

## YZPST-BTA41-1600VAC TRIACs

### ●Product features

Double mesa structure (Double Mesa),

Table glass passivation process,

High voltage stability

The ability of strong current shock resistance

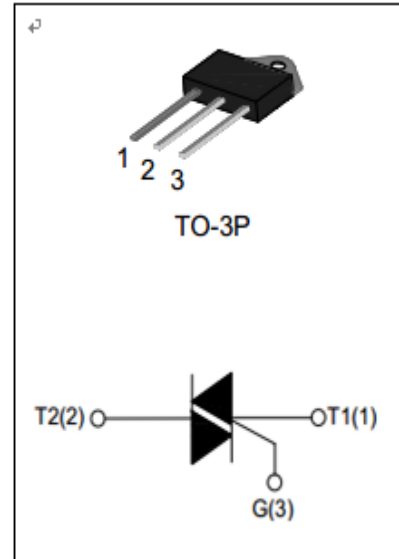
The applicable model : BTA41/BTB41。

### ●The main purpose

Washing machine, Vacuum cleaner

Solid state relay, AC motor speed control

AC contactless switch, Welding equipment



### ●Package

TO-3P

### ●Main Feature (Tj=25°C)

Symbol	Value	Unit
$I_T$ (RMS)	40	A
$V_{DRM} / V_{RRM}$	1600/1600	V
$V_{TM}$	1.55	V

### ●Absolute ratings (Limiting Values)

Symbol	Parameter	Value	Unit
$I_{TSM}$	Non repetitive surge peak on-state Current (tp=10ms)	400	A
$I^2t$	(tp=10ms)	800	A <sup>2</sup> S
di/dt	$I_G=2I_{GT}$ , $tr \leq 100ns$ , $T_j=125^\circ C$	50	A/ $\mu s$
$I_{GM}$	Peak gate current(tp=20us)	8	A
$P_{G(AV)}$	Average gate power	1	W
Tstg	Storage temperature	-40--+150	°C
Tj	Operating junction temperature	-40--+125	

**●Thermai Resistances**

Symbol	Parameter		Value	Unit
Rth (j-c)	Junction to case	TO-3P	0.9	°C/W

**●Electrical characteristics (T<sub>j</sub>=25°C unless otherwise stated)**

Symbol	Test Conditions		Value	Unit
I <sub>GT</sub>	V <sub>D</sub> =12V, R <sub>L</sub> =30 Ω	I II III	≤50	mA
		IV	-----	
I <sub>DRM</sub>	V <sub>D</sub> =V <sub>DRM</sub>	T <sub>j</sub> =25°C	≤5	μ A
		T <sub>j</sub> =125°C	≤5	mA
I <sub>RRM</sub>	V <sub>D</sub> =V <sub>RRM</sub>	T <sub>j</sub> =25°C	≤5	μ A
		T <sub>j</sub> =125°C	≤5	mA
I <sub>L</sub>	I <sub>G</sub> =1.2I <sub>GT</sub>	I III	≤70	mA
		II	≤160	
V <sub>GT</sub>	V <sub>D</sub> =12V, R <sub>L</sub> =30 Ω		≤1.5	V
V <sub>GD</sub>	V <sub>D</sub> =V <sub>DRM</sub> , T <sub>j</sub> =125°C R <sub>L</sub> =3.3K Ω		≥0.2	V
V <sub>TM</sub>	I <sub>TM</sub> =60A, tp=380 μ s		1.55	V
I <sub>H</sub>	V <sub>D</sub> =12V, I <sub>T</sub> =500mA		≤80	mA
dV/dt	V <sub>D</sub> =67% V <sub>DRM</sub> , GateOpen, T <sub>j</sub> =125°C		≥800	v/ μ s

**●Measure of package  
TO-3P**

