



Micro Commercial Components 20736 Marilla Street Chatsworth CA 91311

Phone: (818) 701-4933 Fax: (818) 701-4939 MD60S08M2 MD60S12M2 MD60S16M2 MD60S18M2

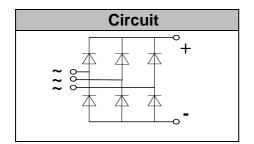
# **Features**

- Lead Free Finish/RoHS Compliant (NOTE 1)("P" Suffix designates RoHS Compliant. See ordering information)
- Blocking Voltage:800 to 1800V
- Heat transfer through aluminum oxide DBC ceramic isolated metal baseplate
- · Glass passivated chip

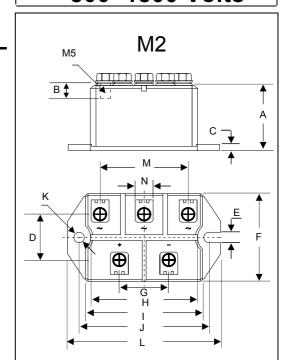
# **Applications**

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





# 60 Amp GLASS PASSIVATED THREE PHASE RECTIFIER BRIDGE 800~1800 Volts



DIMENSIONS					
	INCHES		MM		
DIM	MIN	MAX	MIN	MAX	NOTE
Α	1.169	1.193	29.70	30.30	
В	.264	.287	6.70	7.30	
С	.118	.130	3.00	3.30	
D	.839	.862	21.30	21.90	
Е	.205	.228	5.20	5.80	
F	1.641	1.655	41.70	42.30	
G	.894	.917	22.70	23.30	
Н	1.878	1.902	47.70	48.30	
	2.114	2.138	53.70	54.30	
J	2.350	2.374	59.70	60.30	
K	.217		5.50		Ø
Ĺ	2.823	2.846	71.70	72.30	
M	1.563	1.587	39.70	40.30	
Ν	.815	.839	8.70	9.30	



**Module Type** 

TYPE	VRRM	Vrsm
MD60S08M2	800V	900V
MD60S12M2	1200V	1300V
MD60S16M2	1600V	1700V
MD60S18M2	1800V	1900V

**Maximum Ratings** 

Symbol	Conditions	Values	Units
ID	Three phase, full wave Tc=110°C	60	Α
IFSM	t=10mS Tvj =45℃	460	А
i <sup>2</sup> t	t=10mS Tvj =45℃	1050	A <sup>2</sup> s
Visol	a.c.50HZ;r.m.s.;1min	3000	V
Tvj		-40 to +150	$^{\circ}\mathbb{C}$
Tstg		-40 to +125	$^{\circ}\mathbb{C}$
Mt	To terminals(M5)	5±15%	Nm
Ms	To heatsink(M5)	5±15%	Nm
Weight	Module (Approximately)	130	g

## **Thermal Characteristics**

Symbol	Conditions	Values	Units
Rth(j-c)	Per diode	1.45	°C/W
Rth(c-s)	Module	0.07	°C/W

### **Electrical Characteristics**

Symbol	Conditions	Values			Linita
		Min.	Тур.	Max.	Units
VFM	T=25℃ IF =150A	_	1.45	1.80	V
IRD	Tvj=25°C VRD=VRRM Tvj=150°C VRD=VRRM	_	_	0.3 5	mA mA



### **Performance Curves**

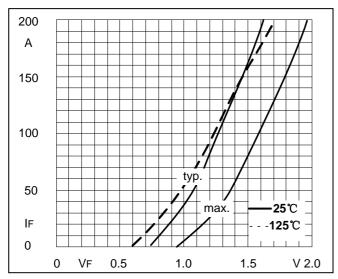


Fig1. Forward Characteristics

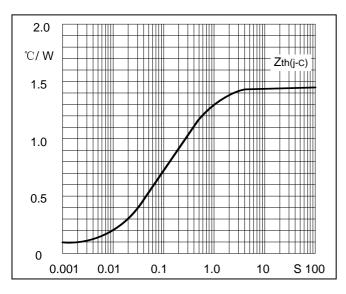
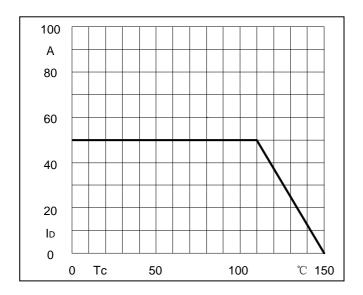


Fig3. Transient thermal impedance



**Fig5.Forward Current Derating Curve** 

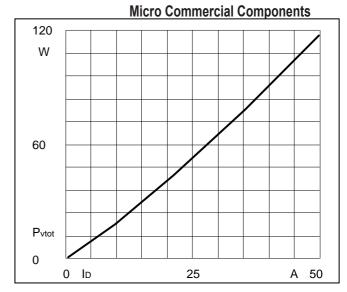


Fig2. Power dissipation

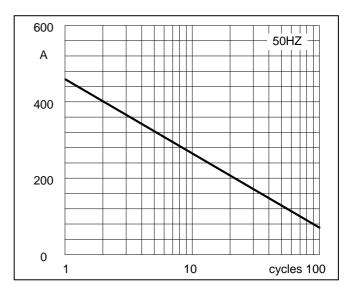


Fig4. Max Non-Repetitive Forward Surge Current



### **Ordering Information:**

Device	Packing
Part Number-BP	Bulk: 8PCS/BOX;80PCS/CTN

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