

**SINGLE-PHASE GLASS PASSIVATED
 SILICON BRIDGE RECTIFIER**

VOLTAGE RANGE 50 to 1000 Volts CURRENT 2.0 Amperes

FEATURES

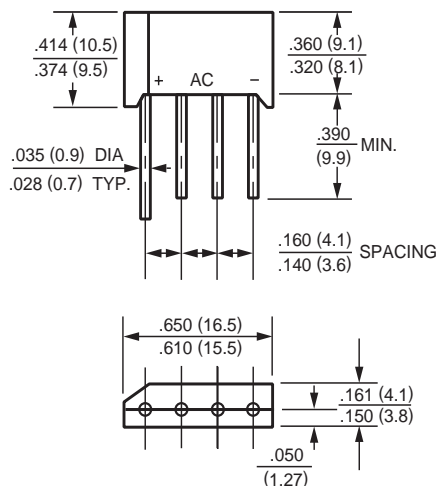
- * Low cost
- * Low leakage
- * Low forward voltage
- * Mounting position: Any
- * Weight: 1.26 grams

MECHANICAL DATA

- * UL listed the recognized component directory, file #E94233
- * Epoxy: Device has UL flammability classification 94V-O



RS-1



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

MAXIMUM RATINGS (At TA = 25°C unless otherwise noted)

| RATINGS | SYMBOL | MDA200G | MDA201G | MDA202G | MDA204G | MDA206G | MDA208G | MDA210G | UNITS | |
|---|------------------|--------------|---------|---------|---------|---------|---------|---------|-------|------|
| Maximum Recurrent Peak Reverse Voltage | V _{RRM} | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | Volts | |
| Maximum RMS Bridge Input Voltage | V _{RMS} | 35 | 70 | 140 | 280 | 420 | 560 | 700 | Volts | |
| Maximum DC Blocking Voltage | V _{DC} | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | Volts | |
| Maximum Average Forward Output Current at TA = 50°C | I _O | 2.0 | | | | | | | | Amps |
| Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC method) | I _{FSM} | 50 | | | | | | | | Amps |
| Typical Thermal Resistance from junction to case | R _{θJC} | 13 | | | | | | | | °C/W |
| Typical Thermal Resistance from junction to ambient | R _{θJA} | 40 | | | | | | | | |
| Operating Temperature Range | T _J | -55 to + 150 | | | | | | | | °C |
| Storage Temperature Range | T _{STG} | -55 to + 150 | | | | | | | | °C |

ELECTRICAL CHARACTERISTICS (At TA = 25°C unless otherwise noted)

| CHARACTERISTICS | SYMBOL | MDA200G | MDA201G | MDA202G | MDA204G | MDA206G | MDA208G | MDA210G | UNITS | |
|--|----------------|---------|---------|---------|---------|---------|---------|---------|-------|-------|
| Maximum Forward Voltage Drop per Bridge Element at 3.14A DC | V _F | 1.1 | | | | | | | | Volts |
| Maximum Reverse Current at Rated DC Blocking Voltage per element | @ TA = 25°C | 5.0 | | | | | | | | uAmps |
| | @ TA = 100°C | 1 | | | | | | | | mAmps |

Note: "Fully ROHS compliant", "100% Sn plating (Pb-free)."

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RATING AND CHARACTERISTIC CURVES (MDA200G THRU MDA210G)

FIG. 1 - MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

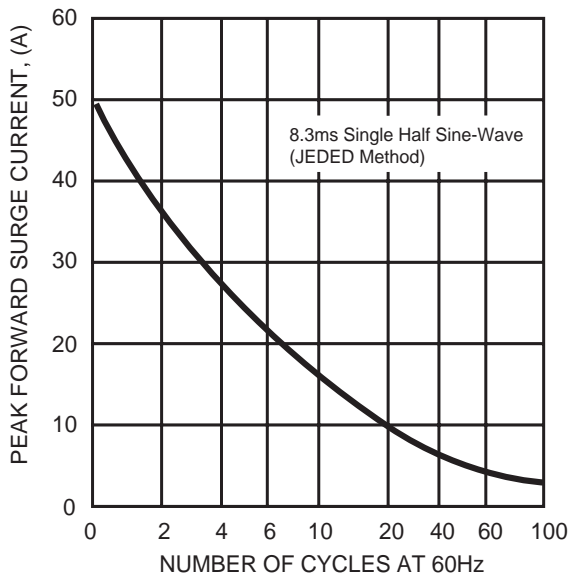


FIG. 2 - TYPICAL FORWARD CURRENT DERATING CURVE

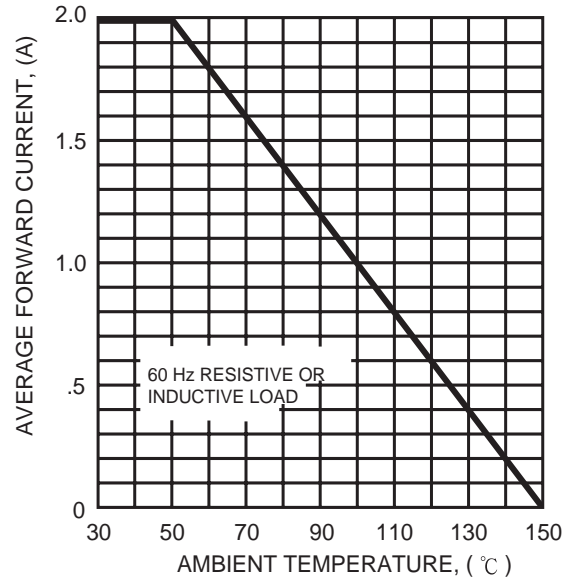


FIG. 3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

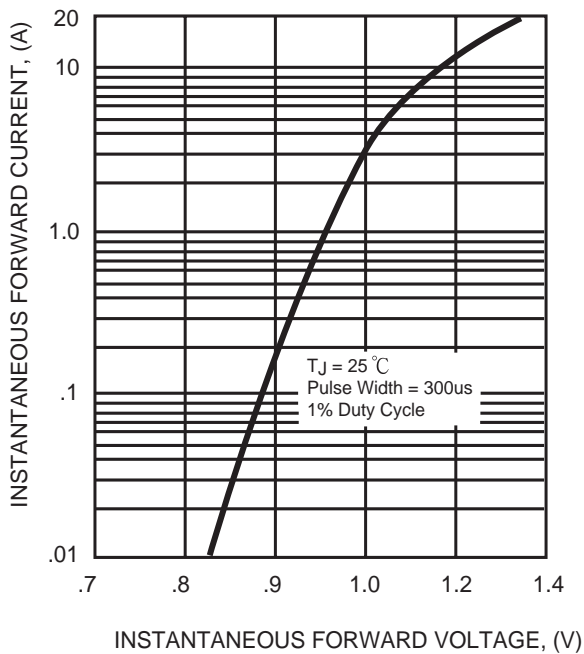


FIG. 4 - TYPICAL REVERSE CHARACTERISTICS

