

DBS SILICON BRIDGE RECTIFIER

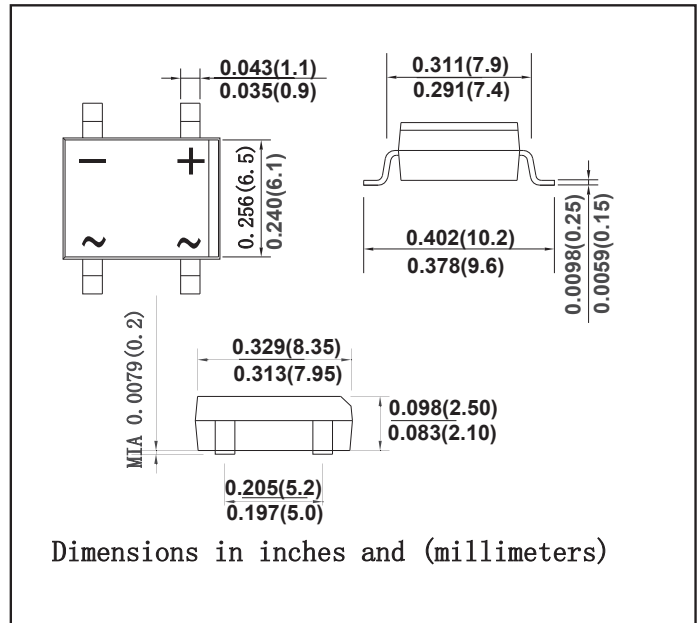
REVERSE VOLTAGE: 50 --- 1000V CURRENT: 1.0A

Features

- Glass passivated die construction
- Low forward voltage drop
- High current capability
- High surge current capability
- Designed for surface mount application
- Plastic material-UL flammability 94V-0

Mechanical Data

- Case: DB-S, molded plastic
- Terminals: plated leads solderable per MIL-STD-202, Method 208
- Polarity: as marked on case
- Mounting position: Any
- Marking: type number
- Lead Free: For RoHS / Lead Free Version



MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted) Single phase, half wave, 60 Hz, resistive or inductive load.

For capacitive load, derate by 20%.

TYPE NUMBER	SYMBOL	DB101S	DB102S	DB103S	DB104S	DB105S	DB106S	DB107S	UNITS
Peak Repetitive Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	V _{RRM}	50	100	200	400	600	800	1000	V
	V _{RWM}								
	V _{DC}								
RMS Reverse Voltage	V _{RMS}	35	70	140	280	420	560	700	V
Average Rectified Output Current (Note 1)@T _C =100℃	IMF(AV)	1.0							A
Non-Repetitive Peak Forward Surge Current 8.3ms Single half sine-wave superimposed on rated load (JEDEC Method)	I _{FSM}	45							A
I ² t Rating for Fusing (t < 8.3ms)	I ² t	8.404							A ² s
Forward Voltage per element @IF=1.0A	V _{FM}	1.0							V
Peak Reverse Current @T _A =25℃ At Rated DC Blocking Voltage @T _A =125℃	I _R	5.0 200							uA
Typical Junction Capacitance per leg (Note 2)	C _J	25							pF
Typical Thermal Resistance per leg	R _{θJA}	40							℃/W
	R _{θJL}	15							
Operating and Storage Temperature Range	T _J ,T _{STG}	-55to+150							℃

Note: 1. Mounted on glass epoxy PC board with 1.3mm² solder pad.

2. Measured at 1.0 MHz and applied reverse voltage of 4.0V D.C.

RATINGS AND CHARACTERISTIC CURVES

Fig. 1 Output Current Derating Curve

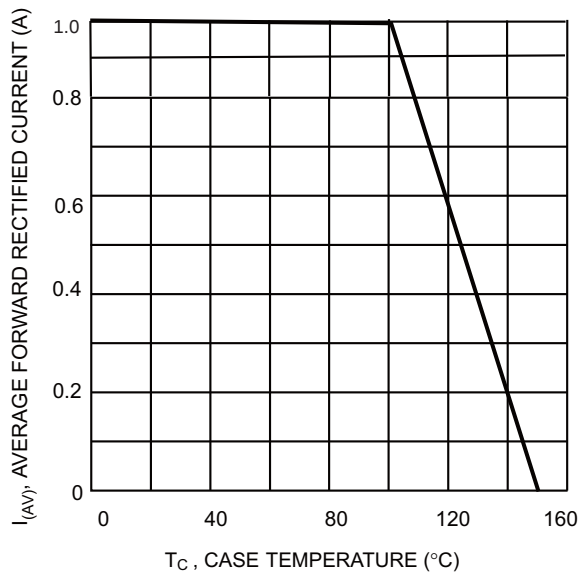


Fig. 2 Typical Forward Characteristics (per leg)

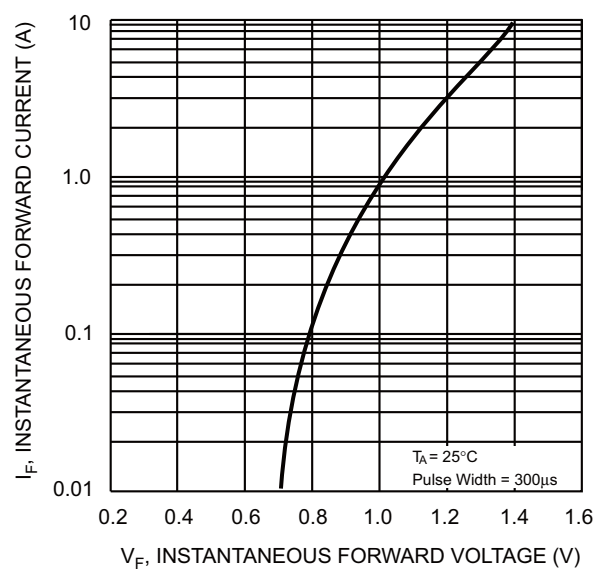


Fig. 3 Maximum Peak Forward Surge Current (per leg)

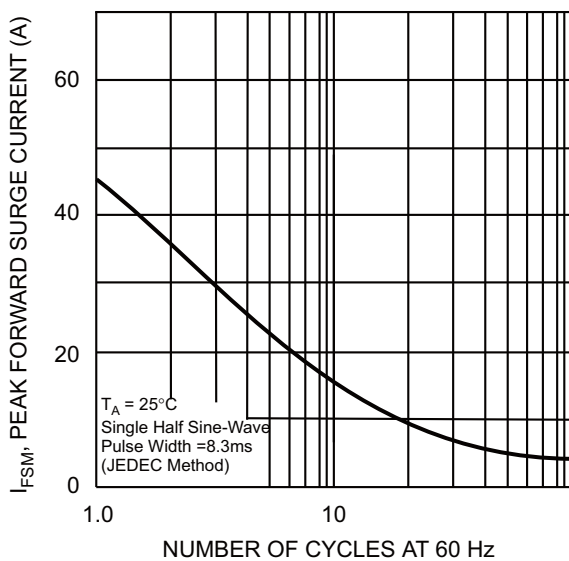


Fig. 4 Typical Reverse Characteristics (per element)

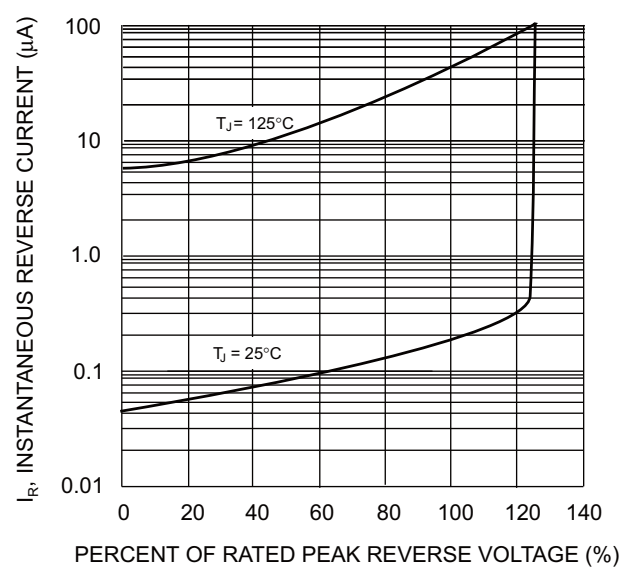


Fig. 5 Mounting Pad Layout

