JGD

KBU1000 THRU KBU1010

SINGLE PHASE 10 AMPS SILICON BRIDGE RECTIFIERS

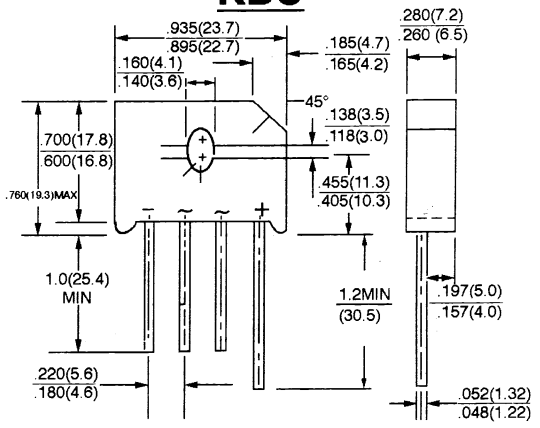


VOLTAGE RANGE
50 to 1000 Volts
CURRENT
10.0 Amperes

FEATURES

* High Surge Current Capability
* Ideal for printed circuit board
* Reliable low cost construction technique results in inexpensive product

KBU



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

TYPE NUMBER	SYMBOLS	KBU 1000	KBU 1001	KBU 1002	KBU 1004	KBU 1006	KBU 1008	KBU 1010	UNITS
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	50	100	200	400	600	800	1000	V
Maximum RMS Bridge Input Voltage	V_{RMS}	35	70	140	280	420	560	700	V
Maximum D.C Blocking Voltage	V_{DC}	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current @ $T_C = 75℃$ (1,2)	$I_{F(AV)}$	10.0							A
Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load(JEDEC method)	I_{FSM}	250							A
Maximum Forward Voltage Drop per element @ 5.0A	V_F	1.10							V
Maximum Reverse Current at Rated @ $T_A = 25℃$ D.C. Blocking Voltage per element @ $T_A = 100℃$	I_R	10 500							μA μA
Typical thermal resistance per leg(NOTE 2)	$R_{\theta JC}$	2.2							℃/W
Operating Temperature Range	T_J	−55 to +125							℃
Storage Temperature Range	T_{STG}	−55 to +150							℃

NOTE:
(1) Recommended mounted position is to bolt down on heatsink with silicone thermal compound for maximum heat transfer with #6 screw
(2) Units mounted on a 4.0×4.0×0.11" thick (10.2×10.2×0.3cm) Al. Plate heatsink

RATINGS AND CHARACTERISTIC CURVES (KBU1000 THRU KBU1010)

FIG.1 – MAXIMUM NON – REPETITIVE FORWARD SURGE CURRENT – PER ELEMENT

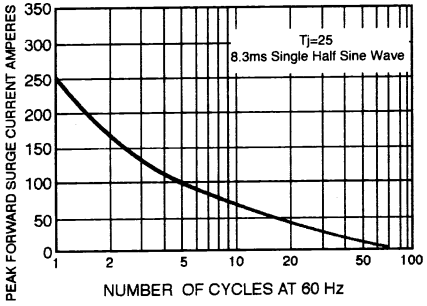


FIG.2 – TYPICAL FORWARD OUTPUT CURRENT DERATING CURVE

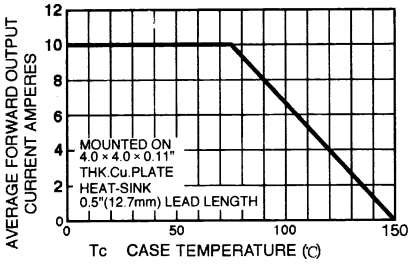


FIG.3 – TYPICAL INSTANTANEOUS FORWARD PER BRIDGE ELEMENT

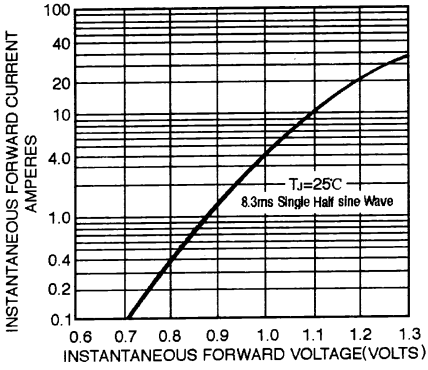


FIG.4 – TYPICAL REVERSE CHARACTERISTICS – PER ELEMENT

