



GBL005 THRU GBL10

Glass Passivated Birdge Rectifier

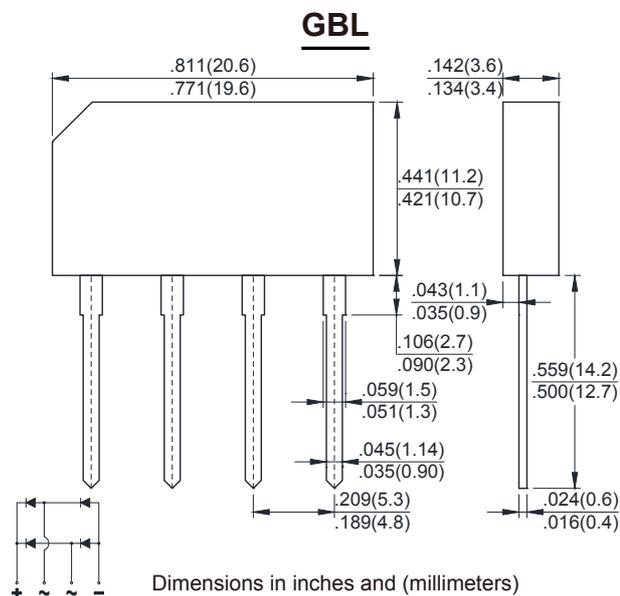
Features

- ★ Ideal for printed circuit boards
- ★ High case dielectric strength
- ★ Typical I_R less than 0.1 μA

Mechanical Data

- ★ Case: GBL
- ★ Epoxy: UL 94V-0 rate flame retardant
- ★ Terminals: Solderable per MIL-STD-202, method 208
- ★ Polarity: As marked on body

Voltage Range 50 to 1000 V
Current 4.0 Ampere



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25°C ambient temperature unless otherwise specified.

Single phase, half wave, 60Hz, resistive or inductive load.

For capacitive load, derate current by 20%.

PARAMETER	SYMBOL	GBL005	GBL01	GBL02	GBL04	GBL06	GBL08	GBL10	UNIT
Maximum repetitive peak reverse voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS voltage	V_{RMS}	35	70	140	280	420	560	70	V
Maximum DC blocking voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum average forward rectified current @ $T_A=50^\circ C$	$I_{F(AV)}$	4							A
Peak forward surge current 8.3 ms single half sine-wave superimposed on rated load	I_{FSM}	135							A
I^2t rating for fusing ($t < 8.3ms$)	I^2t	75.6							A^2s
Maximum instantaneous forward drop per diode @ $I_F=4.0A$	V_F	1.05							V
Maximum DC reverse current at @ $T_J=25^\circ C$ rated DC blocking voltage per diode @ $T_J=125^\circ C$	I_R	5 500							μA
Typical thermal resistance junction to case	$R_{\theta JC}$	4.2							$^\circ C/W$
Operating junction and storage temperature range	T_J, T_{STG}	-55 to +150							$^\circ C$

RATINGS AND CHARACTERISTICS CURVES GBL005 THRU GBL10

Fig.1 - Forward Current Derating Curve

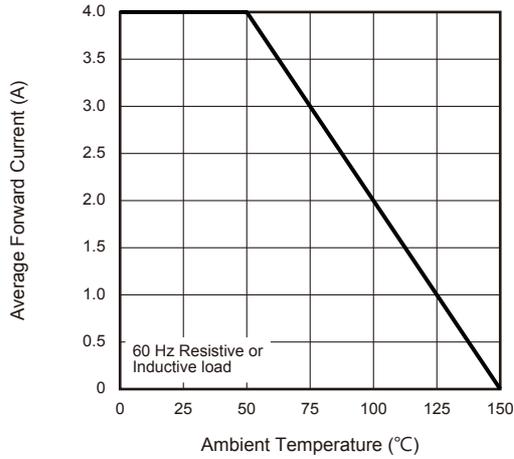


Fig.2 - Maximum Non-Repetitive Peak Forward Surge Current

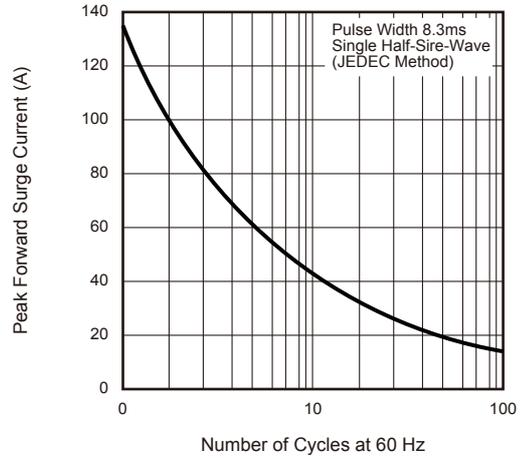


Fig.3 - Typical Instantaneous Forward Characteristics

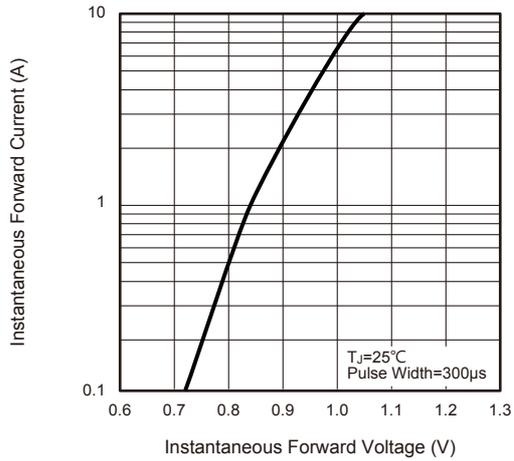


Fig.4 - Typical Reverse Leakage Characteristics

