

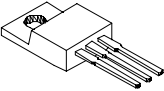
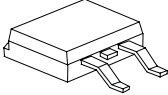
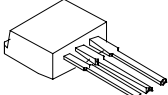
MBR20...CT-G/MBRB20...CT-G/MBR20...CT-1-G
SCHOTTKY RECTIFIER

Applications:

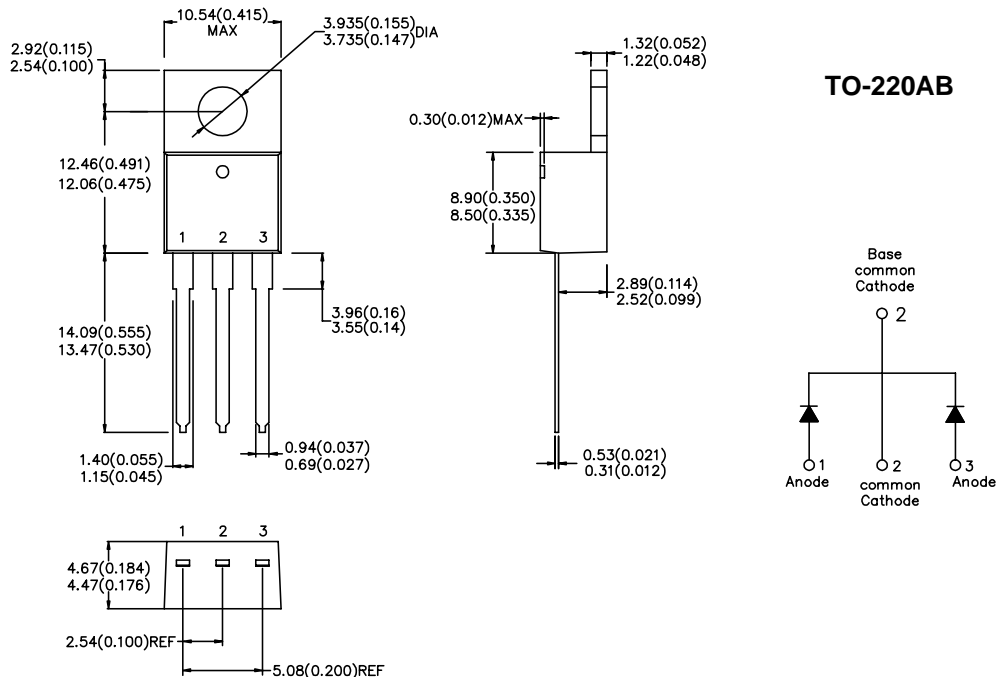
- Switching power supply • Converters • Free-Wheeling diodes • Reverse battery protection

Features:

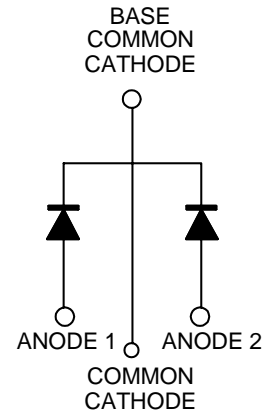
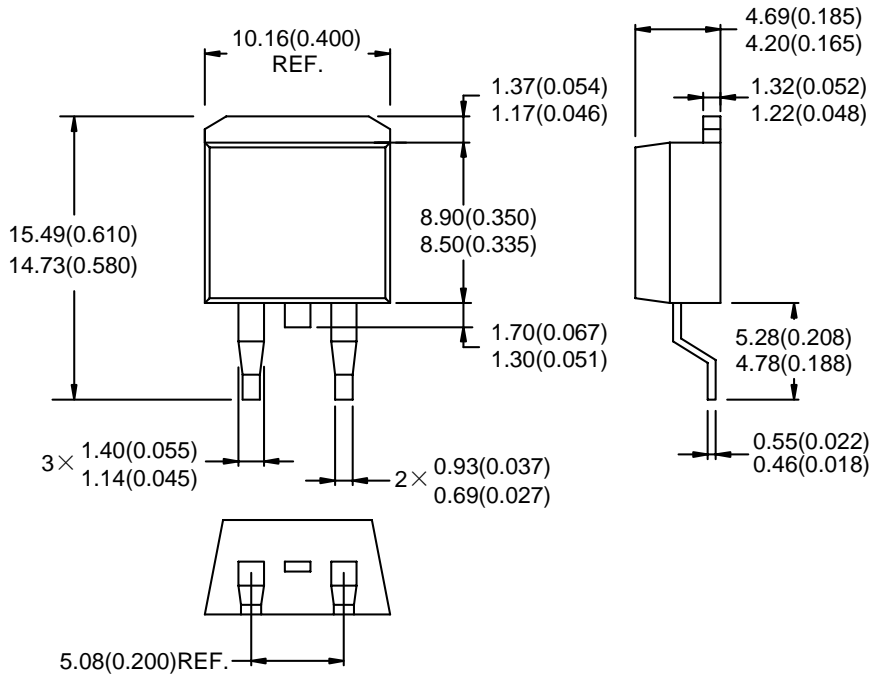
- 150 °C T_J operation
- Center tap configuration
- Low forward voltage drop
- High purity, high temperature epoxy encapsulation for enhanced mechanical strength and moisture resistance
- High frequency operation
- Guard ring for enhanced ruggedness and long term reliability

Case styles		
<p>MBR20...CT-G</p>  <p>TO-220AB</p>	<p>MBRB20...CT-G</p>  <p>D²PAK</p>	<p>MBR20...CT-1-G</p>  <p>TO-262</p>

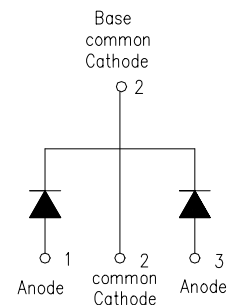
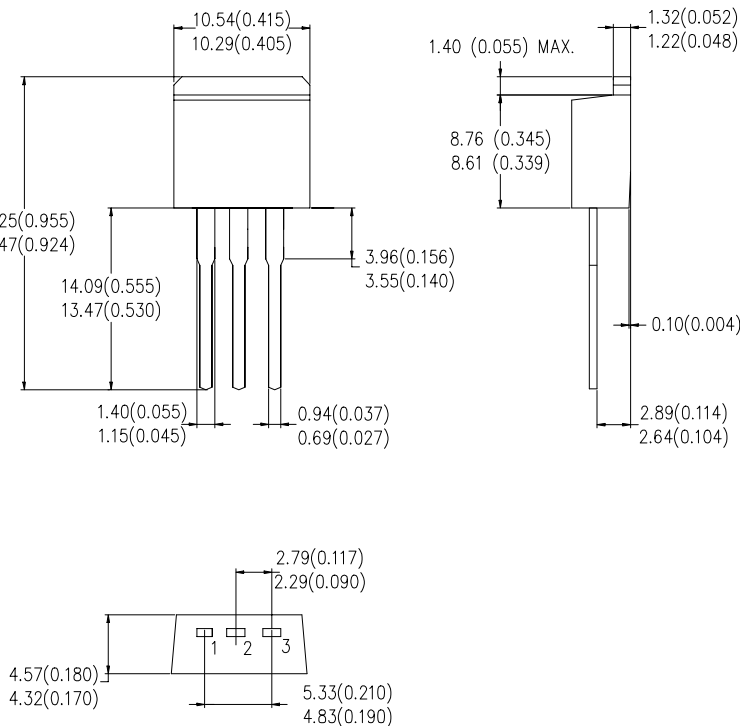
Mechanical Dimensions: In mm/ inches



D²PAK



TO-262



Maximum Ratings:

Characteristics	Symbol	Condition	Max.	Units
Peak Inverse Voltage	V_{RWM}	-	80	V
			90	
			100	
Max. Average Forward	$I_{F(AV)}$	50% duty cycle @ $T_C = 133^\circ\text{C}$, rectangular wave form	10(Per leg)	A
			20(Per device)	
Max. Peak One Cycle Non-Repetitive Surge Current (per leg)	I_{FSM}	8.3 ms, half Sine pulse	150	A
Peak Repetitive Reverse Surge Current (per leg)	I_{RRM}	2.0 μs , 1.0KHz	0.5	A

Electrical Characteristics:

Characteristics	Symbol	Condition	Max.	Units
Max. Forward Voltage Drop (per leg)*	V_{F1}	@ 10A, Pulse, $T_J = 25^\circ\text{C}$	0.85	V
		@ 20 A, Pulse, $T_J = 25^\circ\text{C}$	0.95	
	V_{F2}	@ 10 A, Pulse, $T_J = 125^\circ\text{C}$	0.75	V
		@ 20 A, Pulse, $T_J = 125^\circ\text{C}$	0.85	
Max. Reverse Current (per leg)*	I_{R1}	@ $V_R = \text{rated } V_R$ $T_J = 25^\circ\text{C}$	1.00	mA
		I_{R2}	@ $V_R = \text{rated } V_R$ $T_J = 125^\circ\text{C}$	
Max. Voltage Rate of Change	dv/dt	-	10,000	V/ μs

* Pulse Width < 300 μs , Duty Cycle <2%

Thermal-Mechanical Specifications:

Characteristics	Symbol	Condition	Specification	Units
Max. Junction Temperature	T_J	-	-55 to +150	$^\circ\text{C}$
Max. Storage Temperature	T_{stg}	-	-55 to +150	$^\circ\text{C}$
Maximum Thermal Resistance Junction to Case (per leg)	$R_{\theta JC}$	DC operation	2.0	$^\circ\text{C/W}$
Approximate Weight	wt	-	1.9	g
Mounting Torque	T_M	-	6(Min.)	Kg-cm
			12(Max.)	
Case Style	TO-220AB D ² PAK TO-262			

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