	E502650

10 Amp Single Phase Glass Passivated Bridge Rectifiers 50 to 1000 Volts

Features

- Halogen Free Available Upon Request By Adding Suffix "-HF"
- Lead Free Finish/RoHS Compliant (Note1) ("P"Suffix Designates Compliant. See Ordering Information)
- Epoxy Meets UL 94 V-0 Flammability Rating
- High Surge Overload Rating

Maximum Ratings

- Operating Junction Temperature Range: -55°C to +150°C
- Storage Temperature Range: -55°C to +150°C
- Typical Thermal Resistance: 2.2°C/W Junction To Case (Note 2)

Mechanical Data

- Mounting Torque: 5in-lbs

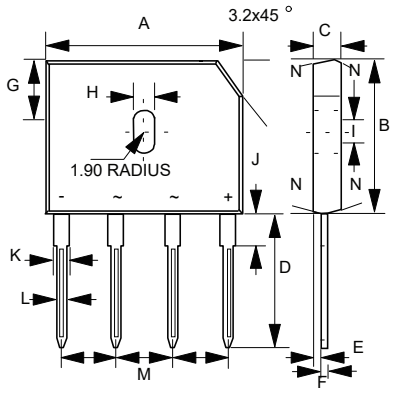
MCC Part Number	Device Marking	Maximum Recurrent Peak Reverse Voltage	Maximum RMS Voltage	Maximum DC Blocking Voltage
GBU10A	GBU10A	50V	35V	50V
GBU10B	GBU10B	100V	70V	100V
GBU10D	GBU10D	200V	140V	200V
GBU10G	GBU10G	400V	280V	400V
GBU10J	GBU10J	600V	420V	600V
GBU10K	GBU10K	800V	560V	800V
GBU10M	GBU10M	1000V	700V	1000V

Electrical Characteristics @ 25°C Unless Otherwise Specified

Maximum Average Forward Current	$I_{F(AV)}$	10A	T_C= 100°C	
Peak Forward Surge Current	I_{FSM}	240A 220A 480A 440A	T_J = 25°C T_J = 125°C T_J = 25°C T_J = 125°C	8.3ms, Half Sine 1.0ms, Half Sine
Maximum Instantaneous Forward Voltage	V_F	1.0V 1.2V	I_{FM}=5A; I_{FM}=10A;	
Rating for fusing	I^2t	239A^{2}s 115.2A^{2}s	t<8.3ms t<1.0ms	
Maximum DC Reverse Current At Rated DC Blocking Voltage	I_R	5μA 500μA	T_J = 25°C T_J = 125°C	
Typical Junction Capacitance	C_J	70pF	Measured at 1.0MHz, V_R=4.0V	

Note: 1. High Temperature Solder Exemption Applied, see EU Directive Annex 7a
2. Device mounted on 75mm x 45mm x 5.5mm Aluminum Plate Heatsink.

GBU



DIMENSIONS					
DIM	INCHES		MM		NOTE
	MIN	MAX	MIN	MAX	
A	0.860	0.880	21.80	22.30	
B	0.720	0.740	18.30	18.80	
C	0.130	0.142	3.30	3.60	
D	0.690	0.717	17.50	18.20	
E	0.030	0.039	0.76	1.00	
F	0.018	0.024	0.46	0.60	
G	0.290	0.310	7.40	7.90	
H	0.140	0.160	3.50	4.10	
I	0.065	0.085	1.65	2.16	
J	0.060	0.096	1.52	2.45	
K	0.077	0.098	1.95	2.50	
L	0.040	0.050	1.02	1.27	
M	0.190	0.210	4.83	5.33	
N	7.0° TYPICAL				

Curve Characteristics

Fig. 1 - Forward Current Derating Curve

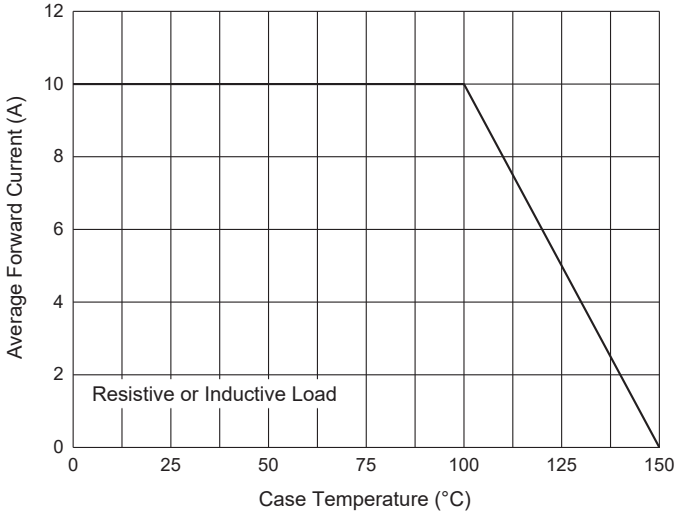


Fig. 2 - Maximum Non-Repetitive Peak Forward Surge Current

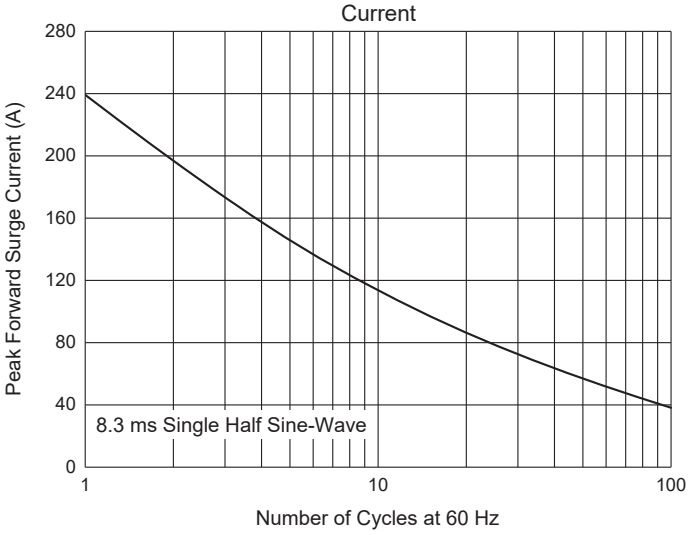


Fig. 3 - Typical Instantaneous Forward Characteristics

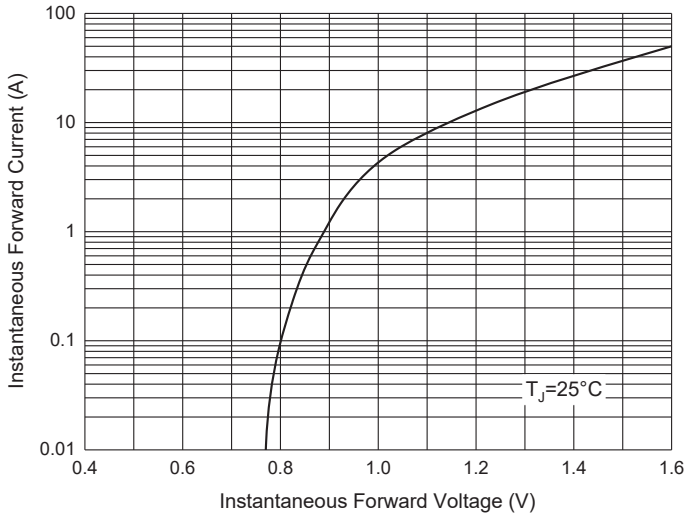
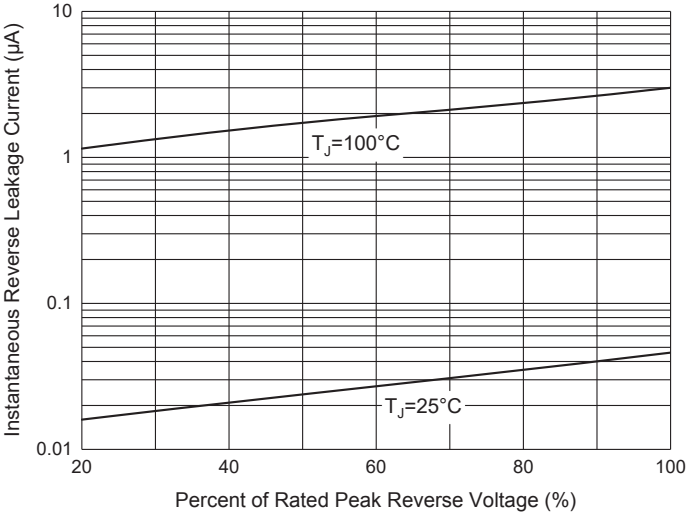


Fig. 4 - Typical Reverse Leakage Characteristics



Ordering Information

Device	Packing
Part Number-BP	Bulk:20pcs/Tube,1Kpcs/Box,2Kpcs/Carton

Note : Adding "-HF" Suffix For Halogen Free, eg. Part Number-BP-HF

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