

SURFACE MOUNT GLASS PASSIVATED BRIDGE RECTIFIER
Feature

- Glass Passivated Die Construction
- Low Forward Drop
- High Current Capability
- High Surge Current Capability
- Designed for Surface Mount Application

Maximum Ratings and Electrical characteristics

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

Parameter	Symbol	MB 1S	MB 2S	MB 4S	MB 6S	MB 8S	MB 10S	Units
Peak repetitive Reverse Voltage	V _{RRM}							
Working Peak Reverse Voltage	V _{RWM}	100	200	400	600	800	1000	V
DC Blocking Voltage	V _R							
RMS Reverse Voltage	V _{RMS}	70	140	280	420	560	700	V
Averager Rectified Output Current (Note 1) @T _A =40°C	I _O	0.5						A
Averager Rectified Output Current (Note 2) @T _A =40°C		0.8						
Non-Repetitive Peak Forward Surge Current 8.3ms Single Half Sine-Wave Superimposed on rated Load(JEDEC Method)	I _{FSM}	30						A
I ² t Rating for Fusing(t<8.3ms)	I ² t	3.7						A ² s
Forward Voltage per element @ I _F =0.4A	V _{FM}	1.05						V
Peak Reverse Current T _A =25°C	I _{RM}	10.0						μA
at Rated DC Blocking Voltage T _A =125°C		500						
Typical Junction Capacitance per leg (Note 3)	C _j	13						pF
Typical Thermal Resistance per leg (Note 1)	R _{θJA} R _{θJl}	134 20						°C/W
Operating and Storage Temperature Range	T _J ,T _{STG}	-55 to +150						°C

Note:

1. Mounted on glass epoxy PC board with $1.3mm^2$ solder pad.
2. Mounted on aluminum substrate PC board with $1.3mm^2$ solder pad.
3. Measured at 1.0MHz and applied reverse voltage of 4.0V D.C.

Typical Characteristics

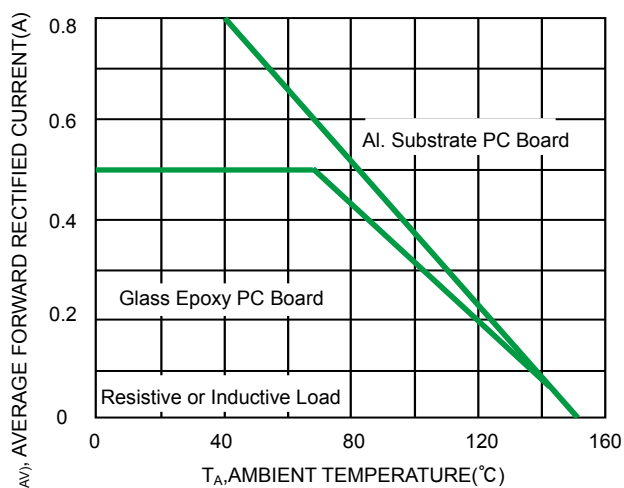


Fig 1 Output Current Derating Curve

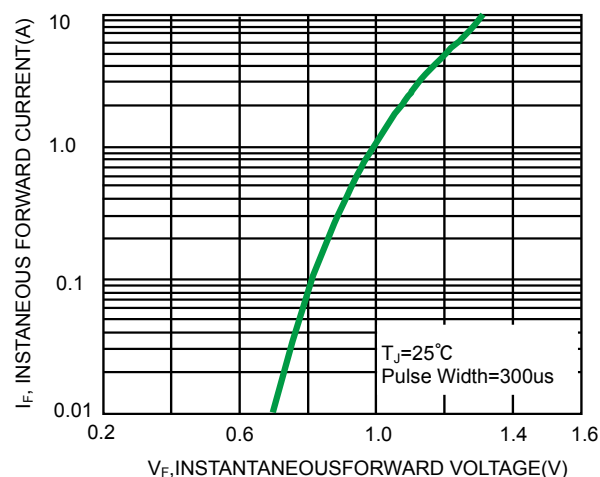


Fig 2 Typical Forward Characteristics (per leg)

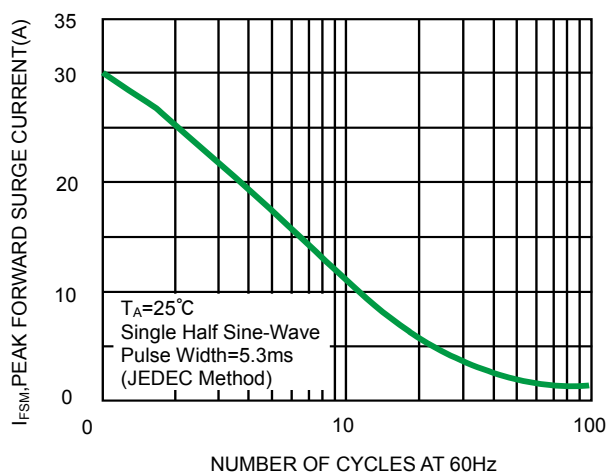


Fig 3 Maximum Peak Forward Surge Current(per leg)

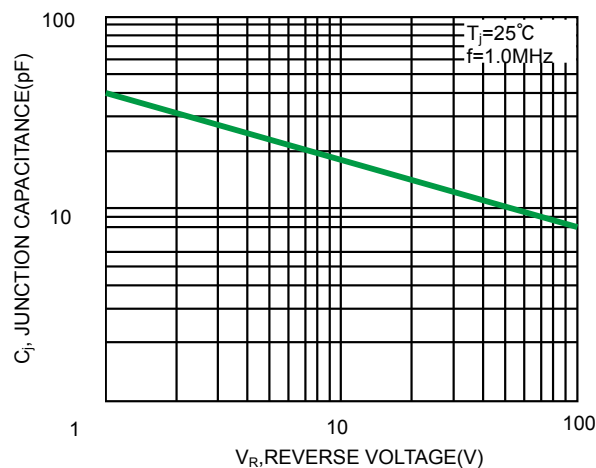
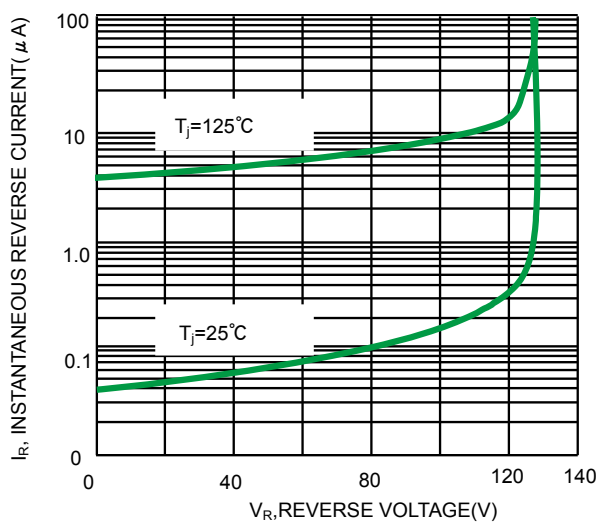
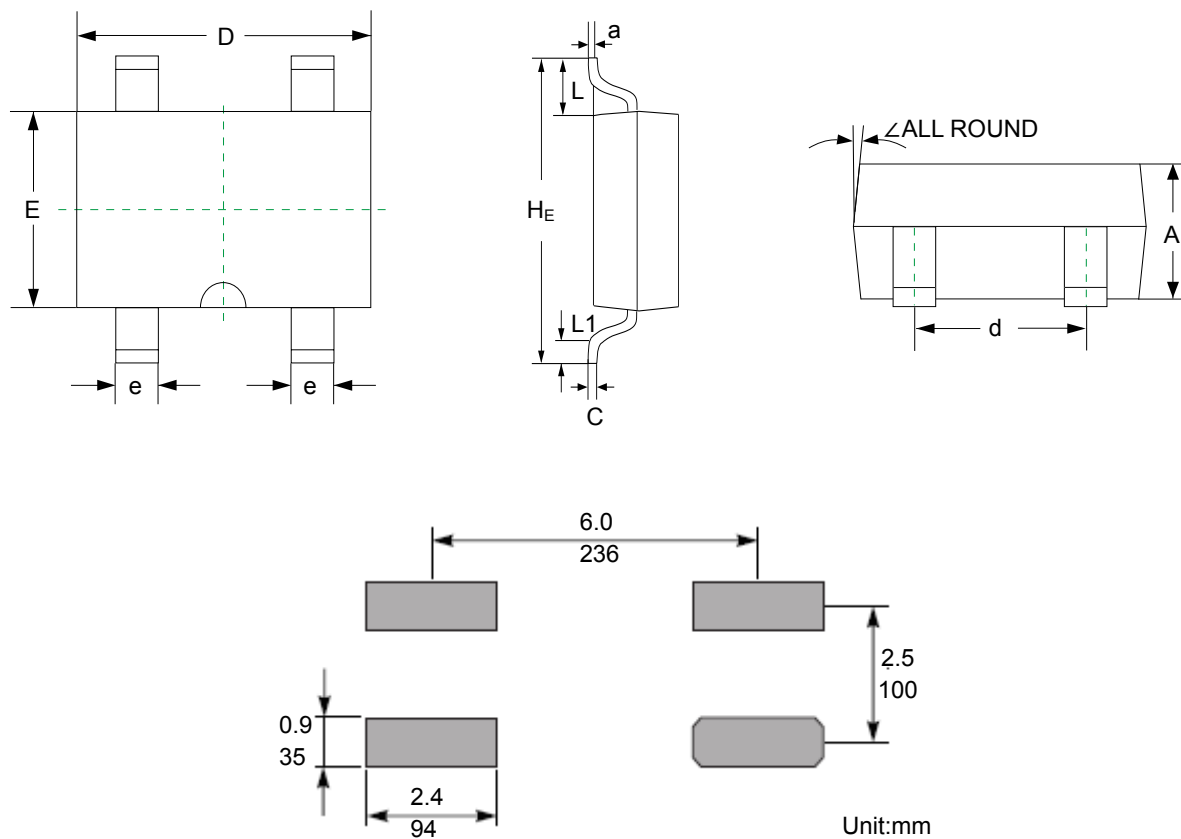


Fig 4 Typical Junction Capacitance



Product dimension (MBS)



Dim	Millimeters	
	MIN	MAX
A	2.20	2.60
C	0.15	0.22
D	4.50	5.00
E	3.60	4.10
H _E	6.40	7.00
d	2.30	2.70
e	0.50	0.70
L	1.30	1.70
L1	0.50	1.10
a	--	0.20
∠	7°	

Ordering information

Device	Package	Shipping
MB1S ~MB10S	MBS (Pb-Free)	3000 / Tape & Reel

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