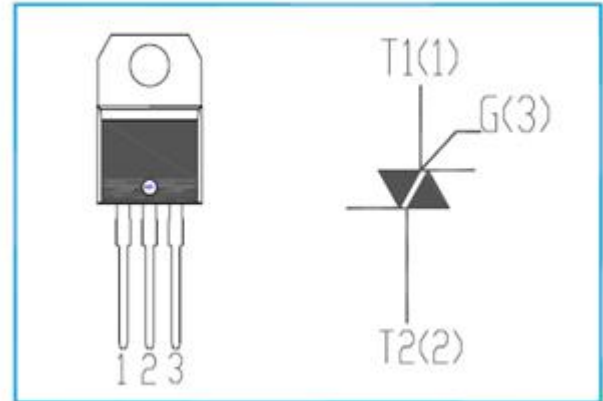


**isc Triacs**
**BT139-600E**
**FEATURES**

- With TO-220 package
- Glass passivated triacs in a plastic envelope, requiring high bidirectional transient and blocking voltage capability and high thermal cycling performance. Typical applications include motor control, industrial and domestic lighting, heating and static switching.
- Minimum Lot-to-Lot variations for robust device performance and reliable operation


**ABSOLUTE MAXIMUM RATINGS (Ta=25°C)**

SYMBOL	PARAMETER	MIN	UNIT
V <sub>DRM</sub>	Repetitive peak off-state voltage	600	V
V <sub>RPM</sub>	Repetitive peak off-state voltage	600	V
I <sub>T(RMS)</sub>	RMS on-state current (full sine wave)	16	A
I <sub>TSM</sub>	Non-repetitive peak on-state current t <sub>p</sub> =20ms	140	A
P <sub>GM</sub>	Peak gate power dissipation	5	W
P <sub>G(AV)</sub>	Average gate power dissipation	0.5	W
T <sub>j</sub>	Operating junction temperature	125	°C
T <sub>stg</sub>	Storage temperature	-40~150	°C

**ELECTRICAL CHARACTERISTICS (T<sub>c</sub>=25°C unless otherwise specified)**

SYMBOL	PARAMETER	CONDITIONS	MIN	MAX	UNIT	
I <sub>RPM</sub>	Repetitive peak reverse current	V <sub>R</sub> =V <sub>RPM</sub> , V <sub>R</sub> =V <sub>RPM</sub> , T <sub>j</sub> =125°C		0.02 0.5	mA	
I <sub>DRM</sub>	Repetitive peak off-state current	V <sub>D</sub> =V <sub>DRM</sub> , V <sub>D</sub> =V <sub>DRM</sub> , T <sub>j</sub> =125°C		0.02 0.5	mA	
I <sub>GT</sub>	Gate trigger current	V <sub>D</sub> =12V; I <sub>T</sub> = 0.1A		I	10	mA
				II	10	
				III	10	
				IV	25	
V <sub>TM</sub>	On-state voltage	I <sub>T</sub> = 20A		1.6	V	
I <sub>H</sub>	Holding current	I <sub>GT</sub> = 0.1A, V <sub>D</sub> = 12V		30	mA	
V <sub>GT</sub>	Gate trigger voltage	V <sub>D</sub> =12V; I <sub>T</sub> = 0.1A		1.5	V	

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