

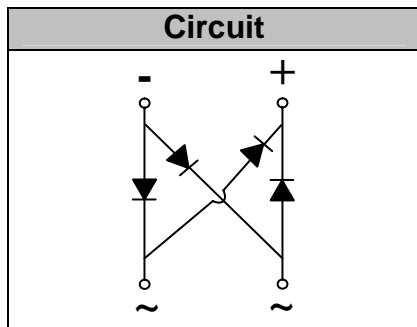
## Glass Passivated Single Phase Bridge Rectifiers



**Reverse Voltage** 200 to 1000V  
**Forward Current** 1.0 Amp

### Features

- Glass passivated die construction
- Ideal for automatic insertion
- Plastic material used carries UL flammability recognition 94V-0
- High surge current capability



### Mechanical Data

**Case:** Molded plastic case  
**Terminals:** Plated leads solderable per MIL-STD-750, Method 2026  
**Polarity:** Marked on Body  
**Mounting Position:** Any

### Module Type

TYPE	VRRM	VRSM
DB103	200V	300V
DB104	400V	500V
DB105	600V	700V
DB106	800V	900V
DB107	1000V	1100V

### Maximum Ratings and Thermal Characteristics (TA = 25°C unless otherwise noted)

Symbol	Conditions	Values	Units
IF(AV)	Maximum average forward output rectified current Tc = 40°C	1.0	A
IFSM	Peak forward surge current single half sine-wave superimposed on rated load (JEDEC Method)	30	A
i <sup>2</sup> t	Rating for fusing (t<8.3ms)	3.7	A <sup>2</sup> s
Visol	a.c.50HZ;r.m.s.;1min	2500	V
RθJA RθJC	Maximum thermal resistance per leg	40 15	°C/W
Tj, TSTG	Operating Junction and storage temperature range	-55 to +150	°C
Weight	Approximate Weight	0.4	g

### Electrical Characteristics (TA = 25°C unless otherwise noted)

Symbol	Conditions	Values	Units
VF	Maximum Instantaneous Forward Voltage per leg IFM = 1.0A	1.1	V
IR	Maximum DC reverse current at rated DC blocking voltage per leg TA = 25°C TA = 125°C	5.0 500	µA
CJ	Typical Junction Capacitance per leg VR=4.0V 1.0MHZ	25	pF

Notes: (1) Thermal resistance from junction to ambient and from junction to lead mounted on P.C.B. with 0.47x0.47" (12 x12mm) copper pads.

## Performance Curves

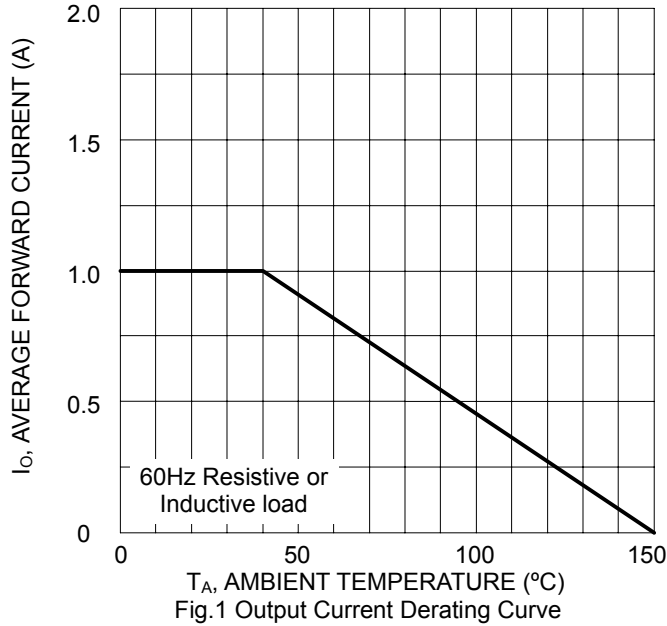


Fig.1 Output Current Derating Curve

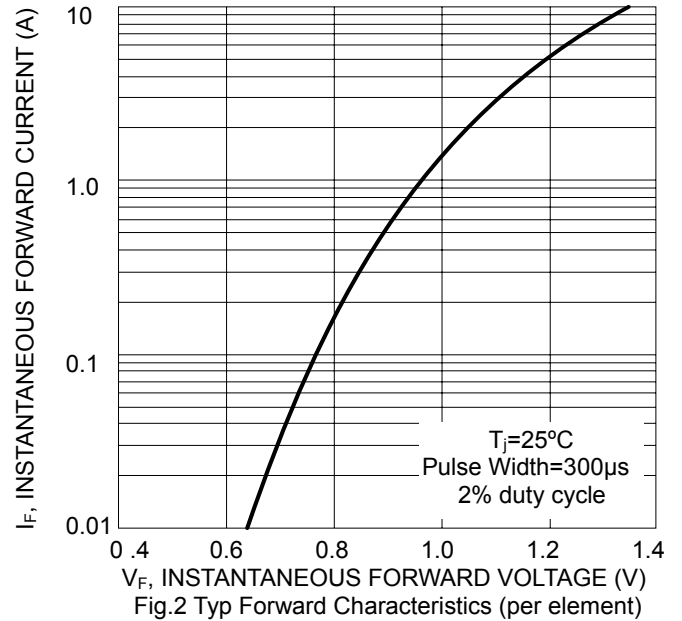


Fig.2 Typ Forward Characteristics (per element)

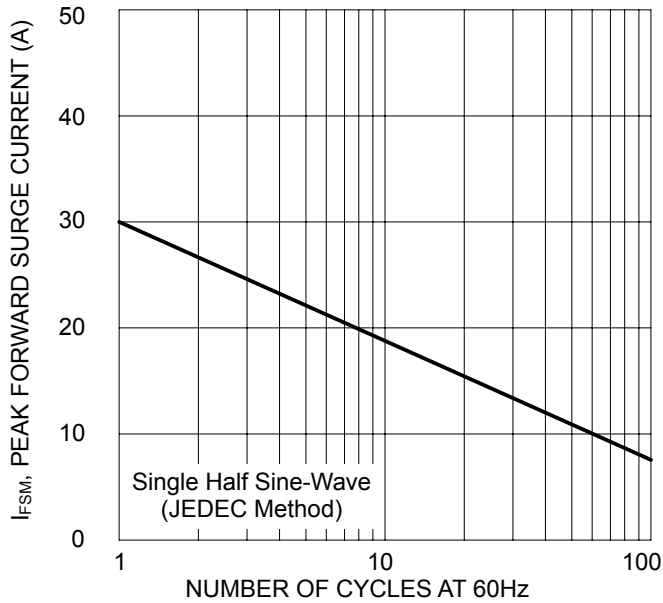


Fig.3 Max Non-Repetitive Peak Forward Surge Current

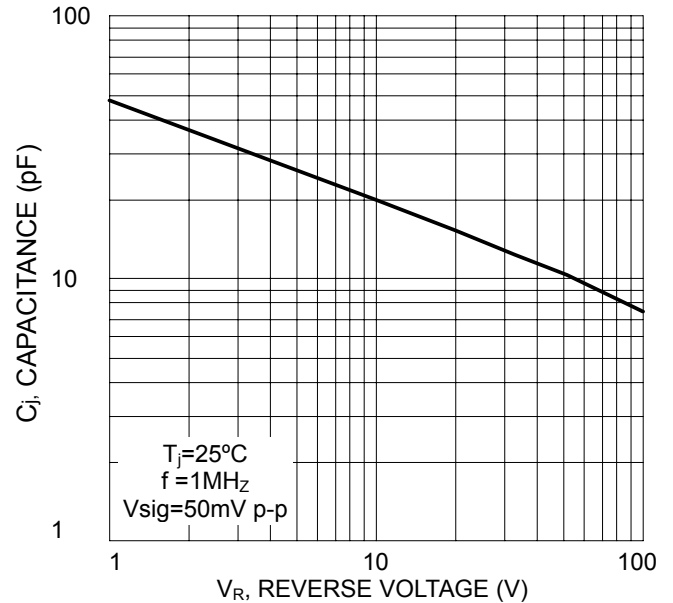


Fig.4 Typ Junction Capacitance (per element)

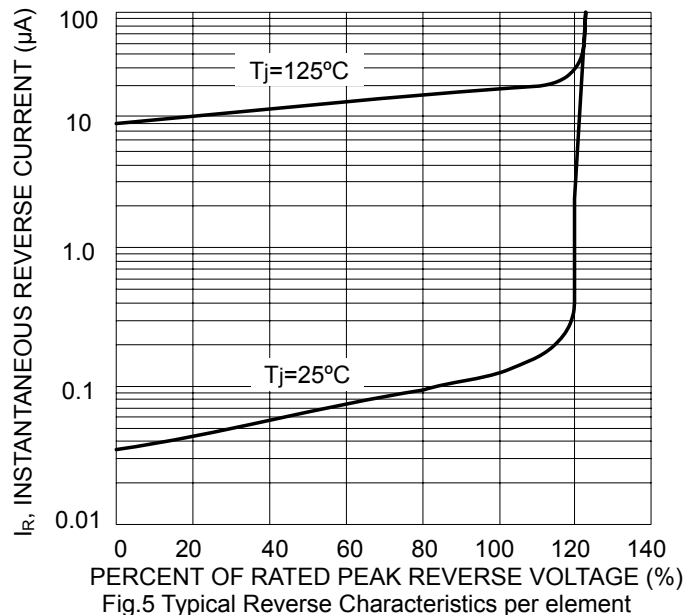
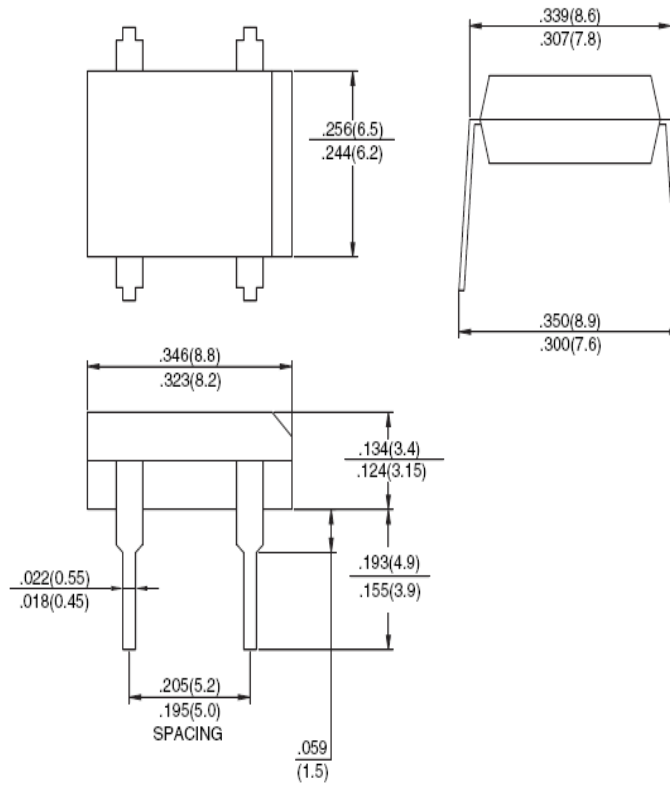


Fig.5 Typical Reverse Characteristics per element

## Package Outline Information

### CASE: DB-1



Dimensions in inches (mm)