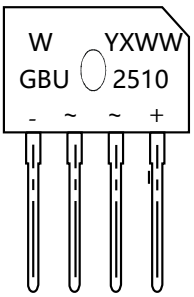
World Internation (China) Limited

GBU2510

25-Dec-2019

Glass Passivated Bridge Rectifiers



Features

- Reverse Voltage - 1000 V
- Forward Current - 25.0 A
- Compliant With RoHS Provisions
- High Forward Surge Current Capability

PINNING

PIN	DESCRIPTION
1	Input Pin（~）
2	Input Pin（~）
3	Output Anode（+）
4	Output Cathode（-）

Applications

- Case: GBU
- Switching Power Supply
- Home Appliances, Office Devices
- Industrial Auto-equipments

Maximum Ratings and Electrical characteristics

Ratings at 25 °C ambient temperature unless otherwise specified.
Single phase half-wave 60 Hz, resistive or inductive load, for capacitive load current derate by 20 %.

Parameter	Symbols	GBU2510	Units
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	1000	V
Maximum RMS voltage	V_{RMS}	700	V
Maximum DC Blocking Voltage	V_{DC}	1000	V
Average Rectified Output Current	I_o	25.0	A
Peak Forward Surge Current 8.3 ms Single Half Sine Wave Superimposed on Rated Load (JEDEC Method)	I_{FSM}	330	A
I^2t rating for fusing (1ms< t < 10ms)	I^2t	452	A^2S
Maximum Forward Voltage at 12.5A	V_F	1.1	V
Maximum DC Reverse Current @TA=25 °C at Rated DC Blocking Voltage @TA=125 °C	I_R	5 500	μA
Typical Junction Capacitance（Note1）	Cj	70	pF
Typical Thermal Resistance （Note2）	$R_{\theta JA}$ $R_{\theta JC}$ $R_{\theta JL}$	10.0 2.0 1.5	°C/W
Operating and Storage Temperature Range	T_j, T_{stg}	-55 ~ +150	°C

Note: 1. Measured at 1MHz and applied reverse voltage of 4 VDC.
2. Unit Mounted on 100 x 100 x 1.6 mm Cu Plate Heatsink.

RATINGS AND CHARACTERISTICS CURVES (TA = 25 ℃ unless otherwise noted)

Fig. 1 - Forward Current Derating Curve

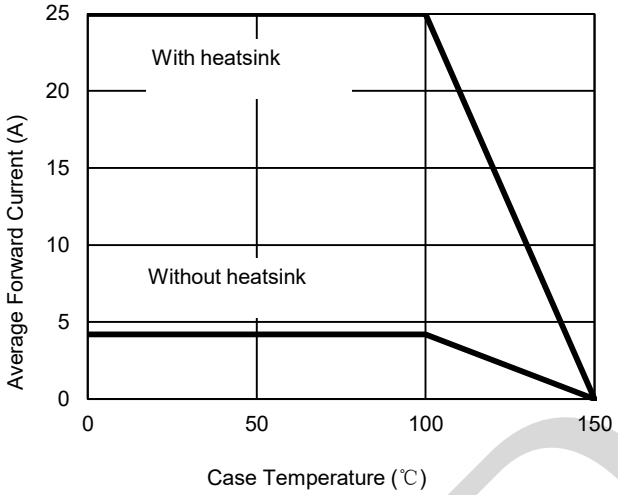


Fig. 2 - Maximum Non-Repetitive Surge Current

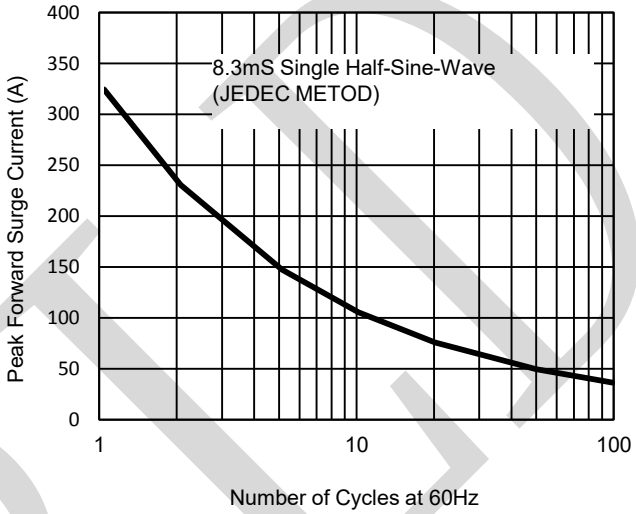


Fig. 3 - Typical Reverse Characteristics

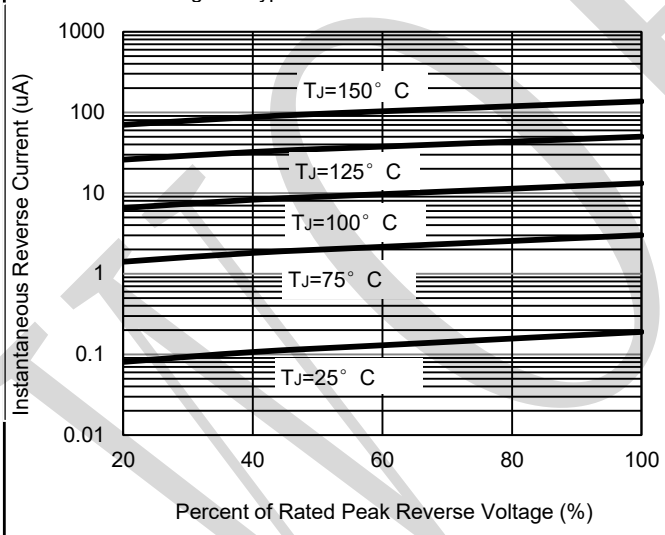
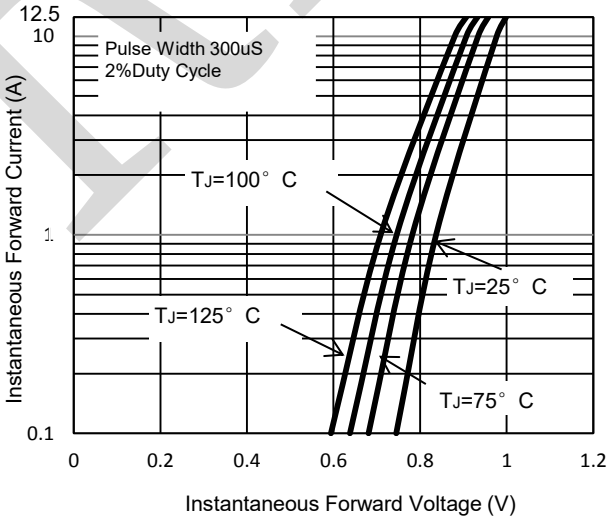
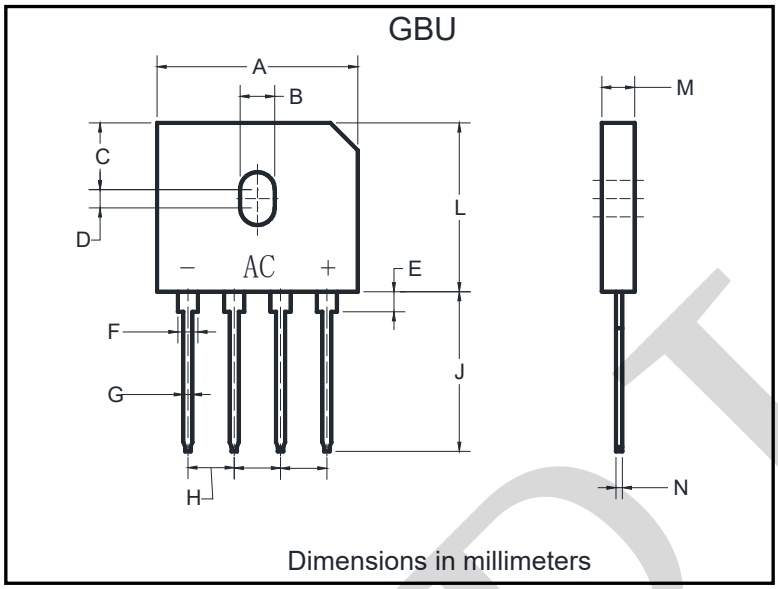


Fig. 4 - Typical Forward Characteristics



PACKAGE OUTLINE DIMENSIONS



GBU		
Dim	Min	Max
A	21.70	22.50
B	3.40	4.10
C	7.40	8.00
D	1.65	2.26
E	2.25	2.85
F	2.05	2.4
G	1.02	1.37
H	4.83	5.43
J	17.0	18.6
L	18.3	18.9
M	3.30	3.66
N	0.46	0.66