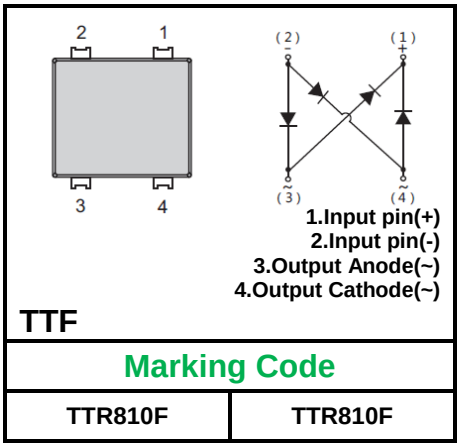
8A SURFACE MOUNT GLASS PASSIVATED BRIDGE RECTIFIER Reverse Voltage - 100 to 1000 V Forward Current – 8.0A



TTF

Marking Code	
TTR810F	TTR810F

FEATURES

- High current capability
- Low forward voltage drop
- Glass Passivated Chip Junction
- Designed for Surface Mount Application
- Lead free in comply with EU RoHS 2011/65/EU directives

MECHANICAL DATA

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

Maximum Ratings and Electrical characteristics

Ratings at 25 °C ambient temperature unless otherwise specified.

Single phase half-wave 60 Hz, resistive or inductive load, for capacitive load current derate by 20 %.

Parameter	Symbols	TTR810F	Units
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	1000	V
Maximum RMS voltage	V_{RMS}	700	V
Maximum DC Blocking Voltage	V_{DC}	1000	V
Average Rectified Output Current at T_c=100℃	I_o	8.0	A
Peak Forward Surge Current 8.3 ms Single Half Sine-Wave Superimposed on Rated Load(JEDEC method)	I_{FSM}	220	A
I2t Rating for Fusing	I^2t	220	A^2S
Typical Thermal Resistance（Note1）	$R_{\theta JA}$ $R_{\theta JC}$ $R_{\theta JL}$	60 6 14	°C/W
Operating and Storage Temperature Range	T_j, T_{stg}	-55 ~ +150	°C

（1）Mounted on glass epoxy PC board with 4×1.5"×1.5"（3.81×3.81 cm） copper pad.

Maximum Ratings and Electrical characteristics

Ratings at 25 °C ambient temperature unless otherwise specified.

Parameter	Symbols	Test Conditions	Min	Typ	Max	Units
Instantaneous forward voltage	V_F	I_F =1A TJ=25℃ I_F =4A TJ=25℃	- -	0.83 0.95	- 1.1	V
		I_F =1A TJ=125℃ I_F =4A TJ=125℃	- - -	0.70 0.85	- -	
Reverse current at DC blocking voltage	I_R	TJ=25℃ TJ=125℃	-	0.15 40	1 200	uA
Maximum Reverse Recovery Time	Trr	Measured with I_F=0.5A, I_R=1A, Irr = 0.25 A .	-	-	500	nS
Typical Junction Capacitance	Cj	f=1MHz,VR=4V DC TJ= 25℃	-	100	-	pF

Fig.1 Average Rectified Output Current Derating Curve

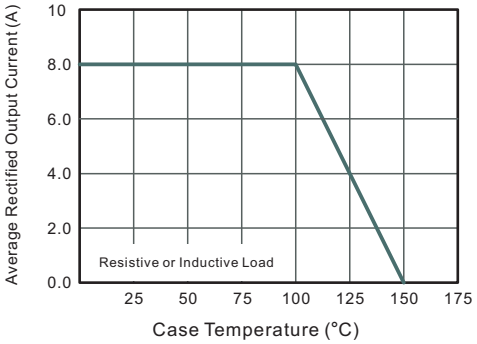


Fig.2 Typical Reverse Characteristics

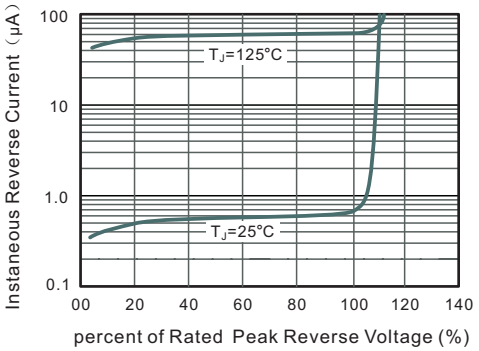


Fig.3 Typical Instaneous Forward Characteristics

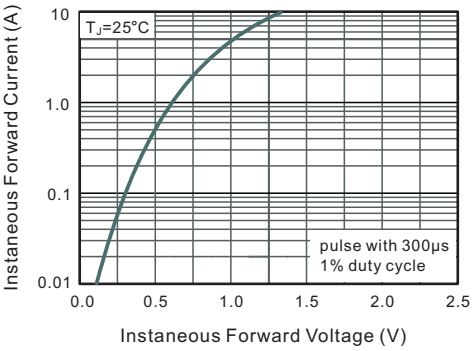


Fig.4 Typical Junction Capacitance

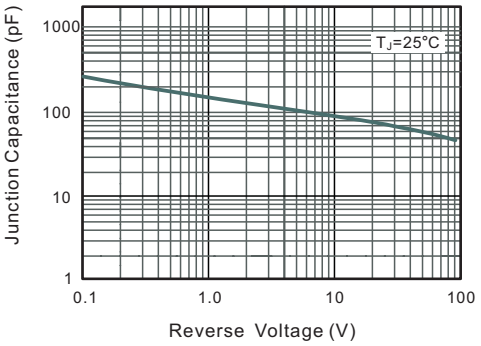


Fig.5 Maximum Non-Repetitive Peak Forward Surage Current

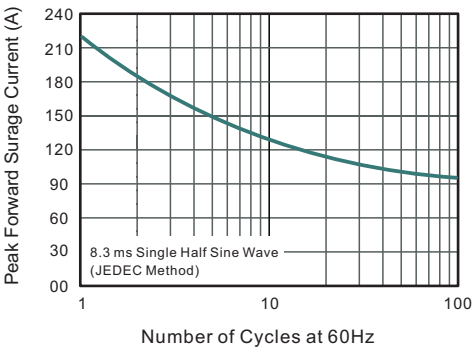
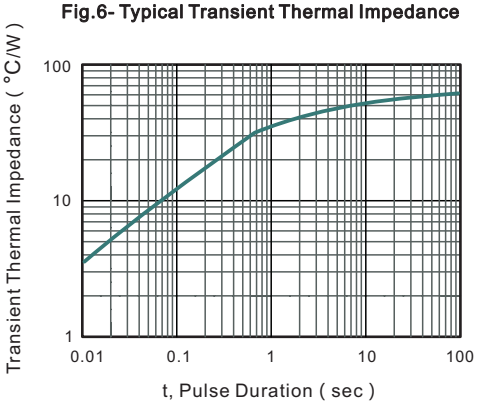
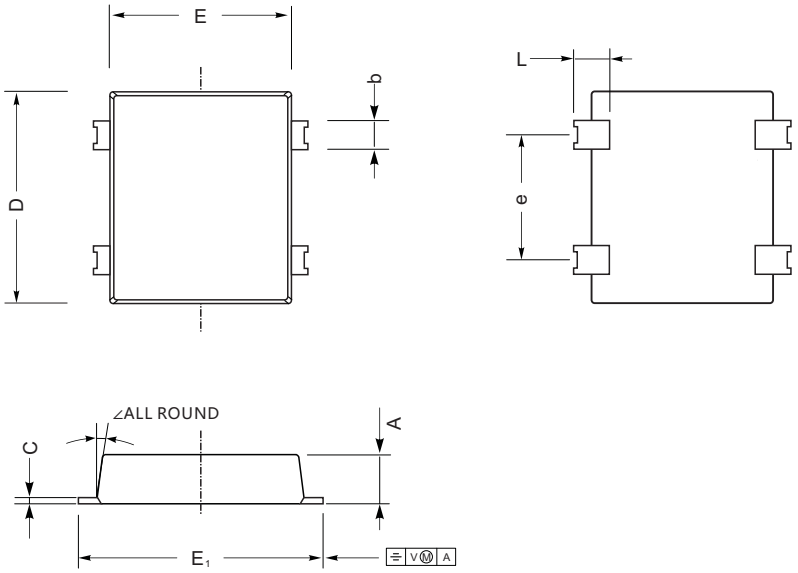


Fig.6- Typical Transient Thermal Impedance



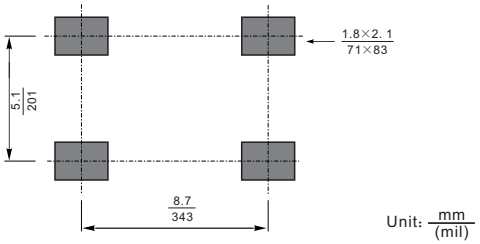
Package Outline TTF

Plastic surface mounted package; 4 leads



UNIT		A	C	D	E	E_1	L	e	b	∠
mm	max	1.75	0.55	9.8	8.8	10.2	1.25	5.3	1.55	10°
	min	1.35	0.25	9.4	8.4	9.8	0.85	4.9	1.25	
mil	max	68	21.6	385	346	401	49	209	61	
	min	53	9.8	370	330	385	33	193	49	

The recommended mounting pad size



Summary of Packing Options

Package	Packing Description	Packing Quantity	Industry Standard
TTF	Tape/Reel,13"reel	3000	EIA-481-1