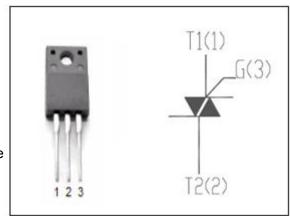


isc Thyristors

BTA316X-800CT

APPLICATIONS

- With TO-220F package
- Applications subject to high temperature $(TJ = 150 \, ^{\circ}\text{C})$
- Be suitable for general purpose AC switching, they can be used as an ON/OFF function in applications.
- Minimum Lot-to-Lot variations for robust device performance and reliable operation.



ABSOLUTE MAXIMUM RATINGS(Ta=25℃)

SYMBOL	PARAMETER	MIN	UNIT
V_{DRM}	Repetitive peak off-state voltage	800	V
V_{RRM}	Repetitive peak reverse voltage	800	V
I _{T(RMS)}	RMS on-state current full sine wave; T _{mb} ≤101°C	16	А
I _{TSM}	Surge non-repetitive on-state current t=20ms t=16.7ms	140 150	А
P _{G(AV)}	Average gate power dissipation (over any 20 ms period)		W
Tj	Operating junction temperature	150	$^{\circ}$ C
T _{stg}	Storage temperature	-40~150	$^{\circ}$



isc Thyristors

BTA316X-800CT

ELECTRICAL CHARACTERISTICS (Tc=25℃ unless otherwise specified)

SYMBOL	PARAMETER	CONDITIONS		MIN	MAX	UNIT
I _{RRM}	Repetitive peak reverse current	V _R =V _{RRM}	T _j =125℃		0.5	mA
I _{DRM}	Repetitive peak off-state current	V _D =V _{DRM}	T _j =125℃		0.5	mA
V_{TM}	On-state voltage	I _{TM} = 18A			1.5	V
I _{GT}	Gate-trigger current Quadrant (I - II - III)	$V_D = 12 \text{ V;I}_T = 0.1 \text{A}$		2	35	mA
V _{GT}	Gate-trigger voltage Quadrant (I - II - III)	V _D = 12 V;I _T =0.1A			1.5	V

NOTICE:

ISC reserves the rights to make changes of the content herein the datasheet at any time without notification. The information contained herein is presented only as a guide for the applications of our products.

ISC products are intended for usage in general electronic equipment. The products are not designed for use in equipment which require specialized quality and/or reliability, or in equipment which could have applications in hazardous environments, aerospace industry, or medical field. Please contact us if you intend our products to be used in these special applications. ISC makes no warranty or guarantee regarding the suitability of its products for any particular purpose, nor does ISC assume any liability arising from the application or use of any products, and specifically disclaims any and all liability, including without limitation special, consequential or incidental damages.