T0610H-6F 6A TRIAC

Rev.A.1.1

The T0610H-6F 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. Compared to traditional triacs, T0610H-6F provides a very high switching capability up to junction temperatures of 150°C. It can be driven directly through the MCU I/O port. By using an external plastic package, T0610H-6F provides a rated insulation voltage of 2000 VRMS, complying with UL standards (File ref: E252906). Package TO-220F is RoHS compliant.

Symbol	Value	Unit
$I_{T(RMS)}$	6	A
V_{DRM} /V_{RRM}	600	V
I_{GT} Ñ/ ñ/ ħ	10/10/10	mA

Peak gate current (t_p=20μs , T_j=150℃)	I_{GM}	4	A
Average gate power dissipation (T_j=150℃)	$P_{G(AV)}$	1	W
Peak gate power	P_{GM}	10	W
Peak pulse voltage (T_j=25℃; non-repetitive,off-state;FIG.7)	V_{pp}	3	kV

(T_j=25℃ unless otherwise specified)

Symbol	Test Condition	Quadrant	Value		Unit
I_{GT}	V_D =12V R_L =33Ω	Ⅰ - Ⅱ - Ⅲ	MAX.	10	mA
V_{GT}		Ⅰ - Ⅱ - Ⅲ	MAX.	1	V

T 06 10 H -6 F

- T: Triacs
- 06: $I_{T(RMS)}$:6A
- 10: I_{GT1-3} ≤ 10mA
- H: High junction temperature
- -6: V_{DRM} /V_{RRM} ≥ 600V
- F: TO-220F(Ins)

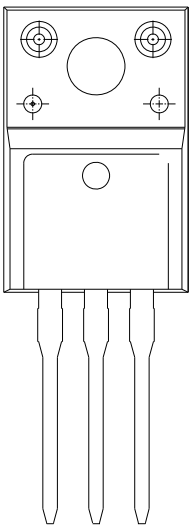


FIG.1: Maximum power dissipation versus RMS on-state current

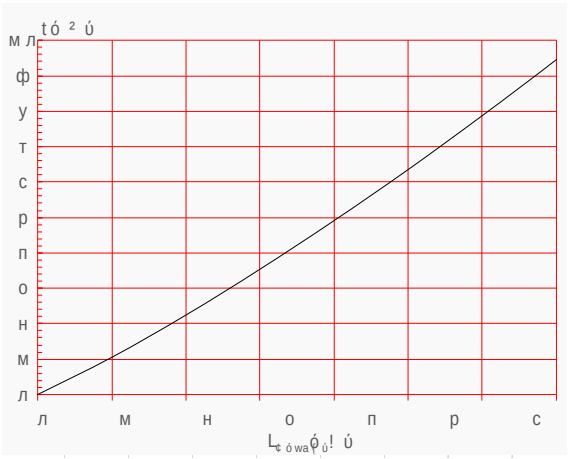
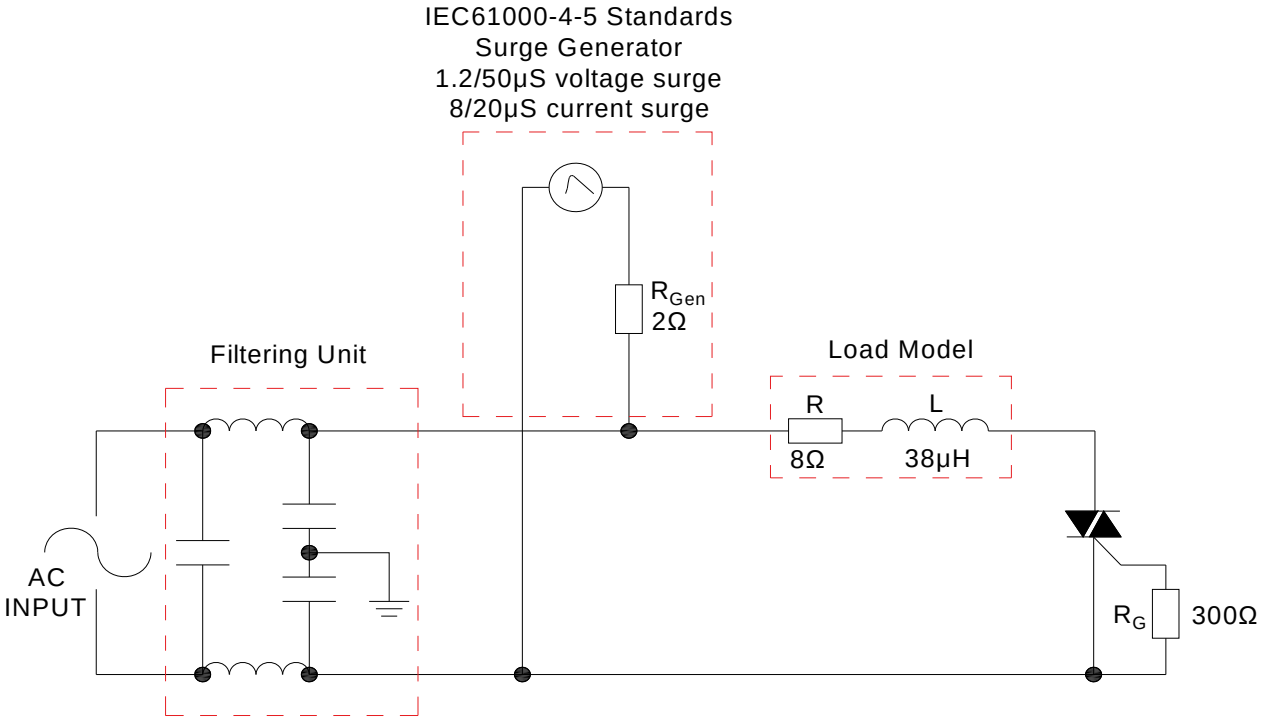


FIG.2: RMS on-state current versus case temperature

FIG.7 Test circuit for inductive and resistive loads to IEC-61000-4-5 standards



Refer to the application note “Assembly Instructions for Thyristors in Through-hole Package” released by JieJie a ǻ ǑNJ ƨ Ŝ f Ŝ Ǒ ű NJ ƨ y ǻ Ǒ ă Φ

Order code	Voltage V_{DRM}/V_{RRM} (V)	IGT(Ma)	

Information furnished in this document is believed to be accura