



## Features

- ◊ UL Recognized File # E-326243
- ◊ For surface mounted application
- ◊ Glass passivated junction chip.
- ◊ Low forward voltage drop
- ◊ High current capability
- ◊ Easy pick and place
- ◊ High surge current capability
- ◊ Plastic material used carries Underwriters Laboratory Classification 94V-0
- ◊ High temperature soldering: 260°C / 10 seconds at terminals
- ◊ Green compound with suffix "G" on packing code & prefix "G" on datecode.

## Mechanical Data

- ◊ Case: Molded plastic
- ◊ Terminals: Pure tin plated, lead free.
- ◊ Polarity: Indicated by cathode band
- ◊ Packaging: 12mm tape per EIA STD RS-481
- ◊ Weight: 0.064 grams

## Maximum Ratings and Electrical Characteristics

Rating 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%

Type Number	Symbol	S2 AA	S2 BA	S2 DA	S2 GA	S2 JA	S2 KA	S2 MA	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 Current @T <sub>L</sub> =100°C	I <sub>F(AV)</sub>								A
Peak Forward Surge Current, 8.3 ms Single Half Sine-wave Superimposed on Rated Load (JEDEC method )	I <sub>FSM</sub>								A
Maximum Instantaneous Forward Voltage @ 1.5A	V <sub>F</sub>								V
Maximum DC Reverse Current at Rated DC Blocking Voltage @T <sub>A</sub> =25°C ( Note 1 ) @ T <sub>A</sub> =125°C	I <sub>R</sub>								uA
Typical Reverse Recovery Time ( Note 4 )	T <sub>rr</sub>								uS
Typical Junction Capacitance ( Note 2 )	C <sub>j</sub>								pF
Typical Thermal resistance (Note 3)	R <sub>θJL</sub> R <sub>θJA</sub>								°C/W
Operating Temperature Range	T <sub>J</sub>					-55 to +150			°C
Storage Temperature Range	T <sub>STC</sub>					-55 to +150			°C

Notes: 1. Pulse Test with PW=300 usec, 1% Duty Cycle

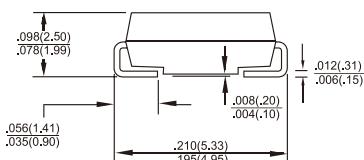
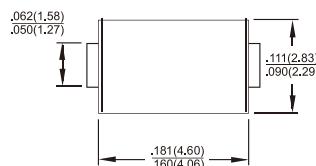
2. Measured at 1 MHz and Applied V<sub>R</sub>=4.0 Volts

3. Measured on P.C. Board with 0.2" x 0.2" (5.0 mm x 5.0mm) Copper Pad Areas.

4. Reverse Recovery Test Conditions: I<sub>F</sub>=0.5A, I<sub>R</sub>=1.0A, I<sub>RR</sub>=0.25A

Version: E10

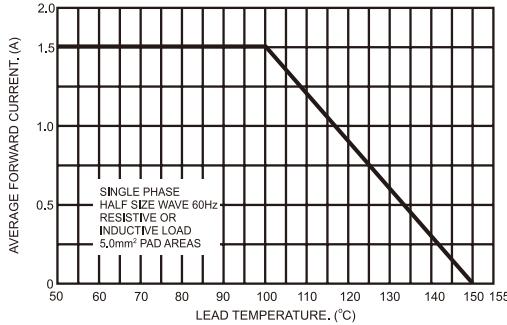
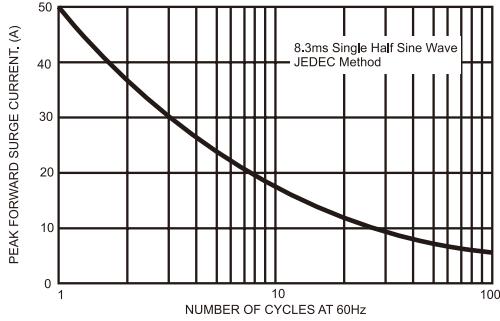
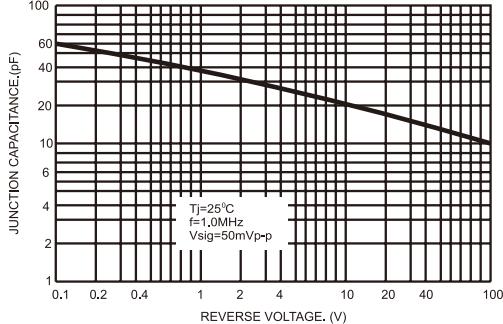
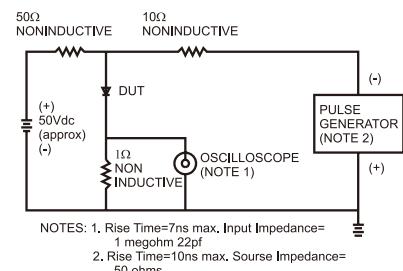
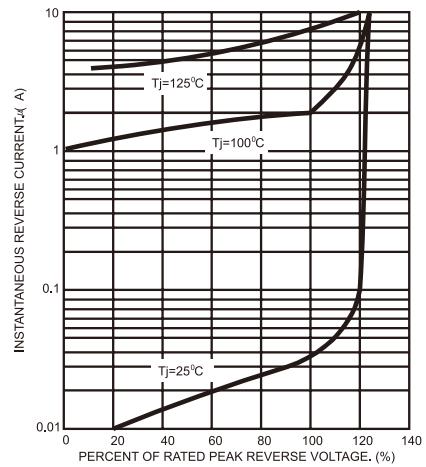
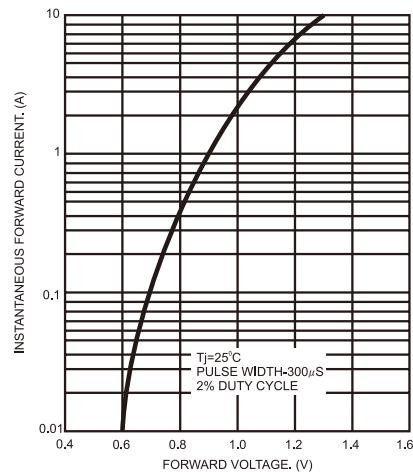
## S2AA - S2MA 1.5 AMPS. Surface Mount Rectifiers SMA/DO-214AC



Dimensions in inches and (millimeters)  
Marking Diagram



S2XA = Specific Device Code  
G = Green Compound  
Y = Year  
M = Work Month

**RATINGS AND CHARACTERISTIC CURVES (S2AA THRU S2MA)**
**FIG.1- MAXIMUM FORWARD CURRENT DERATING CURVE**

**FIG.3- MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT**

**FIG.4- TYPICAL JUNCTION CAPACITANCE**

**FIG.6- REVERSE RECOVERY TIME CHARACTERISTIC AND TEST CIRCUIT DIAGRAM**

**FIG.2- TYPICAL REVERSE CHARACTERISTICS**

**FIG.5- TYPICAL FORWARD CHARACTERISTICS**

**Version: E10**

# Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

[Taiwan Semiconductor:](#)

[S2DA](#)