

### FEATURES

- \* Ideal for surface mount applications
- \* Easy pick and place
- \* Built-in strain relief
- \* Low forward voltage drop

### MECHANICAL DATA

- \* Case: Molded plastic
- \* Epoxy: UL 94V-0 rate flame retardant
- \* Metallurgically bonded construction
- \* Polarity: Color band denotes cathode end
- \* Mounting position: Any
- \* Weight: 0.21 grams

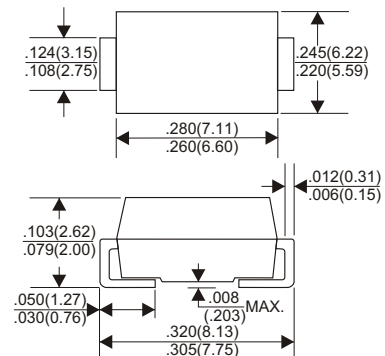
### VOLTAGE RANGE

20 to 100 Volts

### CURRENT

3.0 Ampere

#### DO-214AB(SMC)



Dimensions in inches and (millimeters)

## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating 25°C ambient temperature unless otherwise specified.  
Single phase half wave, 60Hz, resistive or inductive load.  
For capacitive load, derate current by 20%.

| TYPE NUMBER  | SS32       | SS33 | SS34 | SS35       | SS36       | SS38 | SS39 | SS310 | UNITS |      |
|--|------------|------|------|------------|------------|------|------|-------|-------|------|
| Maximum Recurrent Peak Reverse Voltage   | 20         | 30   | 40   | 50         | 60         | 80   | 90   | 100   | V     |      |
| Maximum RMS Voltage  | 14         | 21   | 28   | 35         | 42         | 56   | 63   | 70    | V     |      |
| Maximum DC Blocking Voltage  | 20         | 30   | 40   | 50         | 60         | 80   | 90   | 100   | V     |      |
| Maximum Average Forward Rectified Current  |            |      |      |            |            |      |      |       |       |      |
| At T <sub>L</sub> =100°C   |            |      |      |            |            |      |      |       | 3.0   | A    |
| Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method) |            |      |      |            |            |      |      |       | 80    | A    |
| Maximum Instantaneous Forward Voltage at 3.0A  | 0.55       |      |      |            | 0.70       |      | 0.85 |       | V     |      |
| Maximum DC Reverse Current   |            |      |      |            | 0.2        |      |      |       |       | mA   |
| at Rated DC Blocking Voltage   |            |      |      |            | 20         |      |      |       |       | mA   |
| Typical Junction Capacitance (Note1)   |            |      |      |            | 300        |      |      |       |       | pF   |
| Typical Thermal Resistance R <sub>JL</sub> (Note 2)  |            |      |      |            | 10         |      |      |       |       | °C/W |
| Operating Temperature Range T <sub>J</sub>   | -65 — +125 |      |      | -65 — +150 |            |      |      |       | °C    |      |
| Storage Temperature Range T <sub>STG</sub>   |            |      |      |            | -65 — +150 |      |      |       | °C    |      |

#### NOTES:

1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.
2. Thermal Resistance Junction to Lead.

## RATING AND CHARACTERISTIC CURVES (SS32 THRU SS310)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

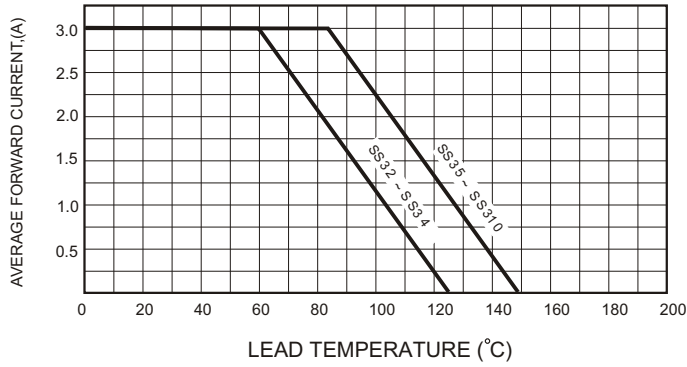


FIG.2-TYPICAL FORWARD CHARACTERISTICS

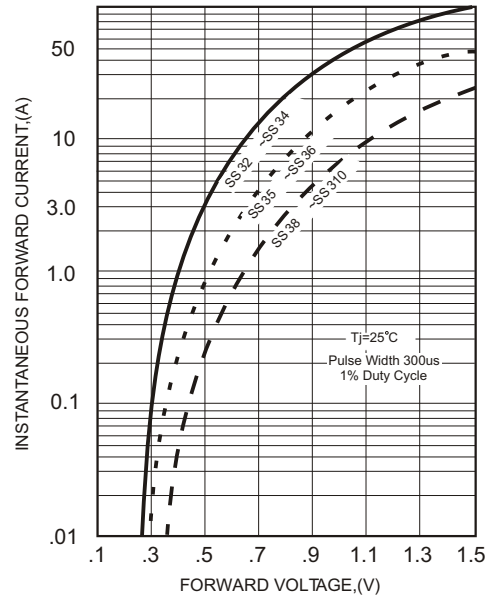


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

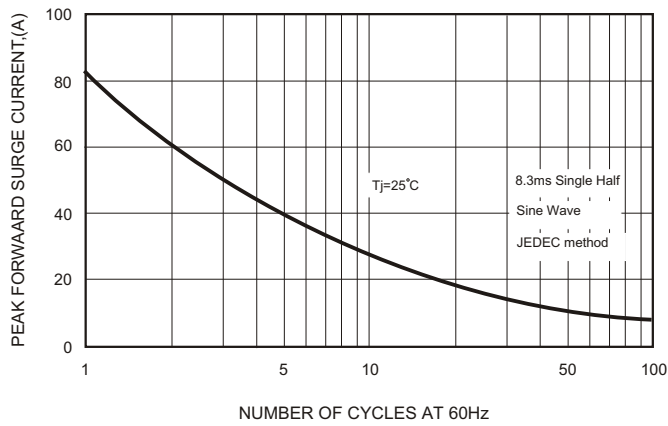


FIG.4-TYPICAL JUNCTION CAPACITANCE

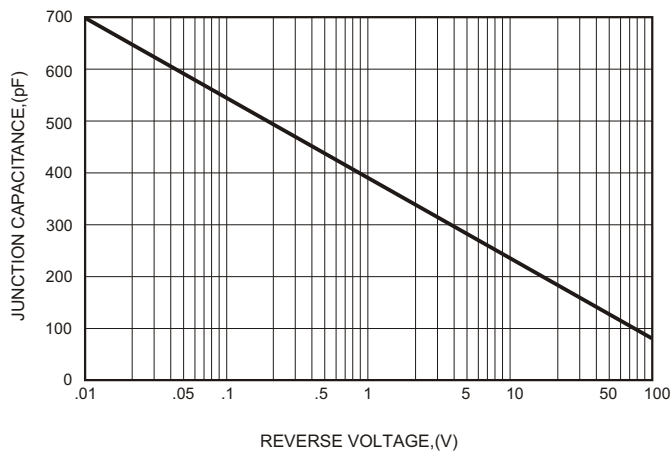


FIG.5 - TYPICAL REVERSE CHARACTERISTICS

