

## Descriptions

The MBRD20200CT is schottky barrier diode,TO-252 plastic package.

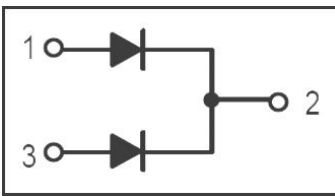
## Features

Low power loss, High efficiency, Halogen-free product

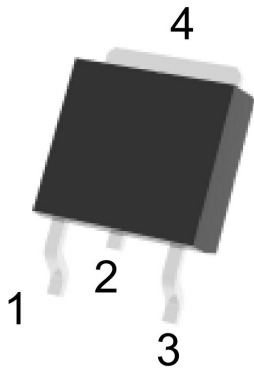
## Applications

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

## Equivalent Circuit



## Pinning



PIN1 : Anode      PIN 2, 4 : Cathode      PIN 3 : Anode

## Marking

See Marking Instructions.

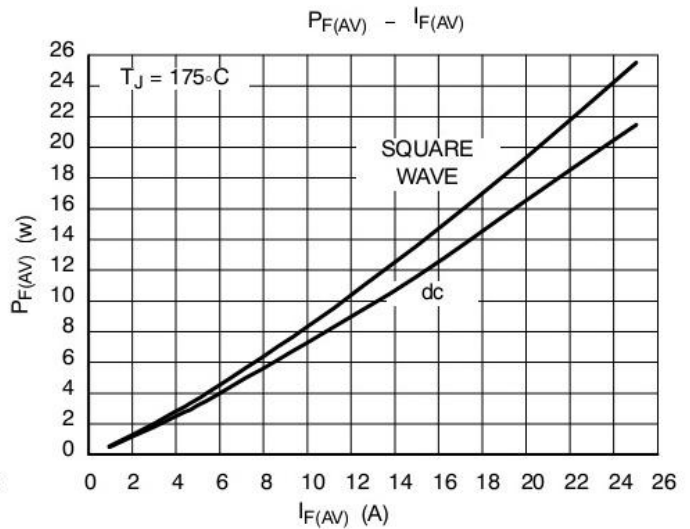
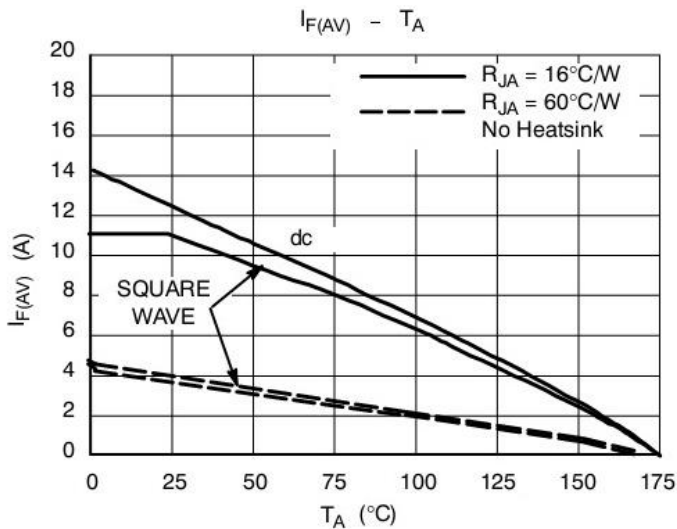
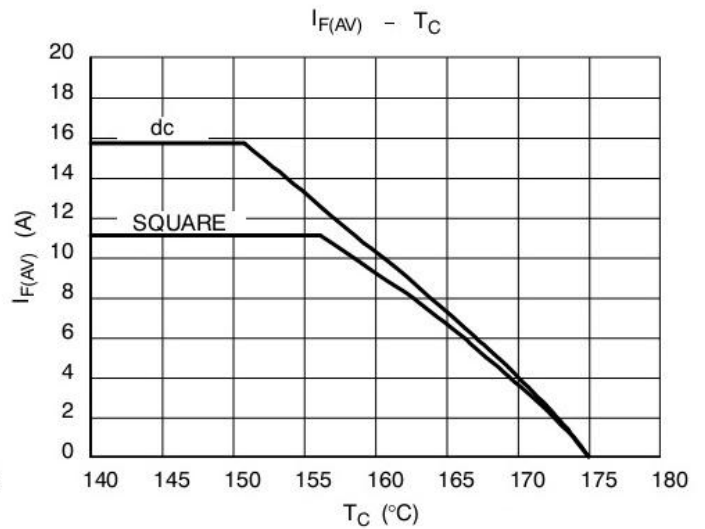
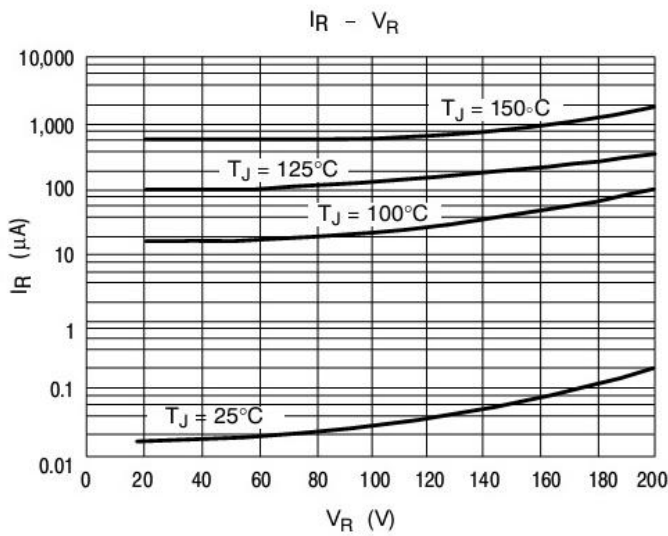
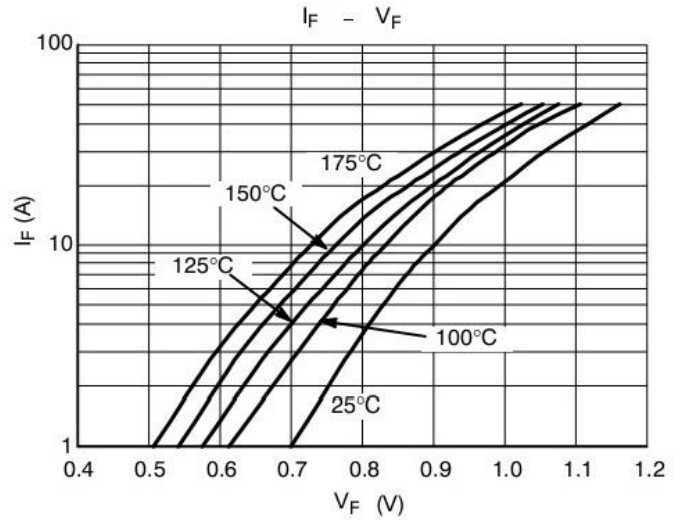
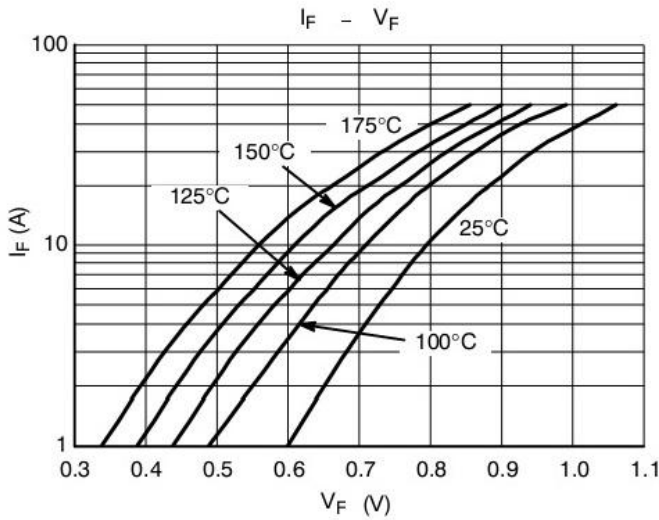
## Absolute Maximum Ratings(Ta=25°C)

Parameter	Symbol	Rating	Unit
Peak Repetitive Reverse Voltage	$V_{RRM}$	200	V
Working Peak Reverse Voltage	$V_{RWM}$	200	V
Peak Repetitive Forward Current	$I_{FRM}$	20	A
Average Rectified Forward Current	$I_{F(AV)}$	10	A
	$I_{F(AV)}^{(total)}$	20	A
Non-Repetitive Peak Forward Surge Current	$I_{FSM}$	150	A
Repetitive Peak Reverse Surge Current	$I_{RRM}$	1.0	A
Thermal Resistance Junction to Case	$R_{\theta Jc}$	2.0	°C/W
Junction Temperature Range	$T_j$	150	°C
Storage Temperature Range	$T_{stg}$	-65~150	°C

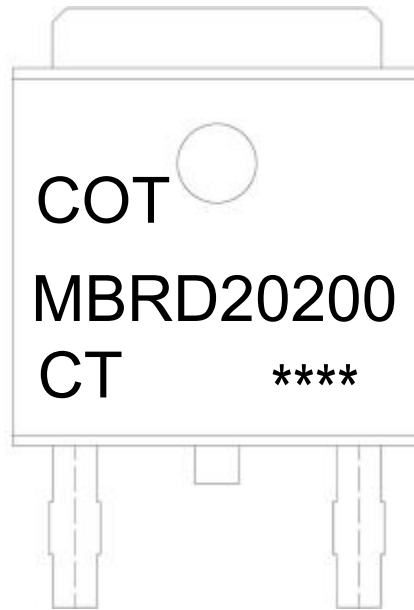
## Electrical Characteristics(Ta=25°C)

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Forward Voltage	$V_F$	$I_F = 10A(T_j = 25^\circ C)$		0.8	0.9	V
		$I_F = 10A(T_j = 125^\circ C)$		0.66	0.8	V
		$I_F = 20A(T_j = 25^\circ C)$		0.89	1.0	V
		$I_F = 20A(T_j = 125^\circ C)$		0.76	0.9	V
Instantaneous Reverse Current	$I_R$	$V_R = 200V(T_j = 25^\circ C)$			1.0	mA
		$V_R = 200V(T_j = 125^\circ C)$		0.4	50	mA
Voltage Rate of Change	dv/dt				10000	V/ $\mu$ s

Electrical Characteristic Curve



**Marking Instructions**



Note:

COT: Company Code

MBRD20200 : Product Type

CT: Internal Structure

\*\*\*\*: Lot No. Code, code change with Lot No

**Packaging SPEC**

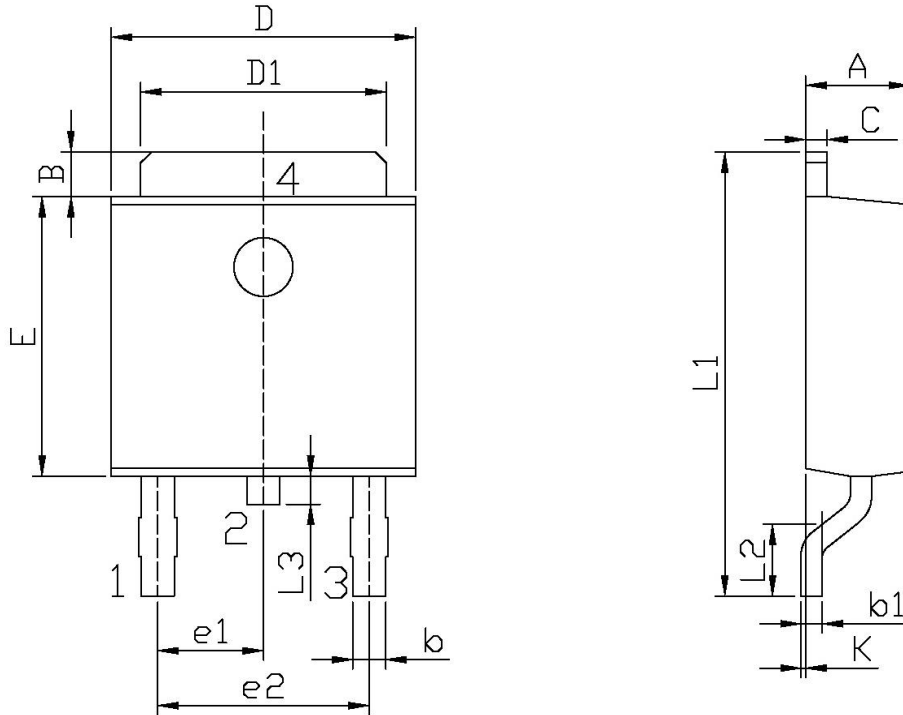
**REEL**

Package Type	Units					Dimension (unit: mm <sup>3</sup> )		
	Units/Reel	Reels/Inner Box	Units/Inner Box	Inner Boxes/Outer Box	Units/Outer Box	Reel	Inner Box	Outer Box
TO-252	2,500	2	5,000	6	30,000	13" ×16	360×360×50	380×335×366

**TUBE**

Package Type	Units					Dimension (unit: mm <sup>3</sup> )		
	Units/Tube	Tubes/Inner Box	Units/Inner Box	Inner Boxes/Outer Box	Units/Outer Box	Tube	Inner Box	Outer Box
TO-251/252	75	48	3,600	5	18,000	526×20.5×5.25	555×164×50	575×290×180

Package Outline Dimensions



单位: mm

Symbol	Dimensions In Millimeters		Symbol	Dimensions In Millimeters	
	Min	Max		Min	Max
A	2.20	2.40	E	5.95	6.25
B	0.95	1.25	e1	2.24	2.34
b	0.50	0.90	e2	4.43	4.73
b1	0.45	0.55	L1	9.45	9.95
C	0.45	0.55	L2	1.25	1.75
D	6.45	6.75	L3	0.60	0.90
D1	5.10	5.50	K	0.00	0.10

T0-252