

# GU2A-A THRU GU2M-A

## SURFACE MOUNT FAST SWITCHING RECTIFIER

VOLTAGE: 50 TO 1000V

CURRENT: 2.0A



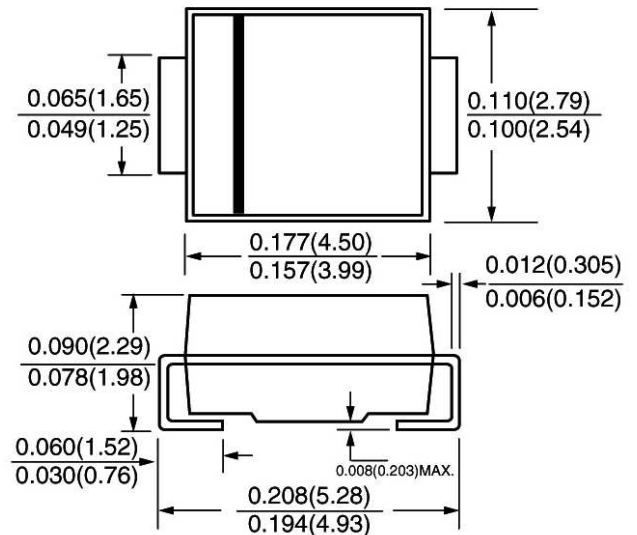
### FEATURE

Ideal for surface mount pick and place application  
 Low profile package  
 Built-in strain relief  
 High surge capability  
 High temperature soldering guaranteed  
 260°C/10sec/at terminals  
 Glass passivated chip  
 Fast recovery time for high efficiency

### MECHANICAL DATA

Terminal: Plated axial leads solderable per MIL-STD 202E, method 208C  
 Case: Molded with UL-94 class V-0 recognized Flame Retardant Epoxy  
 Polarity: Color band denotes cathode

### SMA / DO-214AC



### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

(single-phase, half-wave, 60HZ, resistive or inductive load rating at 25°C, unless otherwise stated, for capacitive load, date current by 20%)

	SYMBOL	GU 2A-A	GU 2B-A	GU 2D-A	GU 2G-A	GU 2J-A	GU 2K-A	GU 2M-A	units
Maximum Recurrent Peak Reverse Voltage	V <sub>rrm</sub>	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	V <sub>rms</sub>	35	70	140	280	420	560	700	V
Maximum DC blocking Voltage	V <sub>dc</sub>	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified at T <sub>L</sub> =100°C	I <sub>f(av)</sub>	2.0							A
Peak Forward Surge Current 8.3ms single half sine- wave superimposed on rated load	I <sub>fsm</sub>	50.0							A
Maximum Instantaneous Forward Voltage at rated forward current 2.0A	V <sub>f</sub>	1.0		1.4		1.7		V	
Maximum DC Reverse Current Ta =25°C at rated DC blocking voltage Ta =125°C	I <sub>r</sub>	10.0 500.0							μ A μ A
Maximum Reverse Recovery Time (Note1 )	T <sub>rr</sub>	50				75			nS
Typical Junction Capacitance (Note 2)	C <sub>j</sub>	50.0							pF
Typical Thermal Resistance (Note 3)	R(jl)	20.0							°C/W
Storage and Operating Junction Temperature	T <sub>stg</sub> , T <sub>j</sub>	-50 to +150							°C

Note:

1. Reverse Recovery Condition I<sub>f</sub> =0.5A, I<sub>r</sub> =1.0A, I<sub>rr</sub> =0.25A
2. Measured at 1.0 MHz and applied reverse voltage of 4.0Vdc
3. Thermal Resistance from Junction to terminal mounted on 5×5mm copper pad area<sup>1</sup>

RATINGS AND CHARACTERISTIC CURVES GU2A-A THRU GU2M-A

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Fig. 1 — Forward Current Derating Curve

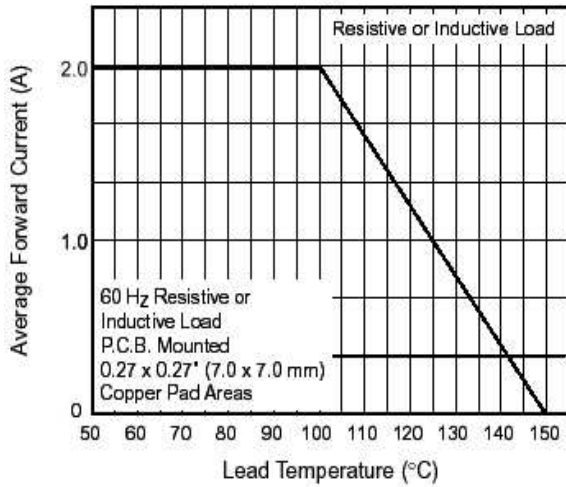


Fig. 2 — Maximum Non-Repetitive Peak Forward Surge Current

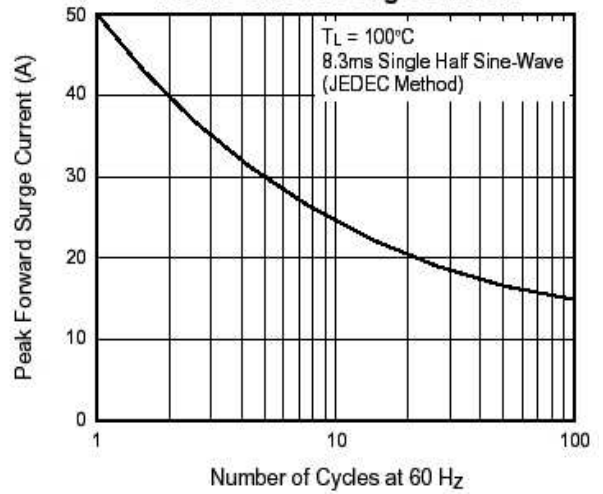


FIG. 3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

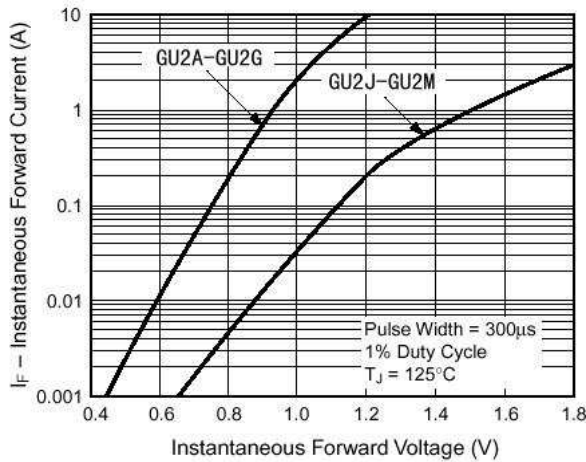


FIG. 4 - TYPICAL REVERSE CHARACTERISTICS

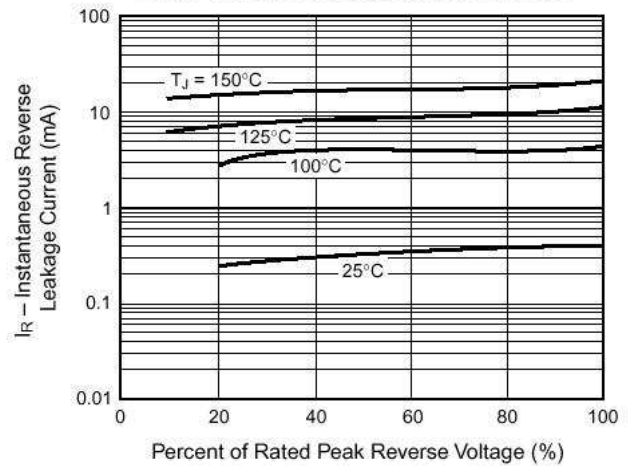


FIG. 5 - TYPICAL JUNCTION CAPACITANCE

