



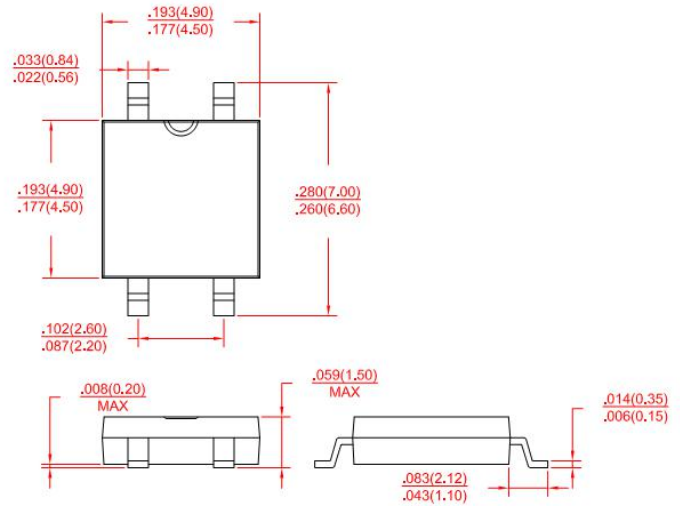
MINI-DIP

FEATURES

- Glass passivated chip junction
- Ideal for surface mounted applications
- Low leakage
- High forward surge current capability
- High temperature soldering guaranteed:
260°C/10 seconds at terminals

MECHANICAL DATA

- Case: Molded plastic body
- Epoxy: UL94V-0 rate flame retardant
- Polarity: Molded on body
- LeadP: Plated terminals solderable per MIL-STD-202E method 208C
- Weight: 0.003 ounce, 0.1 gram



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

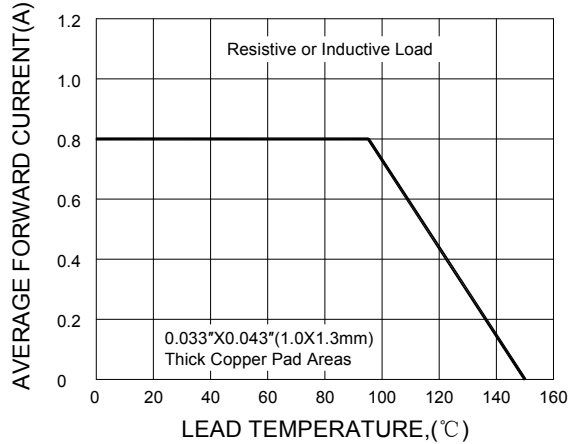
- Ratings at 25°C ambient temperature unless otherwise specified
- Single Phase, half wave, 60Hz, resistive or inductive load
- For capacitive load derate current by 20%

| TYPE NUMBER | | SYMBOLS | MB01F | MB02F | MB03F | MB04F | MB06F | MB08F | MB10F | UNIT |
|---|-----------------------|----------------------------------|---------------|-------|-------|-------|-------|-------|-------|------------------|
| Maximum Reverse Peak Repetitive Voltage | | V _{RRM} | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | Volts |
| Maximum RMS 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 Rectified Output Current, 0.06”(1.5mm) lead length at T _A =40°C | | I _(AV) | 0.8 | | | | | | | Amps |
| Peak Forward Surge Current 8.3ms single half sine wave superimposed on rated load (JEDEC Method) | | I _{FSM} | 25 | | | | | | | Amps |
| Rating for Fusing (t < 8.3ms) | | I ² t | 3.7 | | | | | | | A ² s |
| Maximum Instantaneous Forward Voltage drop Per Bridge element 0.8A | | V _F | 1.1 | | | | | | | Volts |
| Maximum Reverse Current at rated DC blocking voltage per element | T _A =25°C | I _R | 5 | | | | | | | μAmps |
| | T _A =125°C | | 120 | | | | | | | |
| Typical Junction Capacitance (NOTE 1) | | C _J | 13 | | | | | | | pF |
| Typical Thermal Resistance (NOTE 2) | | R _{ΘJA} | 80 | | | | | | | °C/W |
| Operating and Storage Temperature Range | | T _J ,T _{STG} | (-55 to +150) | | | | | | | °C |

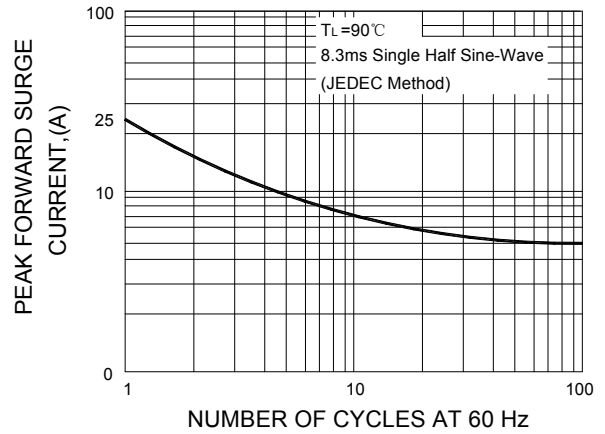
Notes: 1. Measured at 1.0MHz and applied reverse voltage of 4.0 Volts.
2. Unit mounted on P.C.B. with 0.033"x0.043" (1.00mmx1.30mm) copper pads.



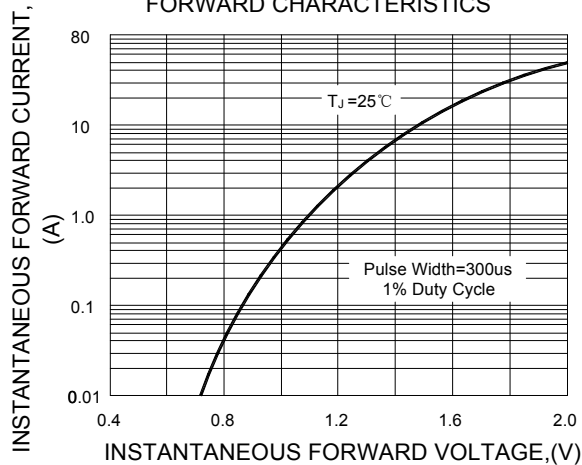
F1G.1-FORWARD CURRENT
DERATING CURVE



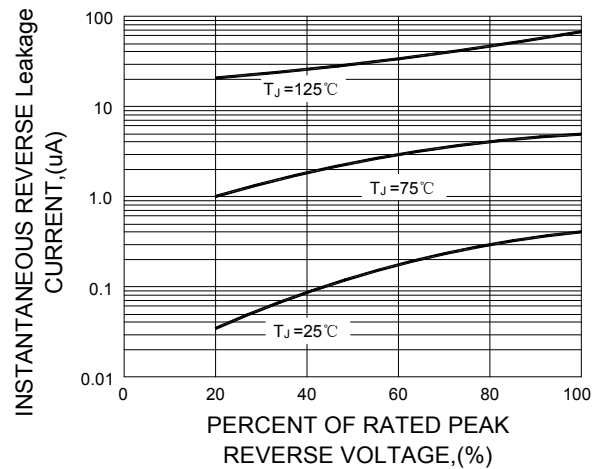
F1G.2-MAXIMUM NON-REPETITIVE PEAK
FORWARD SURGE CURRENT



F1G.3-TYPICAL INSTANTANEOUS
FORWARD CHARACTERISTICS



F1G.4-TYPICAL REVERSE
CHARACTERISTICS



F1G.5-TYPICAL JUNCTION CAPACITANCE

