CE

CHENYI ELECTRONICS

GBPC6005 THRU GBPC610

SINGLE PHASE GLASS PASSIVATED BRIDGE RECTIFIER

Voltage: 50 TO 1000V CURRENT:6.0A

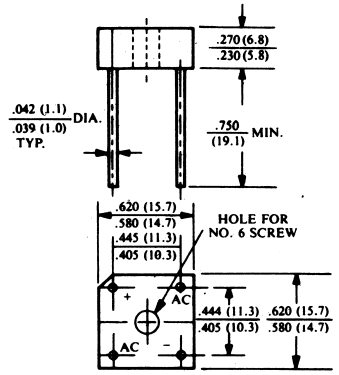
FEATURES

Surge overload rating: 125A peak

High case dielectric strength

Glass passivated chip design

KBPC6



Dimensions in inches and (millimeters)

MECHANICAL DATA

. **Terminal**: Plated leads solderable per
MIL-STD 202E, method 208C

. **Case**: UL-94 Class V-0 recognized Flame Retardant Epoxy

. **Polarity**: Polarity symbol marked on body

. **Mounting** : Hole thru for #6 screw

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

(Single-phase, half-wave, 60HZ, resistive or inductive load rating at 25 ℃, unless otherwise stated, for capacitive load, derate current by 20%)

	SYMBOL	GBPC6005	GBPC601	GBPC602	GBPC604	GBPC606	GBPC608	GBPC610	units
Maximum Recurrent Peak Reverse Voltage	Vrrm	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	Vrms	35	70	140	280	420	560	700	V
Maximum DC blocking Voltage	Vdc	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified current at Ta=75℃	If(av)	6.0							A
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load	Ifsm	125							A
Maximum Instantaneous Forward Voltage at forward current 3.0A DC	Vf	1.0							V
Maximum DC Reverse Voltage Ta=25℃	Ir	10.0							μA
at rated DC blocking voltage Ta=100℃		200							μA
Operating Temperature Range	Tj	-55 to +125							℃
Storage and operation Junction Temperature	Tstg	-55 to +150							℃

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RATINGS AND CHARACTERISTIC CURVES GBPC6005 THRU GBPC610

FIG.1-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

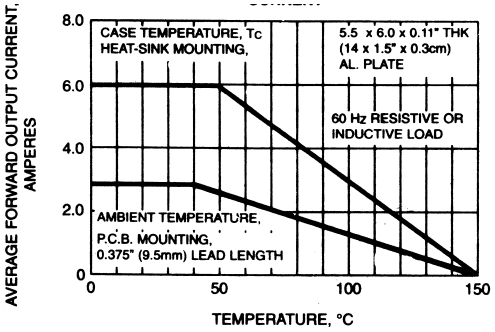

FIG.2-TYPICAL FORWARD CURRENT DERATING CURVE

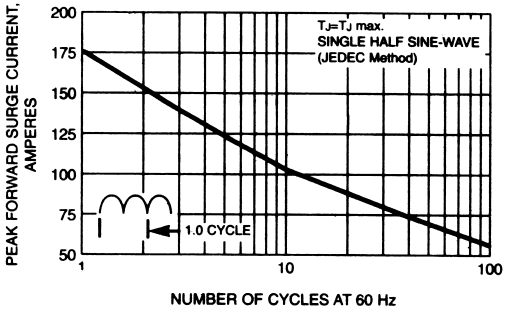

FIG.3-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

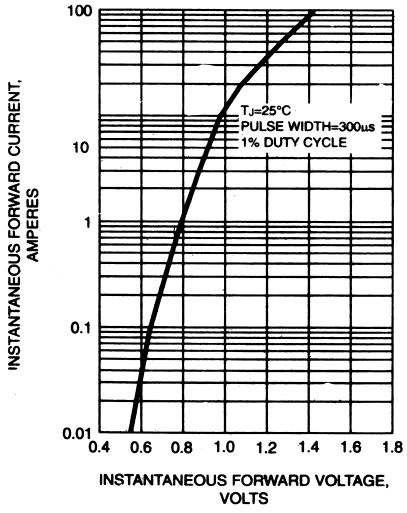

FIG.4-TYPICAL REVERSE CHARACTERISTICS

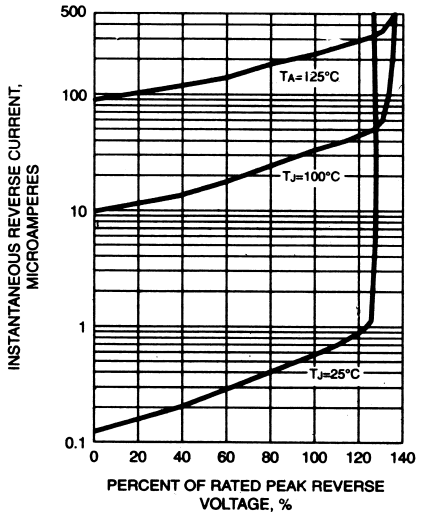

FIG. 5 - TYPICAL JUNCTION CAPACITANCE PER LEG

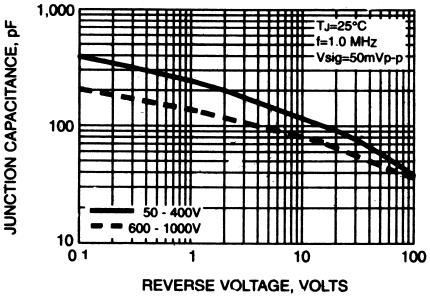

FIG. 6 - TYPICAL TRANSIENT THERMAL IMPEDANCE