

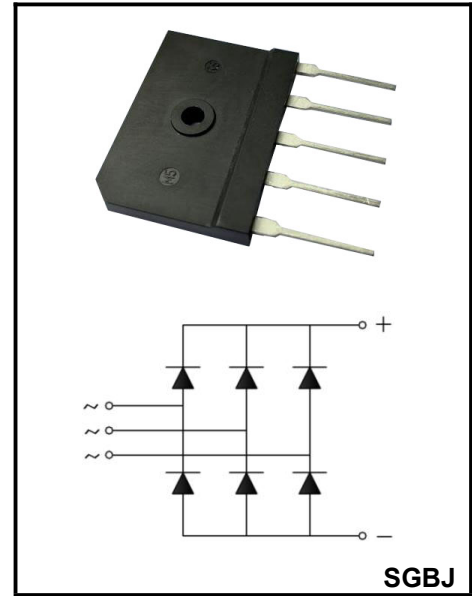
**25A Glass Passivated Single Phase Bridge Rectifiers**

**Voltage - 800 to 1600 V**

**Forward Current – 25A**

**FEATURES**

- Glass passivated die construction
- Ideal for printed circuit boards
- High surge current capability
- High temperature soldering guaranteed:  
265°C /10 seconds, 0.375" (9.5mm) lead length, 5lbs. (2.3kg) tension



**MECHANICAL DATA**

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

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

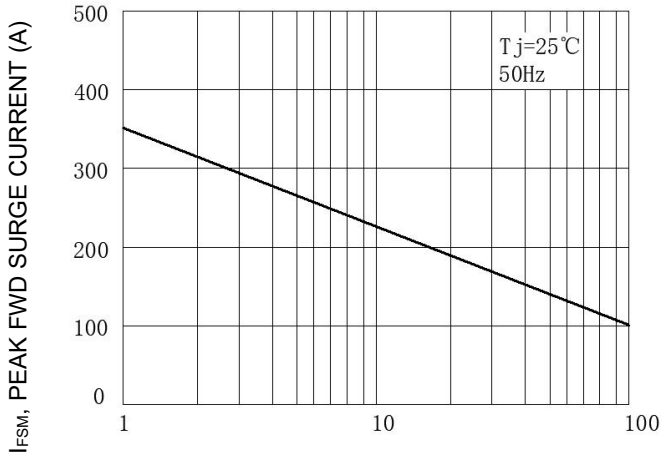
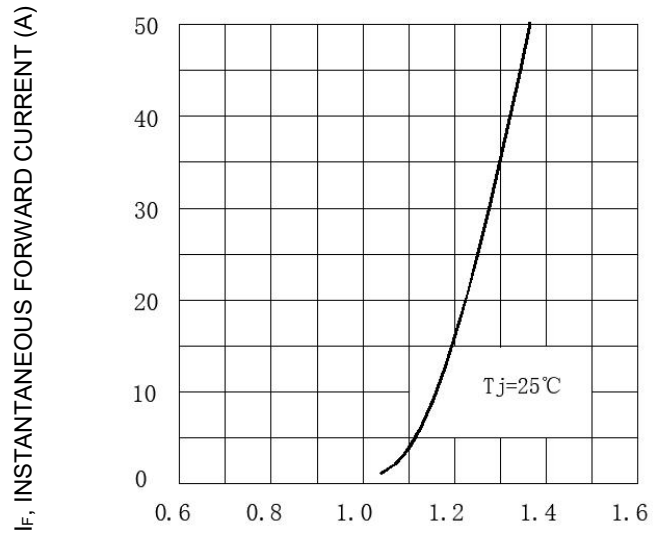
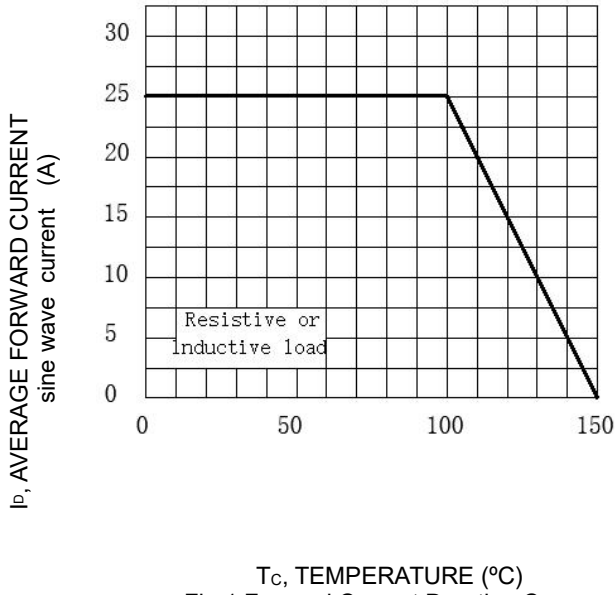
Parameter	Symbols	SGBJ2508	SGBJ2510	SGBJ2512	SGBJ2514	SGBJ2516	Units
Maximum Repetitive Peak Reverse Voltage	$V_{RRM}$	800	1000	1200	1400	1600	V
Maximum RMS voltage	$V_{RMS}$	900	1100	1300	1500	1700	V
Maximum DC Blocking Voltage	$V_{DC}$	800	1000	1200	1400	1600	V
average forward output current sine wave ,R-load Tc =100°C	$I_D$	25					A
Peak forward surge current single half sine-wave superimposed on rated load (JEDEC Method) 50Hz Tj=25°C	$I_{FSM}$	350					A
Rating for fusing (t=1~10ms)	$I^2t$	612					A <sup>2</sup> s
A.C.50/60Hz;R.M.S.;1min	$V_{ISO}$	2500					V
Operating Junction and storage temperature range	Tj, Tstg	-40 to +150					°C
Mounting Torque (Recommended torque:0.65 N·m)	Ms	0.8					N·m
Approximate Weight	Wt	10					g

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

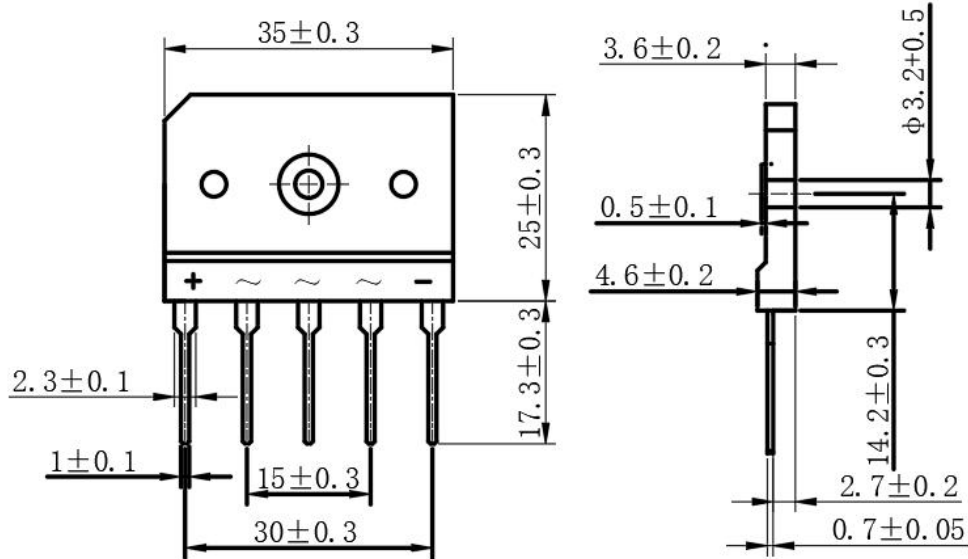
Parameter	Symbols	Values	Units
Maximum Forward Voltage per leg $I_F = 12.5A$ Tj=25°C	$V_{FM}$	1.18	V
Maximum reverse current at rated blocking voltage per leg Tj = 150°C	$I_{RRM}$	3	mA
Maximum thermal resistance per (1) per diode total	$R_{th(j-c)}$	9 1.5	°C/W

Notes: (1) Junction to case

**Performance Curves**



**Fig.3 Max Non-Repetitive Surge Current**



Dimensions in inches (mm)

### Summary of Packing Options

Package	Packing Description	Packing Quantity	Industry Standard
SGBJ	BOX	100	EIA-481-1