



**SUPER FAST DIODE MODULE TYPES
500A / 200-600V**

Features

- High Surge Capability
- Types up to 600V V_{RRM}
- Isolation Type Package
- Electrically Isolation base plate

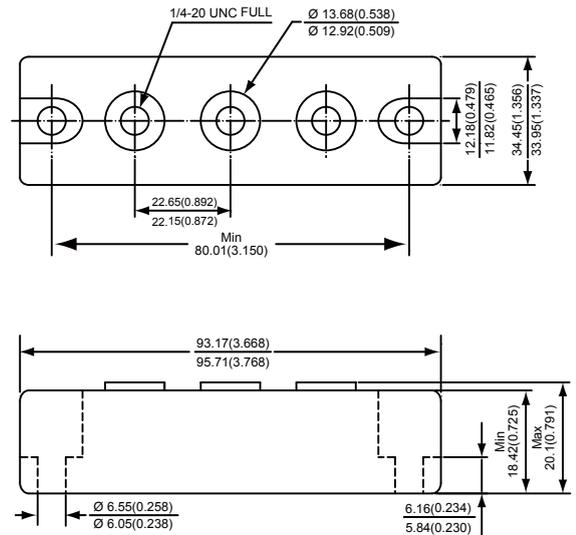
Maximum Ratings

Operating Temperature : -55 °C to +175 °C
Storage Temperature : -55 °C to +175 °C

Part Number	Maximum Recurrent Peak Reverse Voltage	Maximum RMS Voltage	Maximum DC Blocking Voltage
MURTA50020(R)	200V	140V	200V
MURTA50040(R)	400V	280V	400V
MURTA500A60(R)	600V	420V	600V

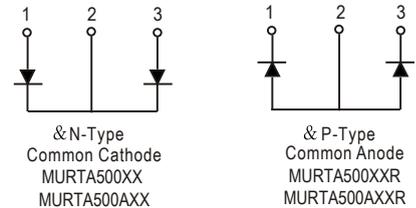


Dimensions in mm (1 mm = 0.0394")



Electrical Characteristics @ 25 °C Unless Otherwise Specified

Average Forward Current (Per pkg)	$I_{F(AV)}$	500A	$T_C = 100^\circ C$
Peak Forward Surge Current (Per leg)	I_{FSM}	3800A	8.3ms, half sine
Maximum Instantaneous Forward Voltage* (Per leg)	V_F	200V: 1.00V 400V: 1.30V 600V: 1.45V	$I_{FM} = 250A;$ $T_J = 25^\circ C$
Maximum Instantaneous Reverse Current At Rated DC Blocking Voltage* (Per leg)	I_R	25 μA 5 mA	$T_J = 25^\circ C$ $T_J = 125^\circ C$
Maximum Reverse Recovery Time (Per leg)	T_{rr}	200ns 250ns	$I_F = 0.5A, I_R = 1.0A,$ $I_{RR} = 0.25A$
Isolation Voltage	V_{isol}	3000 V	A.C. 1minute
Maximum Thermal Resistance Junction To Case (Per leg)	$R_{\theta jc}$	0.30°C/W	
Weight		193g	



*Pulse Test: Pulse Width 300 μsec , Duty Cycle 2%



Figure .1- Typical Forward Characteristics

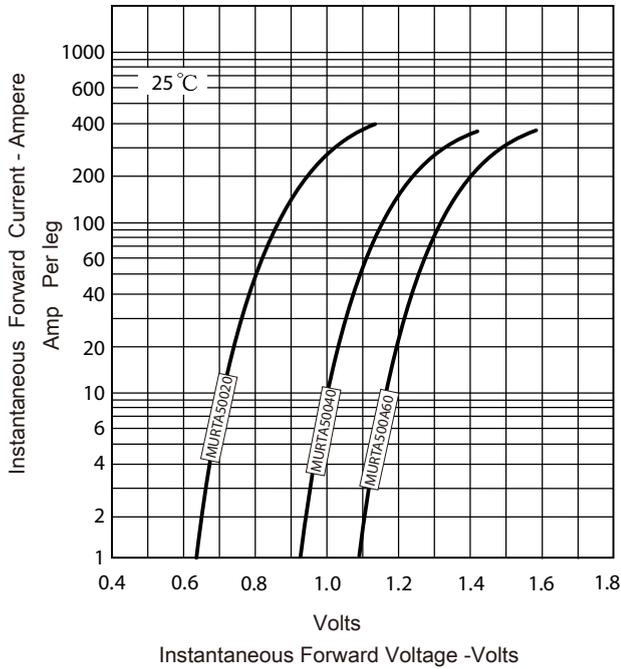


Figure .2- Forward Derating Curve

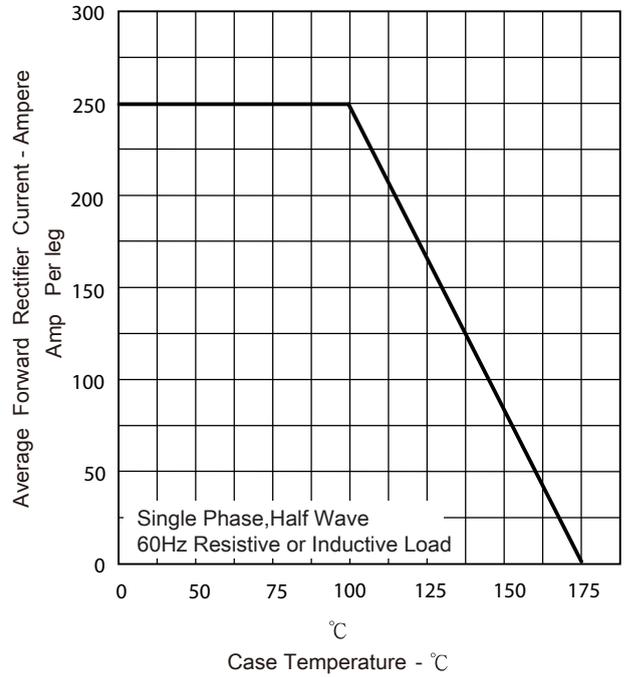


Figure .3- Peak Forward Surge Current

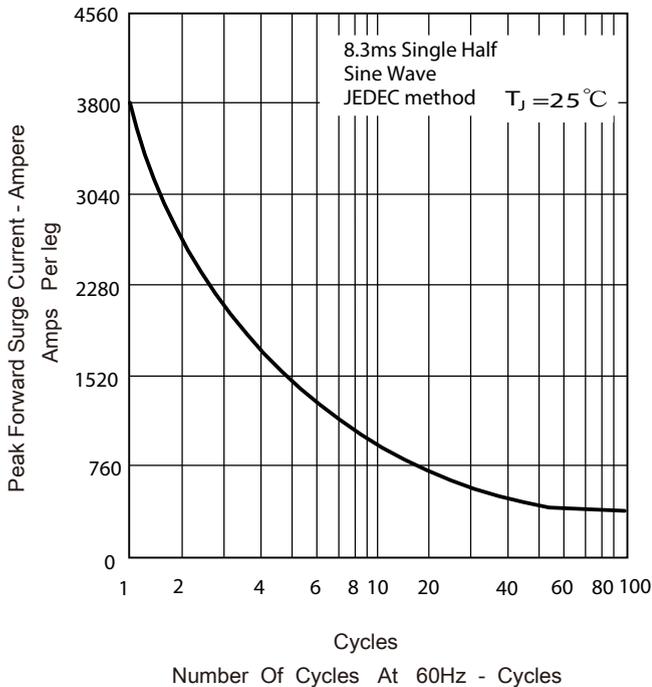
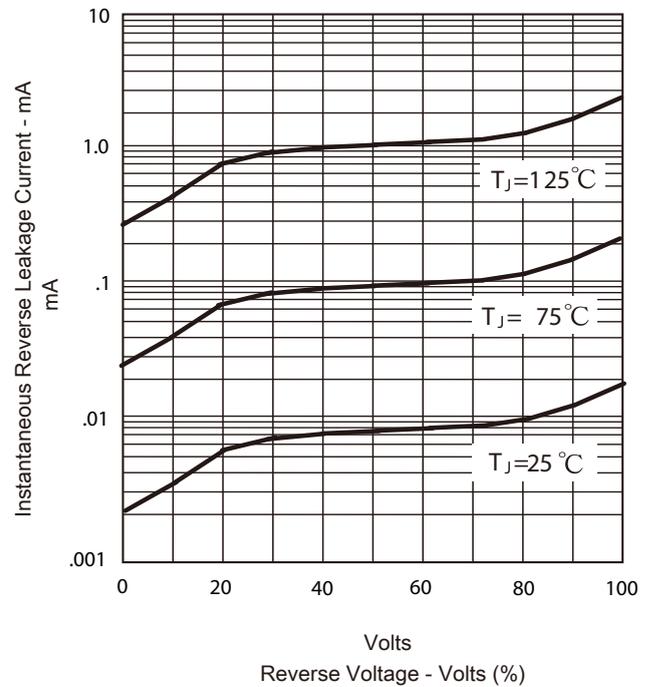


Figure .4- Typical Reverse Characteristics





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