

**8A SURFACE MOUNT BRIDGE RECTIFIER**

**FEATURES:**

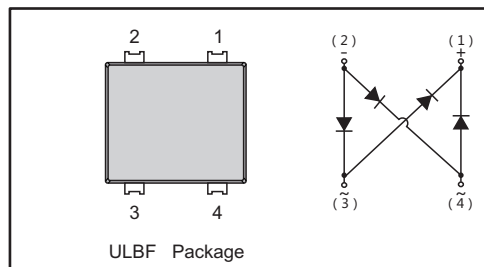
- Reverse Voltage - 300V to 600 V
- Forward Current - 8.0 A
- Efficient reverse recovery time
- Designed for Surface Mount Application

**MECHANICAL DATA**

- Case: ULBF
- Terminals: Solderable per MIL-STD-750, Method 2026
- Approx. Weight: 0.461g / 0.0163oz

**PINNING**

PIN	DESCRIPTION
1	Output Anode ( + )
2	Output Cathode ( - )
3	Input Pin ( ~ )
4	Input Pin ( ~ )



**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Ratings at 25°C ambient temperature unless otherwise specified

Parameter	Symbols	ULBFU803	ULBFU804	ULBFU806	Units
Maximum Repetitive Peak Reverse Voltage	$V_{RRM}$	300	400	600	V
Maximum RMS voltage	$V_{RMS}$	210	280	420	V
Maximum DC Blocking Voltage	$V_{DC}$	300	400	600	V
Average Rectified Output Current at $T = 60^{\circ}C$	$I_o$	8.0			A
Peak Forward Surge Current 8.3 ms Single Half Sine Wave Superimposed on Rated Load (JEDEC Method)	$I_{FSM}$	280			A
$I^2t$ Rating for Fusing( $t < 8.3ms$ )	$I^2t$	325			A <sup>2</sup> S
Maximum Forward Voltage Per diode at 4A	$V_F$	1.0	1.25	1.55	V
Maximum DC Reverse Current $T_a = 25^{\circ}C$ at Rated DC Blocking Voltage $T_a = 125^{\circ}C$	$I_R$	5 500			$\mu A$
Typical Junction Capacitance ( Note1 )	$C_j$	150		110	pF
Typical Thermal Resistance ( Note2 )	$R_{\theta JA}$ $R_{\theta JC}$	55 8			$^{\circ}C/W$
Maximum Reverse Recovery Time ( Note3 )	$t_{rr}$	50		75	ns
Operating and Storage Temperature Range	$T_j, T_{stg}$	-55 ~ +150			$^{\circ}C$

Note: 1. Measured at 1 MHz and applied reverse voltage of 4 V D.C

2. Mounted on glass epoxy PC board with 4×3mm×2mm copper pad.

3. Measured with  $I_f = 0.5 A$ ,  $I_a = 1 A$ ,  $I_r = 0.25 A$ .



Fig.1 Average Rectified Output Current Derating Curve

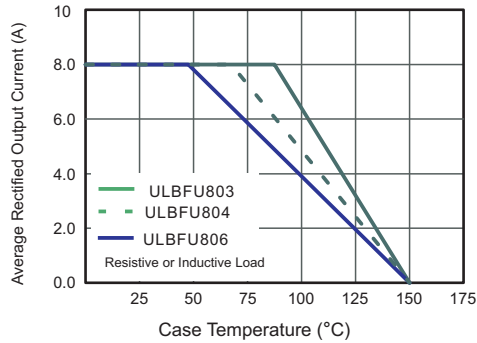


Fig.2 Typical Reverse Characteristics

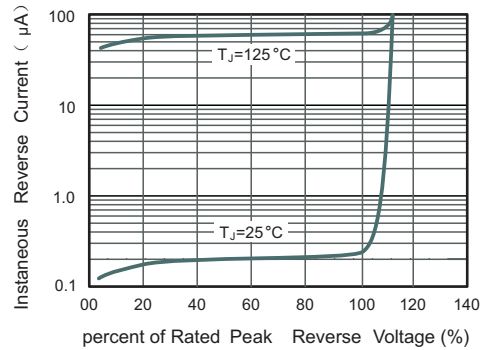


Fig.3 Typical Instantaneous Forward Characteristics

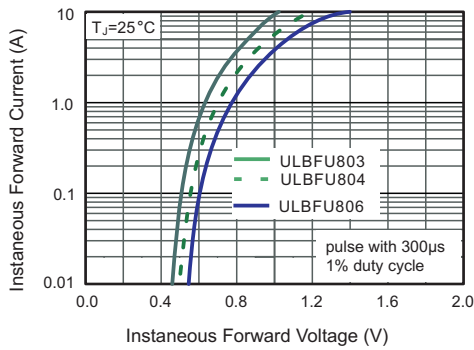


Fig.4 Typical Junction Capacitance

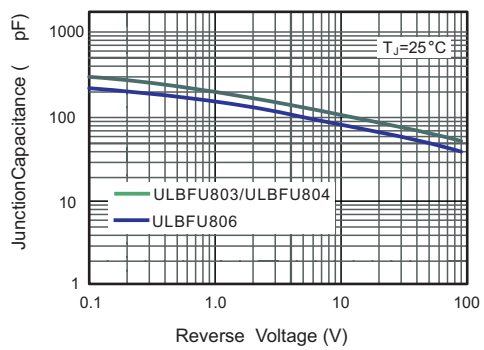
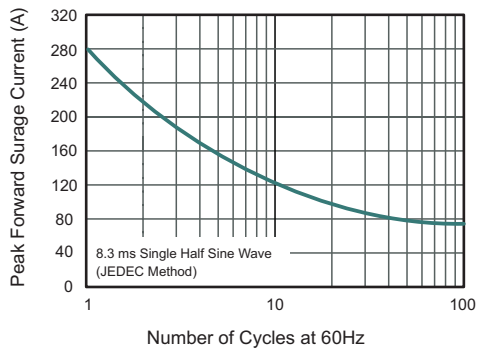


Fig.5 Maximum Non-Repetitive Peak Forward Surge Current

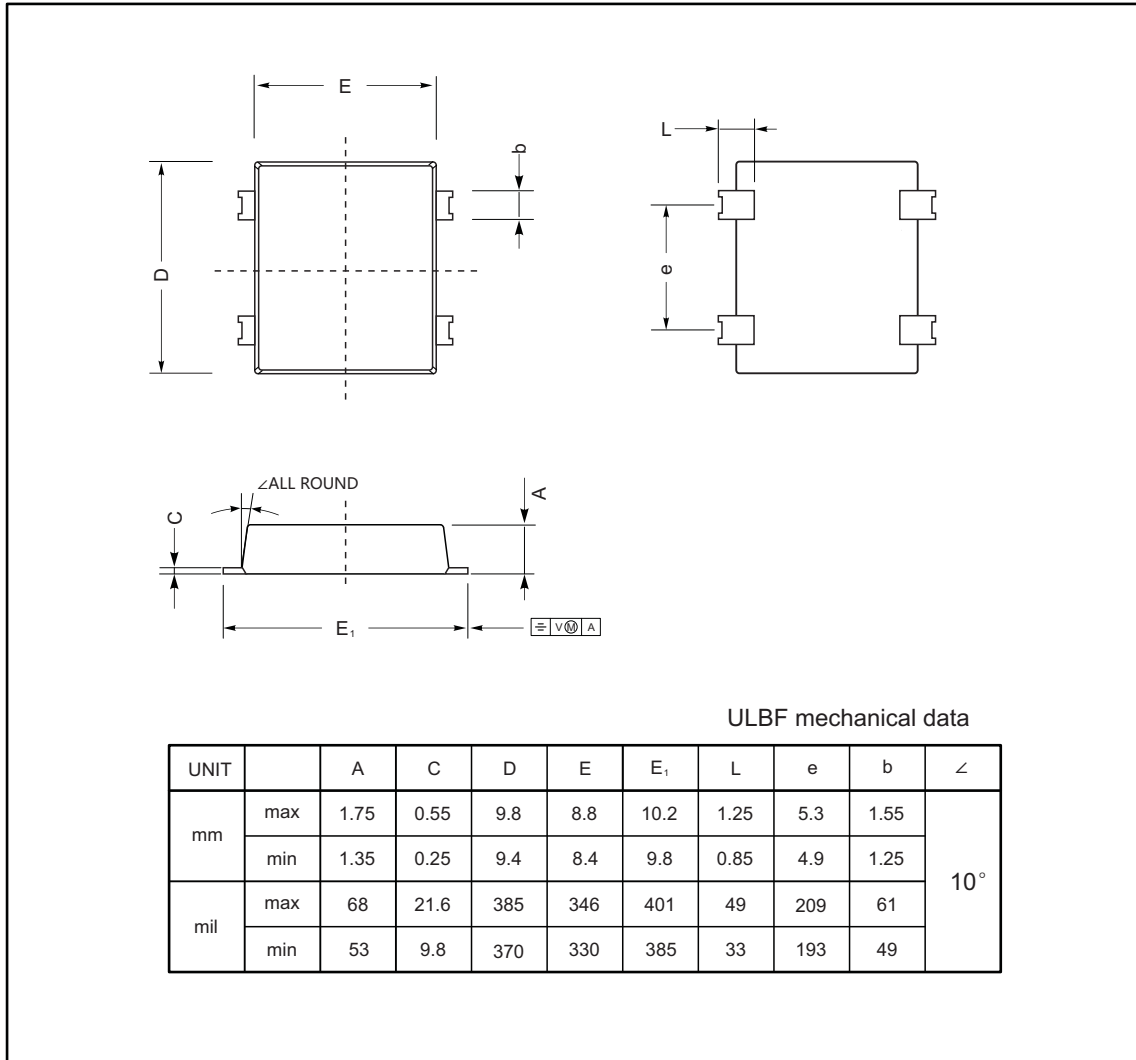




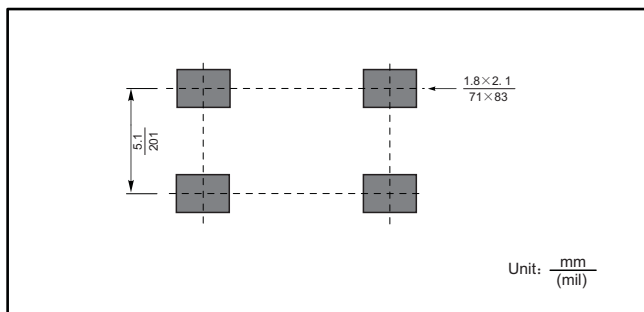
PACKAGE OUTLINE

Plastic surface mounted package; 4 leads

ULBF



The recommended mounting pad size



Marking

Type number	Marking code
ULBFU803	ULBFU803
ULBFU804	ULBFU804
ULBFU806	ULBFU806



文件履历表

序号	制/修订日期	生效日期	版次	修订内容	变更原因	制/修订人	备注
01	2022.09.28	2022.09.30	Rev 1.1	初版制定	/	张雷	
02	2022.10.31	2022.11.2	Rev 1.2	增加ULBFU804	市场要求	张雷	



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