

Schottky Barrier Rectifier

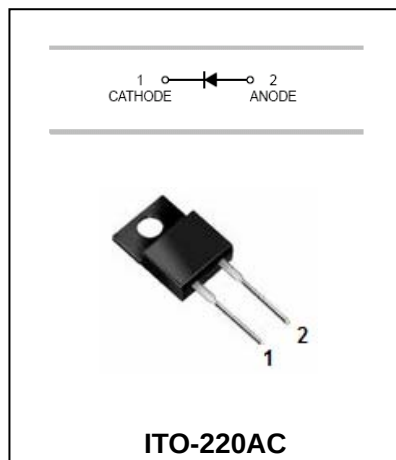
MBRF20150--MBRF20200

FEATURES

- Metal-Semiconductor Junction With Guard Ring.
- Epitaxial Construction.
- Low Forward Voltage Drop,Low Switching Losses.
- High Surge Capacity.
- For Use in Low Voltage,High Frequency Inverters Free Wheeling,and Polarity Protection Applications.



Lead-free



MAXIMUM RATING operating temperature range applies unless otherwise specified

Symbol	Parameter	MBRF20150	MBRF20200	Unit
V_{RRM}	Recurrent Peak Reverse Voltage	150	200	V
V_{RMS}	RMS Reverse Voltage	105	140	V
V_{DC}	DC Blocking Voltage	150	200	V
$I_{(AV)}$	Average Forward Total Device Rectified Current @ $T_A=100^{\circ}C$	20		A
I_{FSM}	Peak Forward Surge Current 8.3ms Single Half Sine-wave Superimosed on Rated Load	150		A
$R_{\theta JC}$	Typical Thermal Resistance Junction to Case (Note 1)	1.5		$^{\circ}C/W$
T_j T_{stg}	Operating Junction and Storage Temperature Range	-55 to +150		$^{\circ}C$

ELECTRICAL CHARACTERISTICS @ $T_a=25^{\circ}C$ unless otherwise specified

Parameter	Symbol	Test conditions	MBRF20150	MBRF20200	UNIT
			MAX		
Reverse Current	I _R	V _R =V _{RRM} , T _A =25℃ V _R =V _{RRM} , T _A =125℃	0.1 50		mA
Forward Voltage	V _F	I _F =20A	0.90	0.95	V

Schottky Barrier Rectifier

MBRF20150--MBRF20200

TYPICAL CHARACTERISTICS @ $T_a=25^\circ\text{C}$ unless otherwise specified

FIG.1 TYPICAL FORWARD CHARACTERISTICS

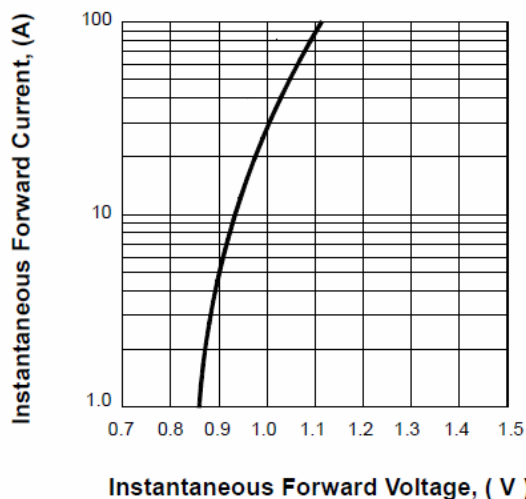


FIG.2 FORWARD DERATING CURVE

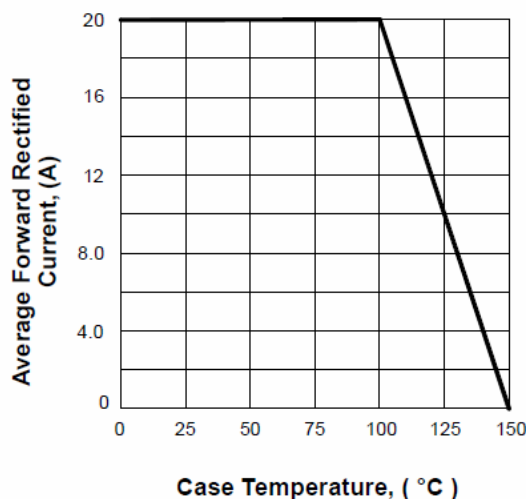


FIG.3 TYPICAL REVERSE CHARACTERISTICS

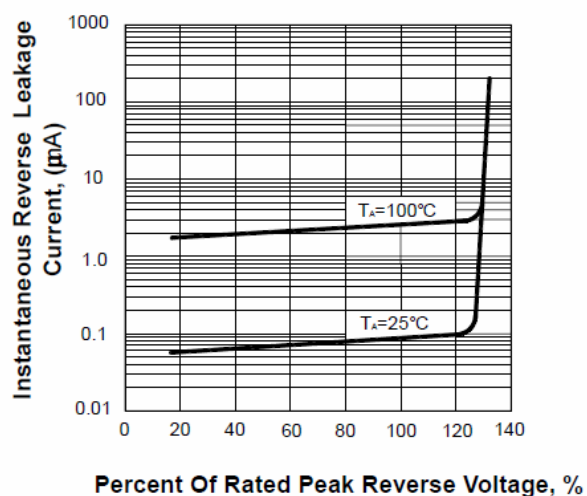
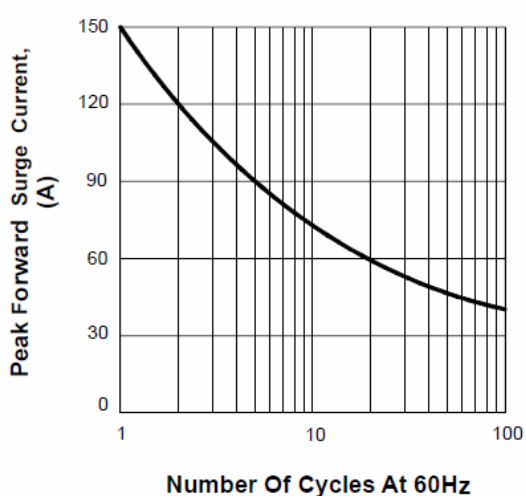


FIG.4 PEAK FORWARD SURGE CURRENT



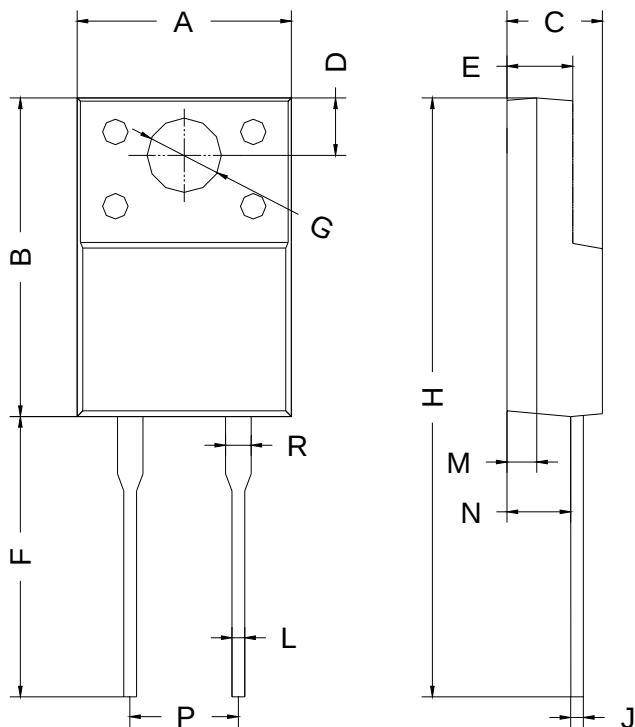
Schottky Barrier Rectifier

MBRF20150--MBRF20200

PACKAGE OUTLINE

Plastic surface mounted package

ITO-220AC



ITO-220AC		
Dim	Min	Max
A	9.90	10.30
B	14.80	15.20
C	4.50 Typical	
D	2.70 Typical	
E	2.80	3.20
F	13.00	13.40
G	3.2 Typical	
H	28.00	28.40
J	0.60 Typical	
L	0.50	0.75
M	1.40 Typical	
N	2.90	3.10
P	5.00	5.20
R	1.20 Typical	
All Dimensions in mm		