

## 15 A SCHOTTKY RECTIFIERS

MBR1535CT-MBR1545CT

# High-reliability discrete products and engineering services since 1977

#### **FEATURES**

- Available as "HR" (high reliability) screened per MIL-PRF-19500, JANTX level. Add "HR" suffix to base part number.
- Available as non-RoHS (Sn/Pb plating), standard, and as RoHS by adding "-PBF" suffix.

#### MAXIMUM RATINGS

Rating	Symbol	MBR		Unit
Ratilig		1535CT	1545CT	Unit
Peak repetitive reverse voltage	$V_{RRM}$			
Working peak reverse voltage	$V_{RWM}$	35	45	V
DC blocking voltage	$V_R$			
Average rectified forward current (Rated V <sub>R</sub> )	I <sub>F(AV)</sub>	15 @ T <sub>C</sub> = 105°C		А
Non-repetitive peak surge current	les	150		А
(surge applied at rated load conditions, halfwave, single phase, 60Hz)	I <sub>FSM</sub> 150			
Peak repetitive reverse surge current (2.0µs, 1.0 kHz)	I <sub>RRM</sub>	1.0		А
Operating junction temperature range	T <sub>J</sub>	-65 to +150		°C
Storage temperature range	T <sub>stg</sub>	-65 to +175		°C
Voltage rate of change (Rated V <sub>R</sub> )	dv/dt	1000		V/µs
Maximum thermal resistance, Junction to case	R <sub>eJC</sub>	3.0		°C/W
Maximum thermal resistance, Junction to ambient	$R_{\Theta JA}$	60		°C/W

### **ELECTRICAL CHARACTERISTICS** (T<sub>A</sub> = 25°C unless otherwise specified)

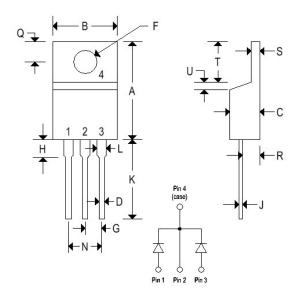
Parameter.	Symbol	MBR		
Parameter		735	745	Unit
Maximum instantaneous forward voltage (1)			1	
$(I_F = 7.5A, T_C = 125^{\circ}C)$	V	0.57 0.72 0.84		V
$(I_F = 15A, T_C = 125^{\circ}C)$	$V_{F}$			
$(I_F = 15A, T_C = 25^{\circ}C)$				
Maximum instantaneous reverse current (1)				
(Rated dc voltage, T <sub>c</sub> = 125°C)	I <sub>R</sub>	1	.5	mA
(Rated dc voltage, T <sub>c</sub> = 25°C)		0	.1	



# High-reliability discrete products and engineering services since 1977

### MECHANICAL CHARACTERISTICS

Case	TO-220AB	
Marking	Alpha-numeric	
Pin out	Cathode band	



# MBR1535CT-MBR1545CT

### **15 A SCHOTTKY RECTIFIERS**

	ТО-220АВ				
	Inches		Millimeters		
	Min	Max	Min	Max	
Α	0.570	0.620	14.480	15.750	
В	0.380	0.405	9.660	10.280	
С	0.160	0.190	4.070	4.820	
D	0.025	0.035	0.640	0.880	
F	0.142	0.147	3.610	3.730	
G	0.095	0.105	2.420	2.660	
Н	0.110	0.155	2.800	3.930	
J	0.018	0.025	0.460	0.640	
K	0.500	0.562	12.700	14.270	
L	0.045	0.060	1.150	1.520	
N	0.190	0.210	4.830	5.330	
Q	0.100	0.120	2.540	3.040	
R	0.080	0.110	2.040	2.790	
S	0.045	0.055	1.150	1.390	
Т	0.235	0.255	5.970	6.470	
U	-	0.050	-	1.270	



High-reliability discrete products and engineering services since 1977

## MBR1535CT-MBR1545CT

### 15 A SCHOTTKY RECTIFIERS

