

Ultra Fast Rectifiers

Reverse Voltage 50 - 1000 Volts

Forward Current - 1.0 Amperes

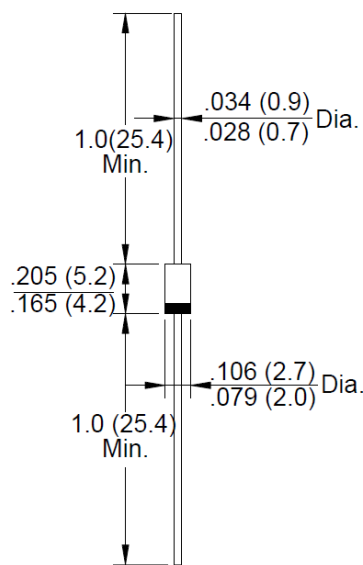
Features

- Ultra fast switching for high efficiency
- Low leakage current
- High forward surge capability
- Solder dip 260 °C, 40 s
- Component in accordance to RoHS 2002/95/EC and WEEE 2002/96/EC

Mechanical Data

- Case: JEDEC DO-41 molded plastic body
- Terminals: Plated axial leads, solderable per MIL STD-750, Method 2026
- Polarity: Color band denotes cathode end
- Mounting Position: Any

DO-41



Dimensions in inches and (millimeters)

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 105G	MUR 110G	MUR 115G	MUR 120G	MUR 140G	MUR 160G	MUR 180G	MUR 1100G	Unit
Maximum Recurrent Peak Reverse Voltage	V _{RRM}	50	100	150	200	400	600	800	1000	V
Maximum RMS Voltage	V _{RMS}	35	70	105	140	280	420	560	700	V
Maximum DC Blocking Voltage	V _{DC}	50	100	150	200	400	600	800	1000	V
Maximum average forward rectified current 0.375"(9.5mm) lead length at TA=50℃	I(AV)	1.0								A
Peak Forward Surage Current 8.3ms Single Half Sine-Wave Super Imposed on Rated Load(JEDEC Method)	I _{FSM}	35								A
I ² t Rating for Fusing (t<8.3mS)	I ² t	5.08								A ² s
Maximum instantaneous forward voltage at 1.0A	V _F	0.97			1.35			1.7		V
Maximum DC Reverse Current @TA=25℃ at Rated DC Blocking Voltage @TA=100℃	I _R	5 50								µA
Maximum Reverse Recovery Time	T _{RR}	45				60		75		nS
Typical Junction Capacitance (Note1)	C _J	20								pF
Typical thermal resistance(Note2)	RθJA	50								℃/W
Operating Temperature Range	T _J	-65 to+175								℃
Storage Temperature Range	T _{STG}	-65 to+175								℃

NOTES: 1.Measured at 1.0 MHz and applied reverse voltage of 4.0V DC

2.Thermal resistance junction to ambient

3.The typical data above is for reference only .

MUR1*G-A-00-A001

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Fig. 1 - Forward Current Derating Curve

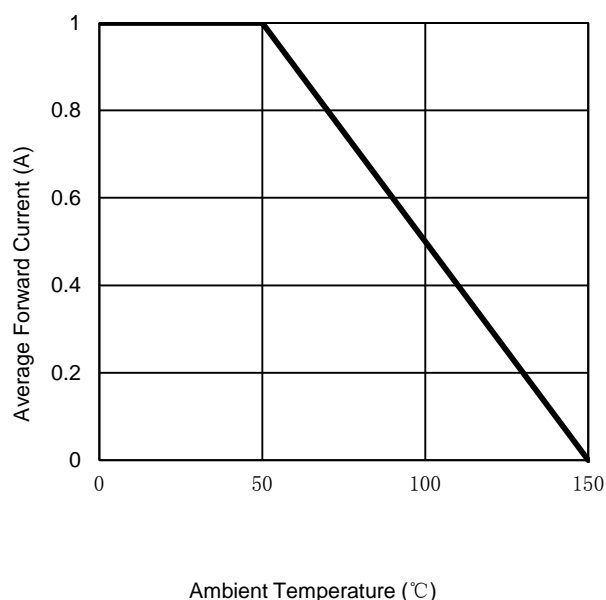


Fig. 2 - Maximum Non-Repetitive Surge Current

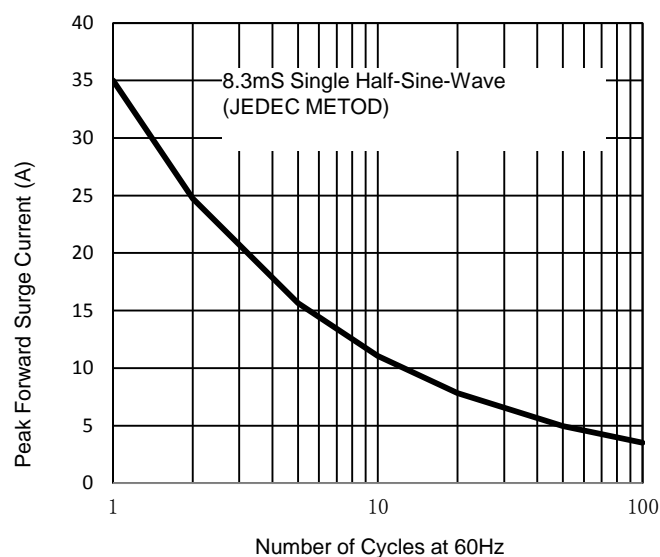


Fig. 3 - Typical Reverse Characteristics

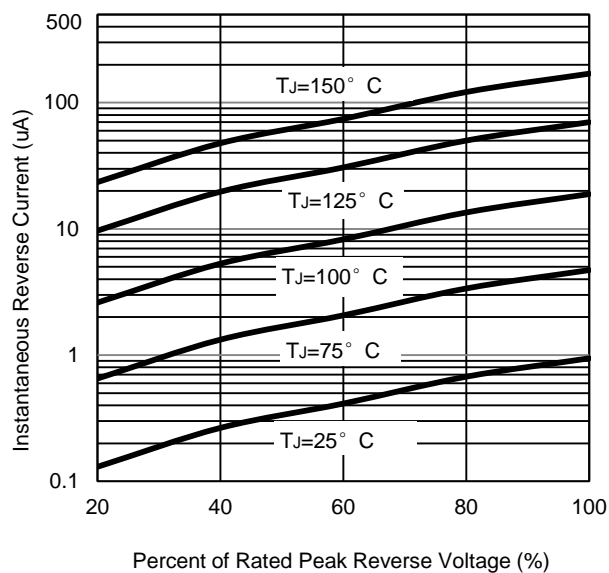
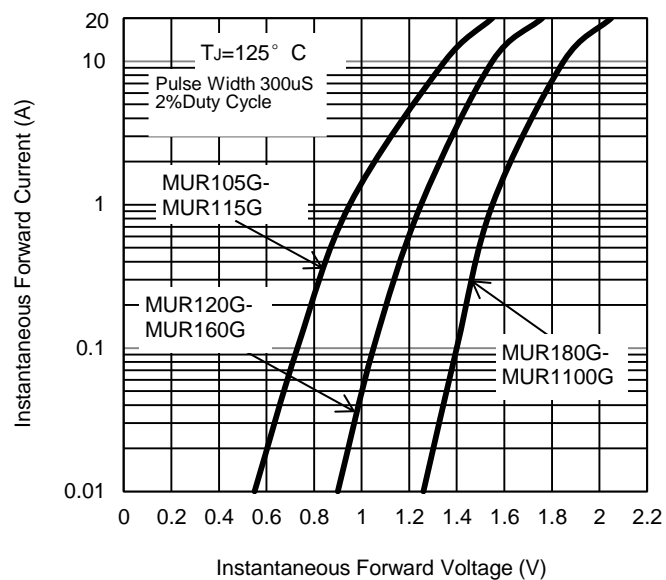


Fig. 4 - Typical Forward Characteristics



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