



# GBU8005 THRU GBU810

Reverse Voltage - 50 to 1000 Volts Forward Current - 8.0 Amperes

## GLASS PASSIVATED BRIDGE RECTIFIERS

### Features

- ◆ Surge overload rating -135 amperes peak
- ◆ Ideal for printed circuit board
- ◆ Reliable low cost construction utilizing molded plastic technique
- ◆ Plastic material has U/L lammability classification 94V-0

### Mechanical Data

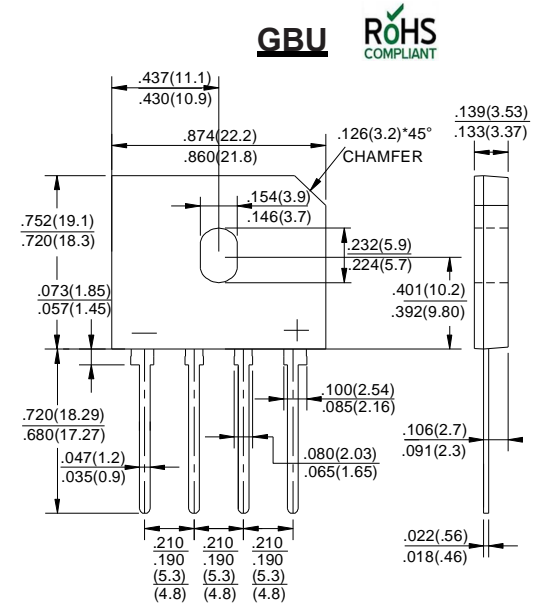
**Case** : JEDEC GBU Molded plastic body

**Terminals** : Solder plated, solderable per MIL-STD-750, Method 2026

**Polarity** : Polarity symbol marking on body

**Mounting Position** : Any

**Weight** : 0.00XX ounce, 0.0XX grams



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 current derate by 20%.

| Parameter  | SYMBOLS         | GBU 8005           | GBU 801           | GBU 802           | GBU 804           | GBU 806           | GBU 808           | GBU 810           | UNITS                     |
|--|-----------------|--------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|---------------------------|
|  |                 | MDD<br>GBU<br>8005 | MDD<br>GBU<br>801 | MDD<br>GBU<br>802 | MDD<br>GBU<br>804 | MDD<br>GBU<br>806 | MDD<br>GBU<br>808 | MDD<br>GBU<br>810 |                           |
| Maximum repetitive peak reverse voltage  | $V_{RRM}$       | 50                 | 100               | 200               | 400               | 600               | 800               | 1000              | V                         |
| Maximum RMS voltage  | $V_{RMS}$       | 35                 | 70                | 140               | 280               | 420               | 560               | 700               | V                         |
| Maximum DC blocking voltage  | $V_{DC}$        | 50                 | 100               | 200               | 400               | 600               | 800               | 1000              | V                         |
| Maximum average forward (with heatsink NOTE 2)<br>Rectified current @ $T_c=100^\circ\text{C}$ (without heatsink) | $I_{(AV)}$      | 8.0                |                   |                   |                   |                   |                   |                   | A                         |
| Peak forward surge current<br>8.3ms single half sine-wave superimposed on<br>rated load (JEDEC Method)           | $I_{FSM}$       | 200.0              |                   |                   |                   |                   |                   |                   | A                         |
| Rating for Fusing ( $t < 8.3\text{ms}$ )   | $I^2t$          | 166                |                   |                   |                   |                   |                   |                   | $\text{A}^2\text{s}$      |
| Maximum forward voltage at 4.0A DC   | $V_F$           | 1.0                |                   |                   |                   |                   |                   |                   | V                         |
| Maximum DC reverse current<br>at rated DC blocking voltage<br>$T_A=25^\circ\text{C}$<br>$T_A=125^\circ\text{C}$  | $I_R$           | 10                 |                   |                   |                   |                   |                   |                   | $\mu\text{A}$             |
|  |                 | 500                |                   |                   |                   |                   |                   |                   | $\mu\text{A}$             |
| Typical Junction Capacitance (Note 1)  | $C_J$           | 60                 |                   |                   |                   |                   |                   |                   | pF                        |
| Typical Thermal Resistance (Note 2)  | $R_{\theta JA}$ | 2.2                |                   |                   |                   |                   |                   |                   | $^\circ\text{C}/\text{W}$ |
| Operating junction temperature range   | $T_J$           | -55 to +150        |                   |                   |                   |                   |                   |                   | $^\circ\text{C}$          |
| storage temperature range  | $T_{STG}$       | -55 to +150        |                   |                   |                   |                   |                   |                   | $^\circ\text{C}$          |

NOTES: 1. Measured at 1.0MHz and applied reverse voltage of 4.0V DC.

2. Device mounted on 75mm\*75mm\*1.6mm cu plate heatsink.

3. The typical data above is for reference only.



## Ratings And Characteristic Curves

FIG.1-FORWARD CURRENT DERATING CURVE

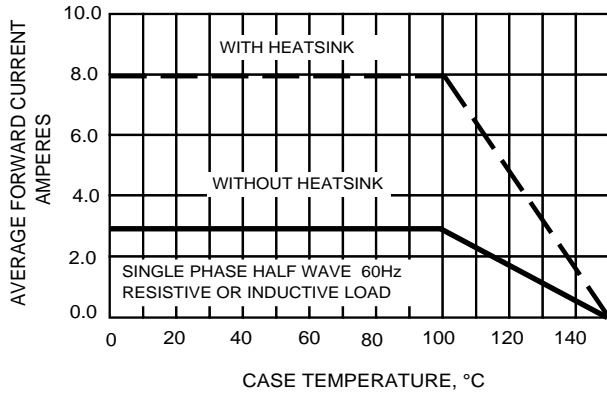


FIG.2-MAXIMUM NON-REPETITIVE SURGE CURRENT

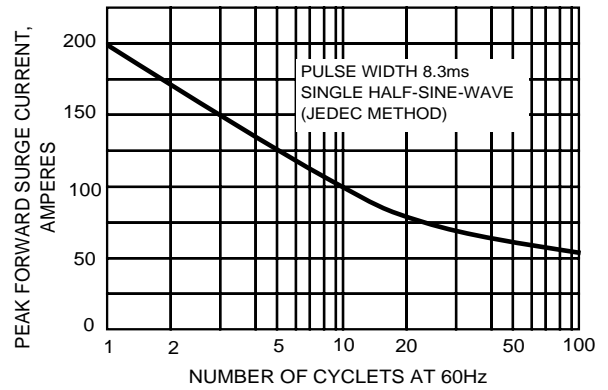


FIG.3-TYPICAL JUNCTION CAPACITANCE

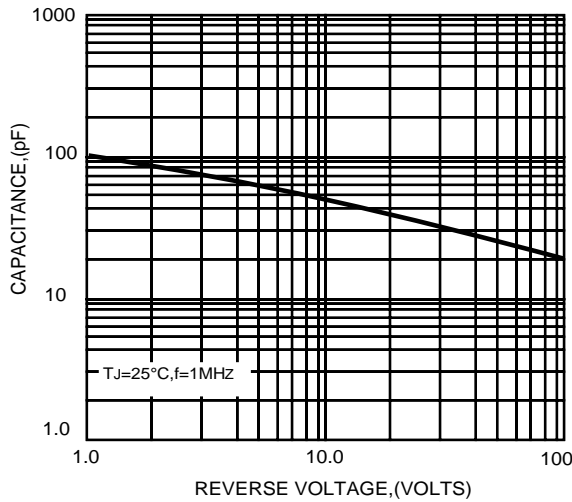


FIG.4-TYPICAL FORWARD CHARACTERISTICS

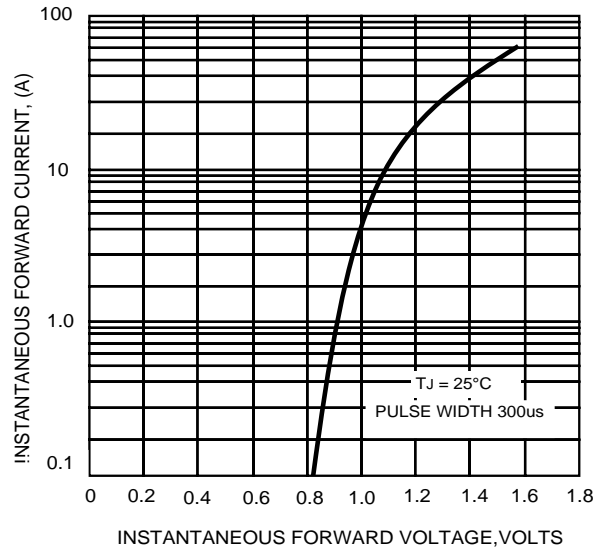
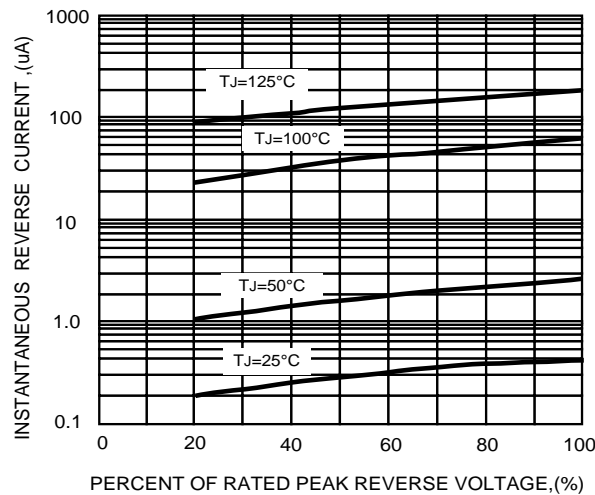


FIG.5-TYPICAL REVERSE CHARACTERISTICS



The cruve graph is for reference only

单击下面可查看定价，库存，交付和生命周期等信息

[>>MDD\(辰达行\)](#)