

## KBPC SILICON BRIDGE RECTIFIERV

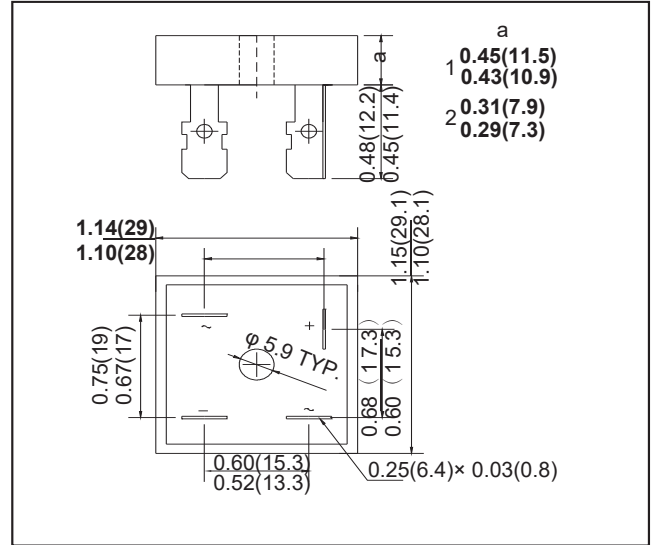
REVERSEVOLTAGE:50 --- 1000V CURRENT: 50.0A

### FEATURES

- Molod case maximum heat dissipation
- Surge overload ratings -400 Amperes
- low forward voltage drop

### MECHANICAL DATA

- Case style: KBPC plastic molded
- Mounting: thru hole for # 8 screw mounting
- Polarity:As marked
- Epoxy:ul94v-0 rate flame retardant



## MAXIMUM RATINGS AND CHARACTERISTICS

@ 25°C Ambient Temperature (unless otherwise noted)

MDD Catalog Number	SYMBOLS	KBPC 50005W	KBPC 5001W	KBPC 5002W	KBPC 5004W	KBPC 5006W	KBPC 5008W	KBPC 5010W	UNITS
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 output rectified current at $T_c=50^\circ\text{C}$ (Note 1,2)	$I_{(AV)}$	50							Amps
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)	$I_{FSM}$	500.0							Amps
Maximum instantaneous forward voltage drop per bridge element at 25A	$V_F$	1.1							Volts
Maximum DC reverse current at rated DC blocking voltage	$I_R$	$T_A=25^\circ\text{C}$							$\mu\text{A}$
		$T_A=100^\circ\text{C}$							mA
Typical junction capacitance(Note1)	$C_J$	300							pF
Typical Thermal Resistance (Note 2)	$R_{\theta JA}$	2.5							k/W
Operating and storage temperature range	$T_J, T_{STG}$	-55 to +125							$^\circ\text{C}$

NOTES:

1. Measred at 1MHz applied reverse voltage of 4.0v D.C
2. Themal resistance junction to case mounted on heatsink.

## RATINGS AND CHARACTERISTIC CURVES

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

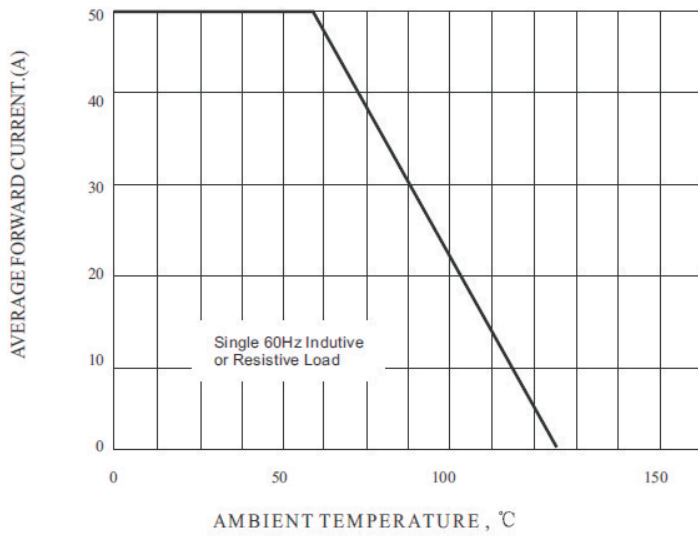


FIG.2-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

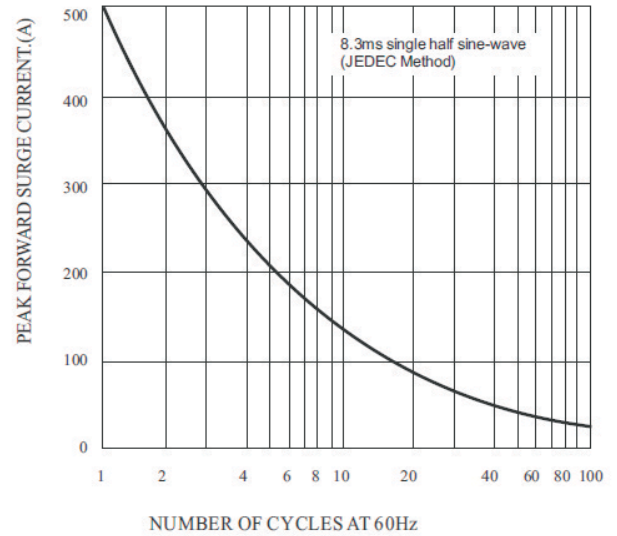


FIG.3-TYPICAL FORWARD CHARACTERISTICS

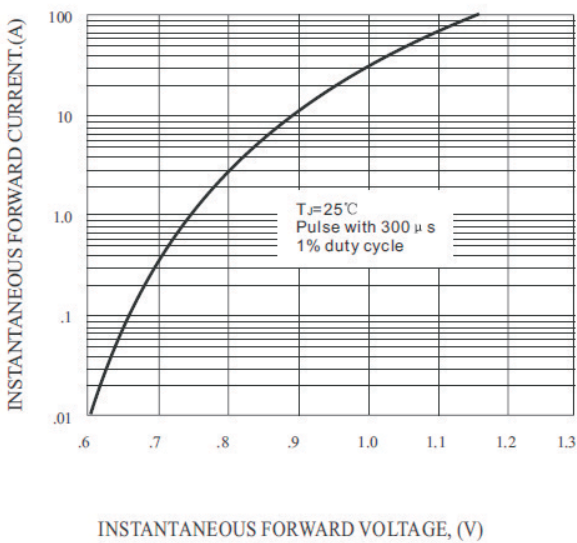


FIG.4-TYPICAL REVERSE CHARACTERISTICS

