

# KBP200 - KBP210

PRV : 50 - 1000 Volts

I<sub>o</sub> : 2.0 Amperes

## Features

- High case dielectric strength
- High surge current capability
- High reliability
- Low reverse current
- Low forward voltage drop
- Ideal for printed circuit board
- RoHS compliant package

## Mechanical Data

- Case : Molded plastic
- Epoxy : UL94V-O rate flame retardant
- Terminals : Plated lead solderable per MIL-STD-202,

Method 208 guaranteed

- Polarity : Polarity symbols marked on case
- Mounting position : Any
- Weight : 3.4 grams

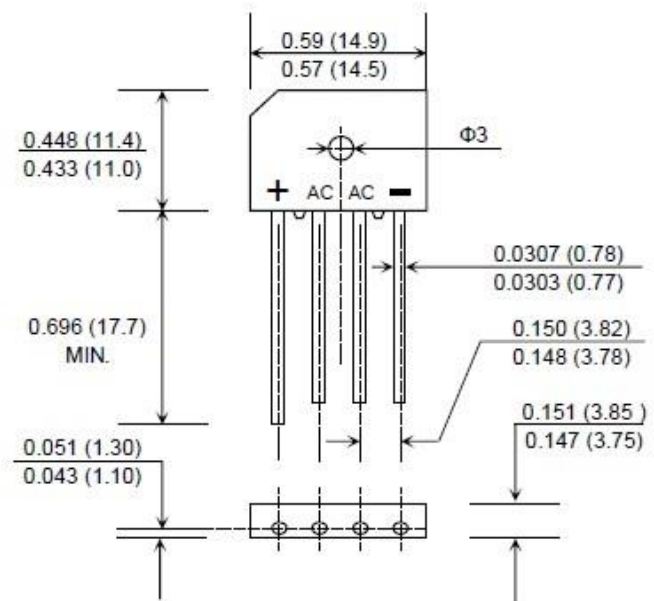
Package type : KBP

## Packing & Order Information

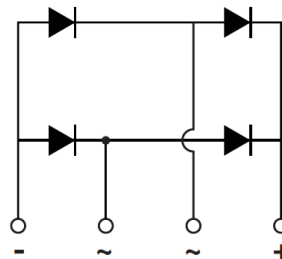
500/Box



**RoHS**  
COMPLIANT



## Graphic symbol



## MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25 °C ambient temperature unless otherwise specific.

Single phase, half wave, 60 Hz, resistive or inductive load

For capacitive load, derate current by 20%

Rating	Symbol	KBP 200	KBP 201	KBP 202	KBP 204	KBP 206	KBP 208	KBP 210	Unit
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	V <sub>RMS</sub>	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	V <sub>DC</sub>	50	100	200	400	600	800	1000	V
Maximum Average Forward Current T <sub>c</sub> = 50°C	I <sub>F(AV)</sub>	2.0							A
Rating for fusing ( t < 8.3 ms. )	I <sup>2</sup> t	10							A <sup>2</sup> S
Typical Thermal Resistance (Note 2)	R <sub>θJA</sub>	30							°C/W

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Rating	Symbol	KBP 200	KBP 201	KBP 202	KBP 204	KBP 206	KBP 208	KBP 210	Unit
Peak Forward Surge Current, Single half sine wave Superimposed on rated load (JEDEC Method)	I <sub>FSM</sub>				60				V
Maximum Forward Voltage per Diode at F = 1.0 A	V <sub>F</sub>				1.0				V
Maximum DC Reverse Current Ta = 25°C	I <sub>R</sub>				10				V
at Rated DC Blocking Voltage Ta = 100°C	I <sub>R(H)</sub>				1.0				A
Typical Junction Capacitance per Diode (Note 1)	C <sub>J</sub>				24				pF
Operating junction temperature range	T <sub>J</sub>				-55 to +125				°C
Storage temperature range	T <sub>STG</sub>				-55 to +125				°C

### Notes

(1) Measured at 1.0 MHz and applied reverse voltage of 4.0 Volts.

(2) Thermal resistance from Junction to Ambient with units mounted on a 0.47" X 0.47" ( 12mm X 12mm ) Cu. Pads.

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### ■ RATING AND CHARACTERISTIC CURVES ( KBP200 - KBP210 )

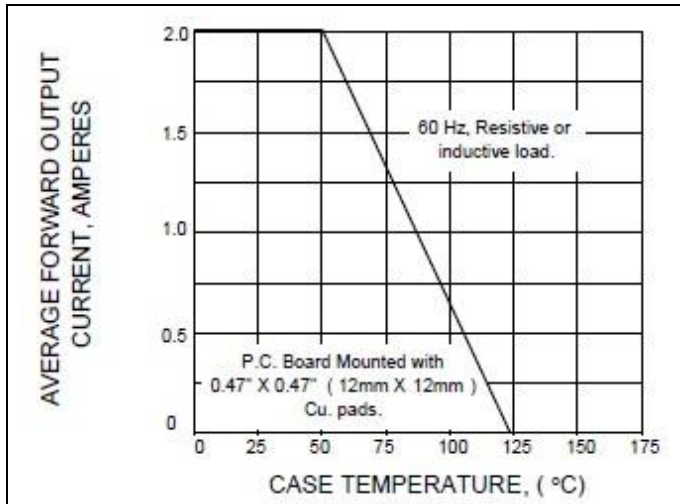


FIG.1 - DERATING CURVE FOR OUTPUT RECTIFIED CURRENT

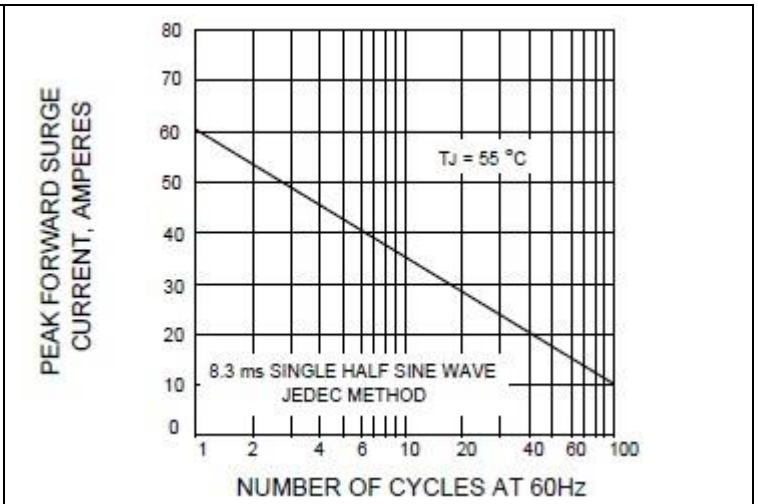


FIG.2 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

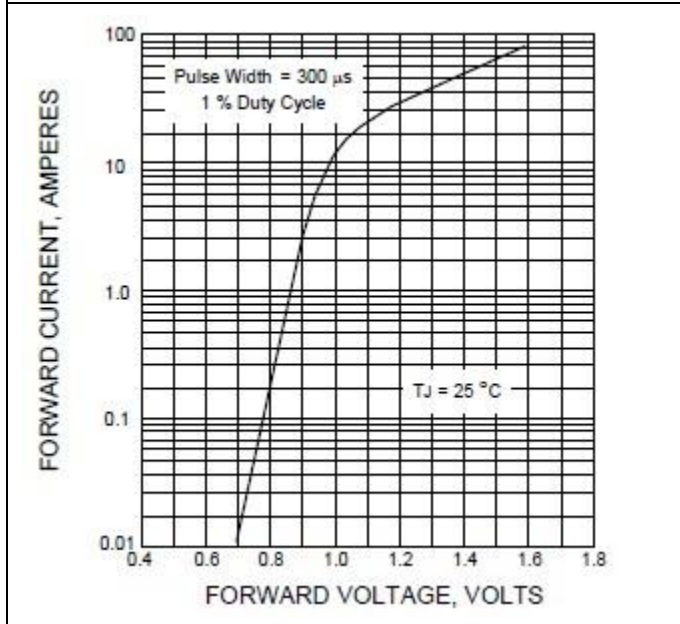


FIG.3 - TYPICAL FORWARD CHARACTERISTICS PER DIODE

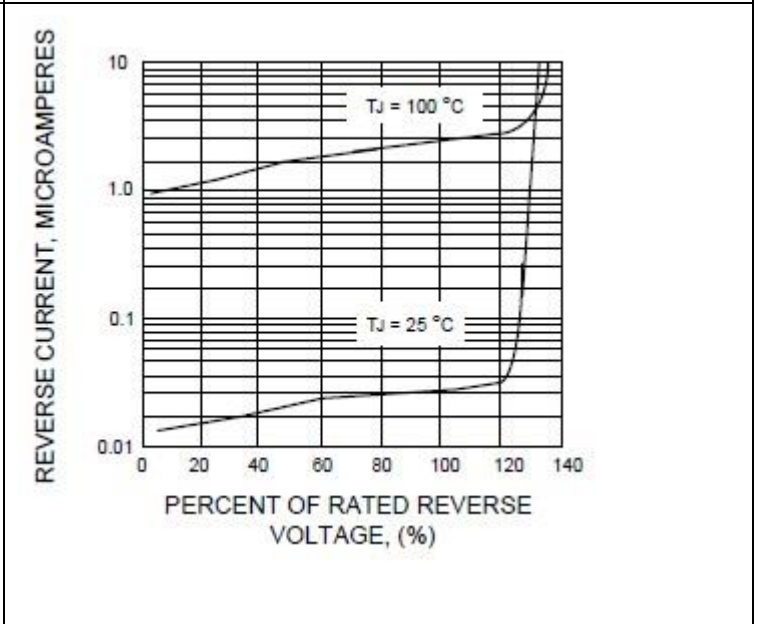


FIG.4 - TYPICAL REVERSE CHARACTERISTICS

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### Disclaimer

ALL PRODUCT, PRODUCT SPECIFICATIONS AND DATA ARE SUBJECT TO CHANGE

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