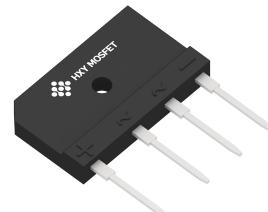


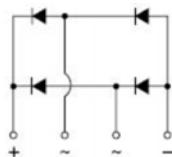


Features

- This series is UL listed under the Recognized Component Index, file number E142814
- Plastic package has Underwriters Laboratory Flammability Classification 94V-0
- High case dielectric strength of 1500VRMS Ideal for printed circuit boards
- High surge current capability



GBJ(GBJ6)



Package Marking and Ordering Information

| Product ID | Pack | Marking | Qty(PCS) |
|------------|-----------|---------|----------|
| HDFB25100 | GBJ(GBJ6) | D2510SA | 500 |

Maximum Ratings (Ta=25°C unless otherwise noted)

Single phase half wave, 60Hz, resistive or inductive load.
For capacitive load, derate current by 20%.

| Parameter | Symbol | HDFB25100 | Unit |
|--|-----------------------------------|--------------|--------------------|
| Maximum repetitive peak reverse voltage | VR _{RM} | 1000 | V |
| Maximum RMS bridge input voltage | VR _{MS} | 700 | V |
| Maximum DC blocking voltage | V _{DC} | 1000 | V |
| Maximum average forward (with heatsink note1) rectified current at T _c =100°C (without heatsink) | I _{F(AV)} | 4.2 | A |
| Peak forward surge current single sine-wave superimposed on rated load (JEDEC Method) | I _{FSM} | 350 | A |
| Rating for fusing (t<8.3ms) | I ² t | 510 | A ² sec |
| Typical thermal resistance per element (note 1) | R _{thJC} | 1.0 | °C/W |
| Operating junction and storage temperature range | T _J , T _{STG} | -55 to + 150 | °C |

Electrical Characteristics(Ta=25 °C unless otherwise specified)

| Parameter | Symbol | HDFB25100 | Unit |
|---|----------------|-------------|------|
| Maximum instantaneous forward voltage drop per leg at 12.5 A | V _F | 1.05 | V |
| Maximum DC reverse current at rated TA =25°C DC blocking voltage per element TA =125°C | I _R | 10.0 500 | μA |

Notes: (1) Device mounted on 250mm x 250mm x 20mm aluminum plate heatsink.



Typical Characteristics

Fig. 1 Derating Curve for Output Rectified Current

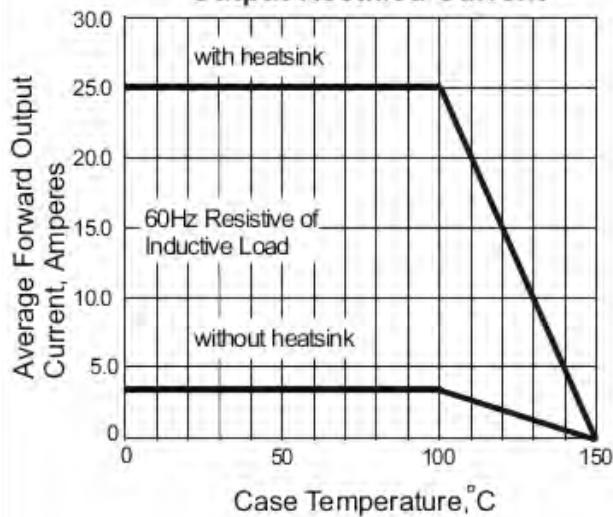


Fig. 2 Maximum Non-repetitive Peak Forward Surge Current

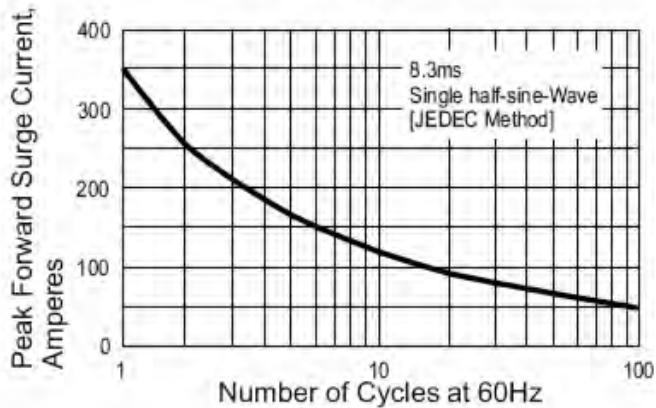


Fig. 3 Typical Instantaneous Forward Characteristics

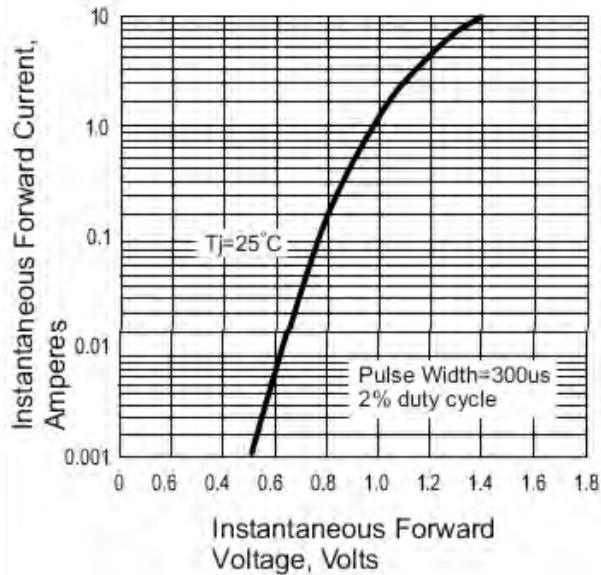


Fig. 4 Typical Reverse Characteristics at $T_j=25^\circ\text{C}$

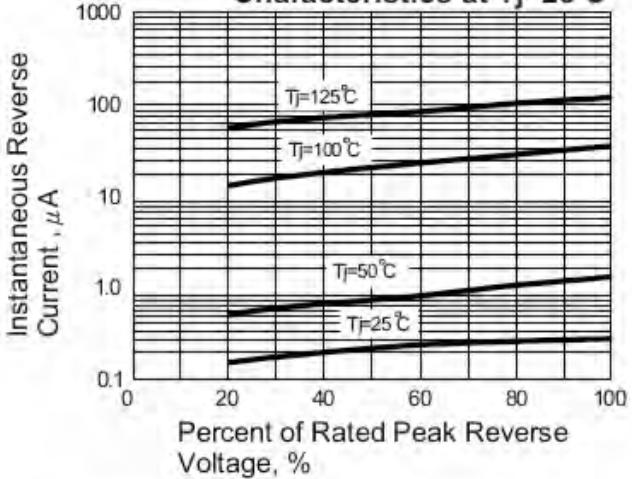
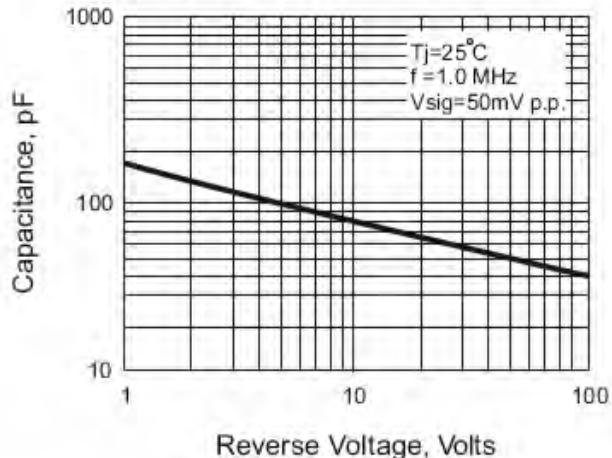
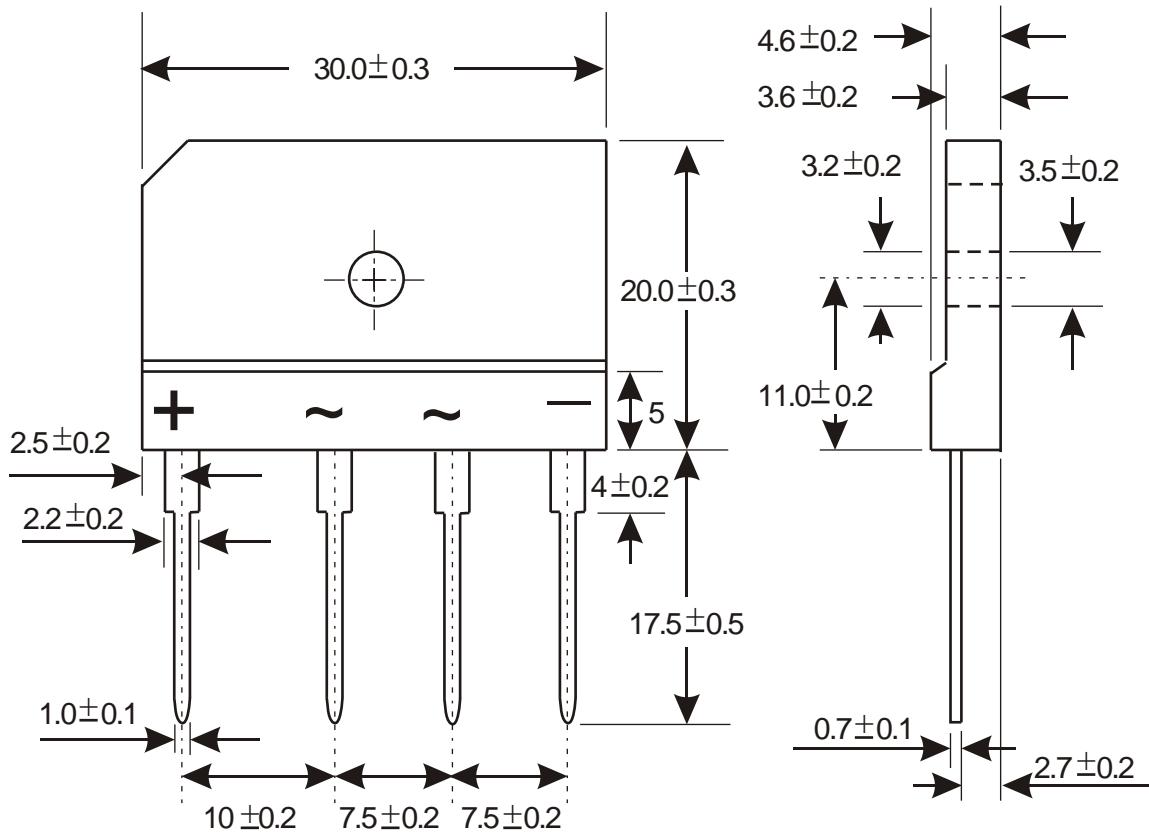


Fig. 5 Typical Junction Capacitance





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