Single Phase Glass Passivated Bridge Rectifier

Features

- Plastic package has UL flammability
  Glass passivated chip junction
- High case dielectric strength of 1500 V_{RMS}
- High surge current capability
- High temperature soldering guaranteed:
  260℃/10 seconds, 0.375"(9.5mm) lead length
- RoHS and REACH Compliance

Mechanical Data

Case:	Molded plastic body
Polarity	/
Terminals:	Plated Leads solderable per MIL-STD-750 method 2026
Mounting torque	6 in-lbs max
Mounting position:	Any (note 2)
Weight:	0.15 ounce, 4.0 gram

Maximum Ratings *($T_{Ambient}$=25ºC unless noted otherwise)*

Symbol	Description	KBJ 601G	KBJ 602G	KBJ 603G	KBJ 604G	KBJ 605G	KBJ 606G	KBJ 607G	Unit	Conditions
VRRM	Max Recurrent Peak Reverse Voltage	50	100	200	400	600	800	1000	**V**	
VRMS	Max RMS Voltage	35	70	140	280	420	560	700	**V**	
VDC	Max DC Blocking Voltage	50	100	200	400	600	800	1000	**V**	
I(AV)	Max Average Forward Rectified Current	6.0							**A**	@Tc=100℃
IFSM	Peak Forward Surge Current	175							**A**	8.3ms single half sine-wave (JEDEC method)
TJ,TSTG	Operating and Storage Temperature Range	-55 to +150							℃	
I2t	Rating for Fusing	120							**A2s**	T<8.3mS

Electrical Characteristics *($T_{Ambient}$=25ºC unless noted otherwise)*

Symbol	Description	KBJ 601G	KBJ 602G	KBJ 603G	KBJ 604G	KBJ 605G	KBJ 606G	KBJ 607G	Unit	Conditions
VF	Max Instantaneous Forward Voltage	1.0							**V**	Drop per Bridge element 3.0A
IR	Max DC Reverse Current at Rated DC Blocking Voltage	5.0							**μA**	TA=25℃
		500								Tc=125℃
Rθ-Ja	Typical Thermal Resistance	2.2							℃/W	Note 1
CJ	Typical Junction capacitance per leg	211			94				**pF**	Measured at 1.0MHz/4.0V

Note:

1. Unit mounted on 2.6" X 1.4" X 0.06" (6.5cm x 3.5cm x 0.15cm) AL Plate
2. Recommended mounting position is to bolt down on heat-sink using #6 screw and silicon thermal compound for maximum heat transfer

KBJ601G ~ KBJ607G

RATINGS AND CHARACTERISTIC CURVES KBJ60G ~ KBJ607G

Fig. 1 – Derating Curve
Output Rectified Current

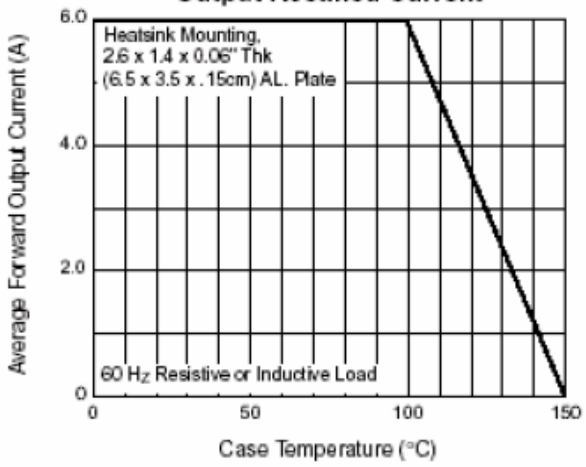


Fig. 2 – Maximum Non-Repetitive Peak
Forward Surge Current Per Leg

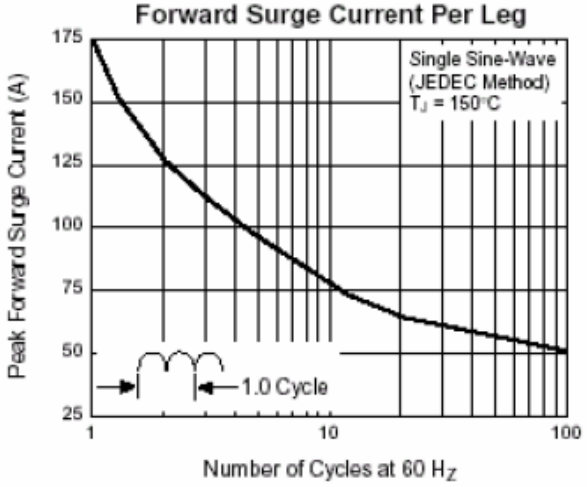


Fig. 3 – Typical Forward
Characteristics Per Leg

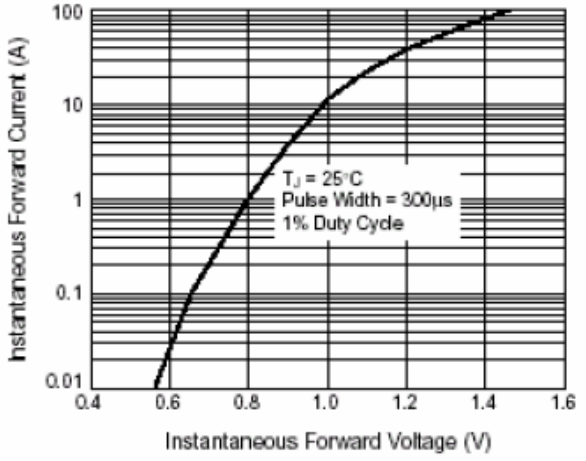


Fig. 4 – Typical Reverse Leakage
Characteristics Per Leg

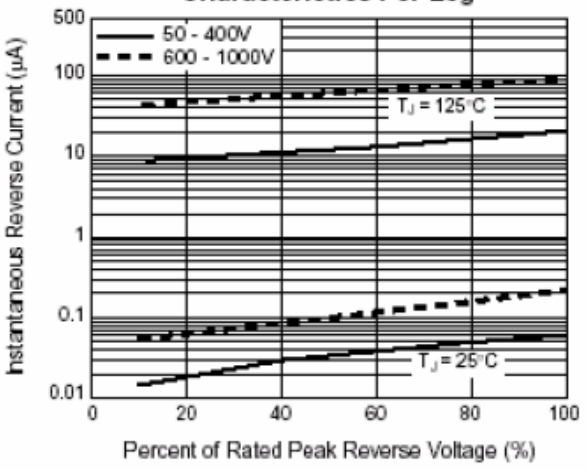


Fig. 5 – Typical Junction
Capacitance Per Leg

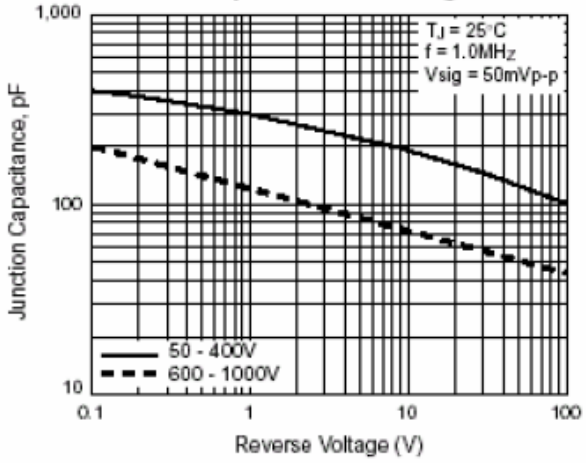
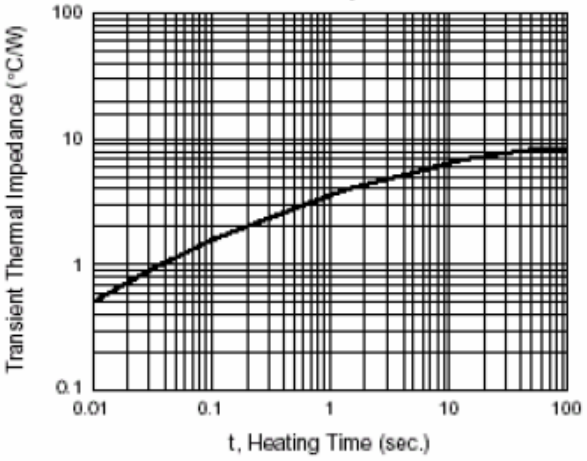
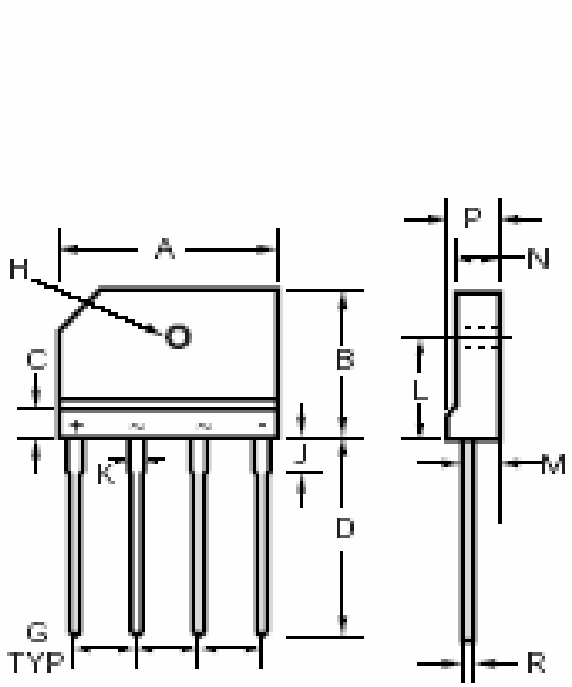


Fig. 6 – Typical Transient
Thermal Impedance



KBJ601G ~ KBJ607G

Dimensions in inches (mm)



KBJ		
Dim	Min	Max
A	24.80	25.20
B	14.70	15.30
C	4.00 Nominal	
D	17.20	17.80
E	0.90	1.10
G	7.30	7.70
H	3.10ø	3.40ø
J	3.30	3.70
K	1.50	1.90
L	9.30	9.70
M	2.50	2.90
N	3.40	3.80
P	4.40	4.80
R	0.60	0.80
All Dimensions In mm		

Contact us:

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