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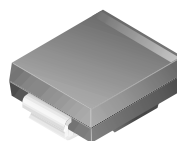
[MBRS320](#)

For any questions, you can email us directly:

[sales@integrated-circuit.com](mailto:sales@integrated-circuit.com)



## MBRS320



**SMC (D0-214AB)**  
 Color Band Denotes Cathode  
 Mark: B32

### Features

- Compact surface mount with J-bend leads (SMC)
- 3.0 Watt Power Dissipation package
- 3.0 Ampere, forward voltage less than 500 mV

### Schottky Rectifier

#### Absolute Maximum Ratings\* T<sub>A</sub> = 25°C unless otherwise noted

Symbol	Parameter	Value	Units
V <sub>RRM</sub>	Maximum Repetitive Reverse Voltage	20	V
I <sub>F(AV)</sub>	Average Rectified Forward Current @ T <sub>L</sub> = 100°C T <sub>L</sub> = 90°C	3.0 4.0	A A
I <sub>FSM</sub>	Non-repetitive Peak Forward Surge Current (Half wave, single phase, 60 Hz)	80	A
T <sub>stg</sub>	Storage Temperature Range	-65 to +150	°C
T <sub>j</sub>	Operating Junction Temperature	-65 to +125	°C

\*These ratings are limiting values above which the serviceability of any semiconductor device may be impaired.

#### Thermal Characteristics

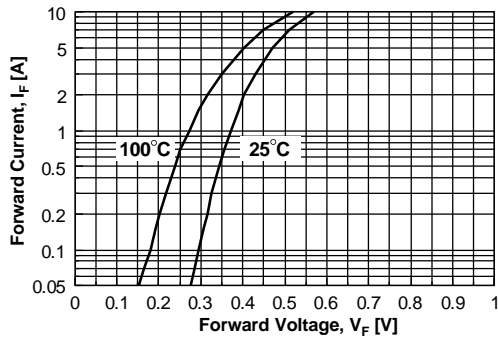
Symbol	Parameter	Value	Units
R <sub>θJL</sub>	Thermal Resistance, Junction to Lead	11	°C/W

#### Electrical Characteristics T<sub>A</sub> = 25°C unless otherwise noted

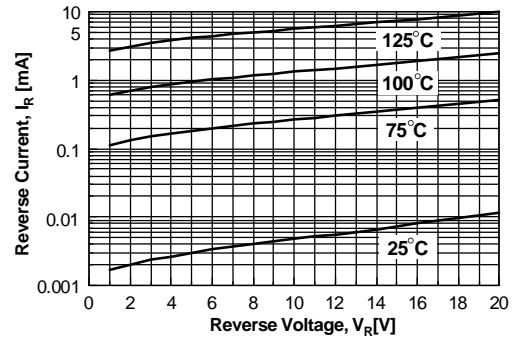
Symbol	Parameter	Value	Units
V <sub>F</sub>	Forward Voltage @ I <sub>F</sub> = 3.0A,	500	mV
I <sub>R</sub>	Reverse Current @ V <sub>R</sub> = 20 V, V <sub>R</sub> = 20 V, T <sub>A</sub> = 100 °C	2.0 20	mA mA

**Schottky Rectifier**  
(continued)

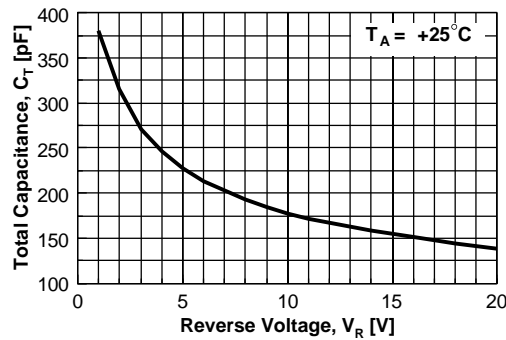
**Typical Characteristics**



**Figure 1. Forward Voltage Characteristics**



**Figure 2. Reverse Current vs Reverse Voltage**



**Figure 3. Total Capacitance**

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