

# B40S-B500S

Glass Passivated Silicon Bridge Rectifiers

**VOLTAGE RANGE: 80 -- 1000 V**

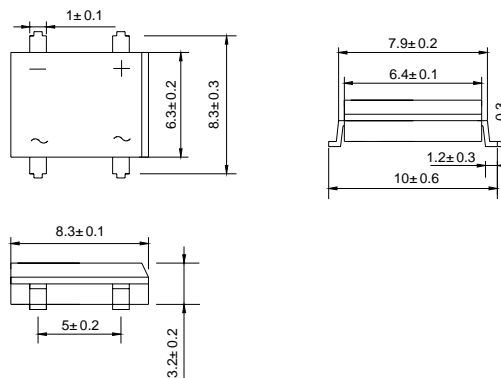
**CURRENT: 0.8 A**

**DB-S**



## Features

- ◇ Rating to 1000 V
- ◇ Low forward voltage drop
- ◇ Small size, plastic case
- ◇ Glass passivated junction
- ◇ Weight: 0.016 ounces, 0.45grams
- ◇ Mounting position: Any



Dimensions in millimeters

## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

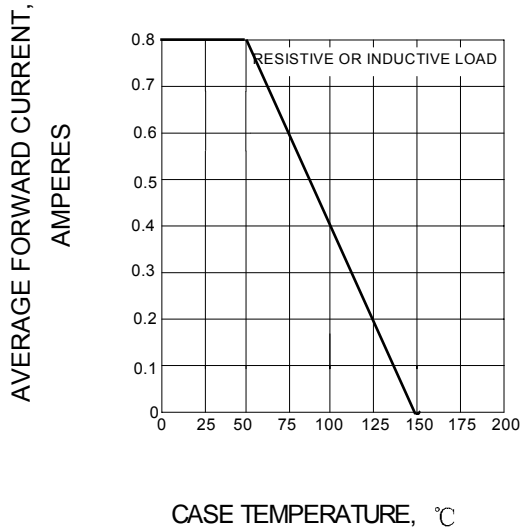
Ratings at 25°C ambient temperature unless otherwise specified.

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

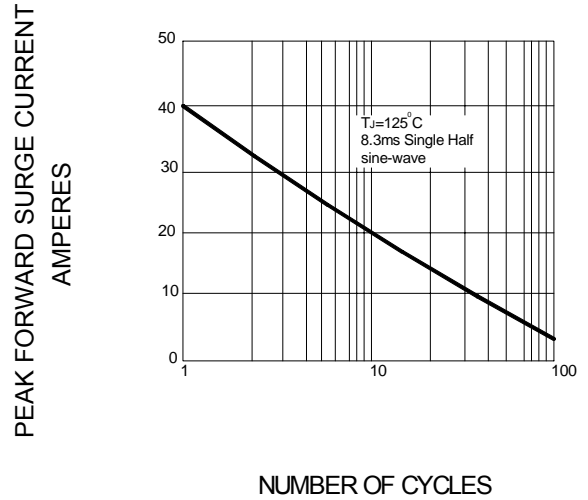
		B40S	B80S	B125S	B250S	B380S	B500S	UNITS
Maximum alternating input voltage	$V_{VRMS}$	50	110	170	420	560	700	V
Repetitive peak reverse voltage	$V_{RRM}$	80	160	250	600	800	1000	V
Maximum average forward rectified output current @T <sub>c</sub> = 50°C	$I_{(AV)}$	0.8						A
Peak forward surge current 8.3ms single half-sine-wave	$I_{FSM}$	40						A
Maximum forward voltage drop per element at 0.4 A	$V_F$	1.1						V
Maximum reverse current at rated DC blocking voltage per element	$I_R$	10.0						μ A
		0.5						mA
Thermal resistance junction to ambient air	$R_{\theta JA}$	60						K/W
Operating temperature range	$T_j$	- 55 --- + 150						°C
Storage temperature range	$T_{STG}$	- 55 --- + 150						°C

## Ratings AND Characteristic Curves

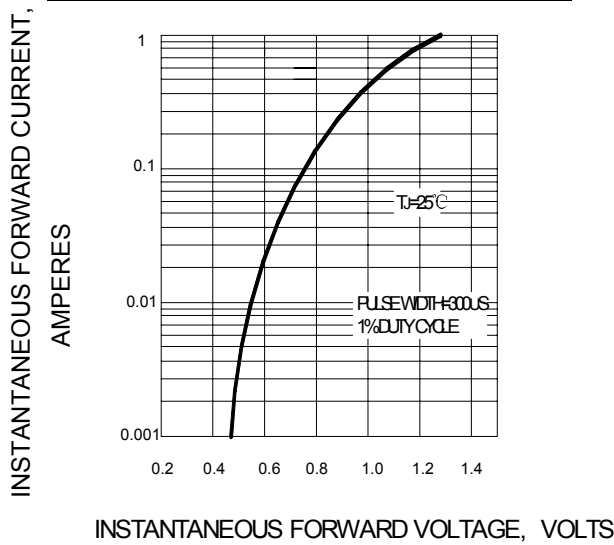
**FIG.1 – FORWARD DERATING CURVE**



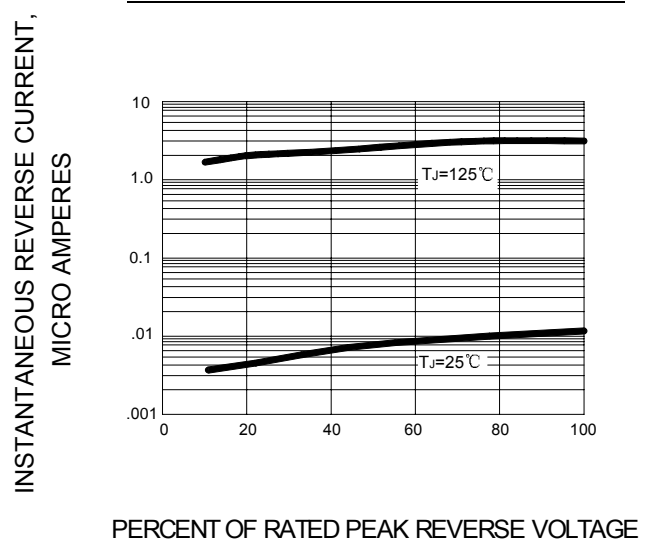
**FIG.2 – PEAK FORWARD SURGE CURRENT**



**FIG.3 – TYPICAL FORWARD CHARACTERISTICS**



**FIG.4 – TYPICAL REVERSE CHARACTERISTIC**



**FIG.5 – TYPICAL JUNCTION CAPACITANCE PER ELEMENT**

