

SUPER FAST DIODE MODULE TYPE 400A / 600V

Features

High Surge Capability
Type 600V V_{RRM}

Maximum Ratings

Junction 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
MUR400A60CT(R)	600V	420V	600V

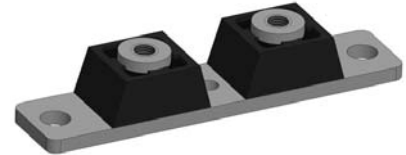
Electrical Characteristics @ 25 °C Unless Otherwise Specified

Item	Symbol	Rating	Conditions
Average Forward Current (Per pkg)	$I_{F(AV)}$	400 A	$T_C = 125^\circ\text{C}$
Peak Forward Surge Current (Per diode)	I_{FSM}	3300 A	8.3ms , half sine
Mounting Torque		35-40 In-lb 30-40 In-lb 8-10 In-lb	Terminal torque Outside holes Center hole

Item (Per diode)	Symbol	Rating		Conditions
		Typ.	Max	
Instantaneous Forward Voltage *	V_F	1.30V	1.45V	$I_{FM}=200A ; T_J = 25^\circ\text{C}$
Instantaneous Reverse Current At Rated DC Blocking Voltage	I_R		25 μA 3mA	$T_J = 25^\circ\text{C}$ $T_J = 125^\circ\text{C}$
Reverse Recovery Time	T_{rr}		200ns	$I_F=0.5A, I_R=1.0A,$ $I_{RR}=0.25A$
Reverse Recovery Time	T_{rr}	45ns 85ns		$T_J = 25^\circ\text{C}$ $T_J = 150^\circ\text{C}$
Peak Recovery Current	I_{rrm}	4A 12A		$T_J = 25^\circ\text{C}$ $T_J = 150^\circ\text{C}$
Reverse Recovery Charge	Q_{rr}	170nC 600nC		$T_J = 25^\circ\text{C}$ $T_J = 150^\circ\text{C}$
Thermal Resistance Junction To Case	$R_{\theta JC}$		0.35 °C/W	

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

TWIN TOWER



Dimensions in mm (1 mm = 0.0394")

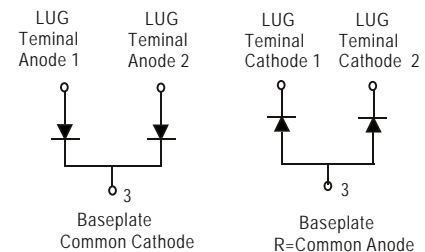
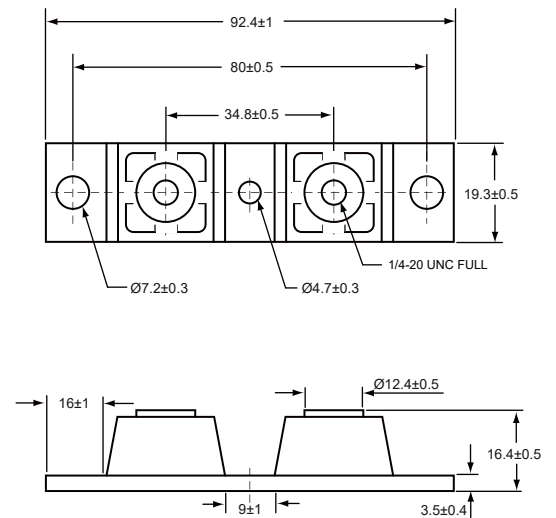


Figure .1- Typical Forward Characteristics

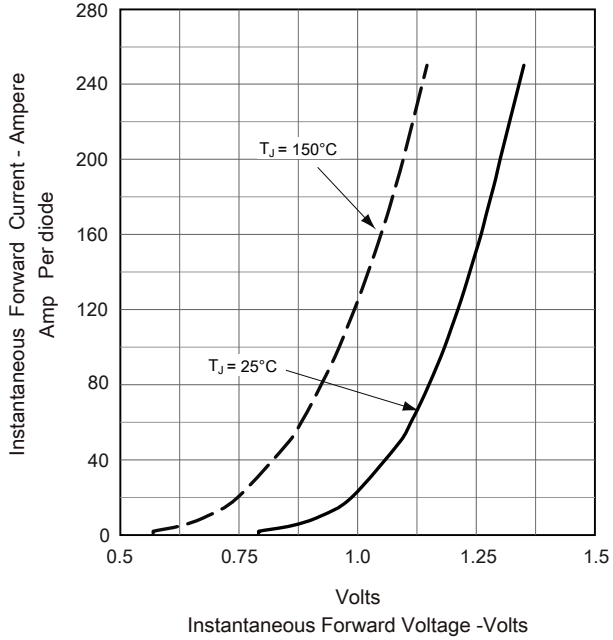


Figure .2-Forward Derating Curve

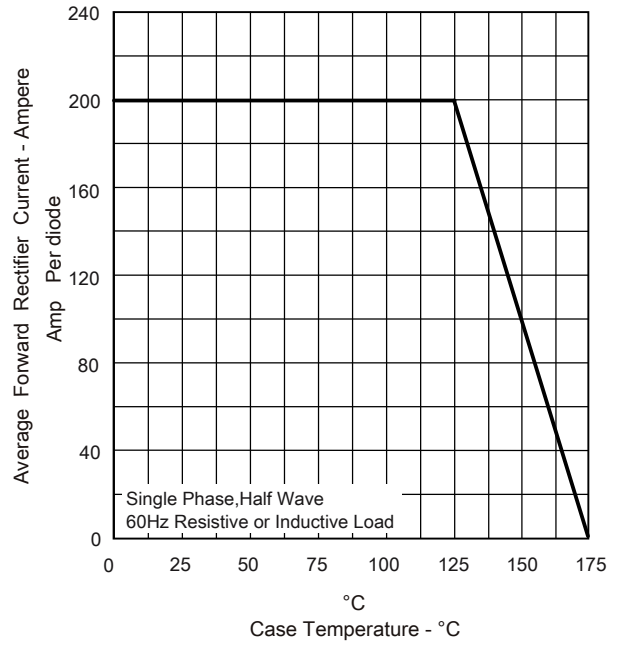


Figure .3-Peak Forward Surge Current

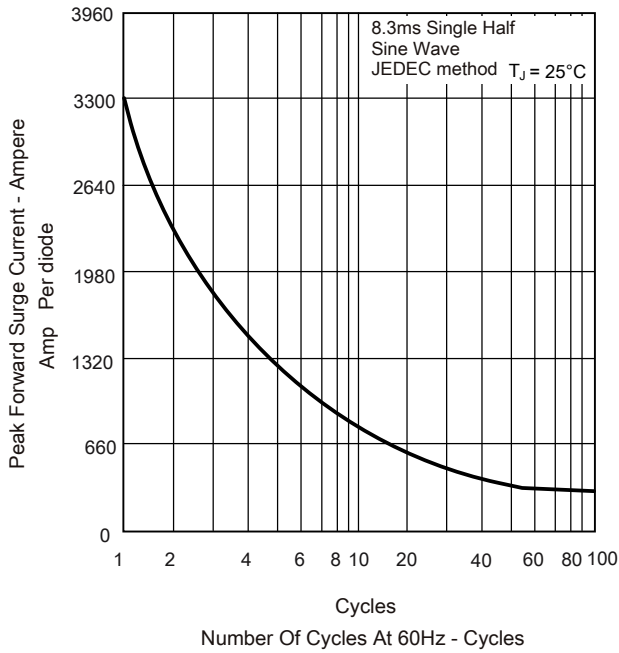
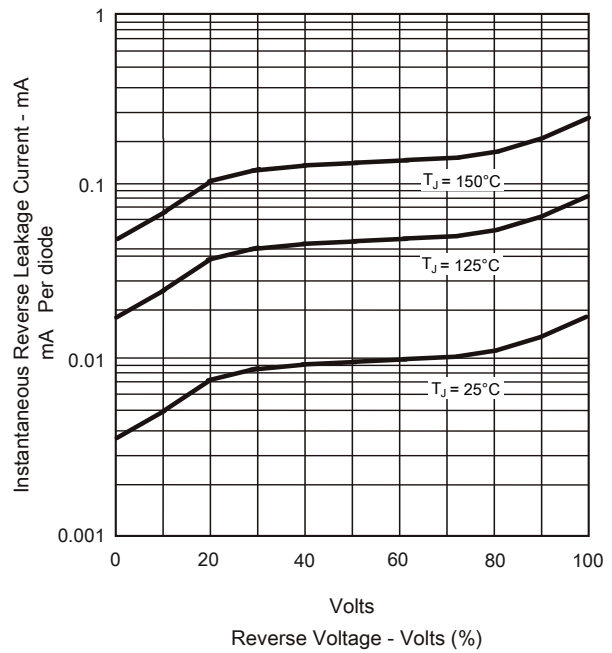


Figure .4-Typical Reverse Characteristics



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