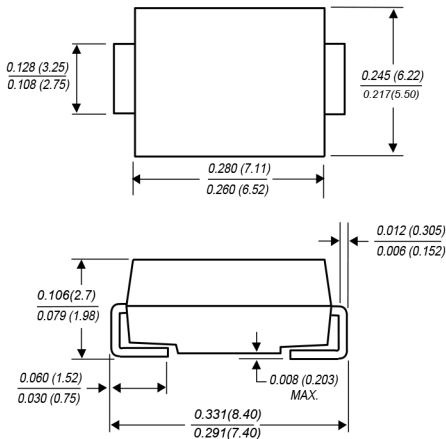


## SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER

Reverse Voltage - 20 to 200 Volts Forward Current - 3.0 Amperes

### DO-214AB



Dimensions in inches and (millimeters)

### FEATURES

- ◆ The plastic package carries Underwriters Laboratory Flammability Classification 94V-0
- ◆ For surface mounted applications
- ◆ Metal silicon junction, majority carrier conduction
- ◆ Low power loss, high efficiency
- ◆ Built-in strain relief, ideal for automated placement
- ◆ High forward surge current capability
- ◆ High temperature soldering guaranteed: 250°C/10 seconds at terminals

### MECHANICAL DATA

**Case:** JEDEC DO-214AB molded plastic body  
**Terminals:** leads solderable per MIL-STD-750, Method 2026  
**Polarity:** Color band denotes cathode end  
**Mounting Position:** Any  
**Weight:** 0.22 grams

### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.

Single phase half-wave 60Hz, resistive or inductive load, for capacitive load current derate by 20%.

|                                                                                                                 | SYMBOLS           | SS32C       | SS33C | SS34C | SS35C       | SS36C | SS38C | SS310C | SS315C | SS320C | UNITS |
|-----------------------------------------------------------------------------------------------------------------|-------------------|-------------|-------|-------|-------------|-------|-------|--------|--------|--------|-------|
| Maximum repetitive peak reverse voltage                                                                         | V <sub>RRM</sub>  | 20          | 30    | 40    | 50          | 60    | 80    | 100    | 150    | 200    | VOLTS |
| Maximum RMS voltage                                                                                             | V <sub>RMS</sub>  | 14          | 21    | 28    | 35          | 42    | 56    | 70     | 105    | 140    | VOLTS |
| Maximum DC blocking voltage                                                                                     | V <sub>DC</sub>   | 20          | 30    | 40    | 50          | 60    | 80    | 100    | 150    | 200    | VOLTS |
| Maximum average forward rectified current at T <sub>L</sub> (see fig.1)                                         | I <sub>(AV)</sub> | 3.0         |       |       |             |       |       |        |        |        | Amps  |
| Peak forward surge current<br>8.3ms single half sine-wave superimposed on rated load (JEDEC Method)             | I <sub>FSM</sub>  | 70.0        |       |       |             |       |       |        |        |        | Amps  |
| Maximum instantaneous forward voltage at 3.0A                                                                   | V <sub>F</sub>    | 0.55        |       |       | 0.70        |       | 0.85  |        | 0.95   |        | Volts |
| Maximum DC reverse current      T <sub>A</sub> =25°C<br>at rated DC blocking voltage      T <sub>A</sub> =100°C | I <sub>R</sub>    | 0.5         |       |       |             |       |       |        | 1.0    |        | mA    |
|                                                                                                                 |                   | 20          |       |       | 10          |       |       |        |        |        |       |
| Typical junction capacitance (NOTE 1)                                                                           | C <sub>J</sub>    | 500         |       |       | 300         |       |       |        |        |        | pF    |
| Typical thermal resistance (NOTE 2)                                                                             | R <sub>θJA</sub>  | 55.0        |       |       |             |       |       |        | 62.0   |        | °C/W  |
| Operating junction temperature range                                                                            | T <sub>J</sub>    | -65 to +125 |       |       | -65 to +150 |       |       |        |        |        | °C    |
| Storage temperature range                                                                                       | T <sub>STG</sub>  | -65 to +150 |       |       |             |       |       |        |        |        | °C    |

**Note:** 1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.

2. P.C.B. mounted with 0.2x0.2" (5.0x5.0mm) copper pad areas

## RATINGS AND CHARACTERISTIC CURVES

