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40A HIGH CURRENT BRIDGE RECTIFIERS

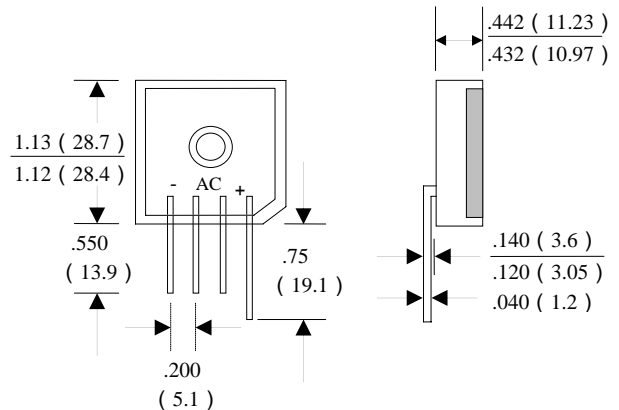
BP40-005L THRU BP40-10L

FEATURES

- CURRENT RATING 40A
- REVERSE VOLTAGE RATING UP TO 1000V
- TYPICAL IR LESS THAN 1 μ A
- HIGH TEMPERATURE SOLDERING GUARANTEED:
260°C /10 SECOND

MECHANICAL DATA

- CASE: METAL HEAT SINK CASE, ELECTRICALLY INSULATED
- TERMINALS: UNIVERSAL .25" (6.3mm) FAST ON
- DIMENSIONS IN INCHES AND (MILLIMETERS)
- MOUNTING METHOD: BOLT DOWN ON HEAT SINK WITH SILICON THERMAL COMPOUND BETWEEN BRIDGE AND MOUNTING SURFACE FOR MAXIMUM HEAT TRANSFER EFFICIENCY
- WEIGHT: 20 GRAMS



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS RATINGS AT 25°C AMBIENT TEMPERATURE UNLESS OTHERWISE SPECIFIED SINGLE PHASE, HALF WAVE, 60 HZ, RESISTIVE OR INDUCTIVE LOAD. FOR CAPACITIVE LOAD, DERATE CURRENT BY 20%

RATINGS	SYMBOL	BP40-005L	BP40-01L	BP40-02L	BP40-04L	BP40-06L	BP40-08L	BP40-10L	UNITS
MAXIMUM RECURRENT PEAK REVERSE VOLTAGE	V _{RRM}	50	100	200	400	600	800	1000	V
MAXIMUM RMS VOLTAGE	V _{RMS}	35	70	140	280	420	560	700	V
MAXIMUM DC BLOCKING VOLTAGE	V _{DC}	50	100	200	400	600	800	1000	V
MAXIMUM AVERAGE FORWARD RECTIFIED OUTPUT CURRENT AT TC=55°C	I _O	40.0							A
PEAK FORWARD SURGE CURRENT SINGLE SINE-WAVE SUPERIMPOSED ON RATED LOAD	I _{FSM}	500							A
STORAGE TEMPERATURE RANGE	T _{STG}	- 55 TO + 175							°C
OPERATING TEMPERATURE RANGE	T _{OP}	- 55 TO + 175							°C

ELECTRICAL CHARACTERISTICS (A_T T_A =25°C UNLESS OTHERWISE NOTED)

CHARACTERISTICS	SYMBOL	BP40-005L	BP40-01L	BP40-02L	BP40-04L	BP40-06L	BP40-08L	BP40-10L	UNITS
MAXIMUM INSTANTANEOUS FORWARD VOLTAGE PER BRIDGE ELEMENT AT SPECIFIED CURRENT	V _F	1.1							V
MAXIMUM REVERSE DC CURRENT AT RATED DC BLOCKING VOLTAGE PER ELEMENT	I _R	10							μ A

NOTE: SUFFIX NO. VERSUS DIFFERENT CASES AND TERMINALS

RATINGS AND CHARACTERISTIC CURVES BP40-005L THRU BP40-10L

FIG. 1 - MAXIMUM OUTPUT RECTIFIED CURRENT

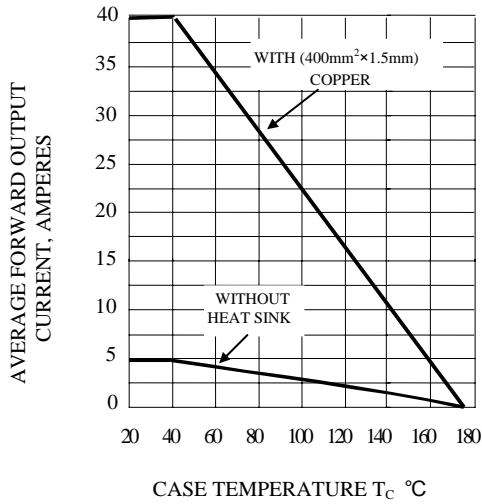


FIG. 4 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

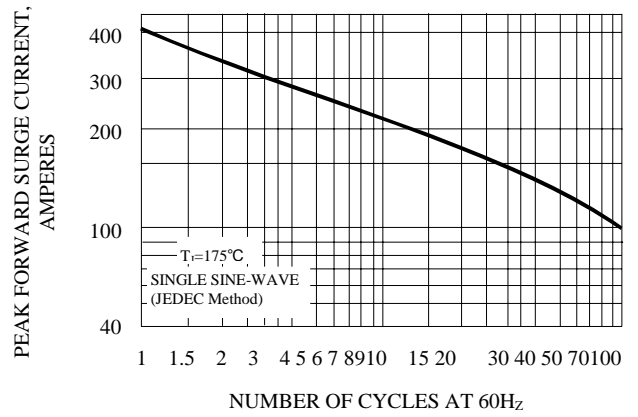


FIG. 2 - TYPICAL REVERSE CHARACTERISTICS AT $T_j = 25^\circ\text{C}$

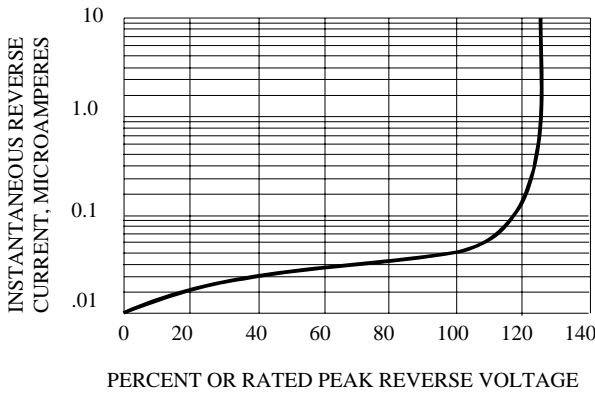


FIG. 5 - TYPICAL JUNCTION CAPACITANCE PER BRIDGE ELEMENT

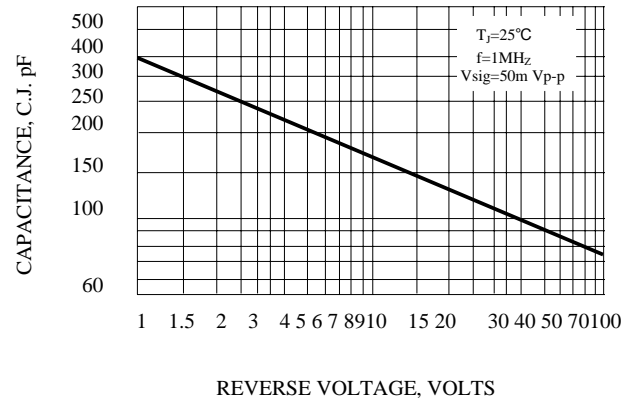
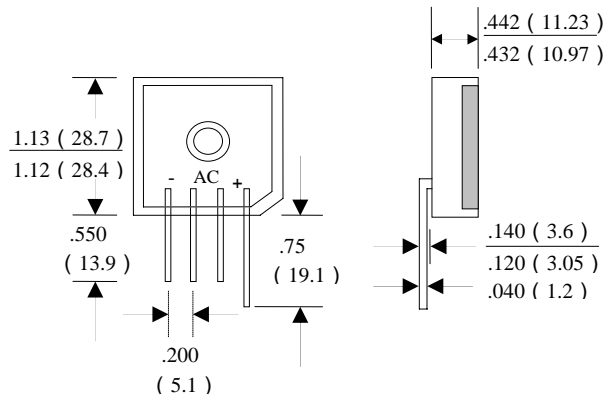
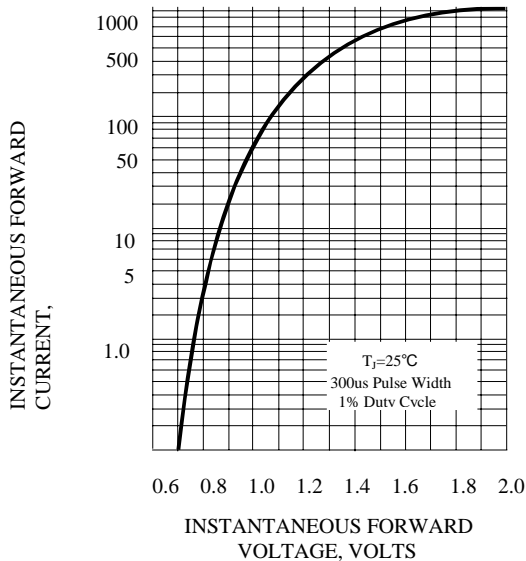


FIG. 3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS



BP40-L IN LINE PIN CONFIGURATION (PLASTIC CASE)