

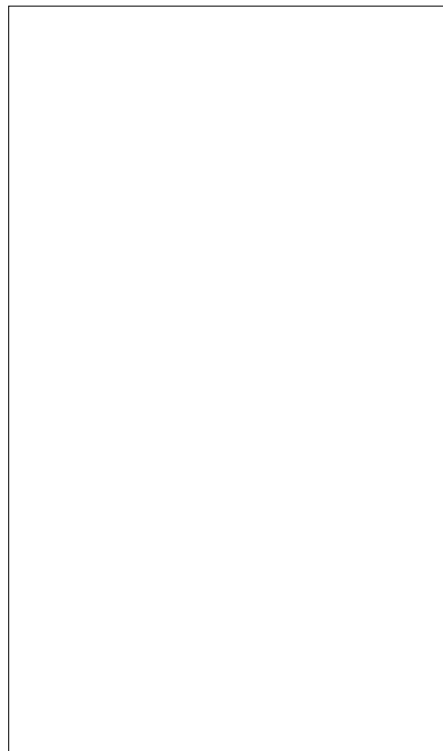


ACJT105-6W 1A TRIAC

Rev.A.1.1

DESCRIPTION:

The ACJT105-6W triac is suitable for general purpose AC switching. It can be used as an ON/OFF function in applications such as heating regulation, induction motor starting circuits, for phase control operation in light dimmers, motor speed controllers. The ACJT105-6W embeds a TVS structure to absorb the inductive turn-off energy such as those described in the IEC 61000-4-5 standards.



Peak pulse voltage ($T_j=25$; non-repetitive, off-state; FIG.8)	V_{pp}	3.5	kV
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ELECTRICAL CHARACTERISTICS ($T_j=25$ unless otherwise specified)

Symbol	Test Condition	Quadrant	Value		Unit
I _{GT}	V _D =12V R _L =33Ω	- -	MAX.	5	mA
V _{GT}		- -	MAX.	1	V
V _{GD}	V _D =V _{DRM} T _j =125 R _L =3.3kΩ	- -	MIN.	0.2	V
I _L	I _G =1.2I _{GT}	-	MAX.	10	mA
				20	
I _H	I _T =100mA		MAX.	10	mA
dV/dt	V _D =400V Gate Open T _j =125		MIN.	700	V/μs
(dI/dt) _c	(dV/dt) _c =10V/μs, T _j =125		MIN.	0.5	A/ms
t _{on}	I _G =10mA I _A =200mA I _R =20mA T _j =25		TYP.	2	μs
t _{off}				20	
V _{CL}	I _{CL} =0.1mA t _p =1ms		MIN.	700	V

STATIC CHARACTERISTICS

Symbol	Parameter	Value(MAX.)	Unit
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V_{TM} I_{TAf} 53872304.56 419.28 0.48 22.H</MC[(T)-c 00.63 0 74 (Af ..08 190.9 00.63 0 7)Tj 0 Tc 0 .2 4 /P48 re f 361.69 Td ()Tj EMC

FIG.1: Maximum power dissipation versus RMS on-state current

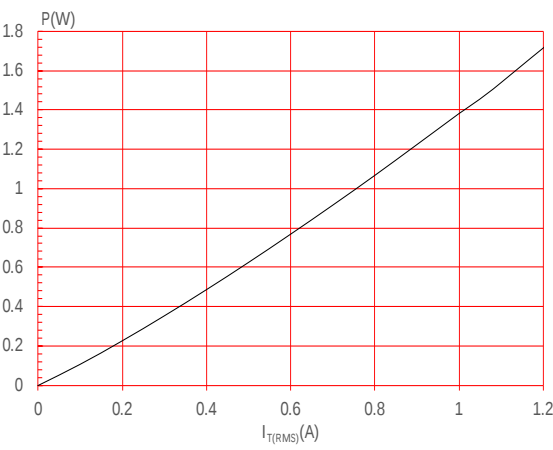


FIG.2: RMS on-state current versus case temperature

FIG.7: Relative variations of gate trigger current, holding current and latching current versus junction temperature

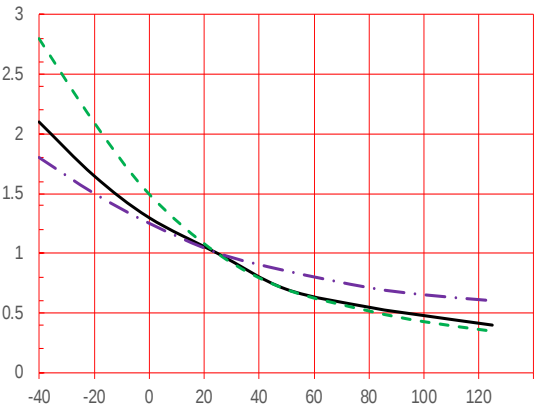
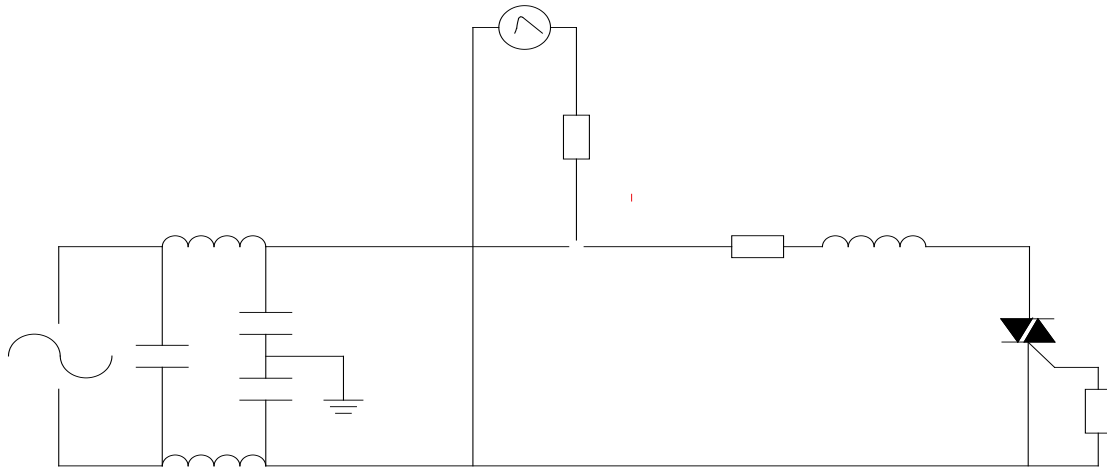


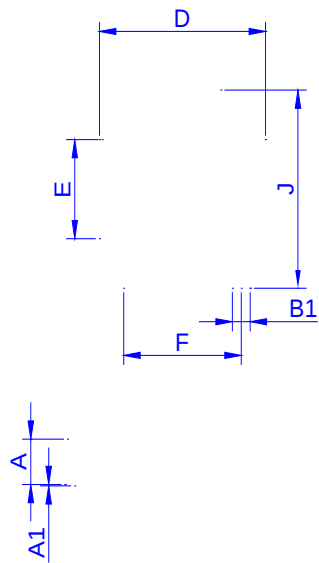
FIG.8 Test circuit for inductive and resistive loads to IEC-61000-4-5 standards



ORDERING INFORMATION

Order code	Voltage V _{DS} /V _{GS} (V)	IGT(mA)	Package	Base qty. (pcs)	Delivery mode
ACJT105-6W	600	5	SOT-223-2L	4,000	Tape & Reel

PACKAGE MECHANICAL DATA



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