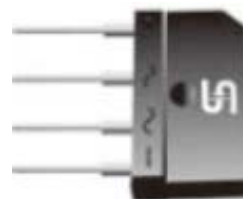


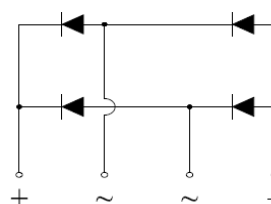
## Glass Passivated Single-Phase Bridge Rectifiers

### FEATURES

- UL Recognized File # E-326243
- Thin Single in-line low profile package ideal for compact required circuit
- Glass passivated junction
- High surge current capability
- Compliant to RoHS Directive 2011/65/EU and in accordance to WEEE 2002/96/EC
- Halogen-free according to IEC 61249-2-21 definition



**KBJL**



### MECHANICAL DATA

**Case :** KBJL

Molding compound, UL flammability classification rating 94V-0  
Base P/N with suffix "G" on packing code - halogen-free, RoHS compliant

**Terminal :** Matte tin plated leads, solderable per JESD22-B102  
Meet JESD 201 class 1A whisker test

**Polarity :** As marked

**Mounting torque :** 5 in-lbs maximum

**Weight :** 2.5 gram (approximately)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (T <sub>A</sub> =25°C unless otherwise noted)					
PARAMETER	SYMBOL	TS10KL60	TS10KL80	TS10KL100	UNIT
Maximum repetitive peak reverse voltage	V <sub>RRM</sub>	600	800	1000	V
Maximum RMS voltage	V <sub>RMS</sub>	420	560	700	V
Maximum DC blocking voltage	V <sub>DC</sub>	600	800	1000	V
Maximum average forward rectified current	I <sub>F(AV)</sub>	10			A
Peak forward surge current, 8.3 ms single half sine-wave superimposed on rated load	I <sub>FSM</sub>	180			A
Rating of fusing ( t<8.3ms)	I <sup>2</sup> T	134			A <sup>2</sup> S
Maximum Instantaneous Forward Voltage (Note 1) IF= 5 A	V <sub>F</sub>	1.0			V
Maximum reverse current @ rated VR T <sub>A</sub> =25 °C T <sub>A</sub> =100 °C	I <sub>R</sub>	5 150			μA
Typical thermal resistance (Note 2)	R <sub>θJC</sub>	11.3			°C/W
Operating junction temperature range	T <sub>J</sub>	- 55 to + 150			°C
Storage temperature range	T <sub>STG</sub>	- 55 to + 150			°C

Note 1 : Pulse test with PW=300u sec, 1% duty cycle

Note 2 : Mount on Heatsink size of 3" x 5" x 0.25" Al-Plate

ORDERING INFORMATION				
PART NO.	PACKING CODE	GREEN COMPOUND CODE	PACKAGE	PACKING
TS10KLXX (Note 1)	T1	Suffix "G"	KBJL	48 / Tray
	C0		KBJL	20 / Tube

Note 1: "xx" defines voltage from 600V (TS10KL60) to 1000V (TS10KL80)

EXAMPLE				
PREFERRED P/N	PART NO.	PACKING CODE	GREEN COMPOUND CODE	DESCRIPTION
TS10KL80 C0	TS10KL80	C0		
TS10KL80 C0G	TS10KL80	C0	G	Green compound

**RATINGS AND CHARACTERISTICS CURVES**

(TA=25°C unless otherwise noted)

FIG.1 FORWARD CURRENT DERATING CURVE PER DEVICE

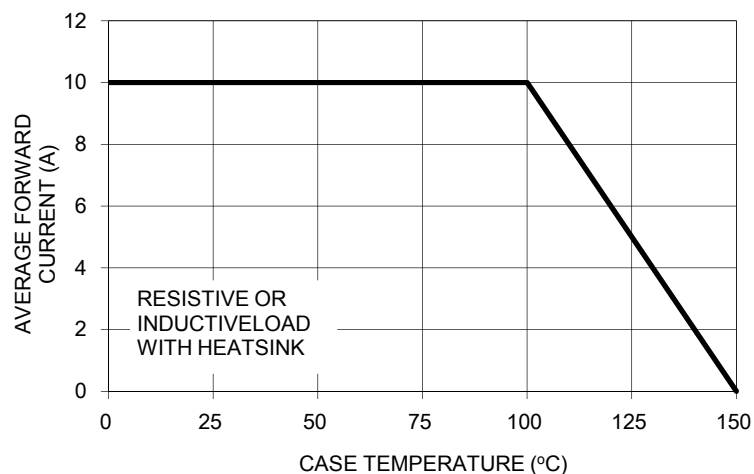


FIG. 2- MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT PER LEG

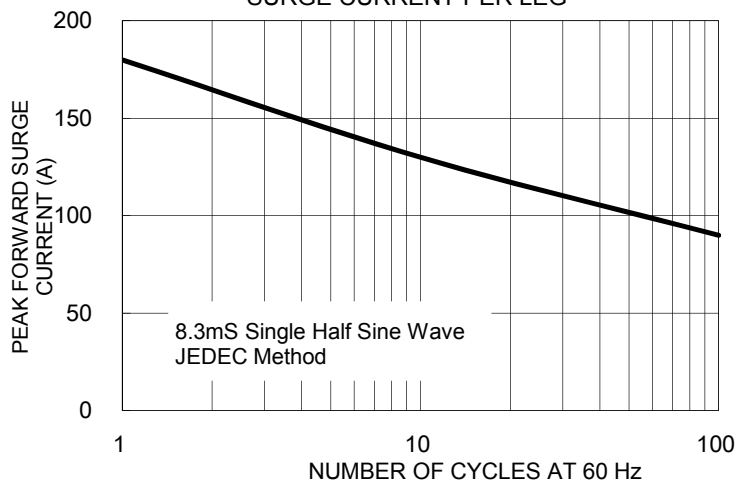


FIG. 3- TYPICAL FORWARD CHARACTERISTICS PER LEG

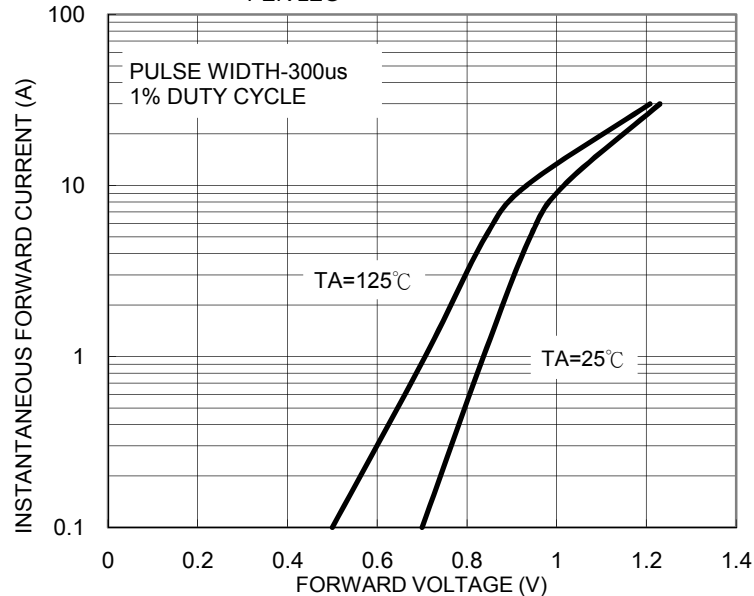


FIG. 4- TYPICAL REVERSE CHARACTERISTICS PER LEG

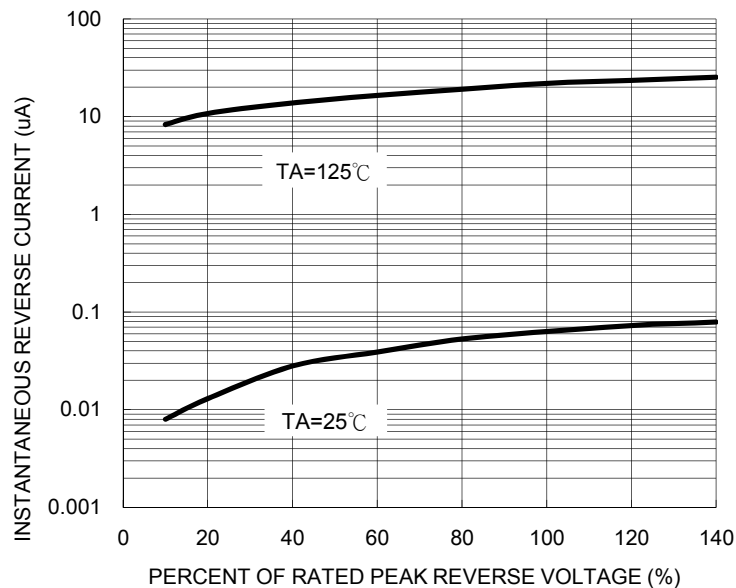
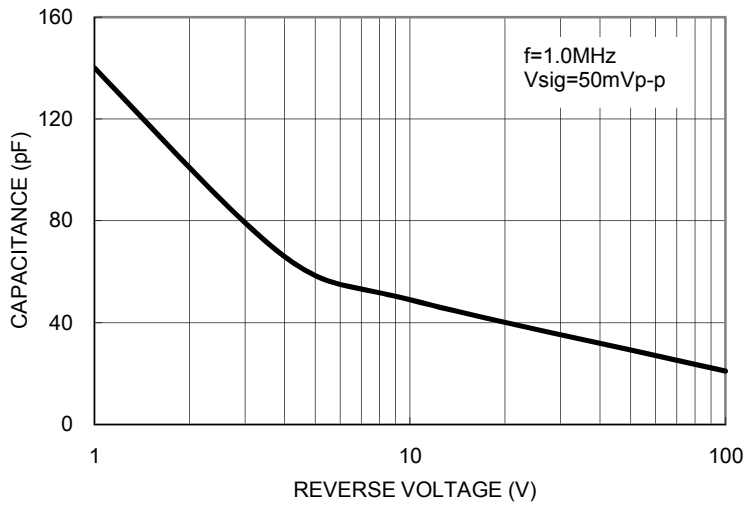
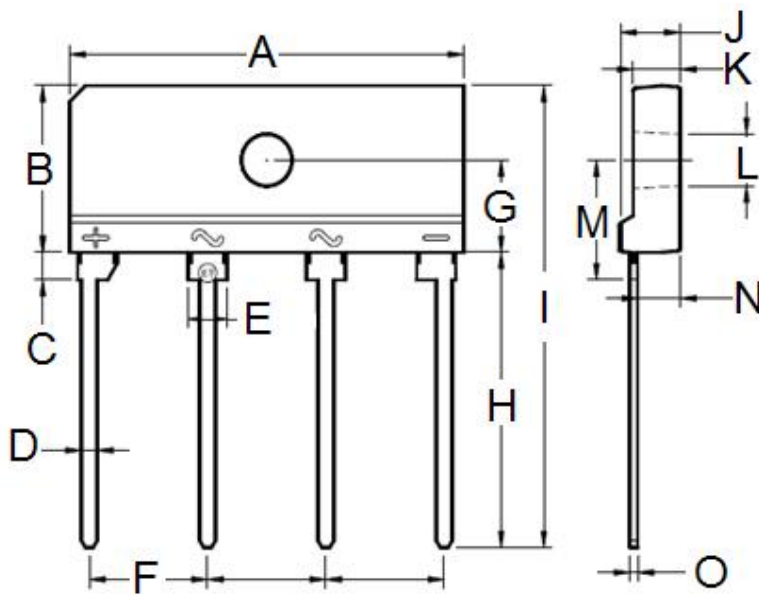


FIG. 5- TYPICAL JUNCTION CAPACITANCE PER LEG



PACKAGE OUTLINE DIMENSIONS



DIM.	Unit(mm)		Unit(inch)	
	Min	Max	Min	Max
A	24.70	25.30	0.972	0.996
B	10.00	10.60	0.394	0.417
C	1.70		0.067	
D	0.90	1.10	0.035	0.043
E	2.30	2.70	0.091	0.106
F	7.30	7.70	0.287	0.303
G	5.50	5.90	0.217	0.232
H	17.70	18.70	0.697	0.736
I	28.50		1.122	
J	3.60	4.00	0.142	0.157
K	2.80	3.20	0.110	0.126
L	3.10	3.40	0.122	0.134
M	7.20	7.60	0.283	0.299
N	2.50	2.90	0.098	0.114
O	0.30	0.70	0.012	0.028

MARKING DIAGRAM



- P/N = Specific Device Code
- G = Green Compound
- YWW = Date Code
- F = Factory Code