

**SINGLE-PHASE GLASS PASSIVATED  
 SILICON BRIDGE RECTIFIER**

**VOLTAGE RANGE 50 to 1000 Volts CURRENT 4.0 Amperes**

**FEATURES**

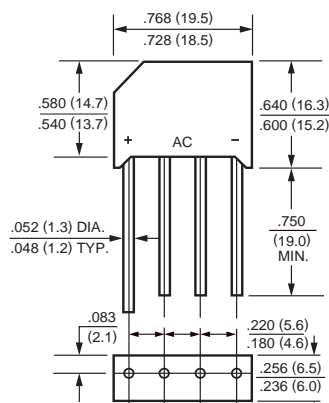
- \* Ideal for printed circuit board
- \* Surge overload rating: 200 amperes peak
- \* Mounting position: Any
- \* Weight: 4.8 grams

**MECHANICAL DATA**

- \* UL listed the recognized component directory, file #E94233
- \* Epoxy: Device has UL flammability classification 94V-0



RS-4L



Dimensions in inches and (millimeters)

**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Ratings at 25 °C ambient temperature unless otherwise specified.  
 Single phase, half wave, 60 Hz, resistive or inductive load.  
 For capacitive load, derate current by 20%.

**MAXIMUM RATINGS** (At TA = 25°C unless otherwise noted)

RATINGS	SYMBOL	MDA970G1	MDA970G2	MDA970G3	MDA970G5	MDA970G6	MDA970G8	MDA970G10	UNITS
Maximum Recurrent Peak Reverse Voltage	VRRM	50	100	200	400	600	800	1000	Volts
Maximum RMS Bridge Input Voltage	VRMS	35	70	140	280	420	560	700	Volts
Maximum DC Blocking Voltage	VDC	50	100	200	400	600	800	1000	Volts
Maximum Average Forward Output Current at TA = 50°C	Io	4.0							Amps
Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)	IFSM	200							Amps
Operating Temperature Range	TJ	-55 to + 150							°C
Storage Temperature Range	TSTG	-55 to + 150							°C

**ELECTRICAL CHARACTERISTICS** (At TA = 25°C unless otherwise noted)

CHARACTERISTICS	SYMBOL	MDA970G1	MDA970G2	MDA970G3	MDA970G5	MDA970G6	MDA970G8	MDA970G10	UNITS	
Maximum Forward Voltage Drop per Bridge Element at 6.28A DC	VF	1.1							Volts	
Maximum Reverse Current at Rated	IR	@TA = 25°C							5.0	uAmps
DC Blocking Voltage per element		@TA = 100°C							1	mAmps

# RATING AND CHARACTERISTIC CURVES ( MDA970G1 THRU MDA970G10 )

FIG. 1 - MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

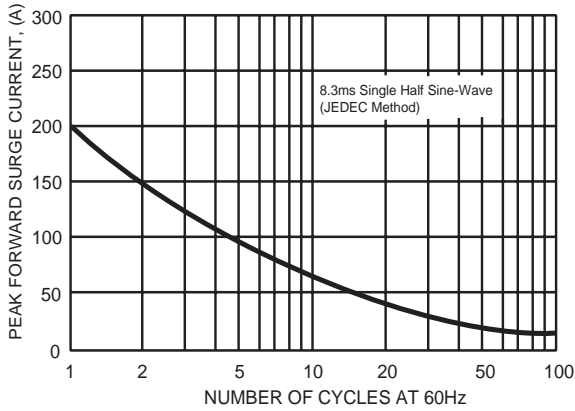


FIG. 2 - TYPICAL FORWARD CURRENT DERATING CURVE

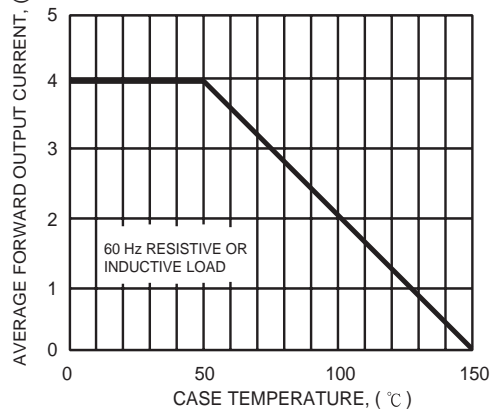


FIG. 3 - TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

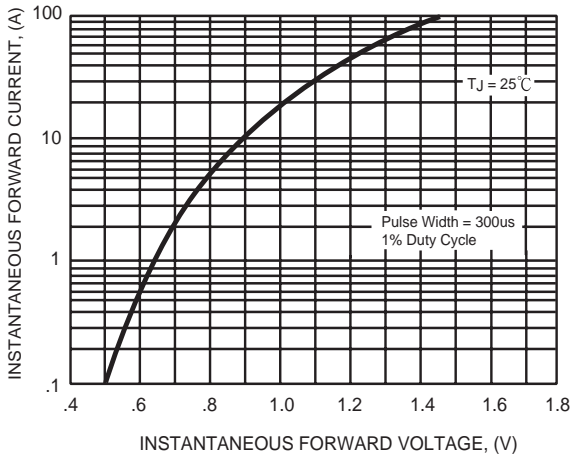


FIG. 4 - TYPICAL REVERSE CHARACTERISTICS

