

SINGLE PHASE SILICON BRIDGE RECTIFIER

FEATURES:

- High efficiency
- Silicon lunction
- Metal case
- Rating to 1000 V PRV

MECHANICAL DATA

Polarity : As marked on case

Mounting : Hole for #10 screw

Case : Mounted in the bridge encapsulation

0.220(5.59) 0.732(18.6) 0.200(5.08) 0.692(17.6) **KBPC-W** DIA 1 135(28 8) 0.732(18.6) 0.692(17.6) 1.115(28.3) 0.470(11.9) 0.430(10.9) Hold for #10 Screw 0.220(5.59) 1.135(28.8) 1.115(28.3) 0.672(17.1) 0.200(5.08) **KBPC-T** DIA 0.632(16.1) 1 <u>1 135(28 8)</u> 0.672(17 1) 0 582(14.8) 1.115(28.3) 0.632(16.1) 0.542(13.8) 0 732(18.6) 0.692(17.6)

Hold for

#10 Screw

KBPC25005T/W THRU

KBPC2510T/W

1.135(28.8)

1.115(28.3)

Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating 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%.

Characteristic	Symbol	КВРС							
		25005 T/W	2501 T/W	2502 T/W	2504 T/W	2506 T/W	2508 T/W	2510 T/W	
	Marking	KBPC 25005	KBPC 2501	KBPC 2502	KBPC 2504	KBPC 2506	KBPC 2508	KBPC 2510	Units
Maximum recurrent 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 current at Tc=55 $^\circ\!\mathrm{C}$	Io	25						Amps	
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)Per leg	I _{FSM}	350							Amps
Maximum instantaneous forward voltage Per leg IF=12.5A	VF	1.1							Volts
Maximum DC reverse current $Tc = 25^{\circ}C$ at rated DC blocking voltage Per leg $Tc = 100^{\circ}C$	I _R	5.0 500							μ Α
Typical thermal resistance (NOTE1)	R _{th} -JC	1.9							°C/W
Typical junction capacitance(NOTE2)	CJ	300							P _F
Operating junction and Storage temperature range	Tj, Tstg	-55to+150							°C

NOTES:

(1) Device mounted on 300mm x 300mm x 1.6mm cu Plate Heaksink

(2) Measured at 1MHZ and applied reverse voltage of 4.0V D.C.



KBPC25005T/W THRU KBPC2510T/W

RATINGS AND CHARACTERISTIC CURVES













RATINGS AND CHARACTERISTIC CURVES



Dimensions in Inches and (millimeters)



Dimensions in Inches and (millimeters)



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