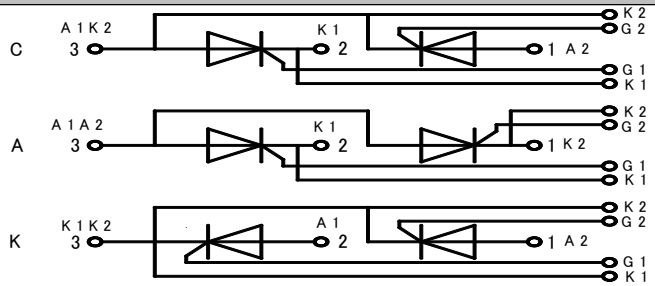
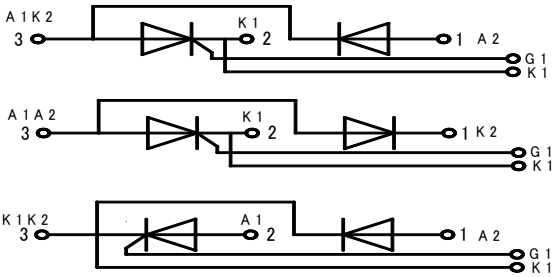
Applications

- Power Converters
- Lighting Control
- DC Motor Control and Drives
- Heat and temperature control

Features

- International standard package
- High Surge Capability
- Simple Mounting

Internal Circuit

C(A/K)	C(A/K)B
	

Blocking - Off State

TYPE		VDRM/VRRM	VDSM/VRSM	Units
MT200C(A/K)28T3	MT200C(A/K)B28T3	2800	2900	V
MT200C(A/K)30T3	MT200C(A/K)B30T3	3000	3100	V
MT200C(A/K)32T3	MT200C(A/K)B32T3	3200	3300	V
MT200C(A/K)34T3	MT200C(A/K)B34T3	3400	3500	V
MT200C(A/K)36T3	MT200C(A/K)B36T3	3600	3700	V

Maximum Ratings

Symbol	Conditions	Values	Units
I_{TAV}	Sine 180°;Tc=85℃	200	A
I_{TSM}	T_{VJ}=125℃ t=10ms, sine	6000	A
I^2t	T_{VJ}=125℃ t=10ms, sine	180000	A^2s
Visol	a.c.50HZ;r.m.s.;1min,I_{iso}:2mA(MAX)	4000	V
Tvj		-40 to 125	℃
Tstg		-40 to 125	℃
Mt	To terminals(M8)	12±15%	Nm
Ms	To heatsink(M6)	6±15%	Nm
di/dt	T_{VJ}= T_{VJM} ,V_{DM}≤2/3V_{DRM}， I_{GM}=1.5A t_r≤0.5μs	100	A/μs
dv/dt	T_{VJ}= T_{VJM} ,2/3V_{DRM}, linear voltage rise	1000	V/μs
Weight	Module(Approximately)	870	g

Thermal Characteristics

Symbol	Conditions	Values	Units
Rth(j-c)	per chip	0.12	℃/W
Rth(c-h)	per chip	0.04	℃/W

Electrical Characteristics

Symbol	Conditions	Values			Units
		Min.	Typ.	Max.	
V_{TM}	T=25℃ I_{TM} =600A			2.5	V
I_{RRM}/I_{DRM}	T_{VJ} =T_{VJM} ,V=V_{RRM} ,V=V_{DRM}			40	mA
V_{TO}	T_{VJ} =T_{VJM}			0.95	V
r_T	T_{VJ} =T_{VJM}			1.2	mΩ
V_{GT}	T_{VJ} =25℃ , V_D =12V, R_L= 3 Ω	0.8		2.5	V
I_{GT}	T_{VJ} =25℃ , V_D =12V, R_L= 3 Ω	30		150	mA
I_L	T_{VJ} =25℃ , V_D =12V, R_L= 3 Ω			1000	mA
I_H	T_{VJ} =25℃ , V_D =12V, R_L= 3 Ω	20		150	mA
V_{GD}	T_{VJ} =T_{VJM} , V_{DM} =67%V_{DRM}	0.2			V

Performance Curves

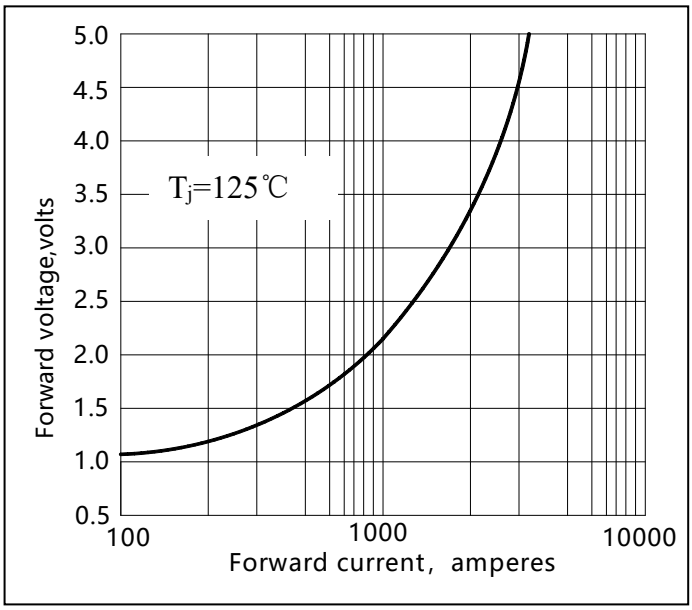


Fig1. Peak On-state Voltage Vs Peak On-state

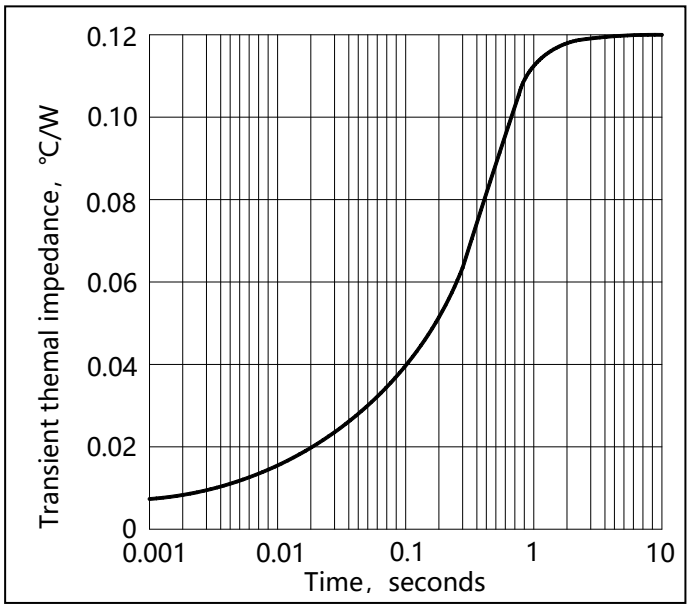


Fig2. Max. junction To case Thermai Impedance Vs Time

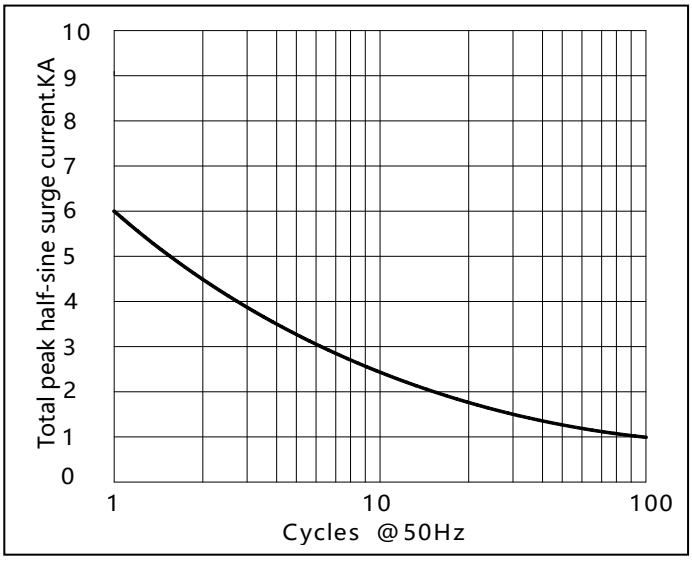


Fig3. Surge Current Vs Cycles

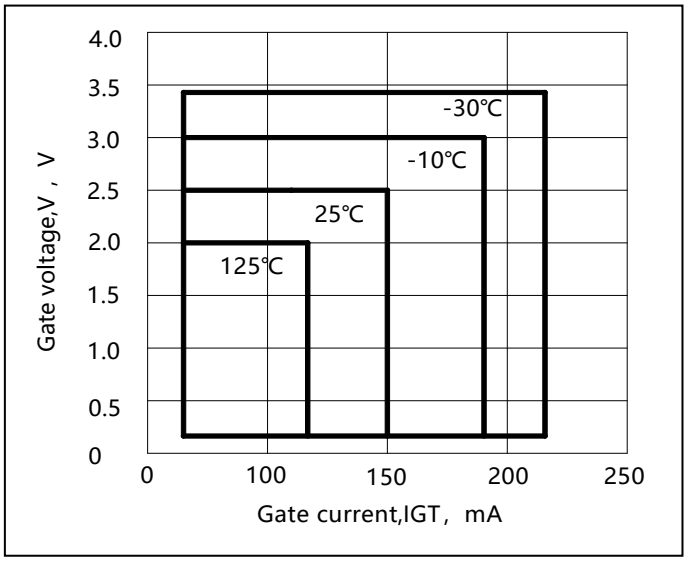


Fig4. Gate Trigger Zone Vs temperature

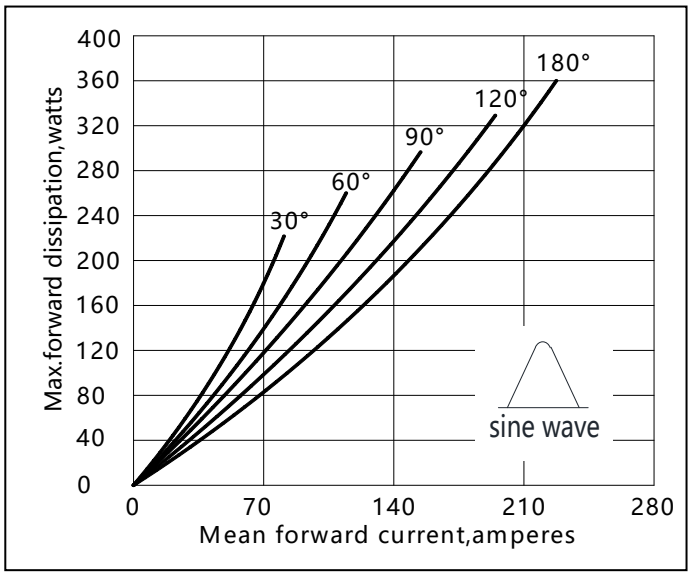


Fig5. Max. Power Dissipation Vs Mean On-state Current

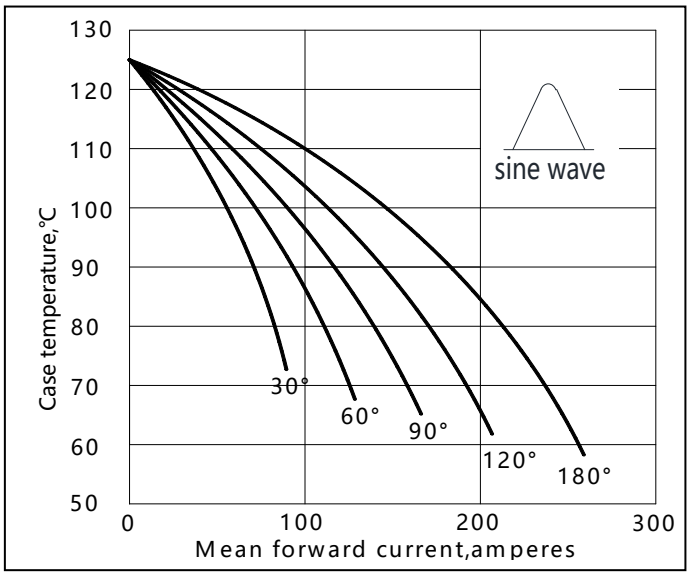
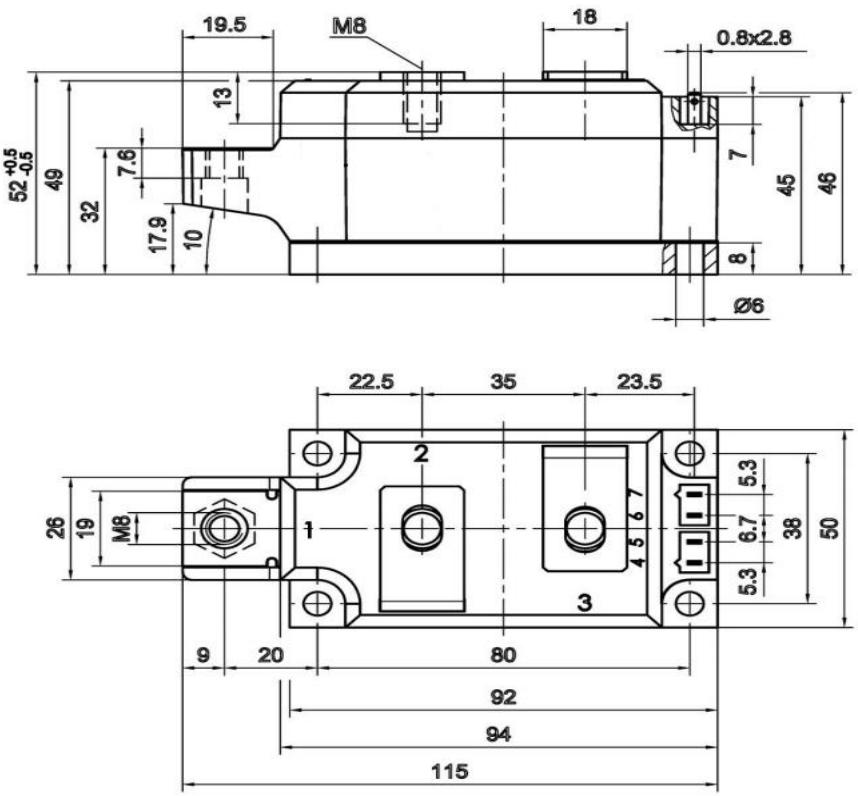


Fig6. Max case Temperature Vs Mean On-state Current

Package Outline Information

CASE:T3



Dimensions in mm
Unmarked dimensional tolerance：±0.5mm