

SR10200



10 AMP SCHOTTKY BARRIER RECTIFIERS



FEATURES

- * Low forward voltage drop
- * High current capability
- * High reliability
- * High surge current capability
- * Epitaxial construction

MECHANICAL DATA

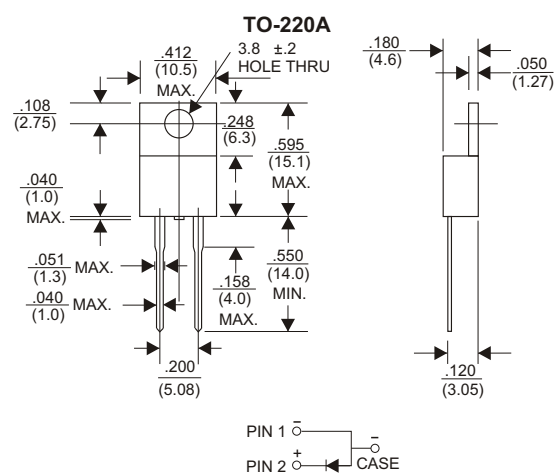
- * Case: Molded plastic
- * Epoxy: UL 94V-0 rate flame retardant
- * Lead: Lead solderable per MIL-STD-202, method 208 guaranteed
- * Polarity: As Marked
- * Mounting position: Any
- * Weight: 1.90 grams

VOLTAGE RANGE

200 Volts

CURRENT

10 Ampere



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 | SR10200 | UNITS |
|--|------------|-------|
| Maximum Recurrent Peak Reverse Voltage | 200 | V |
| Maximum RMS Voltage | 140 | V |
| Maximum DC Blocking Voltage | 200 | V |
| Maximum Average Forward Rectified Current | | |
| .375"(9.5mm) Lead Length at Tc=105°C | 10 | A |
| Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method) | 150 | A |
| Maximum Instantaneous Forward Voltage at 5A | 0.92 | V |
| Maximum DC Reverse Current Ta=25°C | 0.2 | mA |
| at Rated DC Blocking Voltage Ta=125°C | 5.0 | mA |
| Typical Junction Capacitance (Note1) | 300 | pF |
| Typical Thermal Resistance R JA (Note 2) | 3.0 | °C/W |
| Operating Temperature Range Tj | -55 — +150 | °C |
| Storage Temperature Range Tstg | -55 — +175 | °C |

NOTES:

1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.
2. Thermal Resistance Junction to Ambient Vertical PC Board Mounting 0.5"(12.7mm) Lead Length.

RATING AND CHARACTERISTIC CURVES (SR10200)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

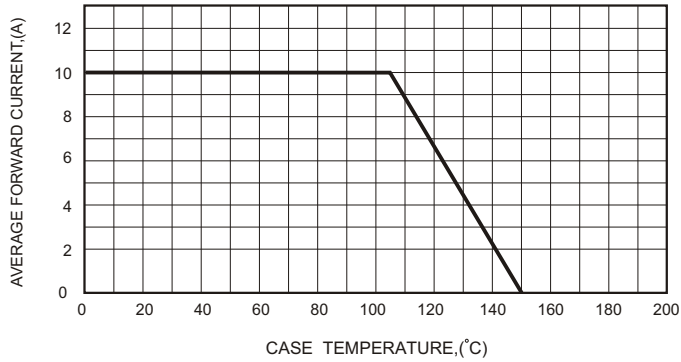


FIG.2-TYPICAL FORWARD CHARACTERISTICS

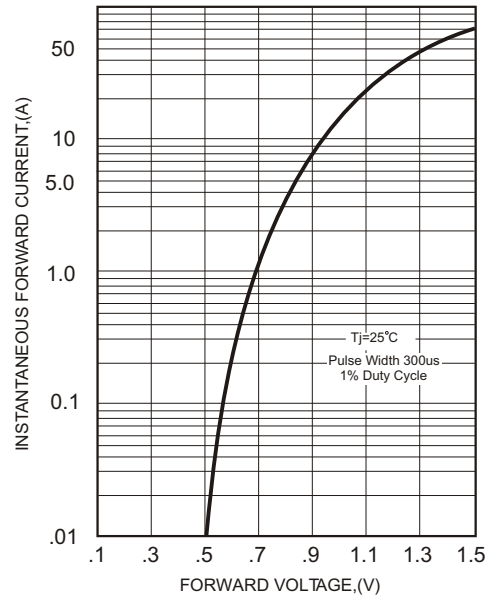


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

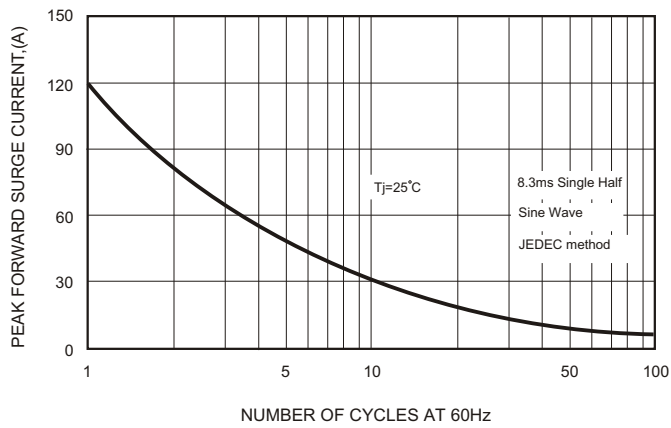


FIG.4-TYPICAL JUNCTION CAPACITANCE

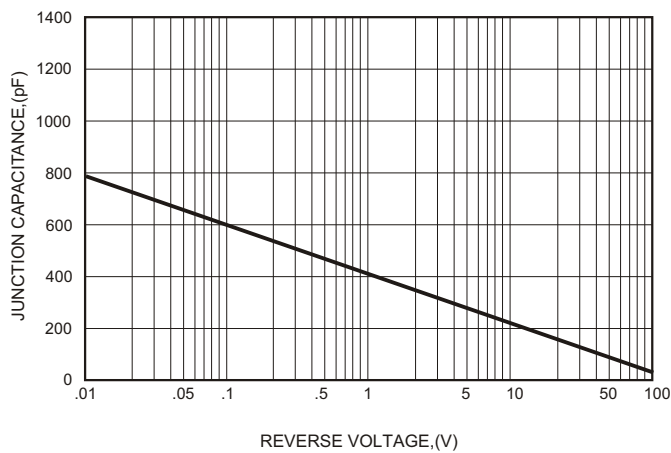


FIG.5 - TYPICAL REVERSE CHARACTERISTICS

