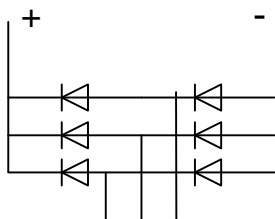




Circuit



Module Type

Diode

Maximum Ratings

Symbol	Item	Conditions	Values	Units
I_D	Output Current(D.C.)	$T_c=96$ Three phase full wave	200	A
I_{FSM}	Surge forward current	$t=10ms, \text{sine}, T_{vj}=45$	1900	A
i^2t	Circuit Fusing Consideration	$t=10ms, \text{sine}, T_{vj}=45$	18050	A^2s
V_{isol}	Isolation Breakdown Voltage(R.M.S)	a.c.50HZ;r.m.s.;1min	3000	V
T_{vj}	Operating Junction Temperature		-40 to +150	
T_{stg}	Storage Temperature		-40 to +125	
M_t	Mounting Torque	To terminals(M4)	$2 \pm 15\%$	Nm
M_t		To terminals(M6)	$5 \pm 15\%$	Nm
M_s		To heatsink(M6)	$5 \pm 15\%$	Nm
Weight		Module Approximately	320	g

Thermal Characteristics

Symbol	Item	Conditions	Values	Units
$R_{th(j-c)}$	Thermal Impedance, max.	Junction to Case(TOTAL)	0.12	/W
$R_{th(c-s)}$	Thermal Impedance, max.	Case to Heat sink	0.06	/W

Electrical Characteristics



Thyristor Maximum Ratings

Symbol	Item	Conditions	Values	Units
I_{TAV}	Average On-State Current	$T_c=93^\circ\text{C}$, Single Phase half wave 180° conduction	200	A
I_{TSM}	Surge On-State Current			

Electrical and Thermal Characteristics



Performance Curves

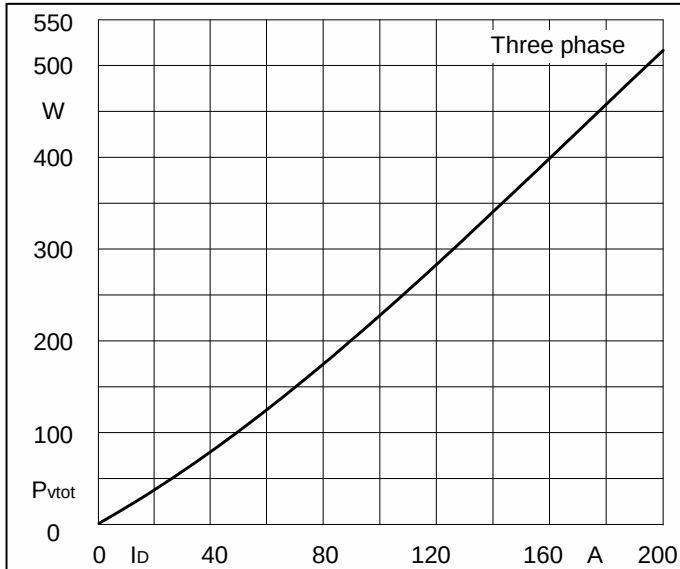


Fig1. Power dissipation

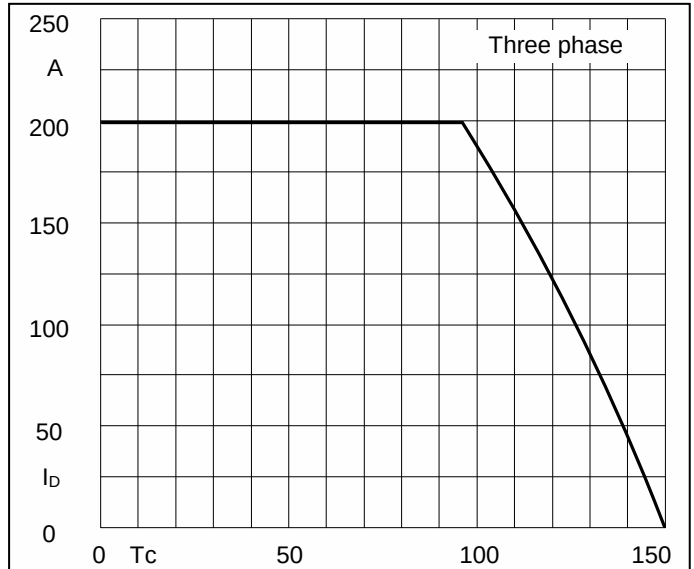


Fig2. Forward Current Derating Curve

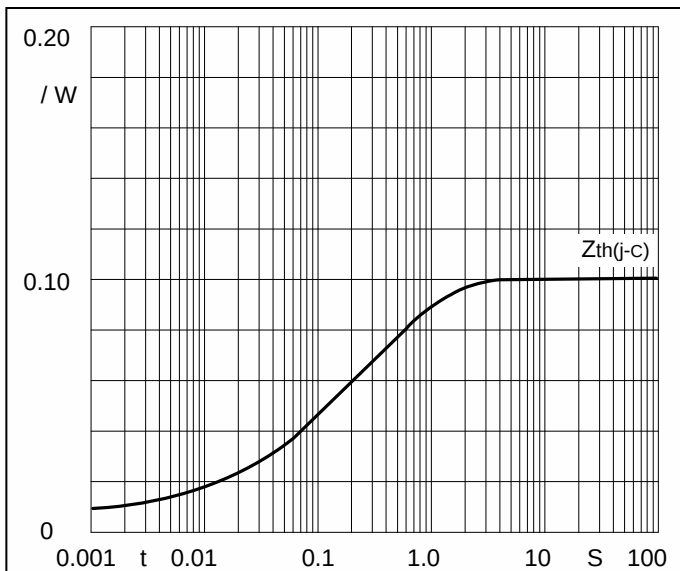


Fig3. Transient thermal impedance

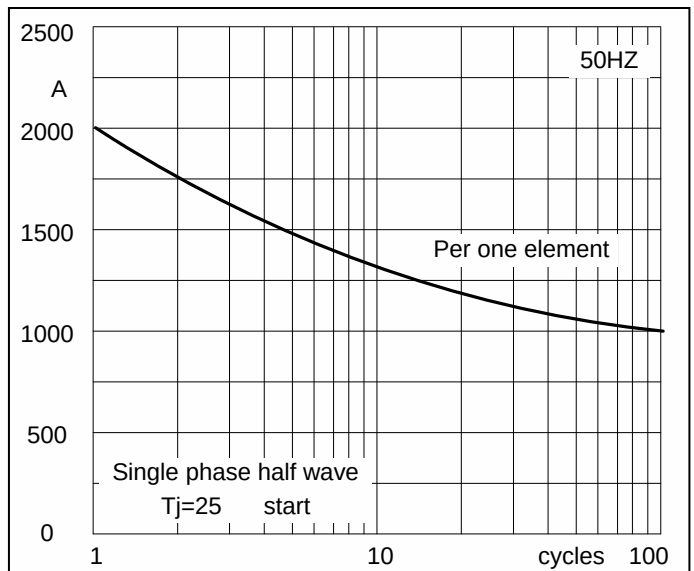


Fig4. Max Non-Repetitive Forward Surge Current

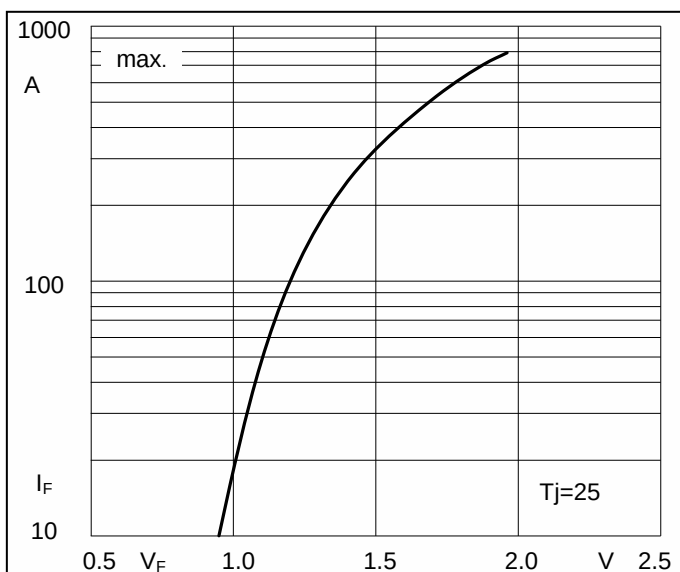


Fig5. Forward Characteristics

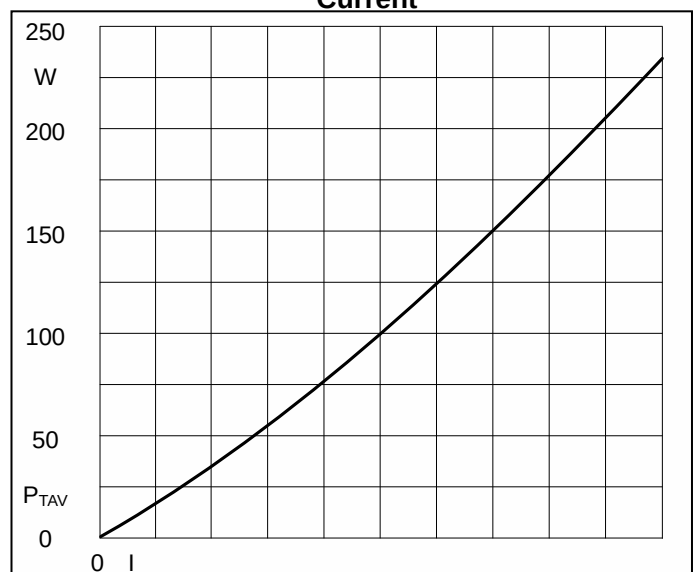


Fig6. SCR Power dissipation

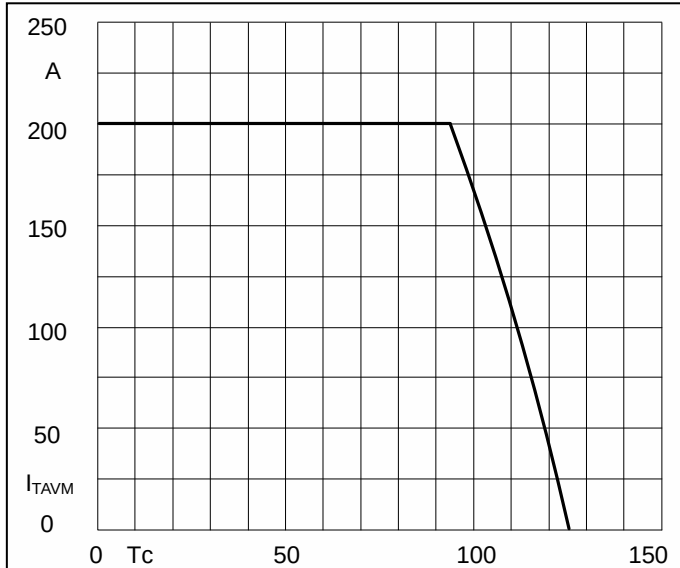


Fig7. SCR Forward Current Derating Curve

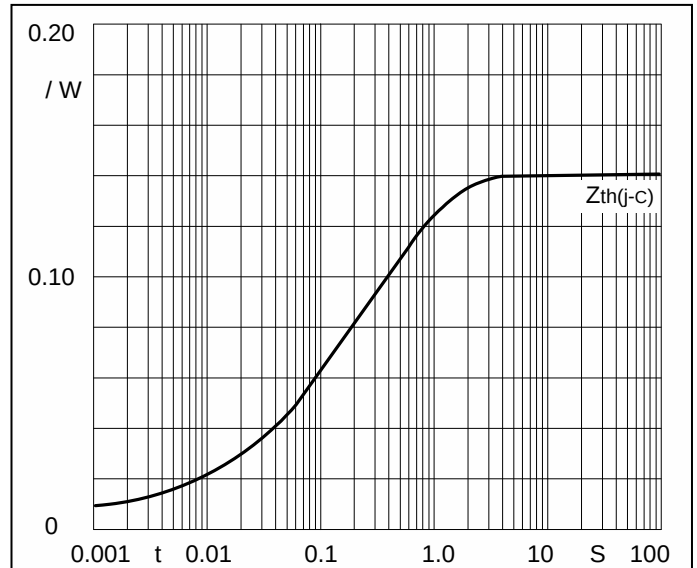


Fig8. SCR Transient thermal impedance

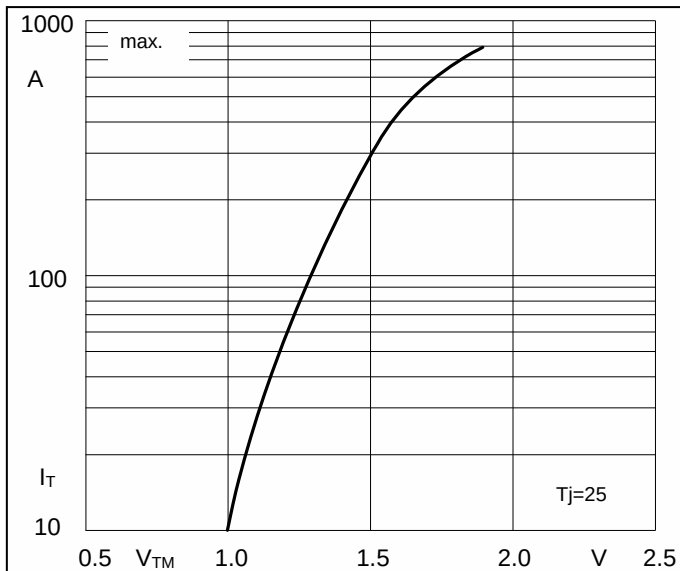


Fig9. SCR Forward Characteristics

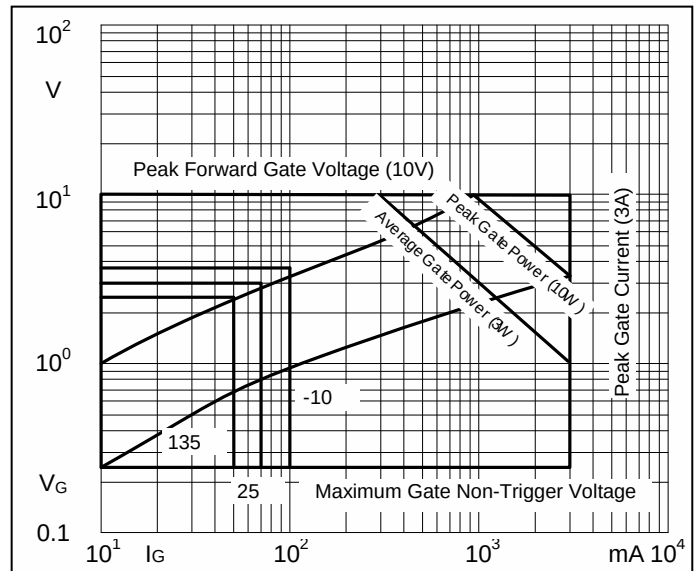


Fig10. Gate trigger Characteristics

