

KBPC25005~KBPC2510

HIGH CURRENT SINGLE-PHASE SILICON BRIDGE RECTIFIERS

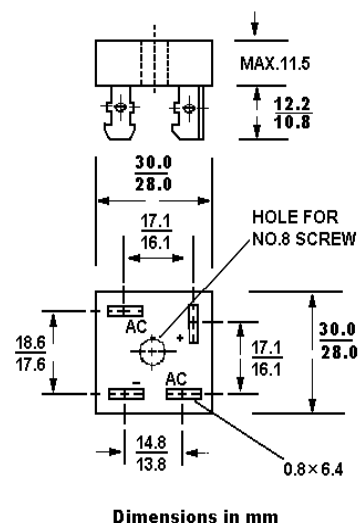
REVERSE VOLTAGE: 50V to 1000V

FORWARD CURRENT: 25A

KBPC

Features

- Surge overload 300 Amperes peak
- Low power loss, high efficiency
- Low reverse leakage current



Absolute Maximum Ratings and Characteristics

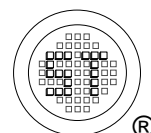
Rating at 25°C ambient temperature unless otherwise specified. resistive or inductive load 60 Hz,.

For capacitive load current by 20%.

Characteristic	KBPC 25005	KBPC 2501	KBPC 2502	KBPC 2504	KBPC 2506	KBPC 2508	KBPC 2510	Units
Maximum Recurrent Peak Reverse Voltage	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current at $T_C = 55^\circ\text{C}$	25							A
Peak Forward Surge Current, 8.3ms single half Sine-wave superimposed on rated load	300							A
Maximum Forward Voltage at 12.5A DC and 25°C	1.2							V
Maximum Reverse Current at $T_A = 25^\circ\text{C}$ at Rated DC Blocking Voltage $T_A = 125^\circ\text{C}$	10 1000							uA
Typical Junction Capacitance (Note 1)	300							pF
Typical Thermal Resistance (Note 2)	1.9							°C/W
Operating Temperature Range T_J	-55 to +125							°C
Storage Temperature Range T_{Stg}	-55 to +150							°C

Notes: 1. Measured at 1 MHz and applied reverse voltage of 4.0VDC.

2. Thermal resistance from junction to case per leg.



Dated : 19/07/2005

RATINGS AND CHARACTERISTIC CURVES

