BT05S thru BT10S

SURFACE MOUNT GLASS PASSIVATED BRIDGE RECTIFIERS

REVERSE VOLTAGE - **50** to **1000** Volts
FORWARD CURRENT - **0.8** Ampere

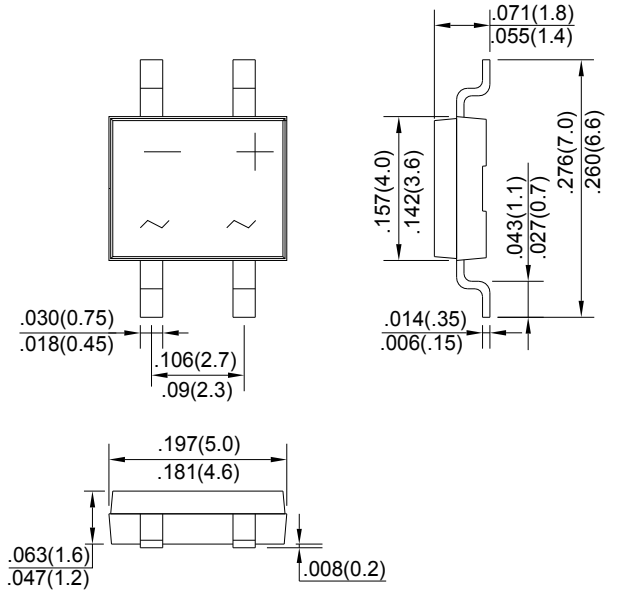
FEATURES

- Rating to 1000V PRV
- Ideal for printed circuit board
- Reliable low cost construction utilizing molded plastic technique results in inexpensive product
- Lead tin plated copper

MECHANICAL DATA

- Polarity:Symbol molded on body
- Mounting position :Any

BTS



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25℃ ambient temperature unless otherwise specified.

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

For capacitive load, derate current by 20%

CHARACTERISTICS	SYMBOL	BT05S	BT1S	BT2S	BT4S	BT6S	BT8S	BT10S	UNIT
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	V_{RMS}	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current (Note 1) @T_A=40 ℃	$I_{(AV)}$	0.8							A
Peak Forward Surge Current 8.3ms Single Half Sine-Wave Super Imposed on Rated Load(JEDEC Method)	I_{FSM}	30							A
I^2t Rating for Fusing (t<8.3ms)	I^2t	3.7							A^2s
Peak Forward Voltage at 0.8A DC	V_F	1.05							V
Maximum DC Reverse Current @T_J=25℃ at Rated DC Bolcking Voltage @T_J=125℃	I_R	5 500							μA
Typical Junction Capacitance Per Element (Note2)	C_J	15							pF
Typical Thermal Resistance (Note3)	$R_{\theta JA}$	75							℃/W
Operating Temperature Range	T_J	-55 to +150							℃
Storage Temperature Range	T_{STG}	-55 to +150							℃

NOTES:1.Mounted on P.C. board.

2.Measured at1.0MHz and applied reverse voltage of 4.0V DC.

3.Thermal resistance junction to ambient

4.The typical data above is for reference only(典型值仅供参考).

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RATING AND CHARACTERTIC CURVES
BT05S thru BT10S

FIG.1-FORWARD CURRENT DERATING CURVE

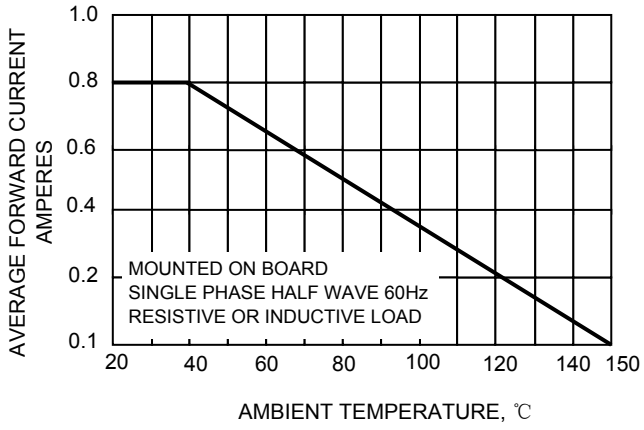


FIG.2 - MAXIMUM NON-REPETITIVE SURGE CURRENT

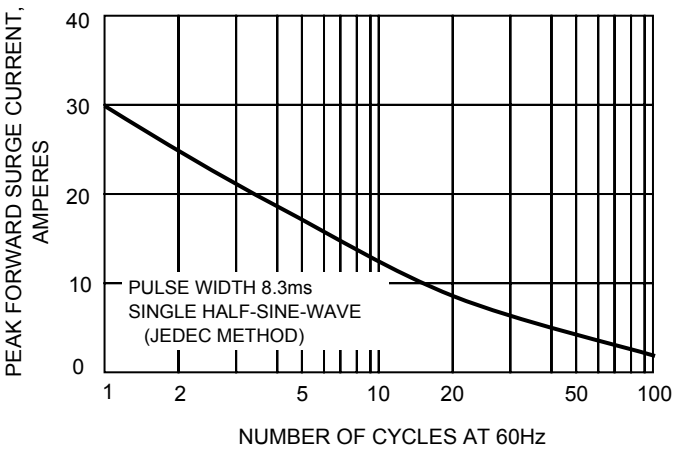


FIG.3-TYPICAL REVERSE CHARACTERISTICS

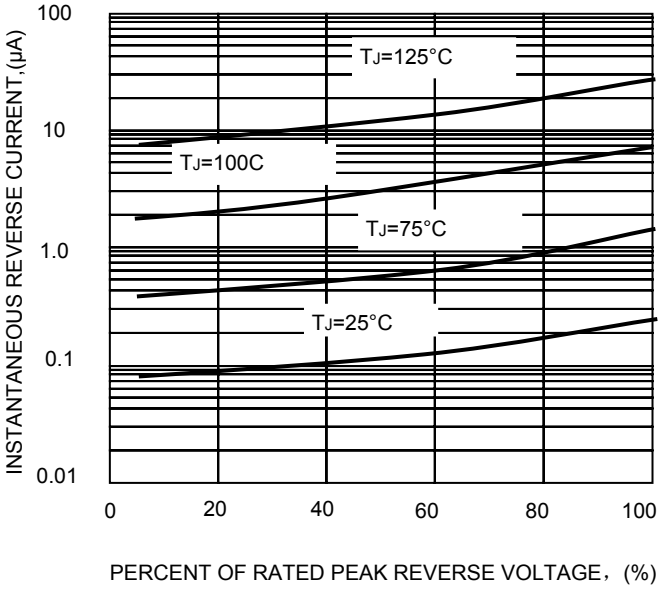


FIG.4-TYPICAL FORWARD CHARACTERISTICS

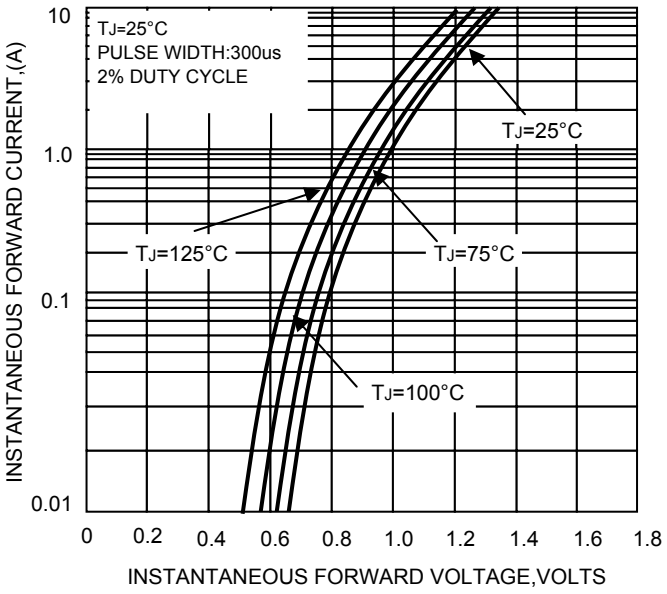
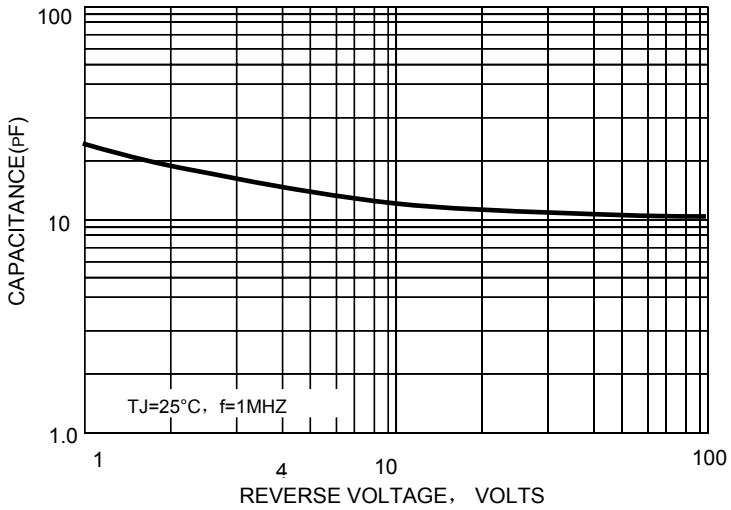


FIG.5-TYPICAL JUNCTION CAPACITANCE



The curve graph is for reference only, can't be the basis for judgment(曲线图仅供参考)!

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