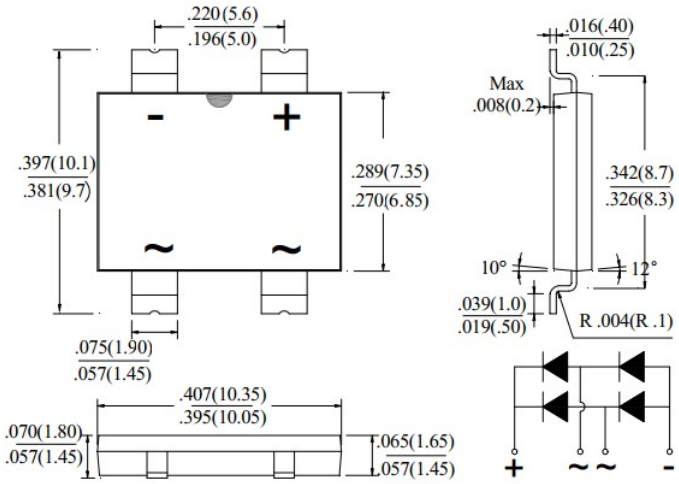


TBM Plastic-Encapsulate Bridge Rectifier

<p>FEATURE</p> <ul style="list-style-type: none"> . Surface mount bridge, small package; . Glass passivated junction. . Ideal for printed circuit board. . Reliable low cost construction utilizing molded plastic technique. . High surge current capability. . High temperature soldering guaranteed: 260°C/10 seconds at terminals. <p>MECHANICAL DATA</p> <ul style="list-style-type: none"> . Case Material: “Green” Molding compound, UL flammability classification rating 94V-0, “Free halogen” . Moisture sensitivity level:level 2a,per J-STD-020 . Polarity:Polarity as marked on the body . Weight: 0.415g (approximately) 	<p style="text-align: center;">TBM</p>  <p style="text-align: center;">Dimensions in inches and (millimeters)</p>						
MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS							
Ratings at 25°C ambient temperature unless otherwise specified.							
Single phase, half wave, 60Hz, resistive or inductive load. For capacitive load, derate current by 20%							
Type Number	SYM BOL	TBM 802	TBM 804	TBM 806	TBM 808	TBM 810	units
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	200	400	600	800	1000	V
Maximum RMS Voltage	V_{RMS}	160	320	420	560	700	V
Maximum DC blocking Voltage	V_{DC}	200	400	600	800	1000	V
Maximum Average Forward rectified Current	$I_{F(AV)}$	8.0					A
Peak Forward Surge Current @ $T_J=25^\circ\text{C}$ 8.3ms single half sine-wave @ $T_J=125^\circ\text{C}$	I_{FSM}	170					A
Peak Forward Surge Current @ $T_J=25^\circ\text{C}$ 1.0ms single half sine-wave @ $T_J=125^\circ\text{C}$		140					
Maximum Instantaneous Forward Voltage @ $I_F=8.0\text{A DC}$ @ $I_F=4.0\text{A DC}$	V_F	1.1 1.0					V
Maximum DC Reverse Current @ $T_J=25^\circ\text{C}$ at rated DC blocking voltage @ $T_J=125^\circ\text{C}$	I_R	5.0 200.0					μA
I^2t Rating for Fusing ($t < 8.3\text{ms}$)	I^2t	120					A^2Sec
Typical Junction Capacitance Per Leg (Note1)	C_J	55					pF
Typical Thermal Resistance (without Heatsink)	R_{JA}	R_{JA}	R_{JL}	R_{JC}		$^\circ\text{C/W}$	
Typical Thermal Resistance (Note2)		55	8	7			
Storage Temperature	T_{STG}	-55 to +150					$^\circ\text{C}$
Operating Junction Temperature	T_J	-55 to +150					$^\circ\text{C}$
Note:							
1. Measured at 1.0 MHz and applied reverse voltage of 4.0Vdc							
2. Thermal resistance junction to case, lead and ambient in accordance with JESD-51.							
Unit mounted on 15mm x 12mm x 1.6mm AL Pad attached on 100mm x 100mm x 30mm copper plate							

Typical Characteristics

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

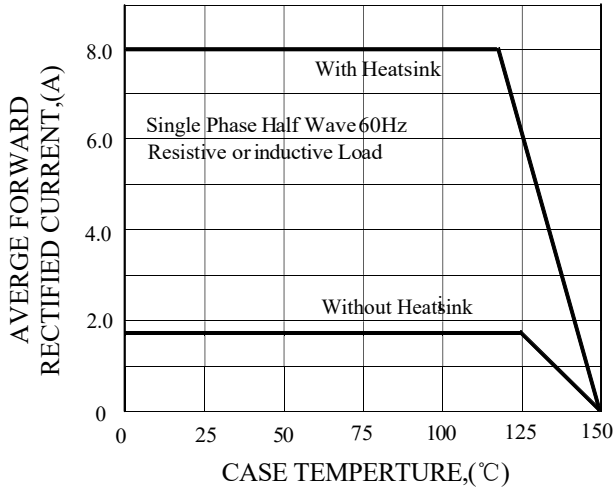


FIG.2-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

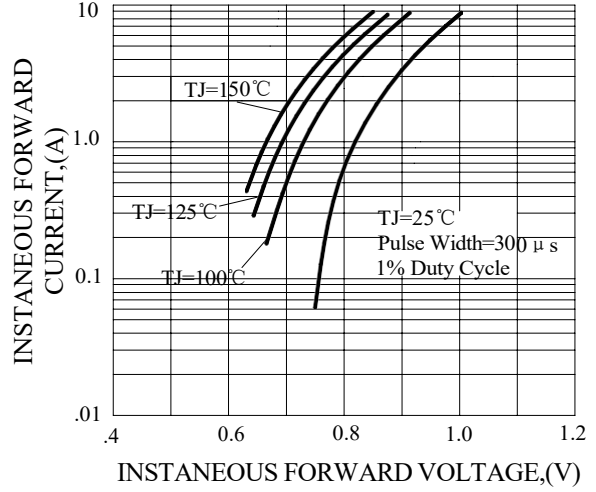


FIG.3-MAXIMUN NON-REPETITIVE FORWARD SURGE CURRENT

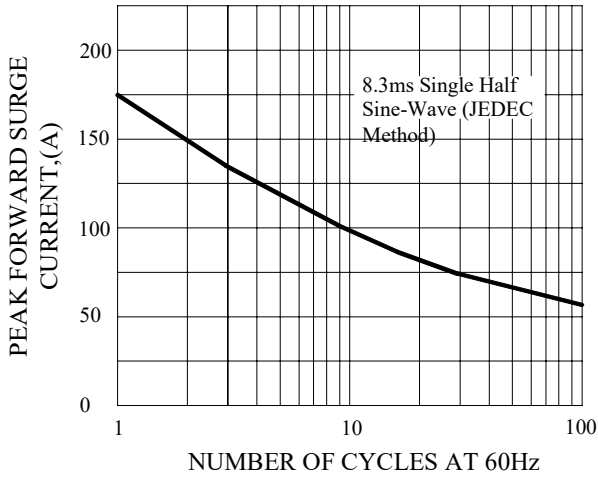


FIG.4-TYPICAL JUNCTION CAPACITANCE

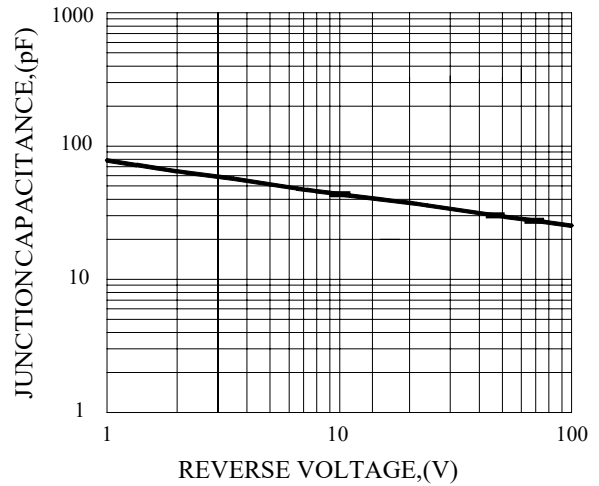


FIG.5-TYPICAL REVERSE CHARACTERISTICS

