



Rectifier Diode Module

VRRM 2200 to 2800V

IFAV 1000A

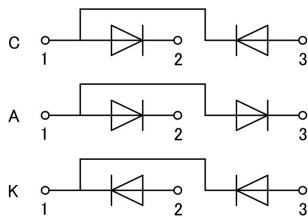
Applications

- Non-controllable rectifiers for AC/AC converters
- Line rectifiers for transistorized AC motor controllers
- Field supply for DC motors

Features

- International standard package
- High Surge Capability
- Simple Mounting

Circuit



Blocking Characteristics

TYPE			VRRM	VRS	Units
MD1000C22D9	MD1000A22D9	MD1000K22D9	2200	2400	V
MD1000C24D9	MD1000A24D9	MD1000K24D9	2400	2600	V
MD1000C26D9	MD1000A26D9	MD1000K26D9	2600	2800	V
MD1000C28D9	MD1000A28D9	MD1000K28D9	2800	3000	V

Maximum Ratings

Symbol	Conditions	Values	Units
IFAV	Single phase ,half wave 180° conduction Tc=100℃	1000	A
	Single phase ,half wave 180° conduction Tc=85℃	1200	A
IFSM	t=10ms Tvj=TvjM	28000	A
i²t	t=10ms Tvj=TvjM	3920000	A²s
Visol	a.c.50HZ;r.m.s.;1min,Iiso :2mA(max)	3000	V
Tvj		-40 to 150	℃
Tstg		-40 to 125	℃
Mt	To terminals(M12)	14±15%	Nm
Ms	To heatsink(M8)	10±15%	Nm
Weight	Module (Approximately)	4050	g

Thermal Characteristics

Symbol	Conditions	Values	Units
Rth(j-c)	per diode	0.048	℃/W
Rth(c-s)	per diode	0.020	℃/W

Electrical Characteristics

Symbol	Conditions	Values			Units
		Min.	Typ.	Max.	
VFM	T=25℃ IF =3000A			1.45	V
IRRM	Tvj=TvjM V=VRRM			40	mA
VFO	Tvj=TvjM			0.72	V
rF	Tvj=TvjM			0.13	mΩ

Performance Curves

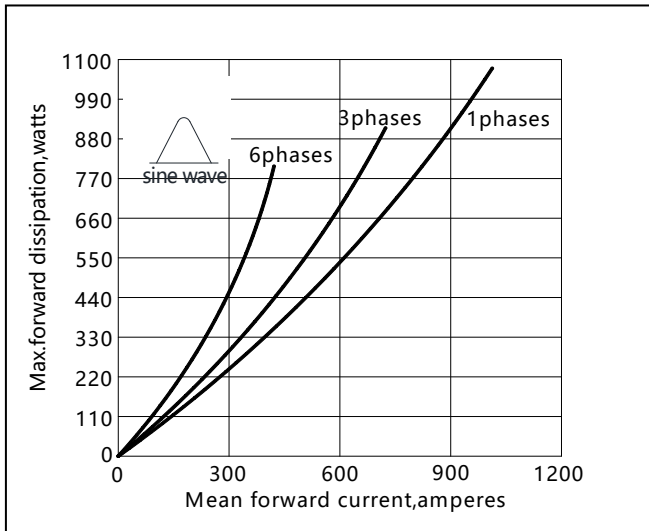


Fig1. Power dissipation

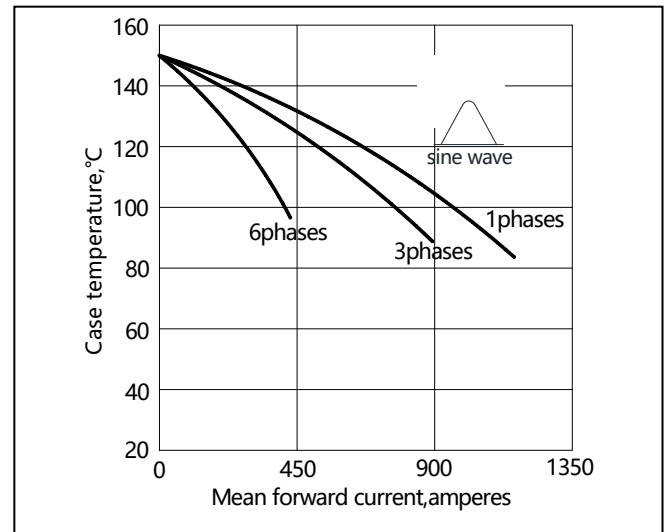


Fig2. Forward Current Derating Curve

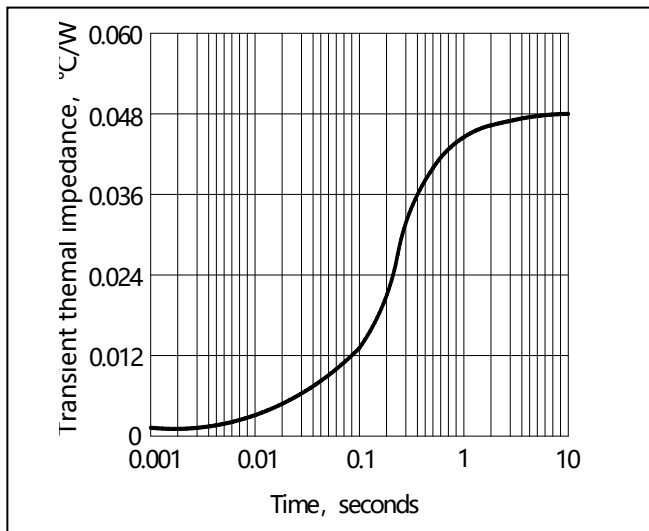


Fig3. Transient thermal impedance

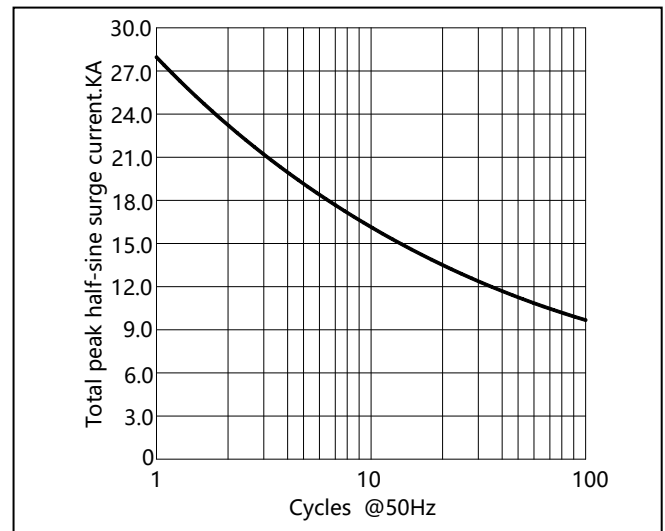


Fig4. Max Non-Repetitive Forward Surge Current

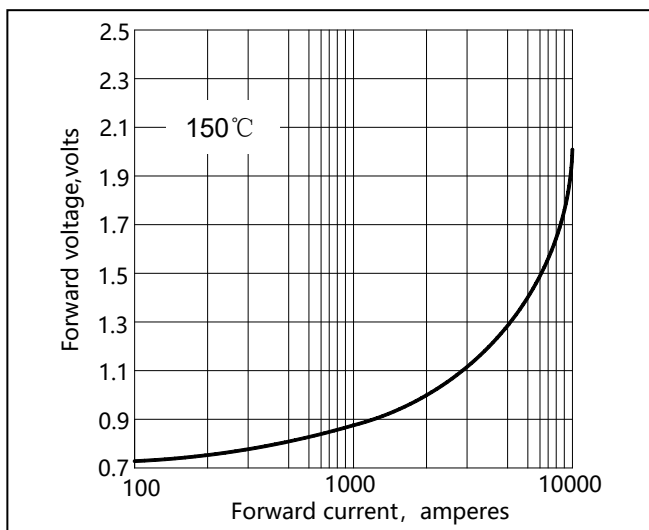
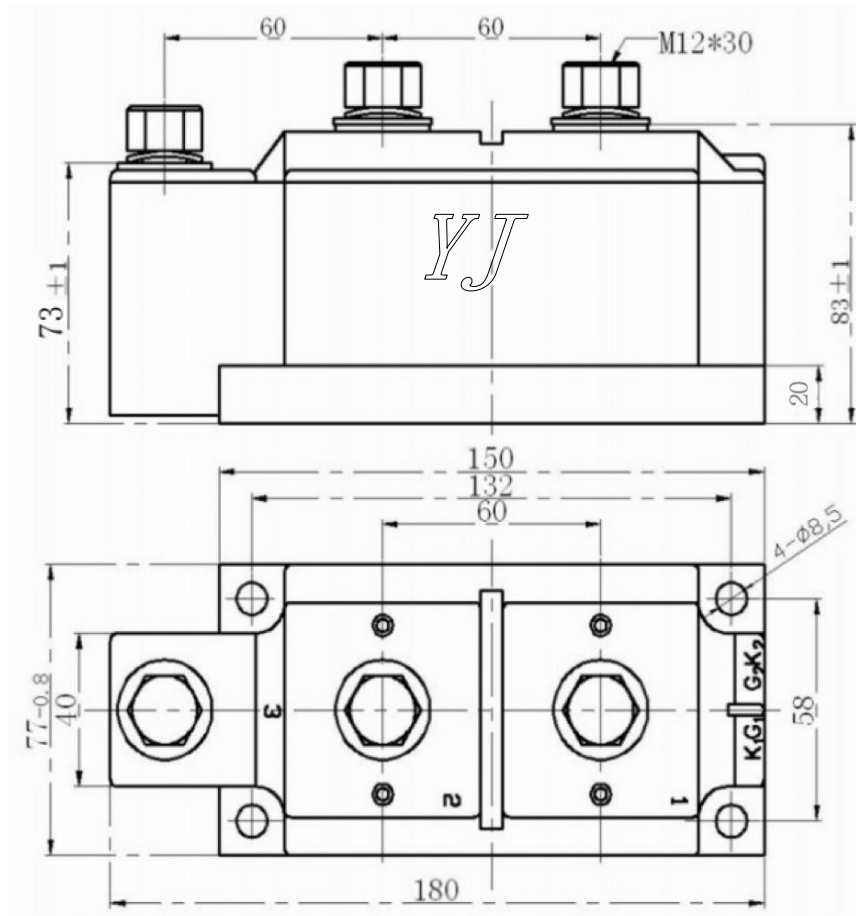


Fig5. Forward Characteristics

Package Outline Information

CASE: D9



Dimensions in mm

Unmarked dimensional tolerance: $\pm$ 0.5mm



Disclaimer

The information presented in this document is for reference only. Yangzhou Yangjie Electronic Technology Co., Ltd. reserves the right to make changes without notice for the specification of the products displayed herein to improve reliability, function, or design or otherwise.

The product listed herein is designed to be used with ordinary electronic equipment or devices, and not designed to be used with equipment or devices which require high level of reliability and the malfunction of which would directly endanger human life (such as medical instruments, transportation equipment, aerospace machinery, nuclear-reactor controllers, fuel controllers and other safety devices), Yangjie or anyone on its behalf, assumes no responsibility or liability for any damages resulting from such improper use of sale.

This publication supersedes & replaces all information previously supplied. For additional information, please visit our website <http://www.21yangjie.com>, or consult your nearest Yangjie's sales office for further assistance.