## SCHOTTKY DIODE MODULE TYPE 300A

#### **Features**

High Surge Capability Type 150V V<sub>RRM</sub> Isolation Type Package Electrically Isolation Base Plate

### **Maximum Ratings**

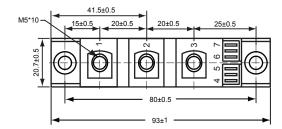
Junction Operating Temperature: -55°C to +150°C

Storage Temperature: -55°C to +150°C

Part Number	Maximum Recurrent Peak Reverse Voltage	Maximum RMS Voltage	Maximum DC Blocking Voltage
MBRTT300150(A)(D)(R)	150V	105V	150V



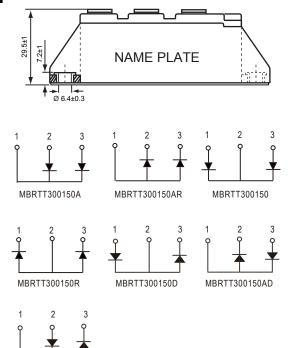
Dimensions in mm (1mm = 0.0394")



#### Electrical Characteristics @ 25°C Unless Otherwise Specified

Average Forward (Per pkg) Current (Per diode)	I <sub>F(AV)</sub>	300A 150A	Tc=125°C
Peak Forward Surge Current (Per diode)	İfsm	2000A	8.3ms, half sine
Maximum (Per diode) Instantaneous Forward Voltage*	VF	0.82V 0.92V	IFM =150A;TJ =125°C IFM =150A;TJ =25°C
Maximum Instantaneous Reverse Current At Rated DC Blockig Voltage* (Per diode)	lR	3mA 8mA 15mA	T <sub>J</sub> =25°C T <sub>J</sub> =125°C T <sub>J</sub> =150°C
Isolation Voltage	Viso	2500V	A.C. 1 minute
Maximum Thermal Resistance Junction To Case (Per diode)	Røjc	0.40°C/W	
Mounting Torque		4 ± 0.5Nm 3 ± 0.5Nm	

<sup>\*</sup>Pulse Test: Pulse Width 300 \( \mu \) sec, Duty Cycle < 2%



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Figure.1 - Typical Forward Characteristics 1000 Instantaneous Forward Current - Ampere 600 400 200 125°C Amp Per diode 100 60 25°C -20 10 4 0 0.2 0.4 0.6 0.8 1.0 1.2 1.4 Volts Instantaneous Forward Voltage -Volts

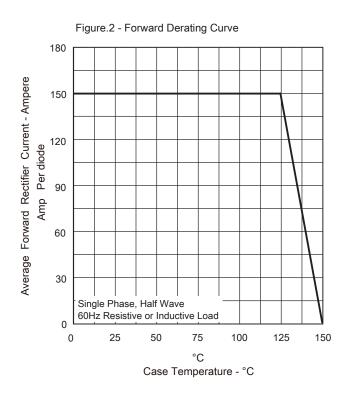
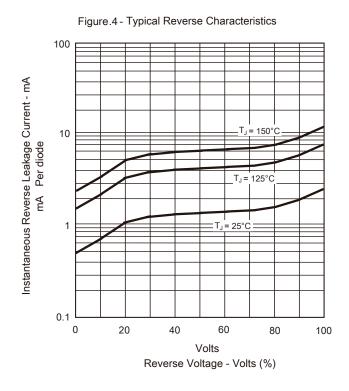


Figure.3 - Peak Forward Surge Current 2400 8.3ms Single Half JEDEC method T<sub>J</sub> = 25°C Peak Forward Surge Current - Ampere 2000 1600 Amp Per diode 1200 800 400 0 2 8 10 20 60 80 100 40 Cycles Number Of Cycles At 60Hz - Cycles





# MBRTT300150(A)(D)(R)

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