# JIEJIE MICROELECTRONICS CO., LTD.

# JEUR1506FPL EPI ULTRAFAST SOFT RECOVERY RECTIFIER

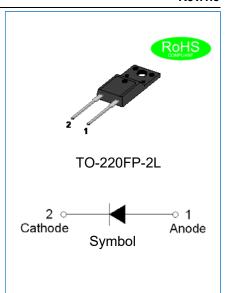
**Rev.1.5** 

#### **DESCRIPTION**

- Plastic package has underwriters laboratory flammability classification 94V-0
- ♦ Lead free in comply with EU RoHS 2011/65/EU directives
- ♦ Low reverse leakage current
- Ultrafast recovery time and soft recovery characteristics
- ♦ Low recovery loss

#### **MECHANICAL DATA**

- ♦ Case: TO-220FP-2L molded plastic over passivated junction
- Terminals: Solder plated, solderable per J-STD-002
- ♦ Weight:2 gram



# ABSOLUTE MAXIMUM RATING (Rating at 25°C ambient temperature unless otherwise specified.)

Parameter	Symbol	JEUR1506FPL	Unit
Maximum repetitive peak reverse voltage	V <sub>RRM</sub>	600	V
Maximum RMS voltage	V <sub>RMS</sub>	420	V
Maximum DC blocking voltage	V <sub>DC</sub> 600		V
Average forward current at T <sub>C</sub> =80°C	I <sub>F(AV)</sub>	15	Α
Peak forward surge current: 8.3ms single half sine-wave superimposed on rated load		180	٨
Peak forward surge current: 10ms single half sine-wave superimposed on rated load	IFSM	150	A
Junction temperature and storage temperature range	T <sub>j</sub> ,T <sub>stg</sub> -55 to +150		$^{\circ}$

#### **ELECTRICAL CHARACTERISTICS**(Rating at 25°C ambient temperature unless otherwise specified.)

Parameter			Min.	Тур.	Max.	Unit
Forward voltage at 15A	VF	-	-	1.5	V	
DC reverse current at rated dc blocking	Tj=25℃		-	-	5	
voltage	Tj=150℃	IR	-	-	300	uA
Reverse recovery time@ I <sub>F</sub> =0.5A,I <sub>R</sub> =1.0A,I <sub>RR</sub>	t <sub>rr</sub>	-	-	50	ns	

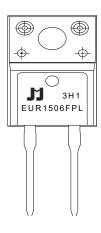
## **ISOLATION CHARACTERISTICS**

Symbol	Parameter	Conditions	Тур.	Max.	Unit	
		50Hz≤f≤60Hz,RH≤65 %,				
		from all pins to external				
$V_{isol(RMS)}$	V <sub>isol(RMS)</sub> RMS isolation voltage	heatsink,	-	-	2500	V
		sinusoidal waveform,				
		clean and dust free				
C	lealation conscitance	from cathode to external	40		۲.	
Cisol	Isolation capacitance	heatsink	-	10	-	pF

#### THERMAL RESISTANCES

Symbol	Parameter	Min.	Тур.	Max.	Unit
R <sub>th(j-c)</sub>	Junction to case thermal resistance	-	3.0	-	°C/W

#### **MARKING**



EUR	EPI Ultrafast Recovery Rectifier
15	I <sub>F(AV)</sub> =15A
06	V <sub>RRM</sub> :600V
FPL	Package:TO-220FP-2L

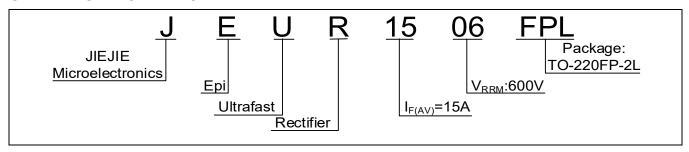
xH1: Month, 1/2/3~9/A/B/C

3**x**1:

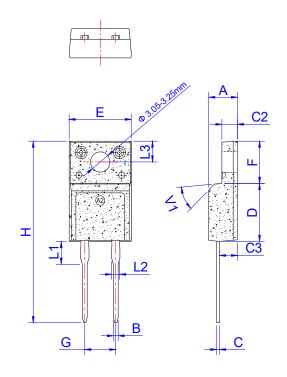
_						
2018	2019	2020	2021	2022	2023	2024
Н	I	J	K	L	М	N
2025	2026	2027	2028	2029	2030	
0	Р	Q	R	S	Т	

3Hx: Batch number

#### **ORDERING INFORMATION**



# PACKAGE MECHANICAL DATA

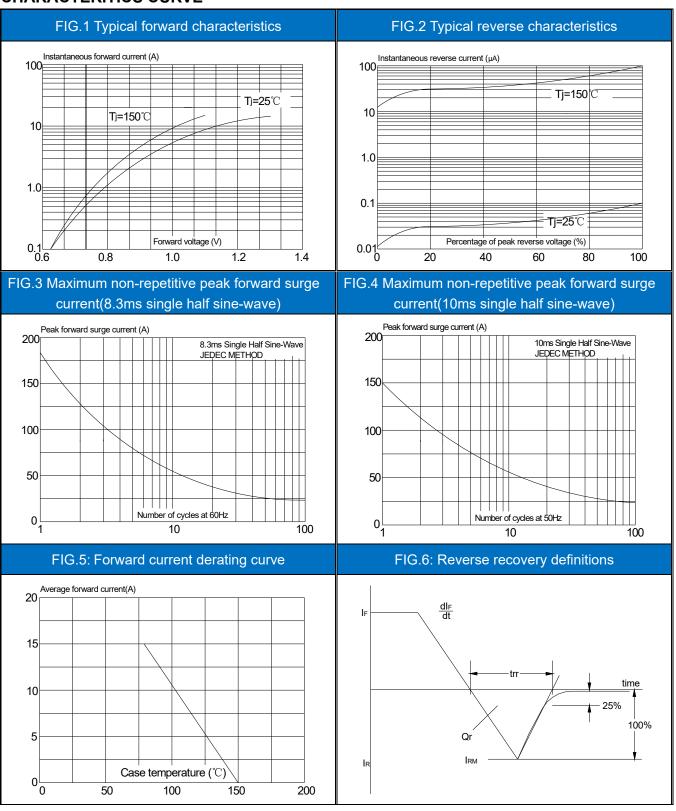


	Dimensions					
Ref.		Millimeters		Inches		
	Min.	Тур.	Max.	Min.	Тур.	Max.
Α	4.50		4.90	0.177		0.193
В	0.74	0.80	0.83	0.029	0.031	0.033
С	0.47		0.65	0.019		0.026
C2	2.45		2.75	0.096		0.108
C3	2.60		3.00	0.102		0.118
D	8.80		9.30	0.346		0.366
E	9.80		10.4	0.386		0.410
F	6.40		6.80	0.252		0.268
G		5.08			0.200	
Н	28.0		29.8	1.102		1.173
L1		3.63			0.143	
L2	1.14		1.70	0.045		0.067
L3		3.30			0.130	
V1		45°			45°	

## PACKAGE INFORMATION-TO-220FP-2L

OUTLINE	UNIT WEIGHT	TUBE	PER CARTON
	(g/PCS) TYP	(PCS)	(PCS)
TUBE	2	50	5,000

# **CHARACTERITICS CURVE**





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