



Micro Commercial Components 20736 Marilla Street Chatsworth CA 91311

Phone: (818) 701-4933 (818) 701-4939 Fax:

# MP1505W **THRU MP1510W**

# Features

- UL Recognized File # E165989
- Mounting Hole For #8 Screw, Plastic Case with Metal Bottom
- Surge Rating Of 300 Amps
- Case to Terminal Isolation Voltage 2500V Case Material: Molded Plastic. UL Flammability Classification Rating 94V-0 and MSL Rating 1
- Lead Free Finish/RoHS Compliant (NOTE 1)("P" Suffix designates RoHS Compliant. See ordering information)

# **Maximum Ratings**

- Mounting Torque: 2.0 N.m, Tolerance:+/-10% Operating Temperature: -55°C to +125°C
- Storage Temperature: -55°C to +150°C
- Typical Thermal Resistance, Junction to Case :Rthjc=6.3°C/W

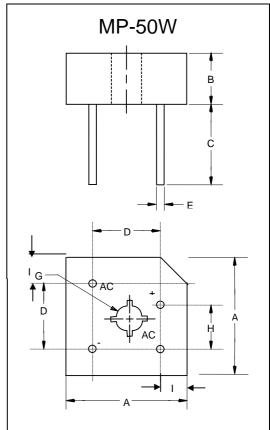
MCC	Device	Maximum	Maximum	Maximum
Catalog	Marking	Recurrent	RMS	DC
Number		Peak Reverse	Voltage	Blocking
		Voltage		Voltage
MP1505W	MP1505W	50V	35V	50V
MP151W	MP151W	100V	70V	100V
MP152W	MP152W	200V	140V	200V
MP154W	MP154W	400V	280V	400V
MP156W	MP156W	600V	420V	600V
MP158W	MP158W	800V	560V	800V
MP1510W	MP1510W	1000V	700V	1000V

### Electrical Characteristics @ 25°C Unless Otherwise Specified

iooti iodi olidi dotoi iotioo 😸 20-0 oliiooo otiioi wioo opooli					
Average Forward Current	I <sub>F(AV)</sub>	15.0A	$T_C = 55^{\circ}C$		
Peak Forward Surge Current	I <sub>FSM</sub>	300A	8.3ms, half sine		
Maximum Forward Voltage Drop Per Element	V <sub>F</sub>	1.1V	$I_{FM}$ = 7.5A per element; $T_J$ = 25°C		
Maximum DC Reverse Current At Rated DC Blocking Voltage	I <sub>R</sub>	5μΑ 500uA	T <sub>J</sub> = 25°C T <sub>J</sub> = 125°C		

Notes: 1. High Temperature Solder Exemption Applied, see EU Directive Annex Notes 7

# 15 Amp Single Phase **Bridge Rectifier** 50 to 1000 Volts

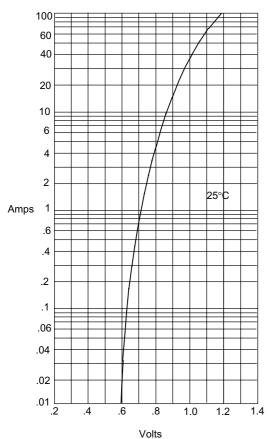


DIMENSIONS					
DIM	INCHES MIN	MAY	MM MIN	LMAY	NOTE
		MAX		MAX	NOTE
A	1.118	1.130	28.40	28.70	
В	.432	.442	10.97	11.23	
С	.769	-	19.53		
D	.673	.752	17.10	19.10	
Е	.038	.042	.97	1.07	4PL/TYP
G	.193		4.90		Ø
Н	.429	.468	10.90	11.90	
i	.169	.236	4.30	6.00	



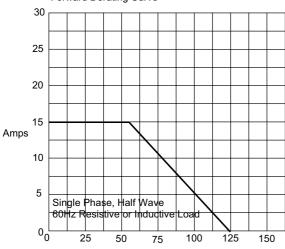
### MP1505W thru MP1510W

Figure 1
Typical Forward Characteristics



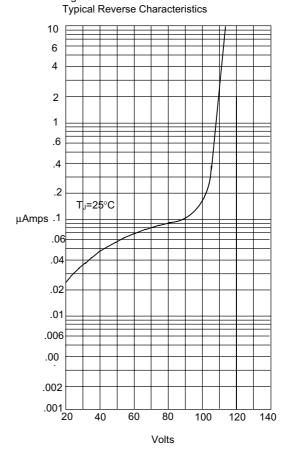
Instantaneous Forward Current - Amperesversus Instantaneous Forward Voltage - Volts

Figure 3 Forward Derating Curve



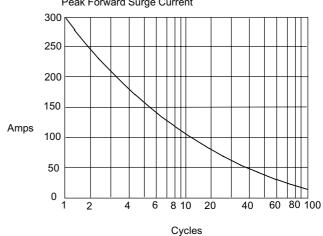
Average Forward Rectified Current - Amperes versus Case Temperature -  $^{\circ}\text{C}$ 

Figure 2 Micro Commercial Components



Instantaneous Reverse Leakage Current - MicroAmperesversus Percent Of Rated Peak Reverse Voltage - Volts

Figure 4
Peak Forward Surge Current



Peak Forward Surge Current - Amperesversus Number Of Cycles At 60Hz - Cycles



## **Ordering Information**

Device	Packing
(Part Number)-BP	Bulk; 400Pcs/Ctn

#### \*\*\*IMPORTANT NOTICE\*\*\*

**Micro Commercial Components Corp.** reserves the right to make changes without further notice to any product herein to make corrections, modifications, enhancements, improvements, or other changes. **Micro Commercial Components Corp.** does not assume any liability arising out of the application or use of any product described herein; neither does it convey any license under its patent rights, nor the rights of others. The user of products in such applications shall assume all risks of such use and will agree to hold **Micro Commercial Components Corp.** and all the companies whose products are represented on our website, harmless against all damages.

#### \*\*\*LIFE SUPPORT\*\*\*

MCC's products are not authorized for use as critical components in life support devices or systems without the express written approval of Micro Commercial Components Corporation.

#### \*\*\*CUSTOMER AWARENESS\*\*\*

Counterfeiting of semiconductor parts is a growing problem in the industry. Micro Commercial Components (MCC) is taking strong measures to protect ourselves and our customers from the proliferation of counterfeit parts. MCC strongly encourages customers to purchase MCC parts either directly from MCC or from Authorized MCC Distributors who are listed by country on our web page cited below. Products customers buy either from MCC directly or from Authorized MCC Distributors are genuine parts, have full traceability, meet MCC's quality standards for handling and storage. MCC will not provide any warranty coverage or other assistance for parts bought from Unauthorized Sources. MCC is committed to combat this global problem and encourage our customers to do their part in stopping this practice by buying direct or from authorized distributors.