

**GLASS PASSIVATED BRIDGE RECTIFIERS**

REVERSE VOLTAGE - **400 to 1000** Volts  
FORWARD CURRENT - **6.0** Amperes

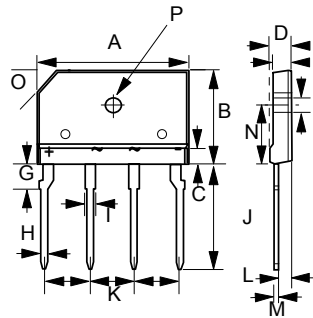
**FEATURES**

- Rating to 1000V PRV
- Ideal for printed circuit board
- Reliable low cost construction utilizing molded plastic technique
- The plastic material has UL flammability classification 94V-0
- UL recognized file # E95060

**MECHANICAL DATA**

- Polarity : Symbols molded on body
- Weight : 0.16 ounces, 4.6 grams
- Mounting position : Any

**KBJ**



KBJ		
DIM.	MIN.	MAX.
A	24.80	25.20
B	14.70	15.30
C	3.90	4.10
D	4.40	4.80
E	3.40	3.80
F	3.10 $\varnothing$	3.40 $\varnothing$
G	3.30	3.70
H	0.90	1.10
I	1.50	1.90
J	17.2	17.80
K	7.30	7.70
L	2.50	2.90
M	0.60	0.80
N	9.30	9.70
O	3.0 x 45°	
P	3.10 $\varnothing$	3.40 $\varnothing$

All Dimensions in millimeter

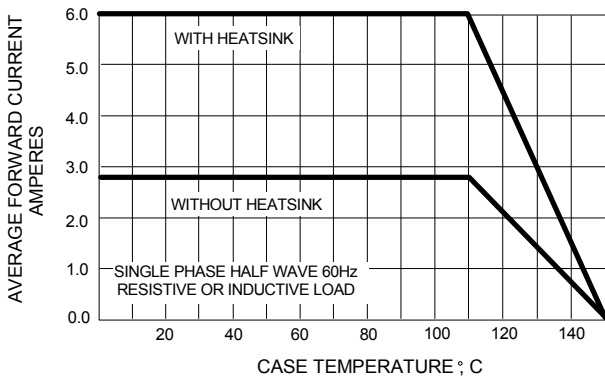
**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Ratings at 25°C ambient temperature unless otherwise specified.  
Single phase, half wave, 60Hz, resistive or inductive load.  
For capacitive load, derate current by 20%

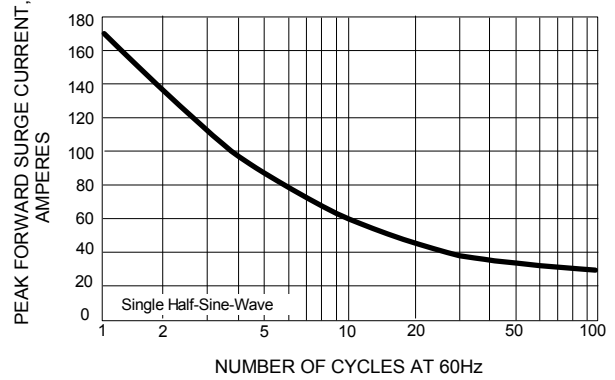
CHARACTERISTICS	SYMBOL	KBJ 604G	KBJ 606G	KBJ 608G	KBJ 610G	UNIT
Maximum Recurrent Peak Reverse Voltage	VRRM	400	600	800	1000	V
Maximum RMS Voltage	VRMS	280	420	560	700	V
Maximum DC Blocking Voltage	VDC	400	600	800	1000	V
Maximum Average Forward (with heatsink Note 2) Rectified Current @TC =110°C (without heatsink)	I(AV)	6.0 2.8				A
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load	IFSM	170				A
Maximum forward Voltage at 3.0A DC	VF	1.0				V
Maximum DC Reverse Current @TJ =25°C at Rated DC Blocking Voltage @TJ =125°C	IR	5.0 500				uA
I <sup>2</sup> t Rating for fusing (t < 8.3ms)	I <sup>2</sup> t	120				A <sup>2</sup> S
Typical Junction Capacitance per element (Note 1)	CJ	45				pF
Typical Thermal Resistance (Note 2)	R $\theta$ JC	3.0				°C/W
Operating Temperature Range	TJ	-55 to +150				°C
Storage Temperature Range	TSTG	-55 to +150				°C

NOTES : 1. Measured at 1.0MHz and applied reverse voltage of 4.0V DC.  
2. Unit Mounted on 75mm x 75mm x 1.6mm Cu Plate Heatsink.

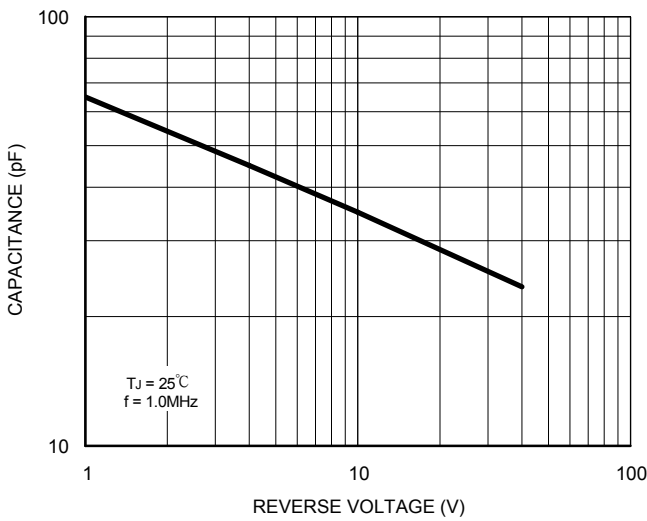
**FIG.1 - FORWARD CURRENT DERATING CURVE**



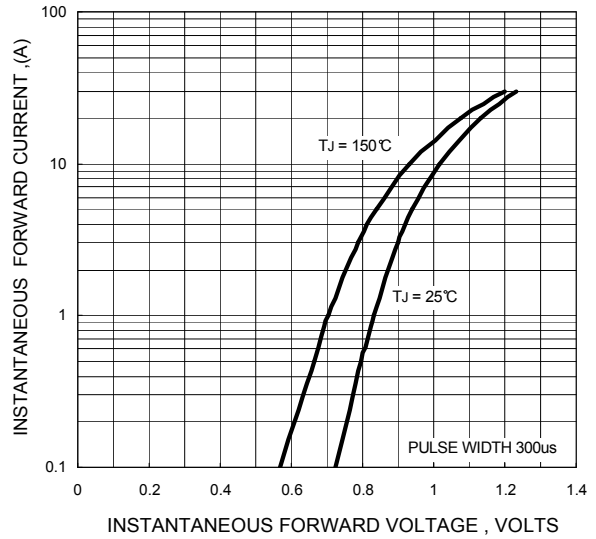
**FIG.2 - MAXIMUM NON-REPETITIVE SURGE CURRENT**



**FIG.3 - TYPICAL JUNCTION CAPACITANCE**



**FIG.4 - TYPICAL FORWARD CHARACTERISTICS**



**FIG.5 - TYPICAL REVERSE CHARACTERISTICS**

