- Fast Switching
- Ideally Suited for Use in High Frequency SMPS, Inverters and As Free Wheeling Diodes



Mechanical Data

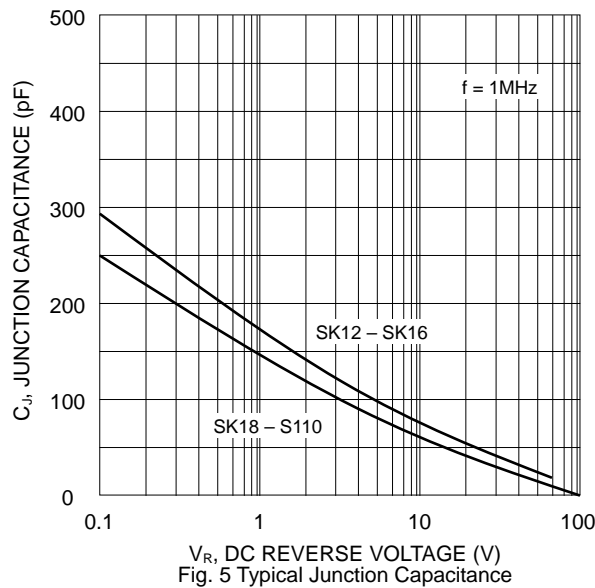
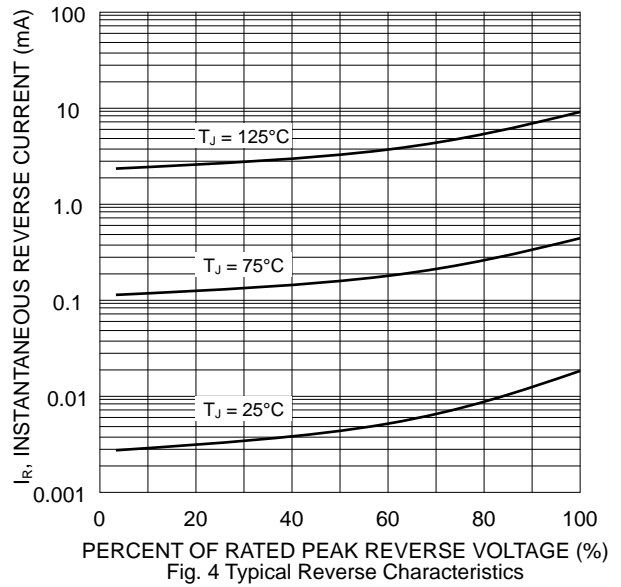
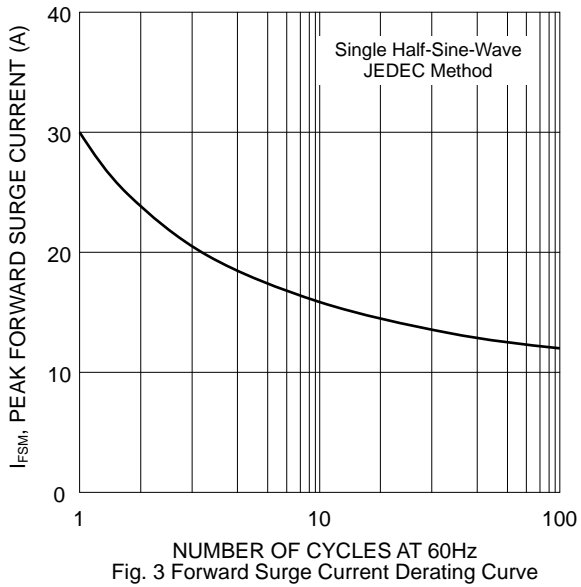
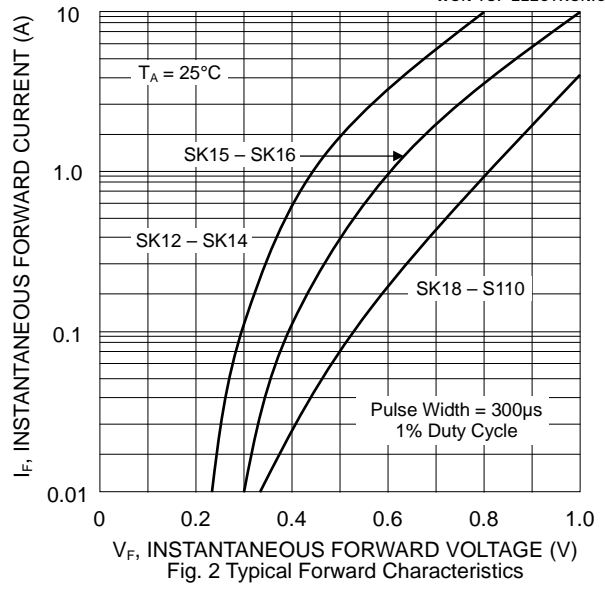
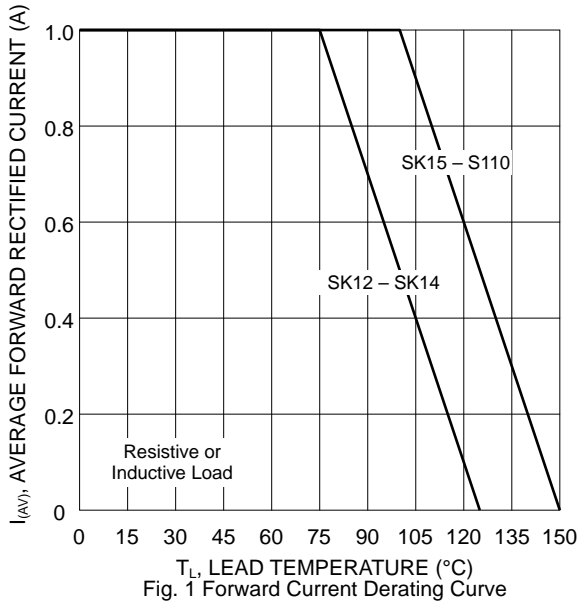
- Case: SMB/DO-214AA, Molded Plastic
- Terminals: Solder Plated, Solderable per MIL-STD-750, Method 2026
- Polarity: Cathode Band or Cathode Notch
- Marking: Type Number
- Weight: 0.093 grams (approx.)
- **Lead Free: For RoHS / Lead Free Version, Add "-LF" Suffix to Part Number, See Page 4**

SMB/DO-214AA		
Dim	Min	Max
A	3.30	3.94
B	4.06	4.70
C	1.91	2.11
D	0.152	0.305
E	5.08	5.59
F	2.13	2.44
G	0.051	0.203
H	0.76	1.27
All Dimensions in mm		

Maximum Ratings @ $T_A=25^{\circ}\text{C}$ unless otherwise specified

Characteristic	Symbol	SK12	SK13	SK14	SK15	SK16	SK18	SK19	S110	Unit	
Peak Repetitive Reverse Voltage	V_{RRM}										
Working Peak Reverse Voltage	V_{RWM}	20	30	40	50	60	80	90	100	V	
DC Blocking Voltage	V_R										
RMS Reverse Voltage	$V_{R(RMS)}$	14	21	28	35	42	56	63	70	V	
Average Rectified Output Current (Note 1)	I_O	1.0								A	
Non-Repetitive Peak Forward Surge Current 8.3ms Single Half Sine-Wave Superimposed on Rated Load (JEDEC Method)	I_{FSM}	30								A	
Forward Voltage @ $I_F = 1.0\text{A}$	V_{FM}	0.50			0.70		0.85			V	
Peak Reverse Current @ $T_J = 25^{\circ}\text{C}$ At Rated DC Blocking Voltage @ $T_J = 100^{\circ}\text{C}$	I_{RM}					0.5		10			mA
Typical Junction Capacitance (Note 2)	C_J	110					80				pF
Thermal Resistance, Junction to Ambient (Note 1)	R_{JA}	80								°C/W	
Thermal Resistance, Junction to Lead (Note 1)	R_{JL}	25									
Operating Temperature Range	T_J	-55 to +125				-55 to +150					°C
Storage Temperature Range	T_{STG}	-55 to +150									°C

Note: 1. Mounted on FR-4 PCB with 8.0 x 8.0mm copper pads.
2. Measured at 1.0 MHz and applied reverse voltage of 4.0V D.C.

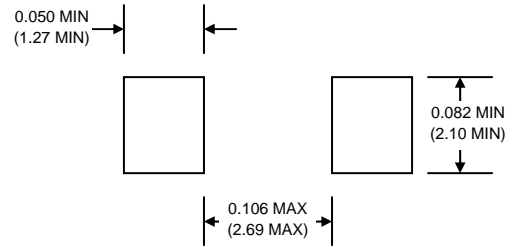


MARKING INFORMATION



Cathode = Polarity Band
 SK1x = Device Number Except S110
 x = 2, 3, 4, 5, 6, 8 or 9

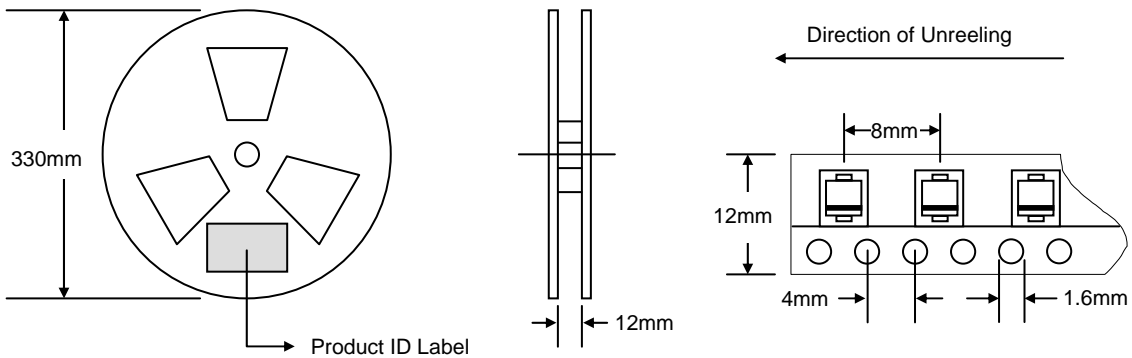
RECOMMENDED FOOTPRINT



inches(mm)

PACKAGING INFORMATION

TAPE & REEL




Reel Diameter (mm)	Quantity (PCS)	Inner Box Size L x W x H (mm)	Quantity (PCS)	Carton Size L x W x H (mm)	Quantity (PCS)	Approx. Gross Weight (KG)
330	3,000	340 x 337 x 45	6,000	370 x 370 x 420	48,000	14.0

Note: 1. Paper reel, white or gray color.
 2. Components are packed in accordance with EIA standard 481-1 and 481-2.

ORDERING INFORMATION

Product No.	Package Type	Shipping Quantity
SK12-T3	SMB	3000/Tape & Reel
SK13-T3	SMB	3000/Tape & Reel
SK14-T3	SMB	3000/Tape & Reel
SK15-T3	SMB	3000/Tape & Reel
SK16-T3	SMB	3000/Tape & Reel
SK18-T3	SMB	3000/Tape & Reel
SK19-T3	SMB	3000/Tape & Reel
S110-T3	SMB	3000/Tape & Reel

- Shipping quantity given is for minimum packing quantity only. For minimum order quantity, please consult the Sales Department.
- To order RoHS / Lead Free version (with Lead Free finish), add "-LF" suffix to part number above. For example, SK12-T3-LF.

WON-TOP ELECTRONICS and  are registered trademarks of Won-Top Electronics Co., Ltd (WTE). WTE has checked all information carefully and believes it to be correct and accurate. However, WTE cannot assume any responsibility for inaccuracies. Furthermore, this information does not give the purchaser of semiconductor devices any license under patent rights to manufacturer. WTE reserves the right to change any or all information herein without further notice.

WARNING: DO NOT USE IN LIFE SUPPORT EQUIPMENT. WTE power semiconductor products are not authorized for use as critical components in life support devices or systems without the express written approval.

Won-Top Electronics Co., Ltd.
 No. 44 Yu Kang North 3rd Road,
 Chine Chen Dist., Kaohsiung 806, Taiwan
Phone: 886-7-822-5408 or 886-7-822-5410
Fax: 886-7-822-5417
Email: sales@wontop.com
Internet: http://www.wontop.com

We power your everyday.