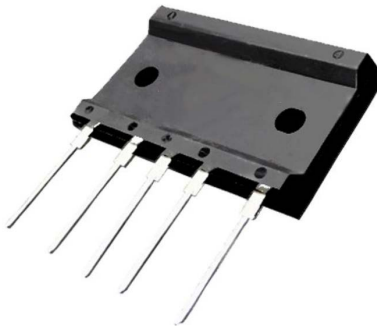


3 Phase Rectifier Bridge

DXT8006E50



Features

- 3 Phase Rectifier Bridge
- Compliant with RoHS Provisions
- Low forward voltage, high forward current
- High forward surge current capability
- High heat-conducting performance
- Thermal welding performance: 260 °C / 10sec

Applications

- Switching Power Supply
- Office Devices
- Industrial Auto-equipments

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	Symbol	DXT8006E50	Unit
Maximum repetitive peak reverse voltage	V_{RRM}	600	V
Maximum RMS voltage	V_{RMS}	420	V
Maximum DC Blocking Voltage	V_{DC}	600	V
Average Rectified Output Current	I_o	80.0	A
Reverse Recovery Time. $I_F=0.5A, I_R=1A, I_{RR}=0.25A$	T_{rr}	50	ns
Peak Forward Surge Current 8.3 ms Single Half Sine Wave Superimposed on Rated Load (JEDEC Method)	I_{FSM}	600	A
I^2t rating for fusing ($1ms < t < 8.3ms$)	I^2t	830	A ² S
Dielectric Strength: Terminals to Case, AC 1 minute	V_{dis}	2.5	KV
Mounting torque	TOR	Recommended torque: 0.5	N.m
Maximum Forward Voltage at 40.0A	V_F	2.55	V
Maximum DC Reverse Current at Rated DC Blocking Voltage	I_R	10 500	μA
Junction to ambient, without heatsink @ $T_A=25^\circ C$ Junction to case, with heatsink @ $T_A=125^\circ C$	$R_{\theta JA}$ $R_{\theta JC}$	16 0.8	$^\circ C/W$
Operating and Storage Temperature Range	T_j, T_{stg}	-55 ~ +150	$^\circ C$

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

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

RATINGS AND CHARACTERISTICS CURVES (TA = 25 °C unless otherwise noted)

Fig.1 Current Derating, Case

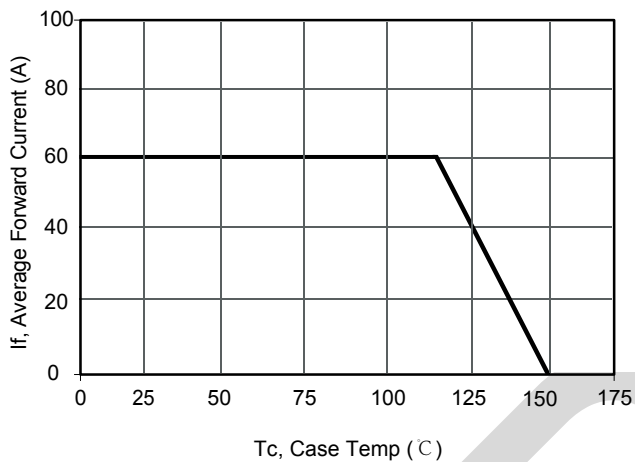


Fig.2 Maximum Non-Repetitive Peak Forward Surge Current

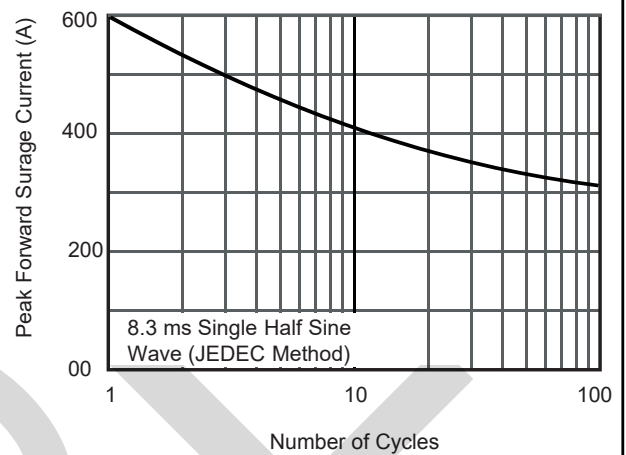


Fig.3 Typical Forward Voltage

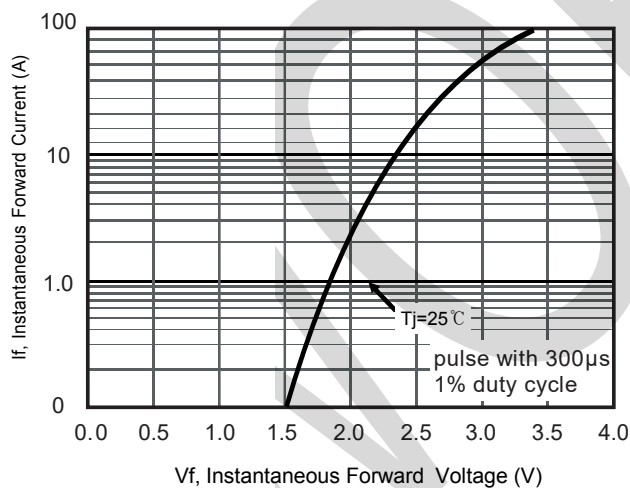
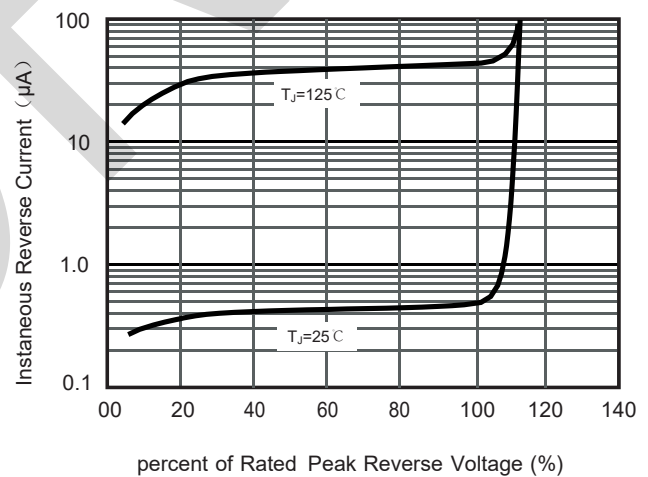
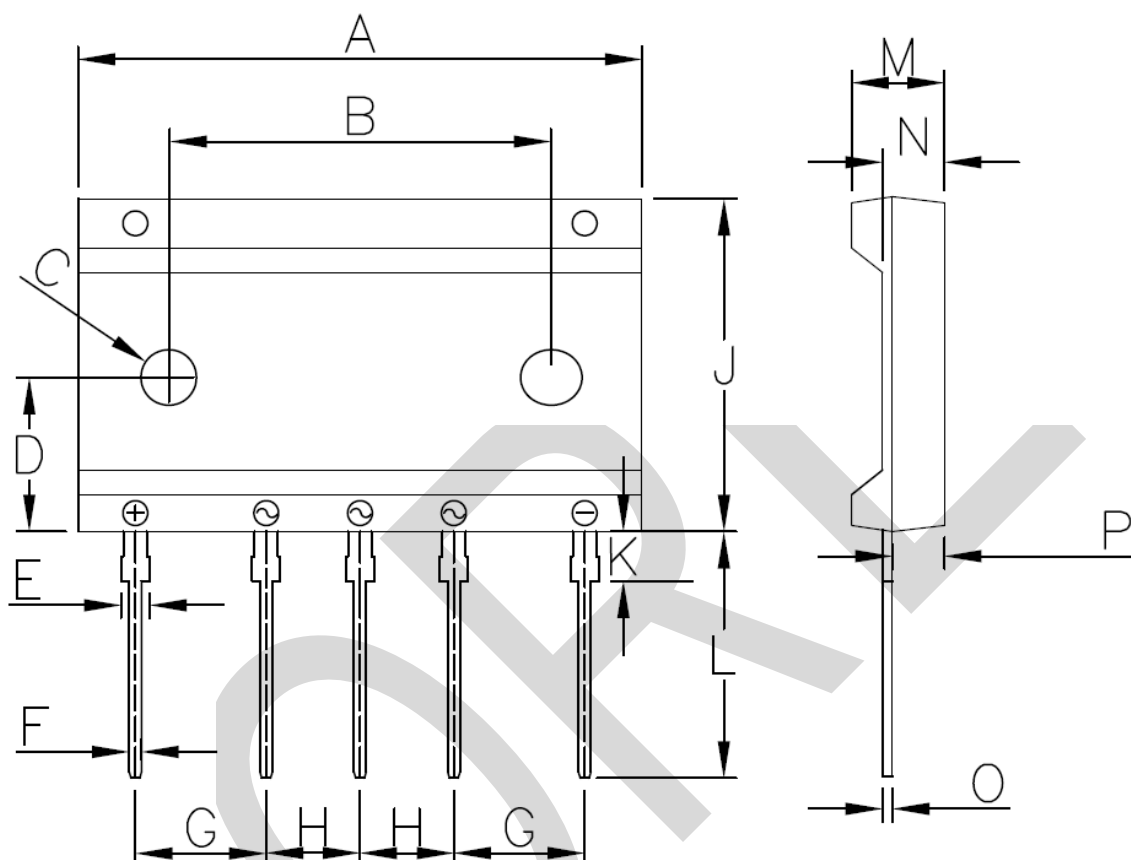


Fig.4 Typical Reverse Characteristics



PACKAGE OUTLINE DIMENSIONS

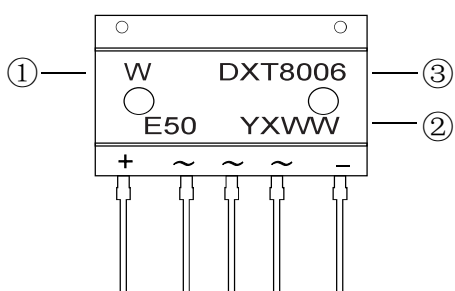
Note: unit mm(inch)



DXT mechanical data: unit mm(inch)

	A	B	C	D	E	F	G	H	J	K	L	M	N	O	P
max	46.1	31.1	4.8	12.8	2.5	1.3	10.9	8.0	27.5	4.2	20.5	8.4	5.9	1.0	4.8
min	45.3	30.9	4.4	12.2	2.1	0.7	10.3	7.2	26.5	3.8	19.5	7.6	5.1	0.6	4.2
max	1.81	1.22	0.19	0.51	1.3	0.10	0.43	0.32	1.09	0.17	0.81	0.33	0.24	0.04	0.19
min	1.78	1.21	0.17	0.48	1.0	0.02	0.40	0.28	1.04	0.15	0.76	0.29	0.20	0.5	0.16

Marking Information



①W : Company's trademark

②Product model : DXT8006E50

③PDC information :

Y X WW

WW:Week code(01 to 53)

X:Internal identification code

Y:Year code(ex:0=2020)