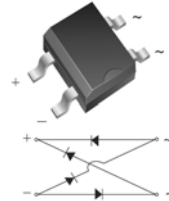


Fast Recovery Diode Bridge Rectifier

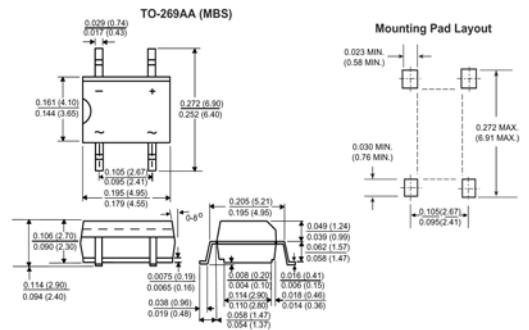
■ Features

- I_o 0.8A
- V_{RRM} 100V~1000V
- t_{rr} 50ns
- Glass passivated chip
- High surge forward current capability



■ Applications

- General purpose 1 phase Bridge rectifier applications



Package outline dimensions in inches (millimeters)

■ Limiting Values (Absolute Maximum Rating)

Item	Symbol	Unit	Conditions	MBUS1					
				BS	DS	GS	JS	KS	MS
Repetitive Peak Reverse Voltage	V_{RRM}	V		100	200	400	600	800	1000
Average Rectified Output Current	I_o	A	60Hz sine wave, R-load, $T_a=25^\circ\text{C}$	On alumina substrate		0.8			
				On glass-epoxi substrate		0.5			
Surge(Non-repetitive)Forward Current	I_{FSM}	A	60Hz sine wave, 1 cycle, $T_j=25^\circ\text{C}$		30				
Current Squared Time	I^2t	A ² S	$1\text{ms} \leq t < 8.3\text{ms}$ $T_j=25^\circ\text{C}$, Rating of per diode		3.7				
Storage Temperature	T_{stg}	$^\circ\text{C}$			-55 ~+150				
Junction Temperature	T_j	$^\circ\text{C}$			-55 ~+125				



MBUS1BS ~ MBUS1MS

■ Electrical Characteristics (T_a=25°C Unless otherwise specified)

Item	Symbol	Unit	Test Condition	Max					
				BS	DS	GS	JS	KS	MS
Peak Forward Voltage	V _{FM}	V	I _{FM} =0.4A, Pulse measurement, Rating of per diode	1.0		1.30	1.70		
Peak Reverse Current	I _{RRM}	μ A	V _{RM} =V _{RRM} , Pulse measurement, Rating of per diode	10					
Reverse Recovery Time	T _{rr}	ns	I _F =0.5A I _{RM} =1A I _{RR} =0.25A	50			75		
Thermal Resistance	R _{θ J-A}	°C/W	Between junction and ambient, On alumina substrate	76					
			Between junction and ambient, On glass-epoxi substrate	134					
	R _{θ J-L}		Between junction and lead	20					

Characteristics (Typical)

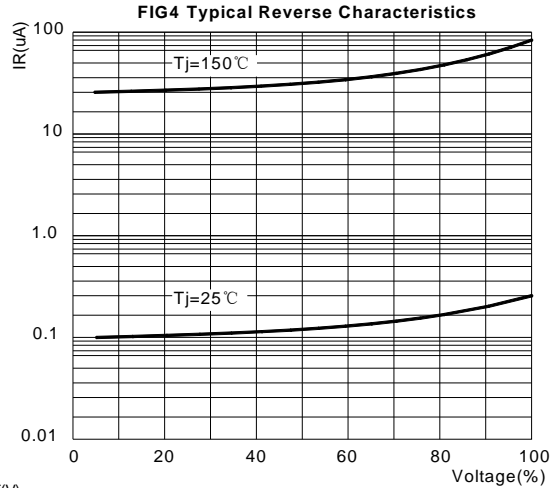
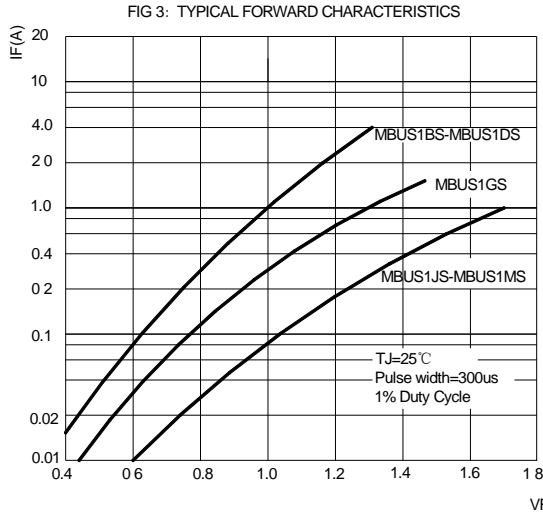
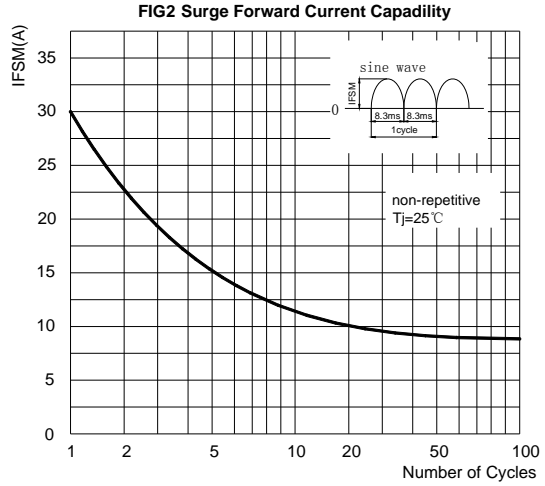
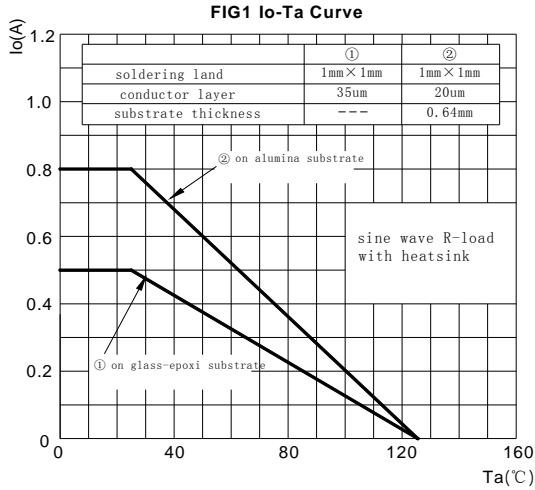


FIG.5: Diagram of circuit and Testing wave form of reverse recovery time

