



Micro Commercial Components 20736 Marilla Street Chatsworth CA 91311

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

## **MBR16100CT**

# **16 Amp Schootky Barrier Rectifier** 100 Volts

## eatures

- Guard ring for transient protection
- Low power loss high efficiency
- High surge capacity, High current capability
- Lead Free Finish/RoHS Compliant(Note 1) ("P" Suffix designates RoHS Compliant. See ordering information)
- Halogen free available upon request by adding suffix "-HF" Epoxy meets UL 94 V-0 flammability rating
- Moisture Sensitivity Level 1

## mum Ratings

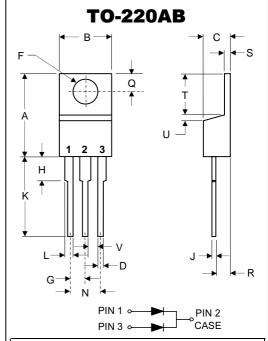
- Operating Temperature :-50°C to +150°C
- Storage Temperature: 50°C to +150°C
- Mounting Torque: 5 in-lbs Maximum

	MCC Catalog Number	Device Marking	Maximum Recurrent Peak Reverse Voltage	Maximum RMS Voltage	Maximum DC Blocking Voltage
I	MBR16100CT	MBR16100CT	100 V	70V	100 V

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

Average Forward Current	I <sub>F(AV)</sub>	16A	T <sub>C</sub> = 100°C
Peak Forward Surge Current	I <sub>FSM</sub>	125A	8.3ms, half sine
Maximum Forward Voltage Drop Per Element	VF	.85V .75V	I <sub>FM</sub> = 8A T <sub>J</sub> = 25°C T <sub>J</sub> = 125°C
Maximum DC Reverse Current At Rated DC Blocking Voltage	IR	0.1mA 100mA	T <sub>J</sub> = 25°C T <sub>J</sub> = 125°C
Typical Junction Capacitance	C٦	275pF	Measured at 1.0MHz, V <sub>R</sub> =4.0V

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

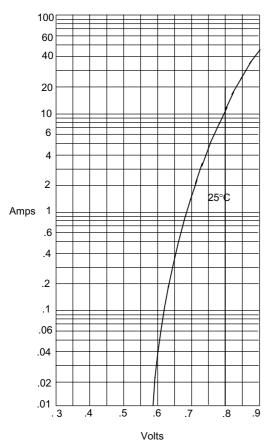


DIMENSIONS						
	INCHES		MM			
DIM	MIN	MAX	MIN	MAX	NOTE	
Α	.560	.625	14.22	15.88		
В	.380	.420	9.65	10.67		
С	.140	.190	3.56	4.82		
D	.020	.045	0.51	1.14		
F	.139	.161	3.53	4.09	Ø	
G	.190	.110	2.29	2.79		
Н		.250		6.35		
J	.012	.025	0.30	0.64		
K	.500	.580	12.70	14.73		
L	.045	.060	1.14	1.52		
N	.190	.210	4.83	5.33		
Q	.100	.135	2.54	3.43		
R	.080	.115	2.04	2.92		
S	.045	.055	1.14	1.39		
Т	.230	.270	5.84	6.86		
U		.050		1.27		
V	.045		1.15			



### **MBR16100CT**

Figure 1
Typical Forward Characteristics



Instantaneous Forward Current - Amperes*versus* Instantaneous Forward Voltage - Volts

Figure 3

Forward Derating Curve

Single Phase, Half Wave

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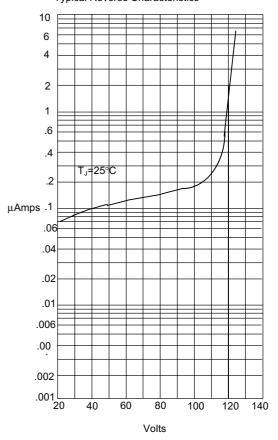
60Hz Resistive or Inductive

16 14 12 Amps 10

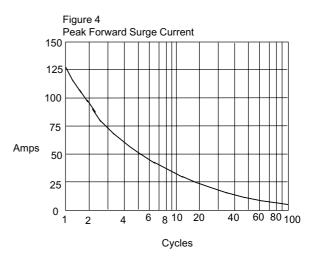
Average Forward Rectified Current - Amperes/ersus Ambient Temperature -°C

100

Figure 2 Micro Commercial Components Typical Reverse Characteristics



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



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

150



### **Ordering Information**

Device	Packing
(Part Number)-BP	Bulk;1Kpcs/Box

Note: Adding "-HF" suffix for halogen free, eg. Part Number-BP-HF

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