

2A SURFACE MOUNT GLASS PASSIVATED BRIDGE RECTIFIER

FEATURES:

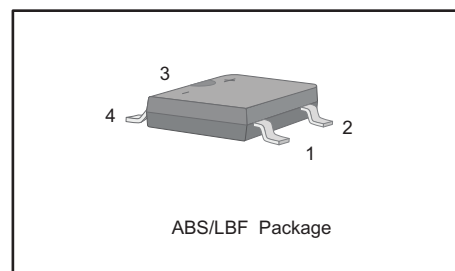
- Glass Passivated Chip Junction
- Reverse Voltage - 2000 V
- Forward Current - 2 A
- High Surge Current Capability
- Designed for Surface Mount Application

MECHANICAL DATA

- Case: ABS/LBF
- Terminals: Solderable per MIL-STD-750, Method 2026
- Approx. Weight: 88mg/0.0031oz

PINNING

PIN	DESCRIPTION
1	Input Pin (~)
2	Input Pin (~)
3	Output Anode (+)
4	Output Cathode (-)



Maximum Ratings and Electrical characteristics

Ratings at 25 °C ambient temperature unless otherwise specified.

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

Parameter	Symbols	TB20S-20	Units
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	2000	V
Maximum RMS voltage	V_{RMS}	1400	V
Maximum DC Blocking Voltage	V_{DC}	2000	V
Average Rectified Output Current at $T_L=88\text{ }^\circ\text{C}$	I_O	2.0	A
Peak Forward Surge Current 8.3 ms Single Half Sine Wave Superimposed on Rated Load (JEDEC Method)	I_{FSM}	40	A
I^2t Rating for Fusing($T < 8.3\text{ms}$)	I^2t	6.7	A^2S
Forward Voltage per element @ $I_F=1.0\text{A}$ @ $I_F=2.0\text{A}$	V_F	1.05 1.3	V
Maximum DC Reverse Current at Rated DC Blocking Voltage @ $T_A=25\text{ }^\circ\text{C}$ @ $T_A=125\text{ }^\circ\text{C}$	I_R	5.0 100	μA
Typical Junction Capacitance (Note1)	C_j	12	pF
Typical Thermal Resistance (Note2)	$R_{\theta JA}$ $R_{\theta JL}$ $R_{\theta JC}$	40 20 10	$^\circ\text{C/W}$
Operating and Storage Temperature Range	T_j, T_{stg}	-55 ~ +150	$^\circ\text{C}$

Note: 1. Measured at 1MHz and applied reverse voltage of 4 V D.C.

2. Mounted on glass epoxy PC board with $4 \times 1.5" \times 1.5"$ ($3.81 \times 3.81\text{ cm}$) copper pad.



Fig.1 Average Rectified Output Current Derating Curve

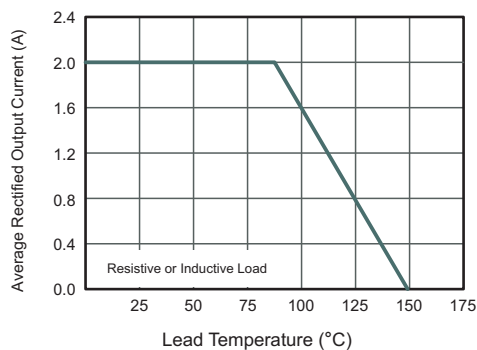


Fig.2 Typical Reverse Characteristics

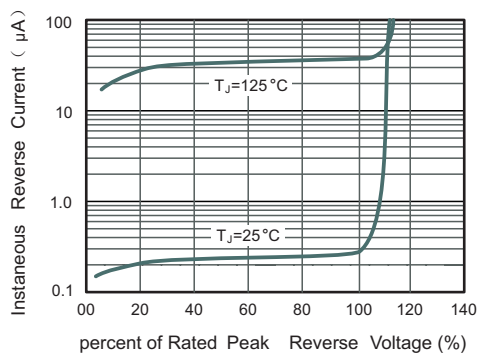


Fig.3 Typical Instantaneous Forward Characteristics

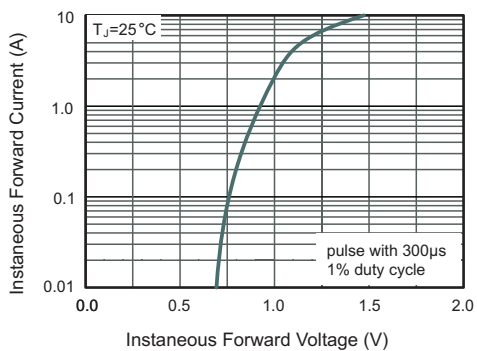


Fig.4 Typical Junction Capacitance

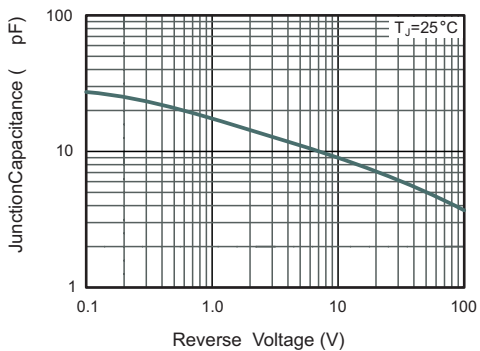
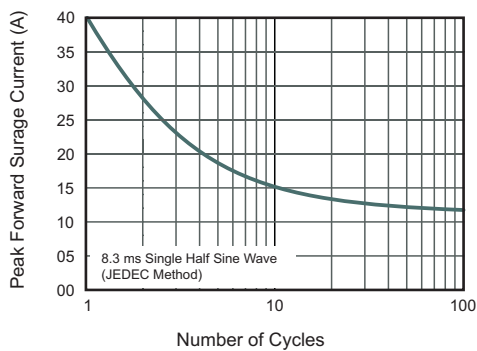


Fig.5 Maximum Non-Repetitive Peak Forward Surge Current

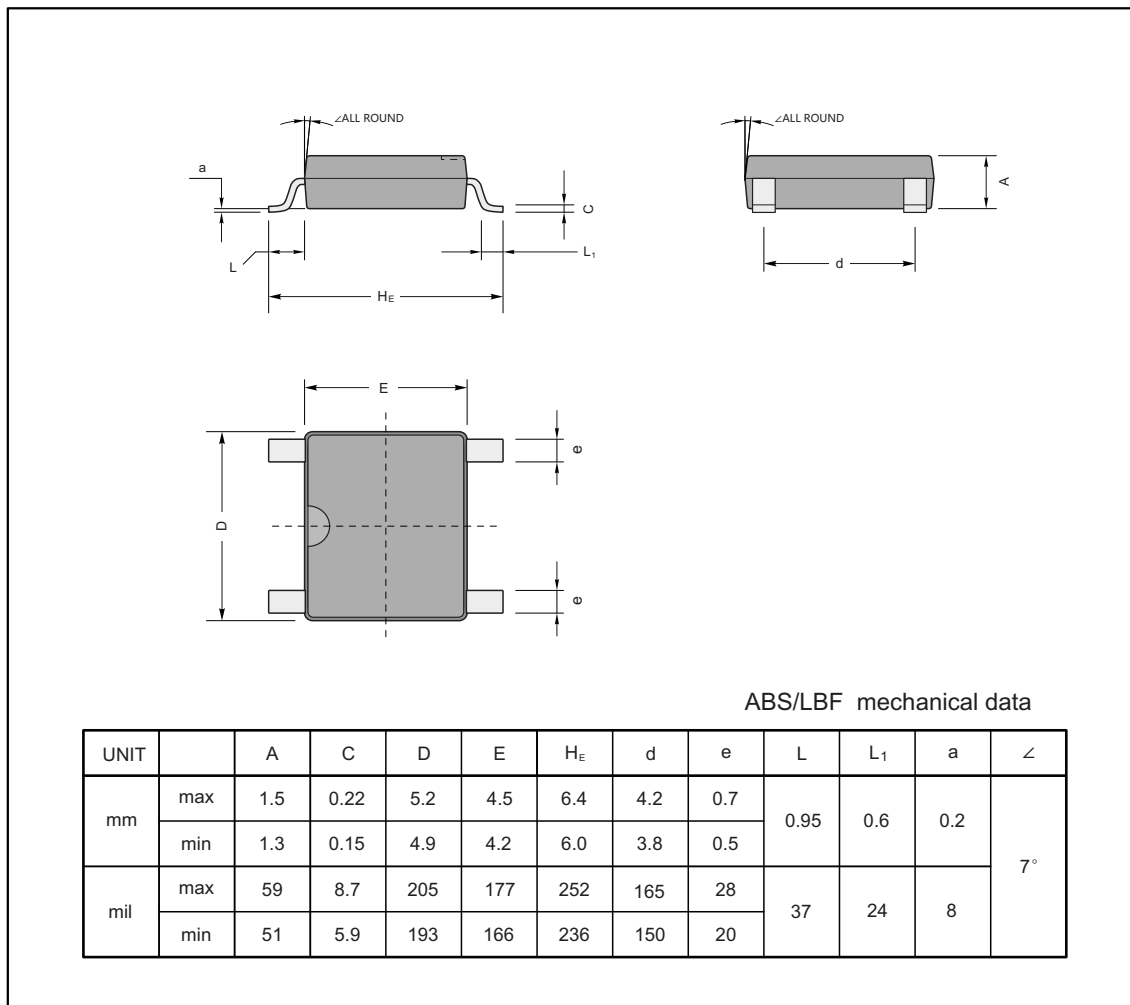




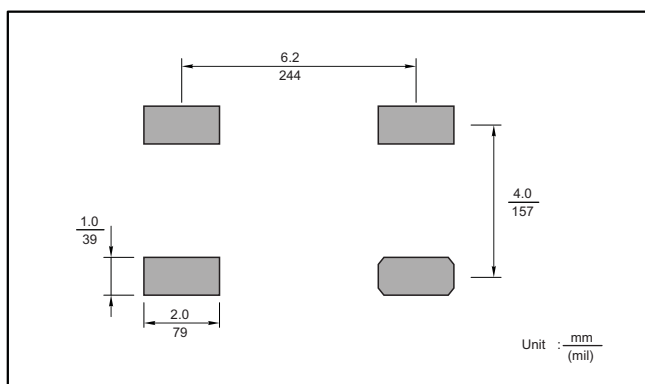
PACKAGE OUTLINE

Plastic surface mounted package; 4 leads

ABS/LBF



The recommended mounting pad size



Marking

Type number	Marking code
TB20S-20	20T20



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