

FEATURES

- * Ideal for surface mount applications
- * Easy pick and place
- * Built-in strain relief
- * Low forward voltage drop

VOLTAGE RANGE

20 to 100 Volts

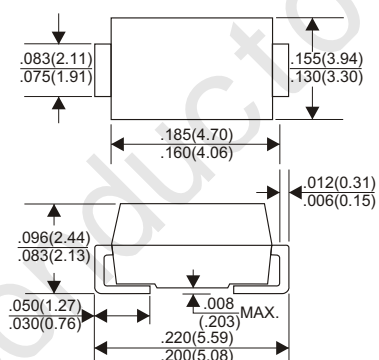
CURRENT

5.0 Ampere

MECHANICAL DATA

- * Case: Molded plastic
- * Epoxy: UL 94V-0 rate flame retardant
- * Metallurgically bonded construction
- * Polarity: Color band denotes cathode end
- * Mounting position: Any
- * Weight: 0.093 grams

DO-214AA(SMB)



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

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

TYPE NUMBER	SS52	SS53	SS54	SS55	SS56	SS58	SS59	SS510	UNITS	
Maximum Recurrent Peak Reverse Voltage	20	30	40	50	60	80	90	100	V	
Maximum RMS Voltage	14	21	28	35	42	56	63	70	V	
Maximum DC Blocking Voltage	20	30	40	50	60	80	90	100	V	
Maximum Average Forward Rectified Current at $T_L=90^\circ\text{C}$	5.0								A	
Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)	120								A	
Maximum Instantaneous Forward Voltage at 5.0A	0.55		0.70			0.85			V	
Maximum DC Reverse Current $T_a=25^\circ\text{C}$	0.2								mA	
at Rated DC Blocking Voltage $T_a=100^\circ\text{C}$	20								mA	
Typical Junction Capacitance (Note1)	380								pF	
Typical Thermal Resistance R_{JL} (Note 2)	16								$^\circ\text{C}/\text{W}$	
Operating Temperature Range T_J	-65 — +125			-65 — +150						$^\circ\text{C}$
Storage Temperature Range T_{STG}	-65 — +150								$^\circ\text{C}$	

NOTES:

1. Measured at 1MHz and applied reverse voltage of 4.0V D.C.
2. Thermal Resistance Junction to Lead.

RATING AND CHARACTERISTIC CURVES (SS52 THRU SS510)

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

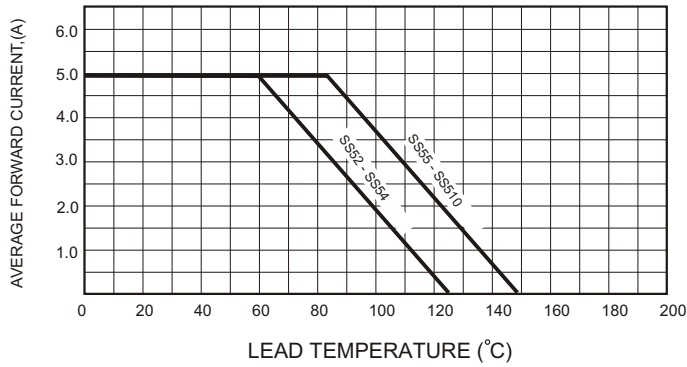


FIG.2-TYPICAL FORWARD CHARACTERISTICS

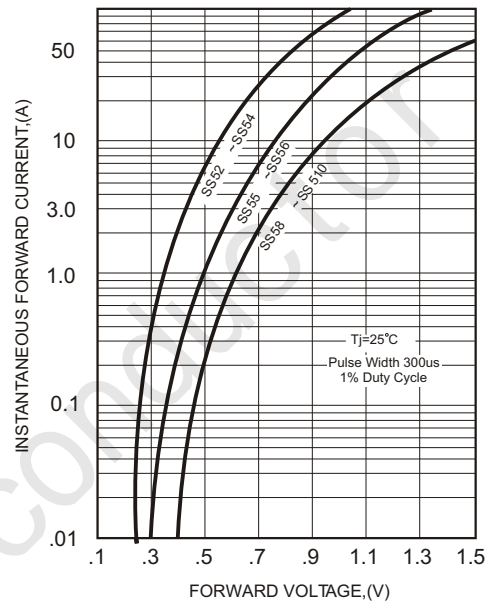


FIG.3-MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT

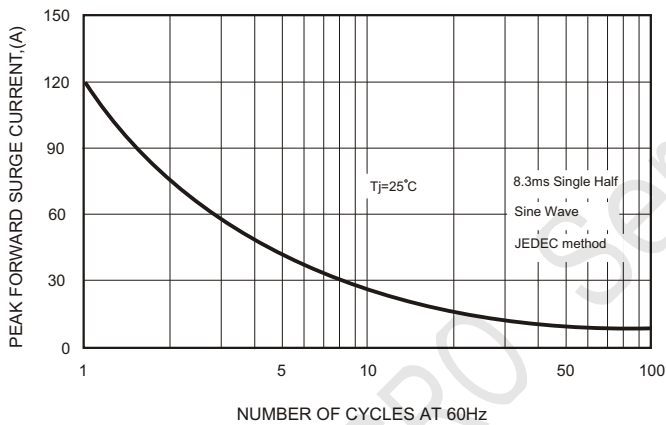


FIG.4-TYPICAL JUNCTION CAPACITANCE

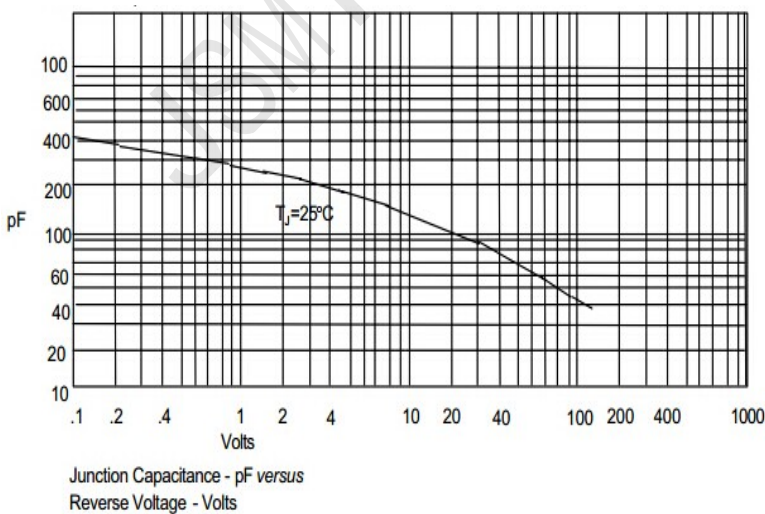


FIG.5 - TYPICAL REVERSE CHARACTERISTICS

