

Model : BT137

Shape: TO-252

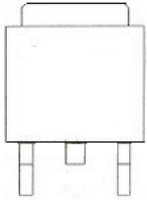
Product name: bidirectional thyristor

TO-252 outline diagram

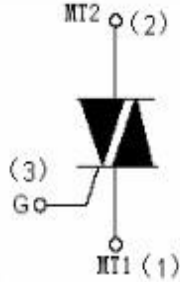
Polarity: Three pins from left to right 1: MT1 2: MT2 3: G

Application: Mainly used for AC switch, phase control,

Lighting and consumer industries
Solid state relay, motor speed control, MPU interface, TTL logic



MT1 MT2 G



Limit range (TA=25 ° C unless otherwise specified)

Project	Symbol	Rated value	Unit
Repeated peak blocking voltage	VDRM/VRRM	600	V
Average on-state current	IT	8	A
No repeated inrush current in on-state	ITSM	65	A
Junction temperature	Tvj	125	°C
Storage temperature	Tstg	-40~150	°C

Electrical parameter characteristics (TA=25 ° C unless otherwise specified)

Parameter	Symbol	Test condition	Min	Max	Unit
Off-state repeat peak current	IDRM/IRRM	VD=VDRM/VR=VRRM, Tj=125°C, Open gate		0.5	mA
Peak on-state voltage	VTM	ITM=10A		1.65	V
Holding current	IL	VD=12V, IGT=100mA	MT1(-),MT2(+),G(+)	30	mA
			MT1(-),MT2(+),G(-)	45	mA
			MT1(+),MT2(-),G(-)	30	mA
			MT1(+),MT2(-),G(+)	45	mA
Contain current	IH	VD=12V IGT=0.1A		20	mA
Gate trigger current	IGT	VD=12v, RL=100Ω	MT1(-),MT2(+),G(+)	35	mA
			MT1(-),MT2(+),G(-)	35	mA
			MT1(+),MT2(-),G(-)	35	mA
			MT1(+),MT2(-),G(+)	70	mA
Gate trigger voltage	VGT	VD=12V IT=0.1A		1.5	V

Curve characteristic diagram

