



# D2SB05 THRU D2SB80

Single Phase 1.5 AMPS. Glass Passivated Bridge Rectifiers



Voltage Range  
50 to 800 Volts  
Current  
1.5 Amperes

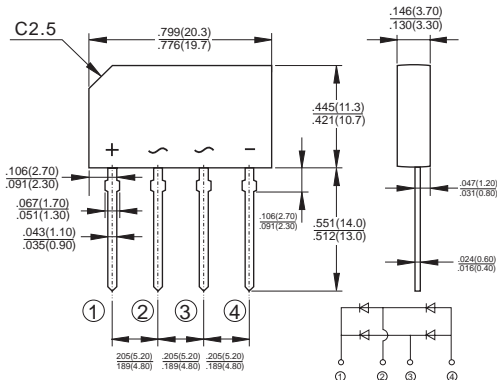
## Features

- ✧ Glass passivated chip junction
- ✧ Ideal for printed circuit board
- ✧ High case dielectric strength
- ✧ Plastic material has Underwriters Laboratory Flammability Classification 94V-0
- ✧ Typical IR less than 0.1 $\mu$ A
- ✧ High surge current capability
- ✧ High temperature soldering guaranteed: 260°C / 10 seconds / .375", (9.5mm) lead lengths.

## Mechanical Data

- ✧ Case: Molded plastic body.
- ✧ Terminals: Plated leads solderable per MIL-STD-750, Method 2026.
- ✧ Weight: 0.071 ounce, 2.0 grams
- ✧ Mounting position: Any

## GBL



## Maximum Ratings and Electrical Characteristics

Rating 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%

Type Number	Symbol	D2SB 05	D2SB 10	D2SB 20	D2SB 40	D2SB 60	D2SB 80	Units
Maximum Recurrent Peak Reverse Voltage	$V_{RRM}$	50	100	200	400	600	800	V
Maximum RMS Voltage	$V_{RMS}$	35	70	140	280	420	560	V
Maximum DC Blocking Voltage	$V_{DC}$	50	100	200	400	600	800	V
Maximum Average Forward Rectified Current @ $T_A = 50^\circ\text{C}$	$I_{(AV)}$	1.5						A
Peak Forward Surge Current, 8.3 ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method)	$I_{FSM}$	80						A
Maximum Instantaneous Forward Voltage @ 0.75A	$V_F$	1.05						V
Maximum DC Reverse Current @ $T_A=25^\circ\text{C}$ at Rated DC Blocking Voltage @ $T_A=125^\circ\text{C}$	$I_R$	10.0 500						$\mu\text{A}$ $\mu\text{A}$
Typical Thermal Resistance Per Leg (Note)	$R\theta_{JA}$ $R\theta_{JL}$	47.0 10.0						$^\circ\text{C}/\text{W}$
Operating Temperature Range	$T_J$	-55 to +150						$^\circ\text{C}$
Storage Temperature Range	$T_{STG}$	-55 to + 150						$^\circ\text{C}$

Notes 1: Units Mounted In Free Air No Heat Sink On PCB 0.4" x 0.4" (10mm x 10mm) Copper Pads, 0.375"(9.5mm) Lead Length.



## RATINGS AND CHARACTERISTIC CURVES (D2SB05 THRU D2SB80)

FIG.1- MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT PER BRIDGE ELEMENT

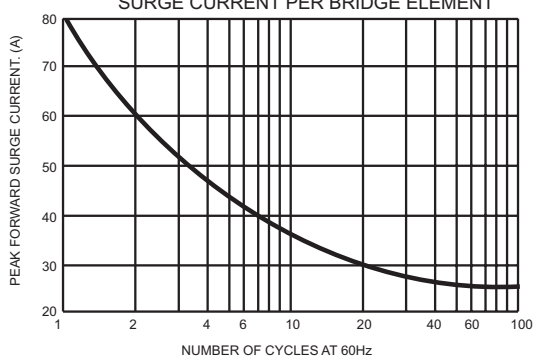


FIG.2- MAXIMUM FORWARD CURRENT DERATING CURVE

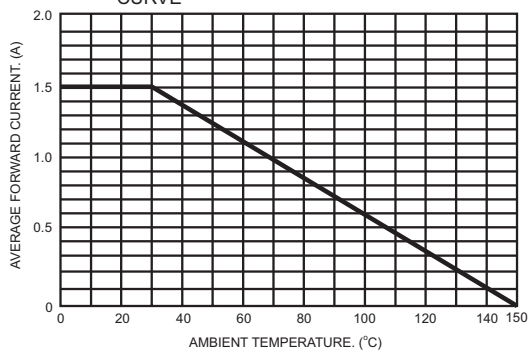


FIG.3- TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS PER BRIDGE ELEMENT

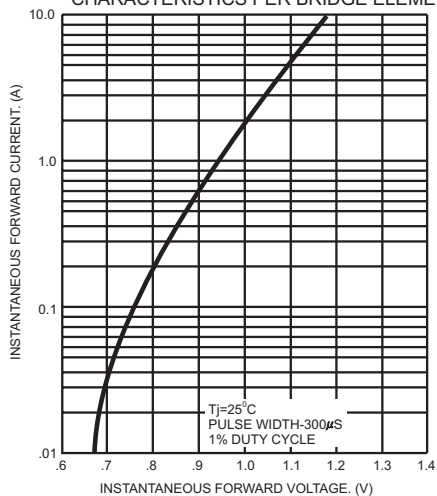


FIG.4- TYPICAL REVERSE CHARACTERISTICS PER BRIDGE ELEMENT

