

Schottky Barrier Rectifier

MBRF30H100CT

FEATURES

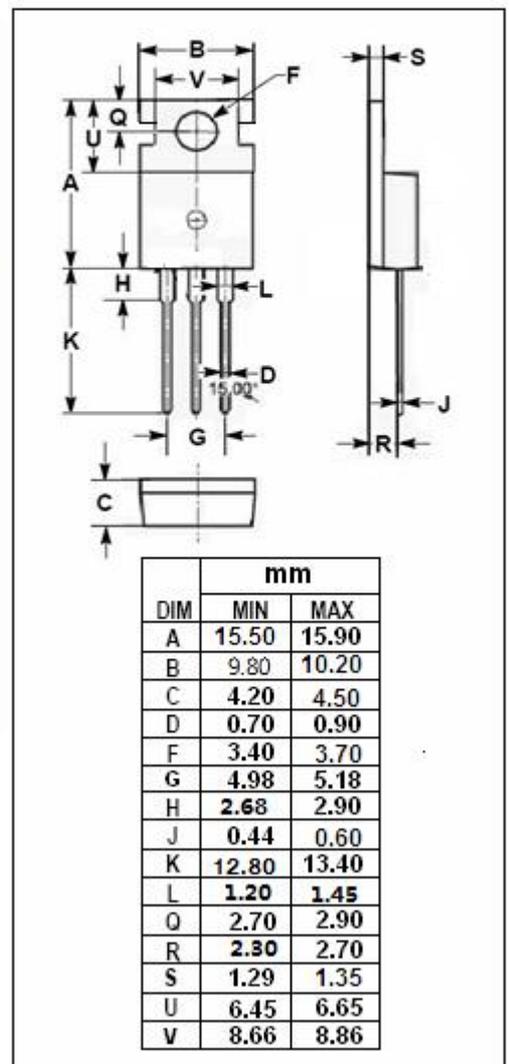
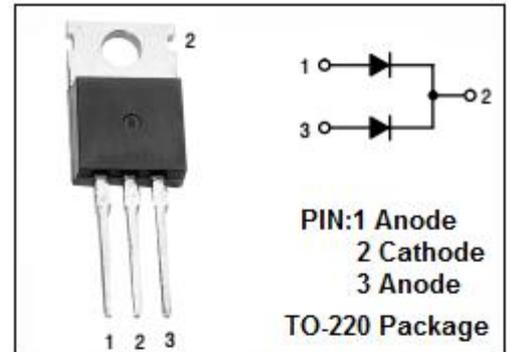
- Schottky barrier chip
- Low Power Loss,High Efficiency
- Guard ring for transient protection
- High Operating Junction Temperature
- 100% avalanche tested
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

APPLICATIONS

- For use in low voltage ,high frequency inverters,free wheeling and polarity protection applications.

ABSOLUTE MAXIMUM RATINGS(Ta=25°C)

SYMBOL	PARAMETER	VALUE	UNIT
V _{RRM} V _{RMS} V _R	Peak Repetitive Reverse Voltage RMS Voltage DC Blocking Voltage	100	V
I _{F(AV)}	Average Rectified Forward Current	30	A
I _{FSM}	Nonrepetitive Peak Surge Current 8.3ms single half sine-wave superimposed on rated load conditions	275	A
T _J	Junction Temperature	150	°C
T _{stg}	Storage Temperature Range	-65~150	°C



Schottky Barrier Rectifier**MBRF30H100CT****THERMAL CHARACTERISTICS**

SYMBOL	PARAMETER	MAX	UNIT
$R_{th\ j-c}$	Thermal Resistance, Junction to Case	1.9	$^{\circ}C/W$

ELECTRICAL CHARACTERISTICS

SYMBOL	PARAMETER	CONDITIONS	MAX	UNIT
V_F	Maximum Instantaneous Forward Voltage	$I_F = 15A ; T_j = 25^{\circ}C$	0.82	V
		$I_F = 15A ; T_j = 125^{\circ}C$	0.67	
		$I_F = 30A ; T_j = 25^{\circ}C$	0.93	
		$I_F = 30A ; T_j = 125^{\circ}C$	0.8	
I_R	Maximum Instantaneous Reverse Current	$V_R = V_{RWM} ; T_j = 25^{\circ}C$	5	μA
		$V_R = V_{RWM} ; T_j = 125^{\circ}C$	6	mA