



## 1.5 AMP FAST RECOVERY BRIDGE RECTIFIERS

### FEATURES

- PRV Ratings from 50 to 1000 Volts
- Surge overload rating to 45 Amps peak
- Reliable low cost molded plastic construction
- Ideal for printed circuit board applications
- Fast switching for high efficiency

• **UL RECOGNIZED - FILE #E141956**

• **RoHS COMPLIANT**

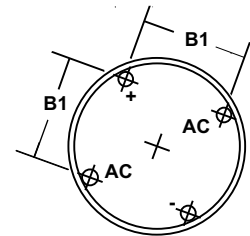
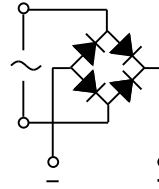
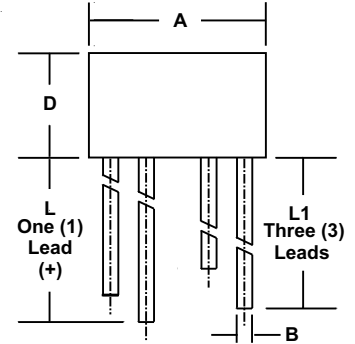
### MECHANICAL DATA

- Case: Molded Epoxy, U/L Flammability Rating 94V-0
- Terminals: Round silver plated pins
- Soldering: Per MIL-STD 202 Method 208 guaranteed
- Polarity: Marked on case
- Mounting Position: Any
- Weight: 0.05 Ounces (1.3 Grams)

### MECHANICAL SPECIFICATION

ACTUAL SIZE OF  
WB PACKAGE

SERIES FWB150 - FWB1510



SYM	MILLIMETERS		INCHES	
	MIN	MAX	MIN	MAX
A	8.6	8.89	0.340	0.350
B	0.76	0.81	0.030	0.032
B1	4.6	5.6	0.180	0.220
D	5.1	5.6	0.200	0.220
L	27.94	n/a	1.10	n/a
L1	25.4	n/a	1.0	n/a

### MAXIMUM RATINGS & ELECTRICAL CHARACTERISTICS

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

PARAMETER (TEST CONDITIONS)	SYMBOL	RATINGS							UNITS
		FWB 150	FWB 151	FWB 152	FWB 154	FWB 156	FWB 158	FWB 1510	
Series Number									
Maximum DC Blocking Voltage	V <sub>RM</sub>	50	100	200	400	600	800	1000	VOLTS
Maximum RMS Voltage	V <sub>RMS</sub>	35	70	140	280	420	560	700	
Maximum Peak Recurrent Reverse Voltage	V <sub>RRM</sub>	50	100	200	400	600	800	1000	
Average Forward Rectified Current @ T <sub>c</sub> = 55 °C	I <sub>O</sub>	1.5							AMPS
Peak Forward Surge Current (8.3mS single half sine wave superimposed on rated load)	I <sub>FSM</sub>	45							
Maximum Forward Voltage (Per Diode) at 1 Amp DC	V <sub>FM</sub>	1.3							VOLTS
Maximum Average DC Reverse Current at Rated DC Blocking Voltage (Per Bridge Element) @ T <sub>A</sub> = 25 °C @ T <sub>A</sub> = 100 °C	I <sub>RM</sub>	10 1							μA mA
Maximum Reverse Recovery Time (Note 1)	T <sub>RR</sub>	200		300		500		nS	
Thermal Energy (Rating for Fusing, t < 8.3 mS)	I <sup>2</sup> t	6.6							AMPS <sup>2</sup> SEC
Typical Thermal Resistance, Junction to Ambient (Note 2)	R <sub>θJA</sub>	40							°C/W
Junction Operating and Storage Temperature Range	T <sub>J</sub> , T <sub>STG</sub>	-55 to +150							°C

NOTES: (1) T<sub>J</sub>=25°C, I<sub>F</sub>=0.5A, I<sub>R</sub>=1A, I<sub>RR</sub>=0.25A  
(2) Mounted on PC Board with 0.2" sq. (5.1mm sq.) copper pads and lead length of 0.375" (9.5mm)