

## Features

- Glass passivated standard rectifiers
- For surface mounted application
- Super low  $V_F$
- High forward surge capability
- Moisture sensitivity: level 1, per J-STD-020



DO-214AA(SMB)

## Mechanical Data

- Case:DO-214AA, molded epoxy body,epoxy meets UL 94V-0 flammability rating
- Terminal: Matte tin plated leads, solderable per J-STD-002 and JESD22B-106
- Polarity: Indicated by cathode band



## Absolute Maximum Ratings and Electrical Characteristics

(single-phase, half-wave, 60Hz,  $T_A=25^\circ\text{C}$  unless otherwise noted)

Parameter	Symbol	GN2A	GN2B	GN2D	GN2G	GN2J	GN2K	GN2M	Unit
Maximum Repetitive Peak Reverse Voltage	$V_{RRM}$	50	100	200	400	600	800	1000	V
Maximum RMS Voltage	$V_{RMS}$	35	70	140	280	420	560	700	V
Maximum DC Blocking Voltage	$V_{bc}$	50	100	200	400	600	800	1000	V
Maximum Average Forward Rectified Current $T_L$ (See Fig.1)	$I_{F(AV)}$	2.0							A
Peak Forward Surge Current (8.3 ms single half sine-wave superimposed on rated load)	$I_{FSM}$	65.0							A
Maximum Forward Voltage at $I_F=2A$	$V_F$	1.1							V
Maximum DC Reverse Current at rated DC Blocking Voltage	@ $T_A=25^\circ\text{C}$	5.0							uA
	@ $T_A=125^\circ\text{C}$	100.0							
Typical Junction Capacitance (note1)	$C_J$	10.0							pF
Typical Thermal Resistance(note2)	$R_{\theta JL}$	20.0							$^\circ\text{C/W}$
Operating Junction and Storage Temperature Range	$T_J, T_{STG}$	- 55 to + 150							$^\circ\text{C}$

Notes: 1.Measured at 1.0MHz and applied reverse voltage of 4.0 D.C.

2. Thermal resistance from junction to lead, 0.197×0.197inch (5.0×5.0mm)copper pads to each terminal

## Typical Electrical Characteristic Curves

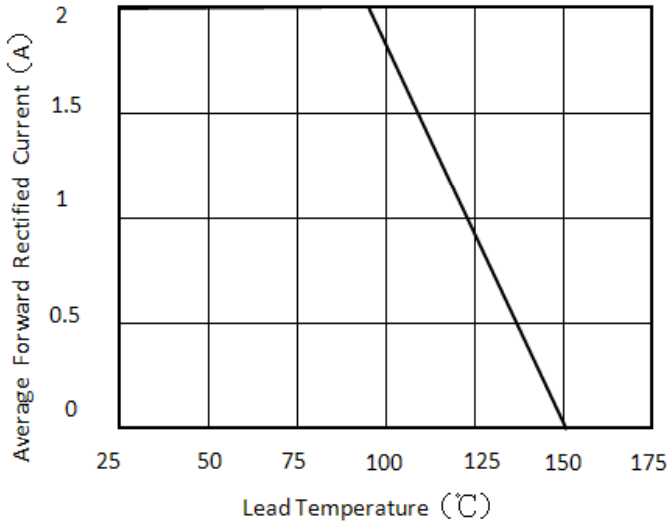


Figure 1. Forward Current Derating Curve

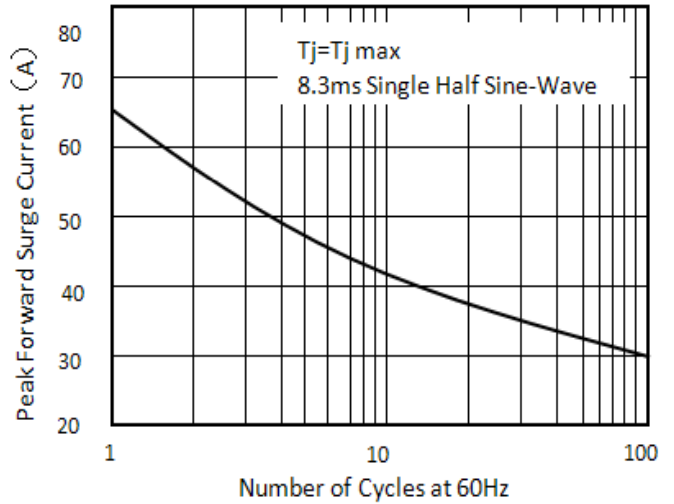


Figure 2. Maximum Non-Repetitive Peak Forward Surge Current

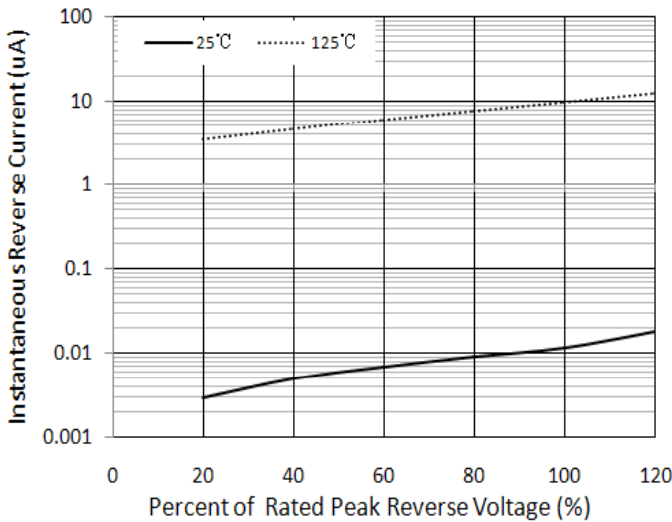


Figure 3. Typical Reverse Characteristics

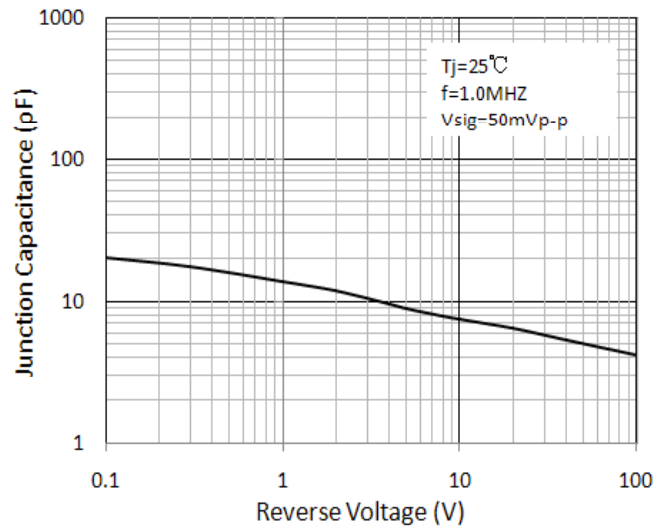


Figure 4. Typical Junction Capacitance

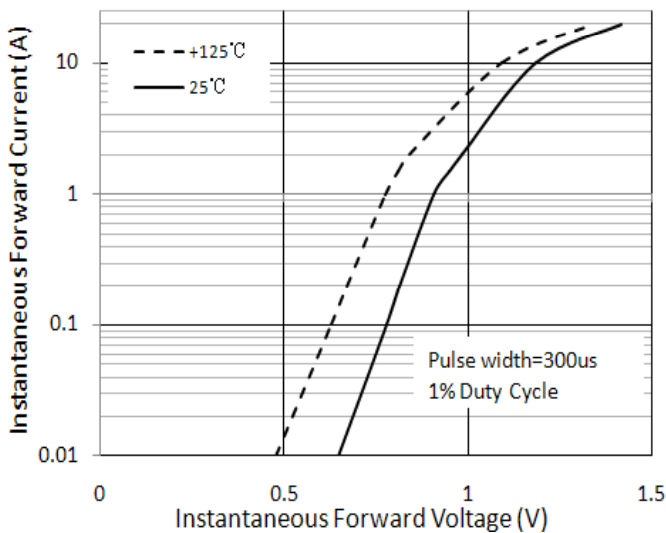


Figure 5. Typical Instantaneous Forward Characteristics

**Package Outline Dimensions**

in inches (millimeters)

**DO-214AA(SMB)**

