

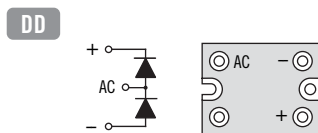
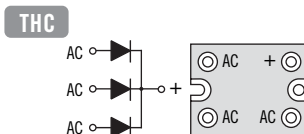
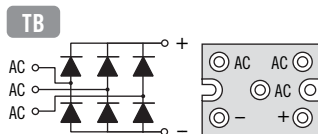
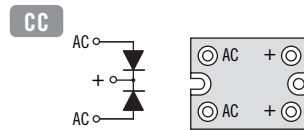
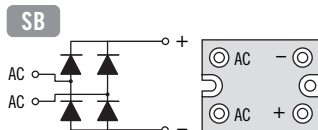
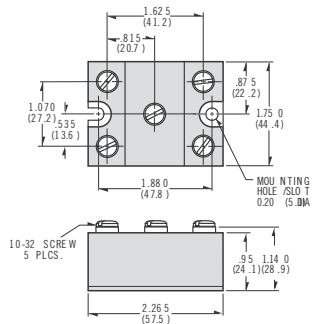


Single- and three-phase diode circuits incorporate highly efficient thermal management to provide high surge capability, extended life, and reliable performance. Available in five circuits, all models come in an industry standard package, provide 2500 Vrms from all terminals to the baseplate, and are UL recognized E72445.

- **High Surge Current Rectifier Circuits**
- **Up to 1600 Volt Blocking Standard**

**Mechanical Dimensions**

All dimensions are in inches (millimeters)



**Electrical Specifications**

	M5060	M50100
$I_D$ Maximum DC Output Current @ $T_c = 85^\circ\text{C}$ (A)	60	100
$V_F$ Maximum Voltage Drop @ Amps Peak	1.35V @60A	1.2V @ 100A
$T_J$ Operating Junction Temperature Range	-40°C to +125°C	
$di/dt$ Critical Rate of Rise of On-State Current @ $T_J=125^\circ\text{C}$ (A/ $\mu\text{s}$ )	100	
$dv/dt$ Critical Rate of Rise of Off-State Voltage	500	
$V_{RMS}$ Repetitive Peak Reverse Voltage (AC Line Input Voltage)	400 (120Vac)	1500
	600 (240Vac)	1500
	800 (280Vac)	1500
	1000 (380Vac)	1500
	1200 (480Vac)	1500
	1400 (530Vac)	1500
$I_{TSM}$ Maximum Non-Repetitive Surge Current (A) [ $1/2$ Cycle, 60Hz]	800	1500
$I^2T$ Maximum $I^2T$ for Fusing ( $A^2\text{-sec}$ ) [ $t=8.3\text{ms}$ ]	2650	9350
$R_{\theta JC}$ Maximum Thermal Resistance Junction to Ceramic Base per Chip	0.45°C/W	0.3°C/W
$V_{ISOL}$ Isolation Voltage	2500 $V_{RMS}$	

**Mechanical Specifications**

Weight (Typical)	4.5 oz. (158g)
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**Part Number Identification**

Series	Current	Circuit Type	Voltage	
M50	60 - 60 Amps	(see schematic diagrams)	400 (120 Vac)	1200 (480Vac)
	100 - 100 Amps		600 (240Vac)	1400 (530Vac)
			1000 (380Vac)	1600 (600Vac)

Example: M50100TB1200

ISO9001 CERTIFIED

Competitive part number cross-reference available at: [www.cynergy3.com](http://www.cynergy3.com)

**Approvals**

UL - E72445

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