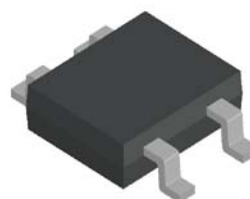




Features

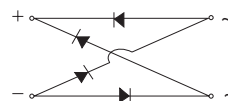
- Low profile package
- Ideal for automated placement
- Ultrafast reverse recovery time
- Low forward voltage drop
- Low power losses, high efficiency
- High forward surge capability
- High temperature soldering:
260°C/10 seconds at terminals
- Component in accordance to
RoHS 2011/65/EU and WEEE 2002/96/EC



MBF



RoHS
COMPLIANT



Mechanical Data

- **Case:**MBF
Molding compound meets
UL 94 V-0 flammability rating
- **Terminals:** Solder plated, solderable per
MIL-STD-750, Method 2026
- **Polarity:** Polarity symbols marked on body
- **Marking:** type number

Major Ratings and Characteristics

$I_{F(AV)}$	2.0A
V_{RRM}	20V to 100V
I_{FSM}	50A
V_F	0.5V,0.55V,0.7V,0.85V
$T_{J,max.}$	125°C,150°C

Maximum Ratings & Thermal Characteristics ($T_A = 25^\circ\text{C}$ unless otherwise noted)

Items	Symbol	KMB 22F	KMB 24F	KMB 26F	KMB 28F	KMB 210F	Unit
Maximum repetitive peak reverse voltage	V _{RRM}	20	40	60	80	100	V
Maximum RMS reverse voltage	V _{RMS}	14	28	42	56	70	V
Maximum DC blocking voltage	V _{DC}	20	40	60	80	100	V
Maximum average forward output rectified current at T _L (see Fig1.)	I _{F(AV)}	2.0					A
Peak forward surge current 8.3ms single half sine-wave superimposed on rated load	I _{FSM}	50					A
Thermal resistance from junction to ambient per leg	R _{θJA} ⁽¹⁾	85					°C/W
Thermal resistance from junction to lead per leg	R _{θJL} ⁽¹⁾	20					
Operating junction temperature range	T _J	-55 to +125			-55 to +150		°C
Storage temperature range	T _{STG}	-55 to +150					

Note:1.Mounted on 0.5x0.5" (13mmx13mm) pads□



Electrical Characteristics (T_A = 25 °C unless otherwise noted)

Items	Test conditions		Symbol	KMB22F	KMB24F	KMB26F	KMB28F~ KMB210F	Unit
Instantaneous forward voltage per leg	I _F =2.0A ⁽²⁾		V _F	0.50	0.55	0.70	0.85	V
Reverse current per leg	V _R =V _{DC}	T _J =25°C	I _R	0.5				mA
		T _J =100°C		20				

Note:2.Pulse test:300μs pulse width,1% duty cycle.

Characteristic Curves (T_A=25 °C unless otherwise noted)

Fig.1 Forward Current Derating Curve

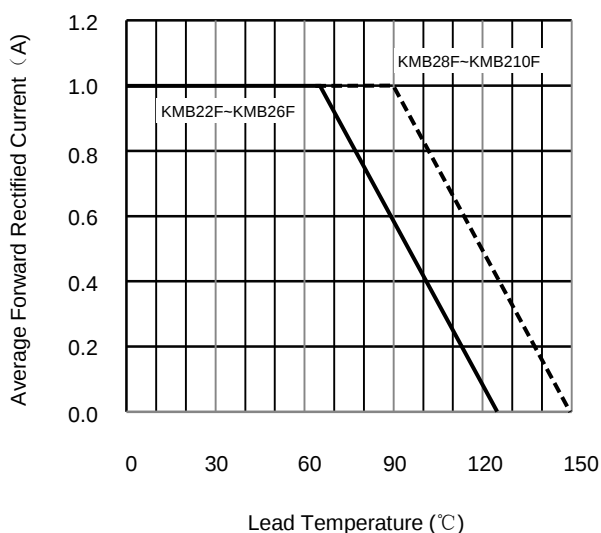


Fig.2 Maximum Non-Repetitive Peak Forward Surge Current

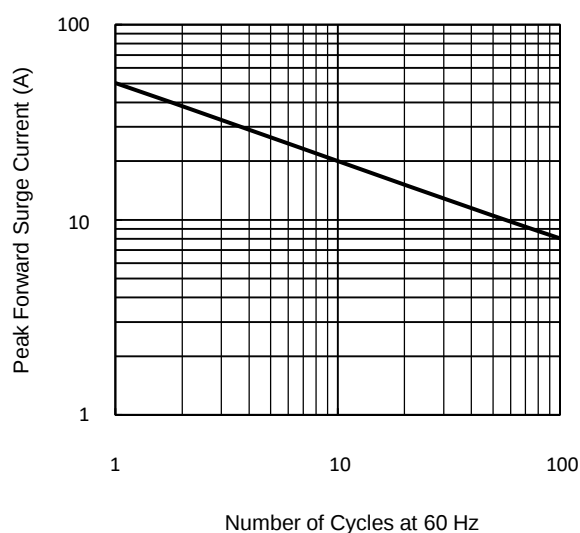


Fig.3 Typical Instantaneous Forward Characteristics

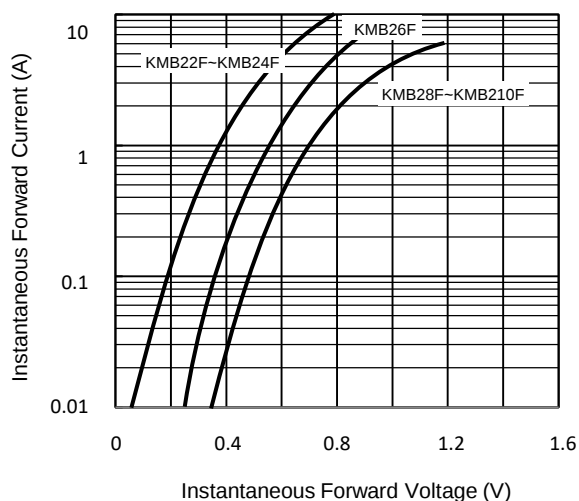
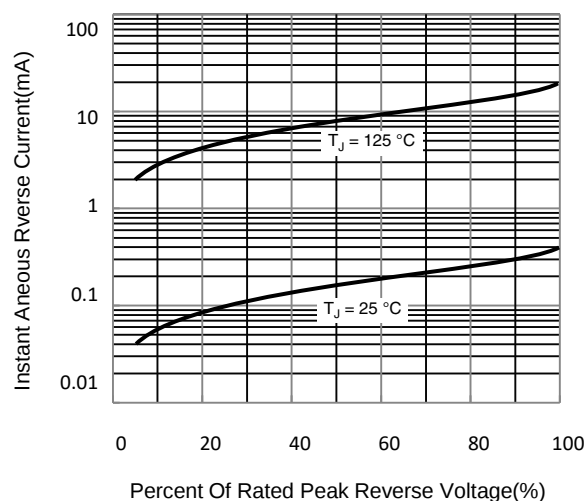


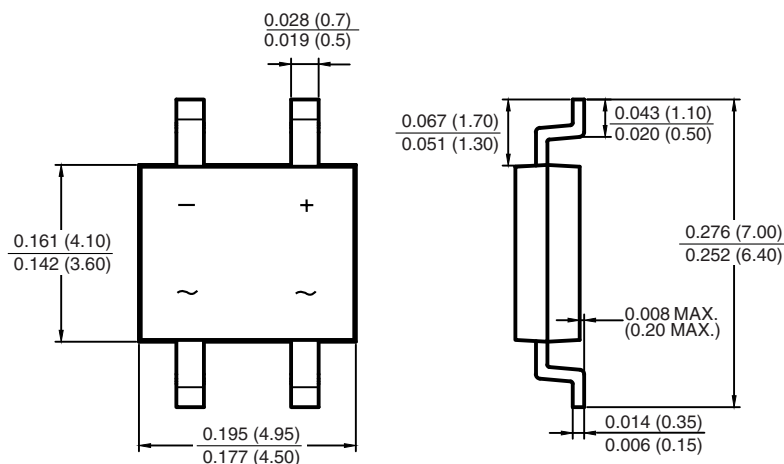
Fig.4 Typical Reverse Characteristics



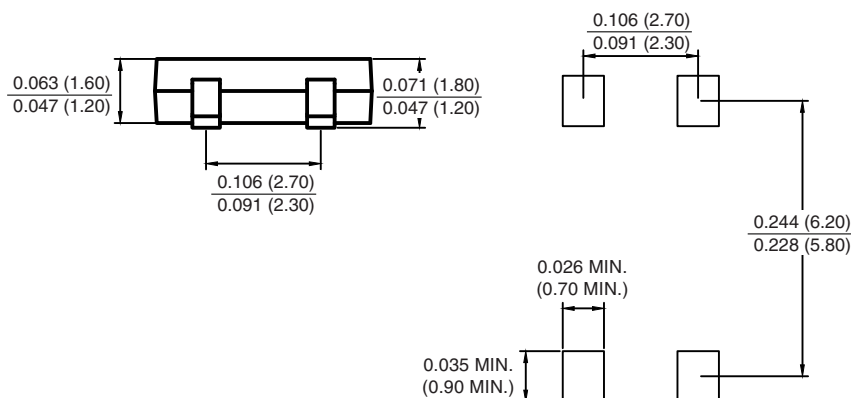


Package Outline

MBF



Mounting Pad Layout



Dimensions in inches and (millimeters)

Ordering Information

Outline	Reel (PCS)	Per Carton (PCS)	Reel Diameters (mm)
Taping	5,000	100,000	330/13"

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