

Pb Free Plating Product

MUR1605 thru MUR1660



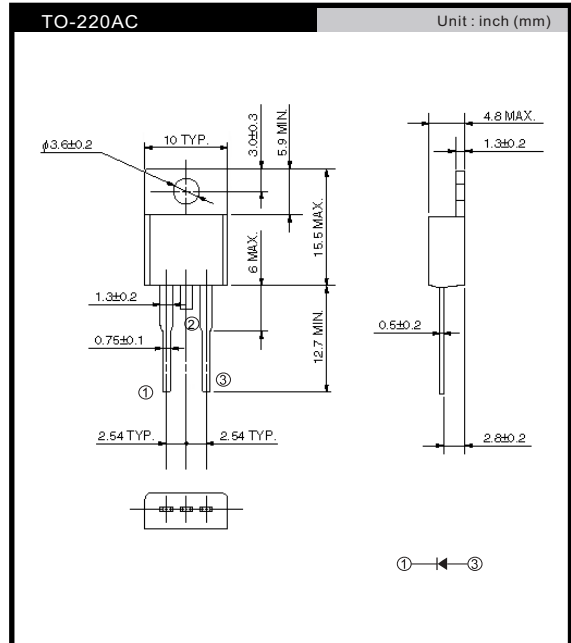
16.0 Amp. Glass Passivated Ultra Fast Recovery Rectifiers

Features

- ★ Fast switching for high efficiency
- ★ Low forward voltage drop
- ★ High current capability
- ★ Low reverse leakage current
- ★ High surge current capability

Mechanical Data

- ★ Case: Molded TO-220AC
- ★ Epoxy: UL 94V-0 rate flame retardant
- ★ Terminals: Solderable per MIL-STD-202 method 208
- ★ Polarity: Color band denotes cathode
- ★ Mounting position: Any
- ★ Weight: 2.03 grams



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating at 25°C ambient temperature unless otherwise specified.

Single phase, half wave, 60Hz, resistive or inductive load.

For capacitive load, derate current by 20%

CHARACTERISTICS	SYMBOL	MUR 1605	MUR 1610	MUR 1615	MUR 1620	MUR 1630	MUR 1640	MUR 1660	UNIT
Maximum Recurrent Peak Reverse Voltage	V _{RRM}	50	100	150	200	300	400	600	V
Maximum RMS Voltage	V _{RMS}	35	70	105	140	210	280	420	V
Maximum DC Blocking Voltage	V _{DC}	50	100	150	200	300	400	600	V
Maximum Average Forward Rectified Current @T _A = 75 °C	I _(AV)	16.0							A
Peak Forward Surge Current 8.3ms Single Half Sine-Wave Super Imposed on Rated Load (JEDEC Method)	I _{FSM}	300							A
Peak Forward Voltage at 16.0A DC	V _F	0.95			1.3		1.7		V
Maximum DC Reverse Current at Rated DC Blocking Voltage @T _J = 25°C	I _R	10							μA
Maximum DC Reverse Current at Rated DC Blocking Voltage @T _J = 100°C	I _R	150							μA
Maximum Reverse Recovery Time (Note1)	T _{RR}	35							nS
Typical Junction Capacitance (Note2)	C _J	80							pF
Typical Thermal Resistance (Note3)	R _{θJA}	2.5							°C/W
Operating and Storage Temperature Range	T _J , T _{STG}	-55 to + 150							°C

NOTES: 1. Measured with I_F = 0.5A, I_R = 1A, I_{RR} = 0.25A

2. Measured at 1.0 MHz and applied reverse voltage of 4.0VDC.

3. Thermal resistance junction to ambient

RATING AND CHARACTERISTIC CURVES (MUR1605 thru MUR1660)

FIG.1- TYPICAL FORWARD CURRENT DERATING CURVE

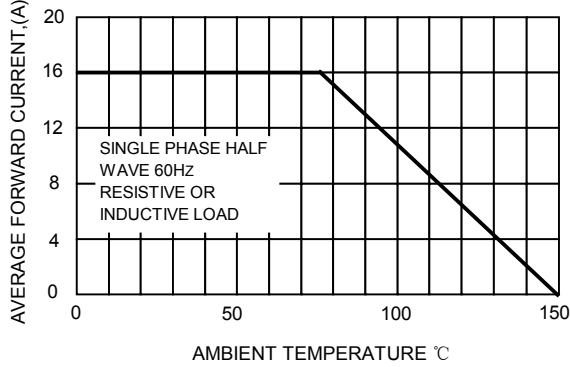


FIG.2-TYPICAL REVERSE CHARACTERISTICS

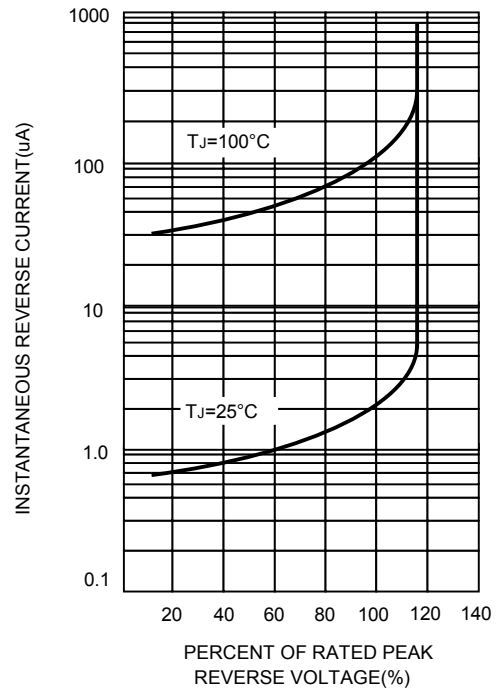


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

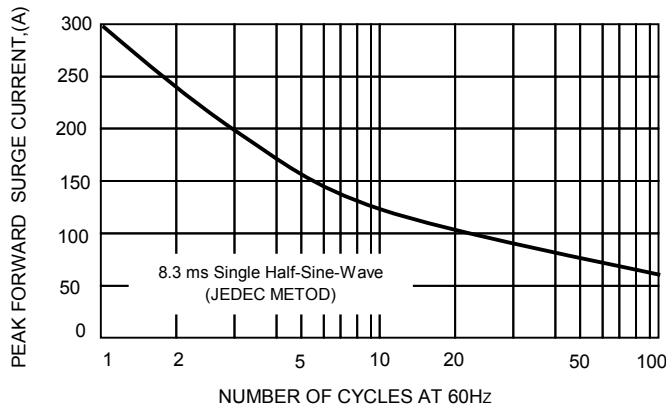


FIG.4-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

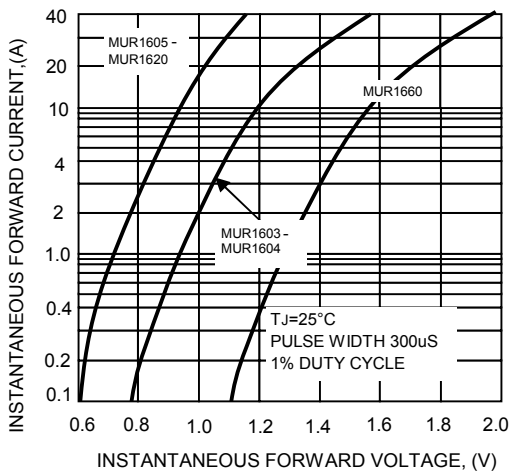


FIG.5-TYPICAL JUNCTION CAPACITANCE

