

ABS Plastic-Encapsulate Bridge Rectifier

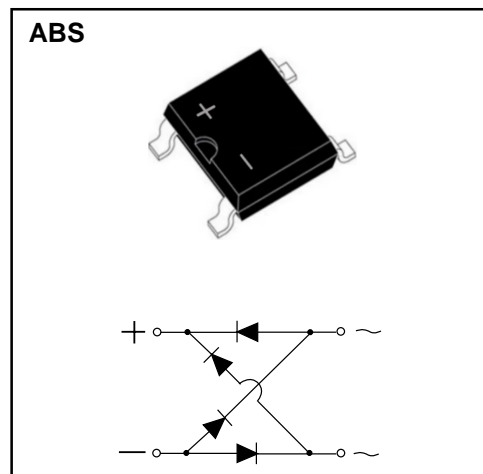
Single Phase 1.0Amp Schottky Bridge Rectifiers

Features

- I_o 1.0A
- VRRM 40V -200V
- Low forward voltage drop
- High surge current capability

Mechanical Data

- Case: ABS molded plastic
- Molding compound: UL flammability classification rating 94V-0
- Terminals: Solder plated, solderable per MIL- STD-202, Method 208
- Polarity: As marked on case



Maximum Ratings And Electrical Characteristics

Ratings at 25°C ambient temperature unless otherwise specified. Single phase half-wave 60Hz, resistive or inductive load, for capacitive load current derate by 20%.

Parameter	SYMBOLS	KABS14	KABS16	KABS18	KABS110	KABS115	KABS120	UNITS
Maximum repetitive peak reverse voltage	V_{RRM}	40	60	80	100	150	200	V
Maximum RMS voltage	V_{RMS}	28	42	56	70	105	140	V
Maximum DC blocking voltage	V_{DC}	40	60	80	100	150	200	V
Maximum average forward rectified current at $T_L=100^\circ C$	$I_{(AV)}$	1.0						A
Peak forward surge current, 8.3ms single half sine-wave superimposed on rated load	I_{FSM}	30.0						A
Maximum instantaneous forward voltage at 1.0A	V_F	0.55	0.70	0.85		0.95		V
Maximum DC reverse current $T_A = 25^\circ C$ at rated DC blocking voltage $T_A = 125^\circ C$	I_R	0.5 50		0.05 10				mA
Rating for fusing ($t=8.3ms, T_a=25^\circ C$)	I_t^2	3.7						A_s^2
Typical thermal resistance	R_{qJA}	80.0						$^\circ C/W$
Operating junction temperature range	T_J	-55 to +125		-55 to +150				$^\circ C$
Storage temperature range	T_{STG}	-55 to +150						$^\circ C$

Typical Characteristics

FIG. 1- DERATING CURVE OUTPUT RECTIFIED CURRENT

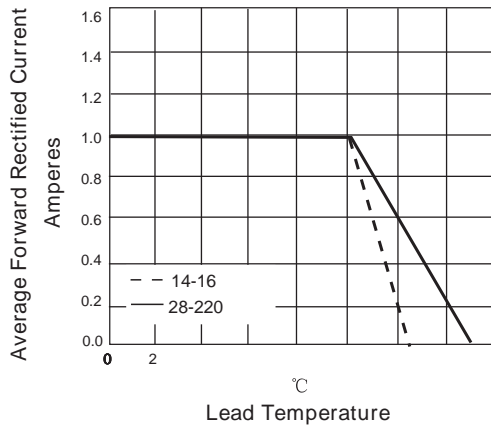


FIG. 2-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT PER LEG

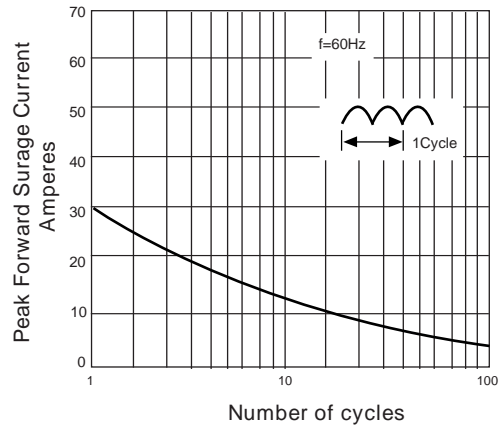


FIG. 3-TYPICAL FORWARD VOLTAGE CHARACTERISTICS

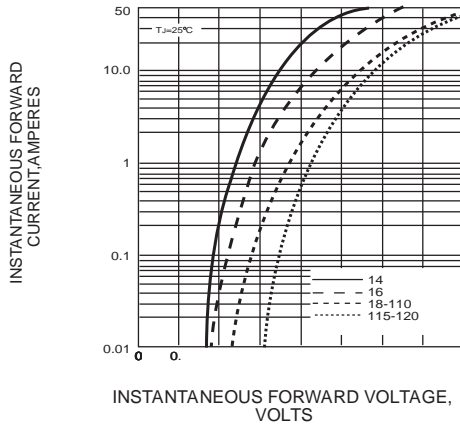
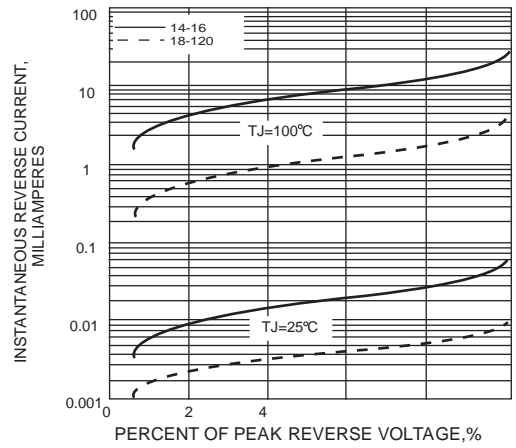
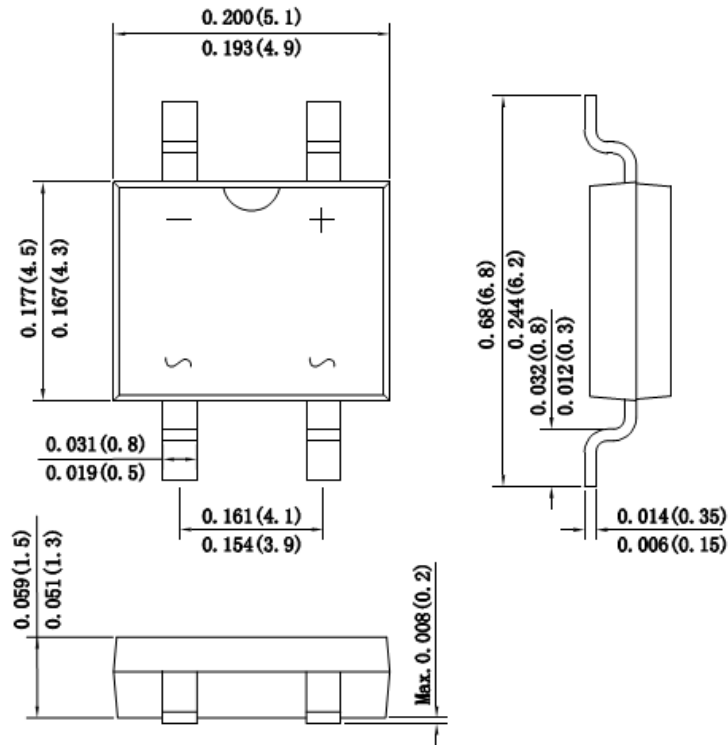


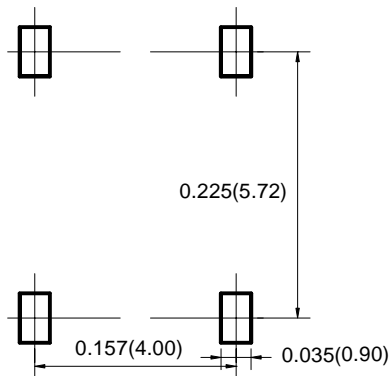
FIG. 4-TYPICAL REVERSE LEAKAGE CHARACTERISTICS



ABS Package Outline Dimensions



ABS Suggested Pad Layout



Note:

1. Controlling dimension: in millimeters.
2. General tolerance: ± 0.05 mm.
3. The pad layout is for reference purposes only.

Reel Taping Specifications For Surface Mount Devices-ABS

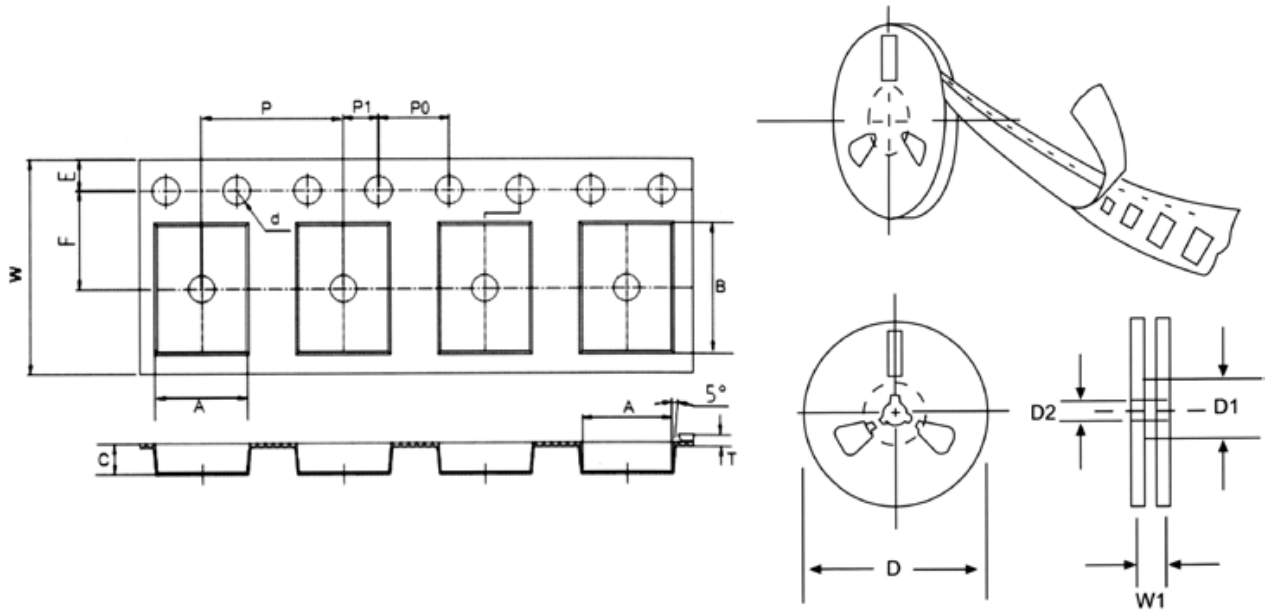


FIG : CONFIGURATION OF SURFACE MOUNTED DEVICES TAPING

ITEM	SYMBOL	ABS mm(inch)
Carrier width	A	5.40±0.1(0.213±0.004)
Carrier length	B	6.90±0.05(0.272±0.002)
Carrier depth	C	2.10±0.1(0.083±0.004)
Sprocket hole	d	1.55±0.05(0.061±0.002)
Reel outside diameter	D	279±2.0 (11± 0.079)
Reel inner diameter	D1	75 ±1.0 (2.95 ±0.039)
Feed hole diameter	D2	13±0.5(0.512±0.020)
Sprocket hole position	E	1.75±0.1(0.069±0.004)
Punch hole position	F	5.5±0.05(0.217±0.002)
Punch hole pitch	P	8.0±0.1(0.315±0.004)
Sprocket hole pitch	P0	4.0±0.1(0.157±0.004)
Embossment center	P1	2.0±0.1(0.079±0.004)
Totall tape thickness	T	0.10-0.70(0.004-0.028)
Tape width	W	12.0±0.3/-0.1(0.472±0.004)
Reel width	W1	16.8±2.0(0.661±0.079)

NOTE:Devices are packde in accordane with EIA standard RS-481-A and specification given above.