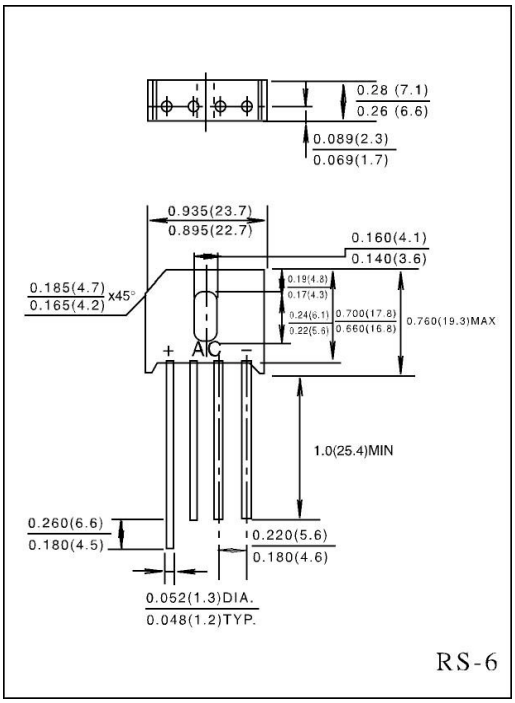
SINGLE-PHASE BRIDGE RECTIFIER

KBU8A THRU KBU8M

VOLTAGE RANGE 50 **to** 1000 **Volts**
CURRENT 8.0 **Ampere**



FEATURES

- Low cost
- This series is UL recognized under component index, file number E127707
- High forward surge current capability
- Ideal for printed circult board
- High temperature soldering guaranteed: 260℃/10 second, 0.375" (9.5mm) lead length at 5 lbs. (2.3kg) tension.

MECHANICAL DATA

- Case: Transfer molded plastic
- Terminal: Lead solderable per MIL - STD - 202E method 208C
- Polarity: Polarity symbols marked on case.
- Mounting: Thru hole for #6 screw, 5 in,- lbs. Torqute Max.
- Weight: 0.27 ounce, 7.59 gram

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

	SYMBOLS	KBU8A	KBU8B	KBU8D	KBU8G	KBU8J	KBU5K	KBU8M	UNIT
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	50	100	200	400	600	800	1000	Volts
Maximum RMS Voltage	V_{RMS}	35	70	140	280	420	560	700	Volts
Maximum DC Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	Volts
Maximum Average Forward Rectified Output Current, at T_C = 100℃	$I_{(AV)}$	8.0							Amps
Maximum Average Forward Rectified Output Current, at T_A= 45℃ (Note3)	$I_{(AV)}$	6.0							Amps
Peak Forward Surge Current 8.3ms single half sine - wave superimposed on rated load (JEDEC method)	I_{FSM}	300							Amps
Rating for Fusing (t<8.3ms)	I^2t	373							A^2s
Maximum Instantaneous Forward Voltage Drop per bridge element at 8.0A	V_F	1.0							Volts
Maximum DC Reverse Current at rated DC blocking voltage per element T_A = 25℃	I_R	10							μA
Maximum DC Reverse Current at rated DC blocking voltage per element T_A = 100℃	I_R	1.0							mA
Typical Junction Capacitance(Note 1)	C_j	200							pF
Typical Thermal Resistance (Note 2)	$R_{\theta JC}$	5.0							℃/W
Operating Temperature Range	T_J	(-65 to +150)							℃
Storage Temperature Range	T_{STG}	(-65 to +150)							℃

NOTES:

1. Measured at 1.0 MHz and applied reverse voltage of 4.0 Volts.
2. Unit mounted on 3.0" X 3.0" X 0.11" thick (7.5 X 7.5 X 0.3cm) Al. plate.
3. Unit mounted in free air, no heatsink, P.C.B. at 375" (9.5mm) lead length with. 5" X 5" (12 X 12mm) copper pads.

RATINGS AND CHARACTERISTIC CURVES KBU8A THRU KBU8M

FIG.1-DERATING CURVE FOR
OUTPUT RECTIFIED CURRENT

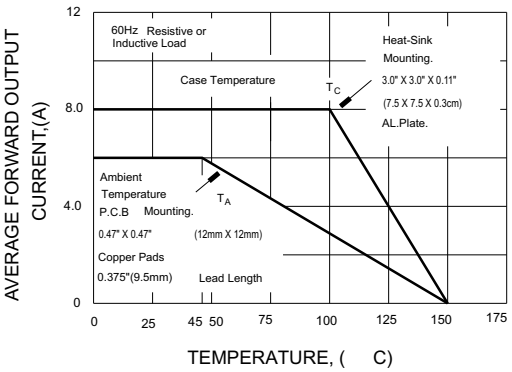


FIG.2-MAXIMUM NON-REPETITIVE PEAK
FORWARD SURGE CURRENT PER ELEMENT

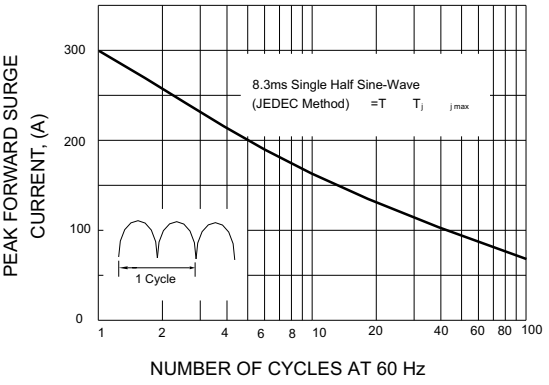


FIG.3-TYPICAL FORWARD CHARACTERISTICS
PER BRIDGE ELEMENT

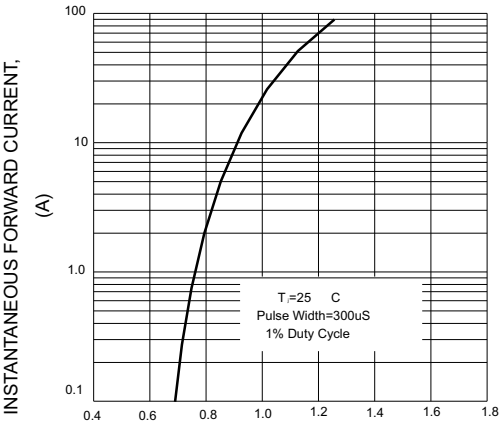


FIG.4-TYPICAL REVERSE CHARACTERISTICS
PER BRIDGE ELEMENT

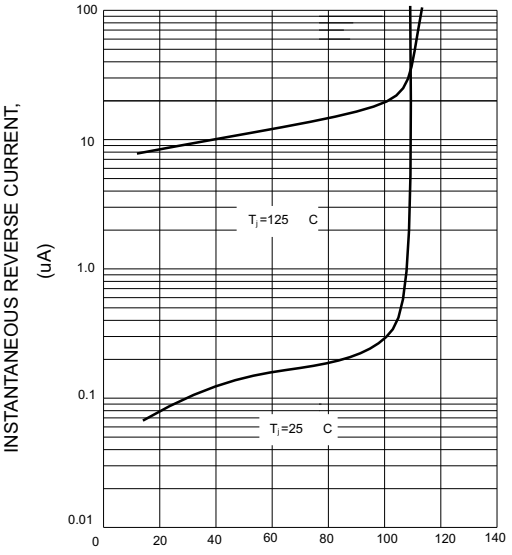


FIG.5-TYPICAL JUNCTION CAPACITANCE
PER BRIDGE ELEMENT