



DATA SHEET

GBPC3500W~GBPC3508W

HIGH CURRENT GLASS PASSIVATED BRIDGE RECTIFIER

VOLTAGE 50 to 800 Volts **CURRENT** 35 Amperes

GBPC-W

Unit:inch(mm)



Recognized File # E111753

FEATURES

- Plastic material has Underwriters Laboratory Flammability Classification 94V-O
- The plastic package has Underwriters Laboratory Flammability Classification 94V-O.
- Both normal and Pb free product are available :
Normal : 80~95% Sn, 5~20% Pb
Pb free: 98.5% Sn above

MECHANICALDATA

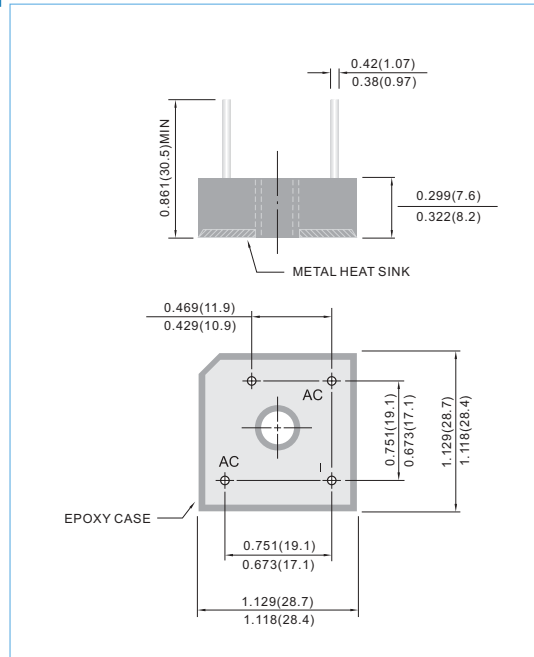
Case:Molded plastic with heatsink integrally mounted in the bridge encapsulation.

Mounting position: Any

Weight: 1 ounce, 30 grams

“ W” Suffix Designates Wire Leads

All Models are Available on B(Height)=7.62mm Max. Epoxy Case



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25°C ambient temperature unless otherwise specified. Resistive or inductive load, 60Hz.
For Capacitive load derate current by 20%.

| PARAMETER | SYMBOL | GBPC 35005W | GBPC 3501W | GBPC 3502W | GBPC 3504W | GBPC 3506W | GBPC 3508W | UNITS |
|---|----------------------------------|--------------|------------|------------|------------|------------|------------|------------------|
| Maximum Recurrent Peak Reverse Voltage | V _{RRM} | 50 | 100 | 200 | 400 | 600 | 800 | V |
| Maximum RMS Bridge Input Voltage | V _{RMS} | 35 | 70 | 140 | 280 | 420 | 560 | V |
| Maximum DC Blocking Voltage | V _{DC} | 50 | 100 | 200 | 400 | 600 | 800 | V |
| Maximum Average Forward Current For Resistive Load at TC=55°C | I _{AV} | 35 | | | | | | A |
| Non-repetitive Peak Forward Surge Current at Rated Load | I _{FSM} | 400 | | | | | | A |
| Maximum Forward Voltage per Bridge Element at 17.5A Specified Current | V _F | 1.2 | | | | | | V |
| Maximum Reverse Leakage Current at Rated @ TA=25°C Dc Blocking Voltage @ TA=100°C | I _R | 10.0 1000 | | | | | | uA |
| I ² t Rating for fusing (t < 8.35ms) | I ² t | 660 | | | | | | A ² t |
| Typical Thermal Resistance per leg | R _{θJC} | 3.0 | | | | | | °C/W |
| Operating Junction and Storage Temperature Range | T _J ,T _{STG} | -55 to + 150 | | | | | | °C |



RATING AND CHARACTERISTIC CURVES

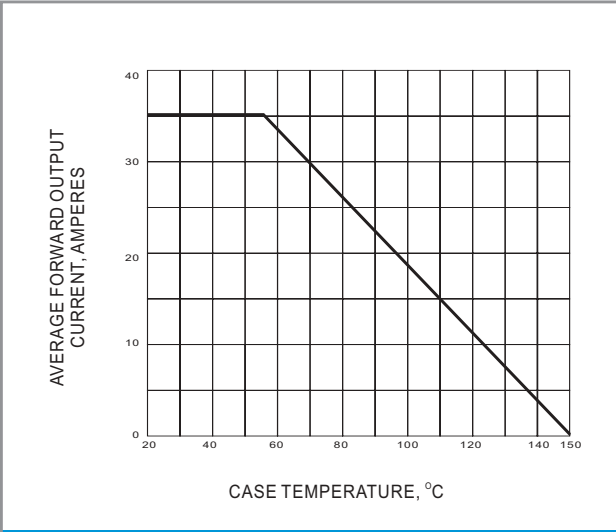


Fig.1 DERATING CURVE FOR OUTPUT RECTIFIED CURRENT

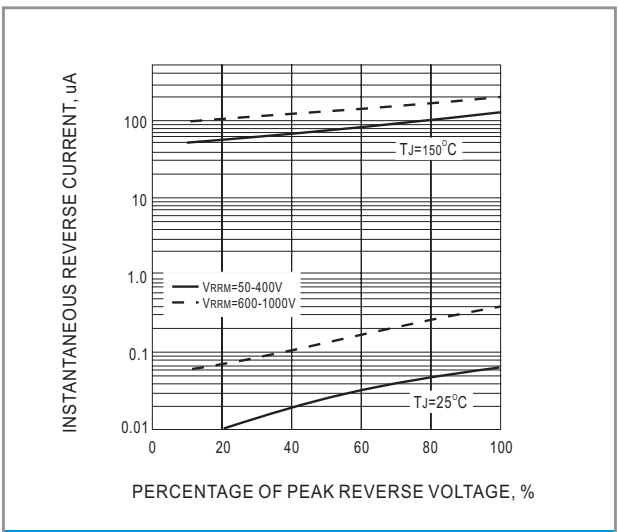


Fig.2 TYPICAL REVERSE CHARACTERISTICS

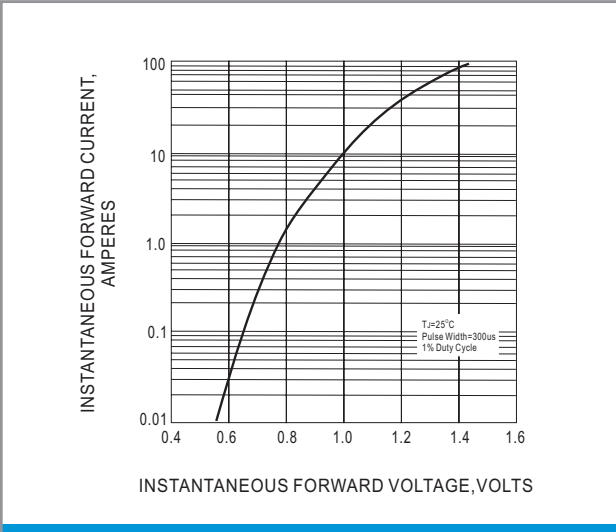


Fig.3 TYPICAL FORWARD CHARACTERISTIC