



## KBU1001G THRU KBU1007G

Single Phase 10 AMPS. Glass Passivated Bridge Rectifiers

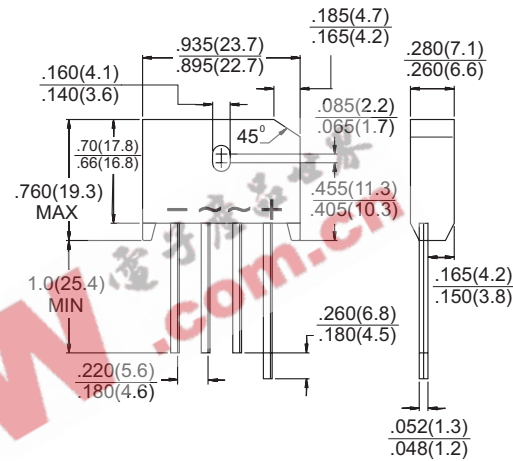


Voltage Range  
50 to 1000 Volts  
Current  
10.0 Amperes

### Features

- ✦ UL Recognized File # E-96005
- ✦ Glass passivated junction
- ✦ Ideal for printed circuit board
- ✦ Reliable low cost construction
- ✦ Plastic material has Underwriters Laboratory Flammability Classification 94V-0
- ✦ Surge overload rating to 200 amperes peak
- ✦ High temperature soldering guaranteed: 260°C / 10 seconds / .375", (9.5mm) lead lengths at 5 lbs., (2.3kg) tension
- ✦ Weight: 0.3 ounce, 8.0 grams
- ✦ Mounting torque: 5 in. lb. Max.

### KBU



Dimensions in inches and (millimeters)

### Maximum Ratings and Electrical Characteristics

Rating 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%

| Type Number  | Symbol          | KBU         | KBU   | KBU   | KBU   | KBU   | KBU   | KBU   | Units                          |
|--|-----------------|-------------|-------|-------|-------|-------|-------|-------|--------------------------------|
|  |                 | 1001G       | 1002G | 1003G | 1004G | 1005G | 1006G | 1007G |                                |
| Maximum Recurrent 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 Rectified Current @ $T_A = 45^\circ\text{C}$   | $I_{(AV)}$      | 10.0        |       |       |       |       |       |       | A                              |
| Peak Forward Surge Current, 8.3 ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method)             | $I_{FSM}$       | 200         |       |       |       |       |       |       | A                              |
| Maximum Instantaneous Forward Voltage @ 10.0A  | $V_F$           | 1.1         |       |       |       |       |       |       | V                              |
| Maximum DC Reverse Current @ $T_A = 25^\circ\text{C}$ at Rated DC Blocking Voltage @ $T_A = 125^\circ\text{C}$ | $I_R$           | 5.0<br>500  |       |       |       |       |       |       | $\mu\text{A}$<br>$\mu\text{A}$ |
| Typical Thermal Resistance (Note)  | $R_{\theta JC}$ | 2.2         |       |       |       |       |       |       | $^\circ\text{C/W}$             |
| Operating Temperature Range  | $T_J$           | -55 to +150 |       |       |       |       |       |       | $^\circ\text{C}$               |
| Storage Temperature Range  | $T_{STG}$       | -55 to +150 |       |       |       |       |       |       | $^\circ\text{C}$               |

Note: Thermal Resistance from Junction to Case with Device Mounted on 4" x 6" x 0.25" Al-Plate Heatsink.



RATINGS AND CHARACTERISTIC CURVES (KBU1001G THRU KBU1007G)

FIG.1- MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT PER BRIDGE ELEMENT

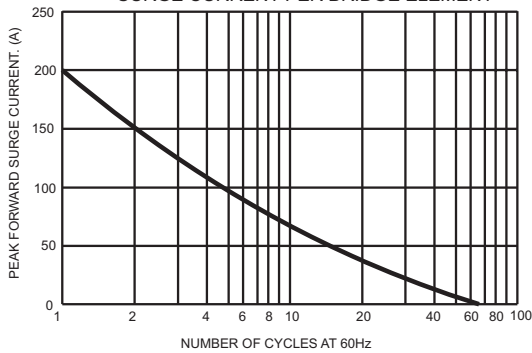


FIG.2- MAXIMUM FORWARD CURRENT DERATING CURVE

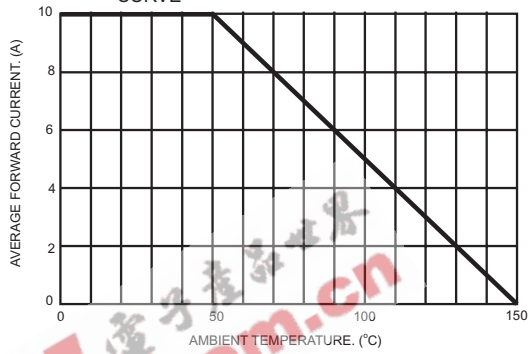


FIG.3- TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS PER BRIDGE ELEMENT

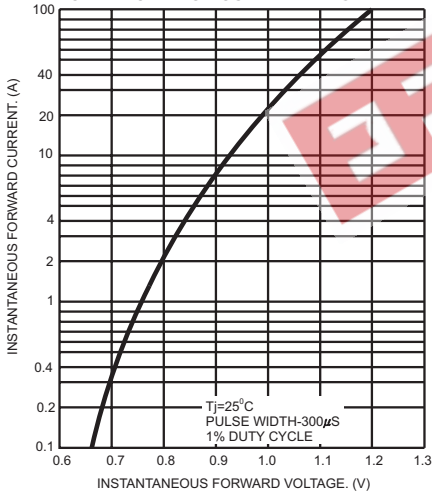


FIG.4- TYPICAL REVERSE CHARACTERISTICS PER BRIDGE ELEMENT

