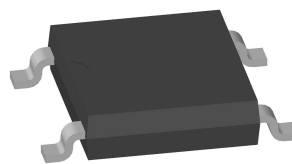




## ABS22 thru ABS220 Surface mount schottky bridge rectifier

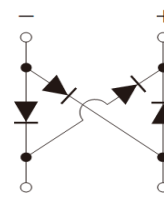
### Features

- Low forward voltage drop
- Low power losses, high efficiency
- High Current Capability
- High surge capability
- High temperature soldering:  
260°C/10 seconds at terminals
- Component in accordance to  
RoHS 2011/65/EU and WEEE 2002/96/EC



RoHS  
COMPLIANT

ABS



### Mechanical Date

- **Case:**ABS  
Molding compound meets  
UL 94 V-0 flammability rating
- **Terminals:** Solder plated, solderable per  
MIL-STD-750, Method 2026
- **Polarity:** Polarity symbols marked on case
- **Mounting Position:** Any

### Major Ratings and Characteristics

$I_{F(AV)}$	2.0A
$V_{RRM}$	200 V to 2000 V
$I_{FSM}$	50A
$V_F$	0.50V,0.55V,0.70V,0.85V,0.95V
$T_{Jmax.}$	125 °C,150°C

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

Items	Symbol	ABS 22	ABS 23	ABS 24	ABS 25	ABS 26	ABS 28	ABS 210	ABS 215	ABS 220	Unit	
Maximum repetitive peak reverse voltage	$V_{RRM}$	200	300	400	500	600	800	1000	1500	2000	V	
Maximum RMS voltage	$V_{RMS}$	140	210	280	350	420	560	700	1050	1400	V	
Maximum DC blocking voltage	$V_{DC}$	200	300	400	500	600	800	1000	1500	2000	V	
Maximum average forward rectified current at $T_L$ (see Fig1.)	$I_{F(AV)}$	2									A	
Peak forward surge current 8.3 ms single half sine-wave superimposed on rated load	$I_{FSM}$	50									A	
Thermal resistance from junction to lead <sup>(1)</sup>	$R_{\theta JL}$	25									°C/W	
Operating junction temperature range	$T_J$	-65 to +125					-65 to +150					°C
Storage temperature range	$T_{STG}$	-65 to +150									°C	

Note 1: Mounted on P.C.B. with 0.32 x 0.32" (8 x 8mm) copper pad areas.



### Electrical Characteristics (T<sub>A</sub> = 25 °C unless otherwise noted)

Items	Test conditions	Symbol	ABS22	ABS23~ABS24	ABS25~ABS26	ABS28~ABS210	ABS215~ABS220	Unit
Instantaneous forward voltage	I <sub>F</sub> =2.0A <sup>(2)</sup>	V <sub>F</sub>	0.50	0.55	0.70	0.85	0.95	V
Reverse current	V <sub>R</sub> =V <sub>DC</sub>	I <sub>R</sub>	0.5					mA
			20.0		10.0			

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

### Characteristic Curves (T<sub>A</sub>=25 °C unless otherwise noted)

Fig 1. Forward Current Derating Curve

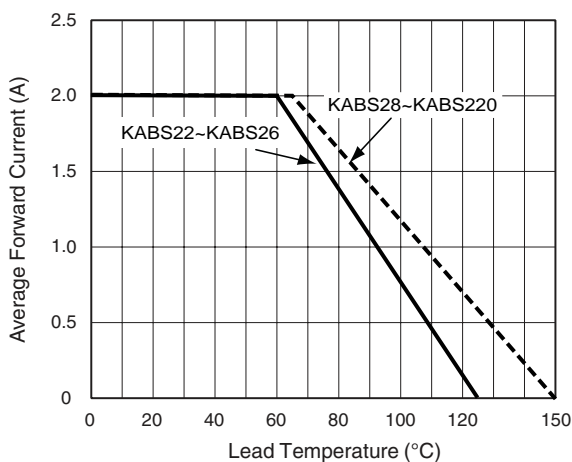


Fig 2. Maximum Non-Repetitive Peak Forward Surge Current

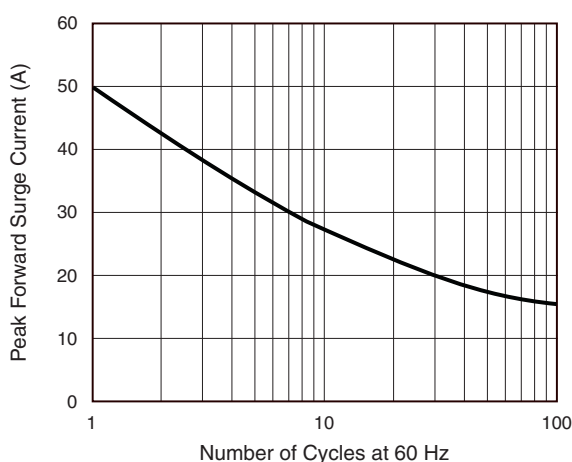


Fig3. Typical Instantaneous Forward Characteristics

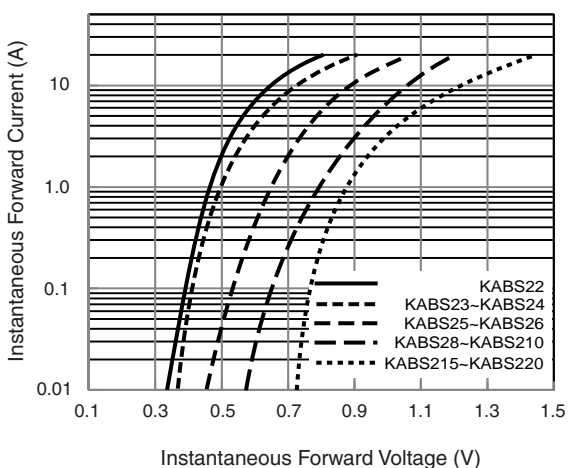
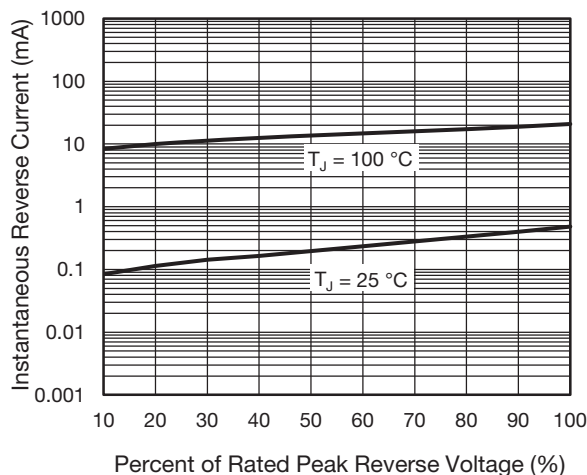


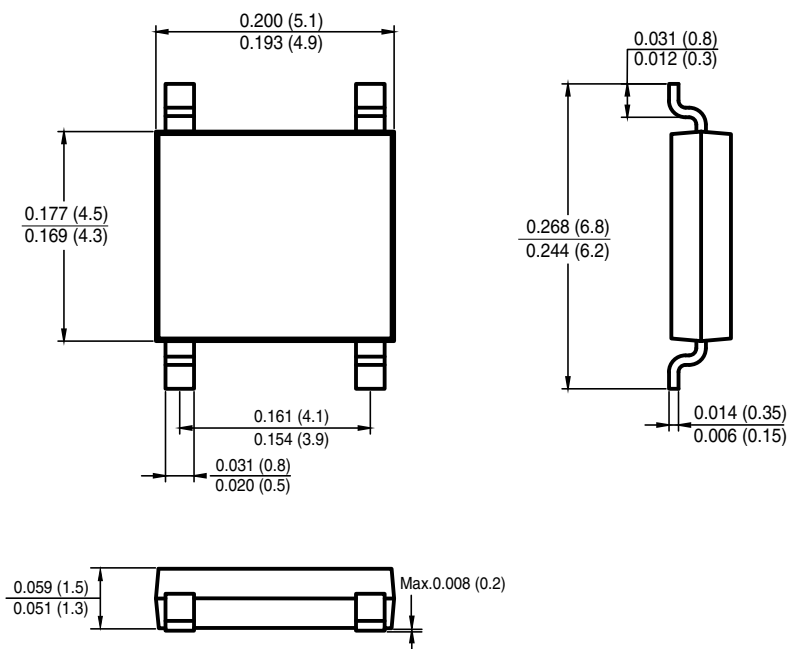
Fig 4. Typical Reverse Characteristics



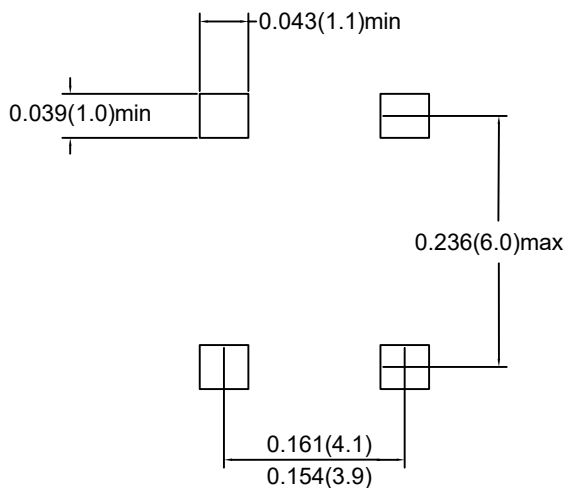


### Package Outline

### ABS



### Mounting Pad Layout



Dimensions in inches and (millimeters)

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