



## Features

- Average Forward Current:  $I_{F(AV)}=3A$
- Polarity: Color band denotes cathode



SMAF

## Package Marking and Ordering Information

| Product ID      | Pack | Marking | Qty(PCS) |
|-----------------|------|---------|----------|
| BX310F_R1_00001 | SMAF | SS310F  | 3000     |



## Maximum Ratings (Ta=25°C unless otherwise noted)

| Parameter                                                                                               | Symbols         | Limit      | Units         |
|---------------------------------------------------------------------------------------------------------|-----------------|------------|---------------|
| Maximum Repetitive Peak Reverse Voltage                                                                 | $V_{RRM}$       | 100        | V             |
| Maximum RMS voltage                                                                                     | $V_{RMS}$       | 70         | V             |
| Maximum DC Blocking Voltage                                                                             | $V_{DC}$        | 100        | V             |
| Maximum Average Forward Rectified Current                                                               | $I_{F(AV)}$     | 3.0        | A             |
| Peak Forward Surge Current, 8.3ms<br>Single Half Sine-wave Superimposed on<br>Rated Load (JEDEC method) | $I_{FSM}$       | 70         | A             |
| Max Instantaneous Forward Voltage at 3 A                                                                | $V_F$           | 0.85       | V             |
| Maximum DC Reverse Current at $T_a = 25^{\circ}C$<br>Rated DC Reverse Voltage $T_a = 100^{\circ}C$      | $I_R$           | 0.3<br>5   | mA            |
| Typical Junction Capacitance <sup>1)</sup>                                                              | $C_j$           | 160        | pF            |
| Typical Thermal Resistance <sup>2)</sup>                                                                | $R_{\theta JA}$ | 40         | $^{\circ}C/W$ |
| Operating Junction Temperature Range                                                                    | $T_j$           | -55 ~ +125 | $^{\circ}C$   |
| Storage Temperature Range                                                                               | $T_{stg}$       | -55 ~ +150 | $^{\circ}C$   |

1) Measured at 1MHz and applied reverse voltage of 4 V D.C.

2) P.C.B. mounted with 0.2 X 0.2" (5 X 5 mm) copper pad areas.



## Typical Characteristics

Fig.1 Forward Current Derating Curve

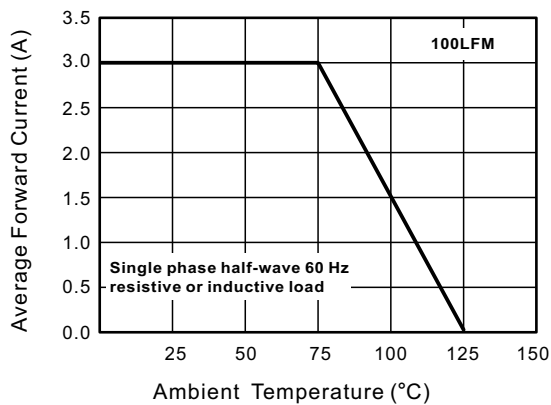


Fig.2 Typical Reverse Characteristics

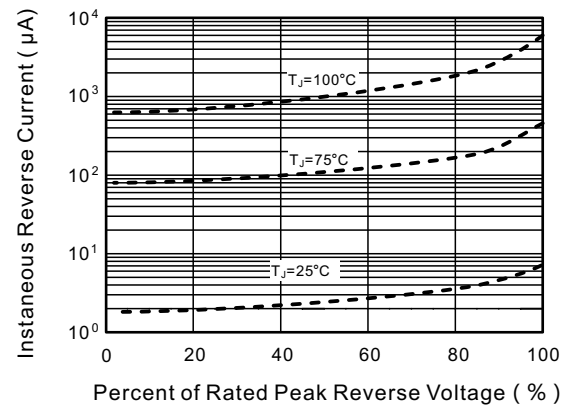


Fig.3 Typical Forward Characteristic

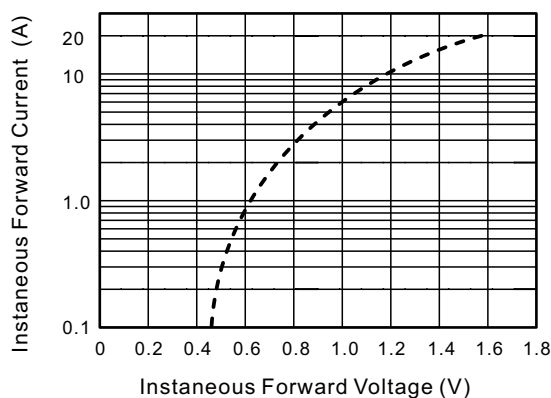


Fig.4 Typical Junction Capacitance

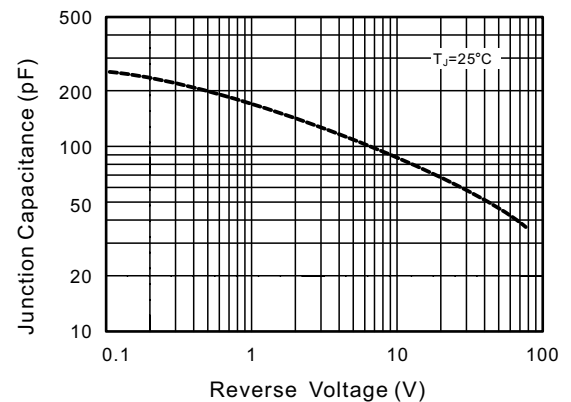


Fig.5 Maximum Non-Repetitive Peak Forward Surge Current

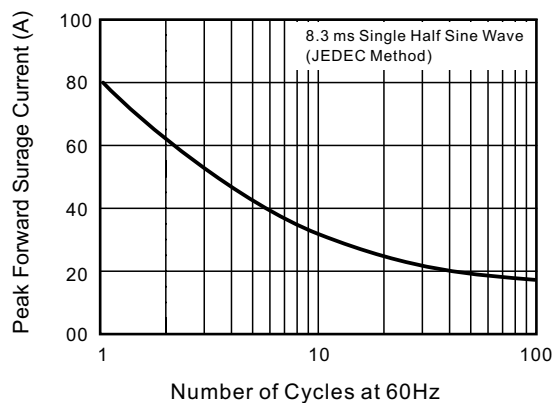
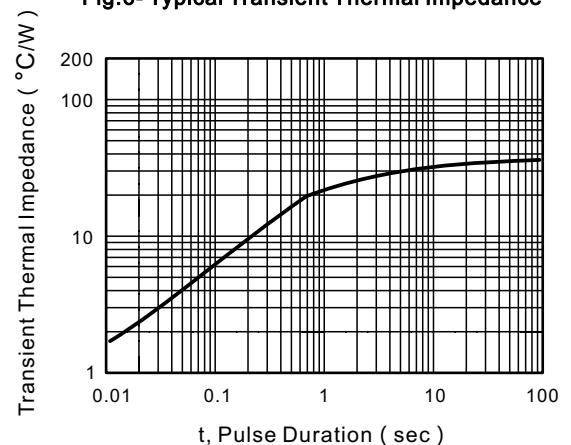


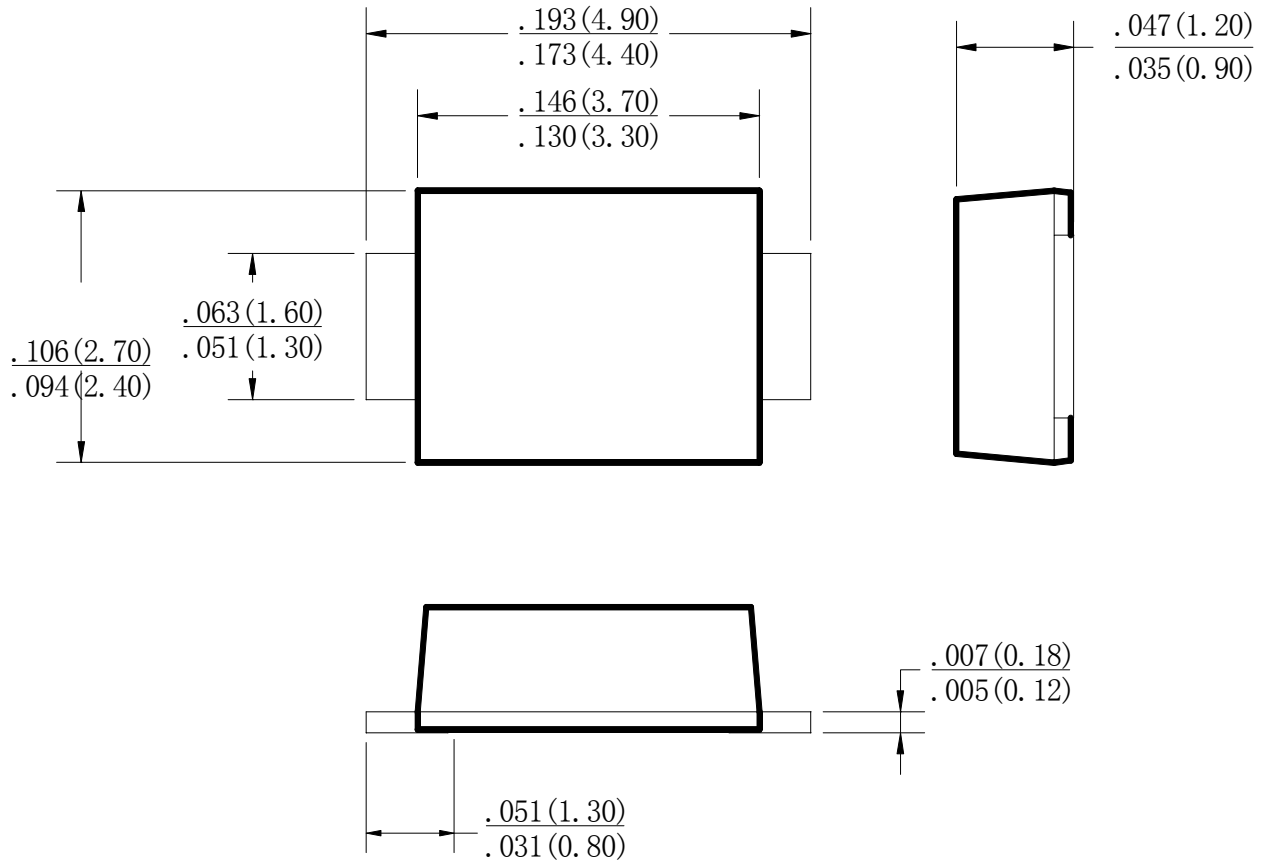
Fig.6- Typical Transient Thermal Impedance





## Package Outline Dimensions

### SMAF



Dimensions in inches and (millimeters)



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