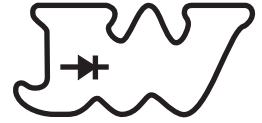


KBJ601 THRU KBJ607



SINGLE PHASE 6.0 AMP BRIDGE RECTIFIERS



FEATURES

- * Ideal for printed circuit board
- * Low forward voltage
- * Low leakage current
- * Mounting position: Any

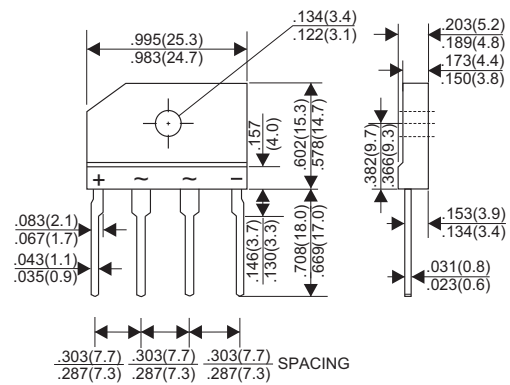
VOLTAGE RANGE

50 to 1000 Volts

CURRENT

6.0 Amperes

KBJ



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 | KBJ601 | KBJ602 | KBJ603 | KBJ604 | KBJ605 | KBJ606 | KBJ607 | UNITS | |
|--|--------|--------|--------|--------|--------|--------|--------|------------|------|
| Maximum Recurrent Peak Reverse Voltage | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | V | |
| Maximum RMS Voltage | 35 | 70 | 140 | 280 | 420 | 560 | 700 | V | |
| Maximum DC Blocking Voltage | 50 | 100 | 200 | 400 | 600 | 800 | 1000 | V | |
| Maximum Average Forward (with heatsink Note 1) | | | | | | | | 6.0 | |
| Rectified Current at Tc=110°C (Without heatsink) | | | | | | | | 2.8 | A |
| Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method) | | | | | | | | 170 | A |
| Maximum Forward Voltage Drop per Bridge Element at 3.0A D.C. | | | | | | | | 1.0 | V |
| Maximum DC Reverse Current Ta=25°C | | | | | | | | 5.0 | μA |
| at Rated DC Blocking Voltage Ta=100°C | | | | | | | | 500 | μA |
| Typical Thermal Resistance R _{jc} (Note 2) | | | | | | | | 3.4 | °C/W |
| Typical Thermal Resistance R _{jl} (Note 3) | | | | | | | | 5.0 | °C/W |
| Operating Temperature Range, T _J | | | | | | | | -55 — +150 | °C |
| Storage Temperature Range, T _{stg} | | | | | | | | -55 — +150 | °C |

NOTES

1. Device mounted on 75mm x 75mm x 1.6mm Cu Plate Heatsink.
2. Thermal Resistance from Junction to Case with device mounted on 75mm x 75mm x 1.6mm Cu Plate Heatsink.
3. Thermal Resistance from Junction to Lead without Heatsink.

RATING AND CHARACTERISTIC CURVES (KBJ601 THRU KBJ607)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

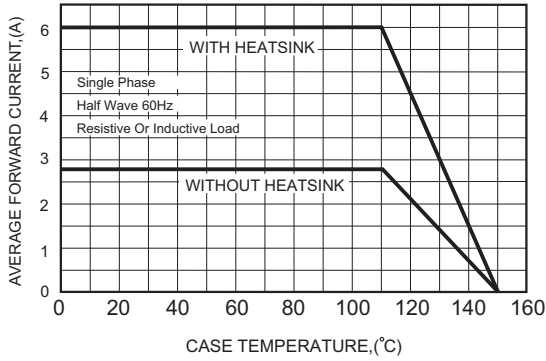


FIG.2-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

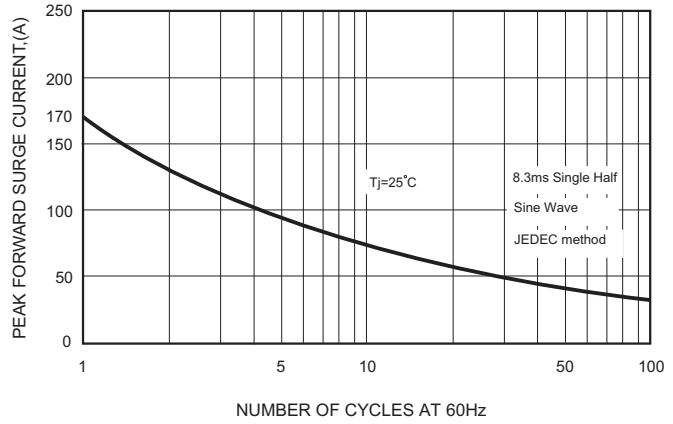


FIG.3-TYPICAL FORWARD CHARACTERISTICS

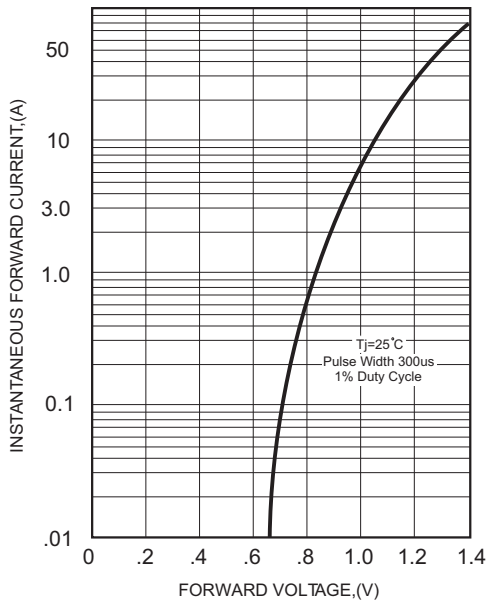


FIG.4-TYPICAL REVERSE CHARACTERISTICS

