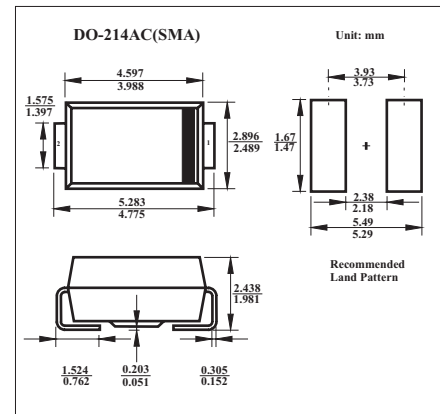


## Schottky Barrier Rectifier Diodes

## 1N5817-1N5819

## ■ Features

- For Surface Mounted Applications
- Metal Silicon Junction, Majority Carrier Conduction
- Low Power Loss, High Efficiency
- High Forward Surge Current Capability



## ■ Maximum Ratings and Electrical Characteristics @ Ta = 25 °C

Parameter	Symbol	Rating			Unit
		1N5817	1N5818	1N5819	
Maximum Repetitive Peak Reverse Voltage	V <sub>RRM</sub>	20	30	40	V
Maximum RMS voltage	V <sub>RMS</sub>	14	21	28	
Maximum DC Blocking Voltage	V <sub>DC</sub>	20	30	40	
Maximum Average Forward Rectified Current	I <sub>(AV)</sub>	1.0			A
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load (JEDEC Method)	I <sub>FSM</sub>	40			A
Maximum Instantaneous Forward Voltage at 1.0A	V <sub>F</sub>	0.45	0.55	0.55	V
Maximum DC Reverse Current TA=25 °C	I <sub>R</sub>	0.5			mA
At Rated DC Blocking Voltage TA=100 °C		6.0			
Typical Junction Capacitance *1	C <sub>J</sub>	110			pF
Typical Thermal Resistance *2	R <sub>θJA</sub>	88.0			°C/W
Operating Junction Temperature Range	T <sub>J</sub>	-65 to +125			°C
Storage Temperature Range	T <sub>STG</sub>	-65 to +150			°C

\*1 Measured at 1Mz and applied reverse voltage of 4.0V D.C.

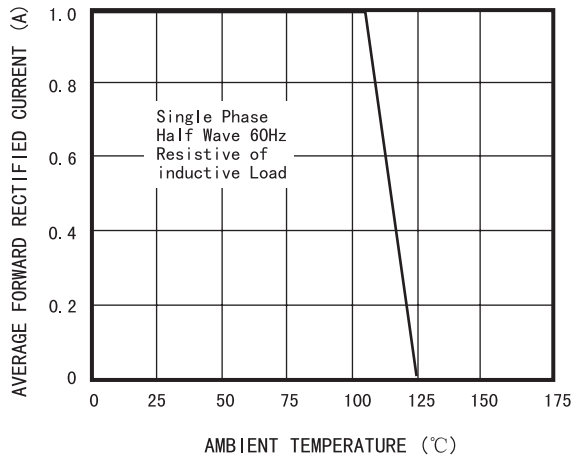
\*2 P.C.B mounted with 0.2X0.2"(5.0x5.0mm)copper pad areas

## ■ Marking

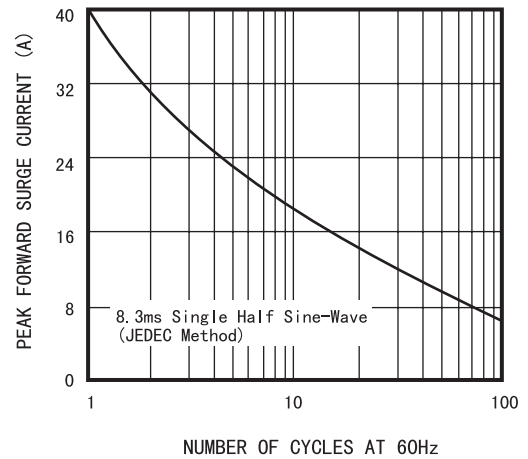
Part NO.	1N5817	1N5818	1N5819
Marking	SS12	SS13	SS14

# 1N5817-1N5819

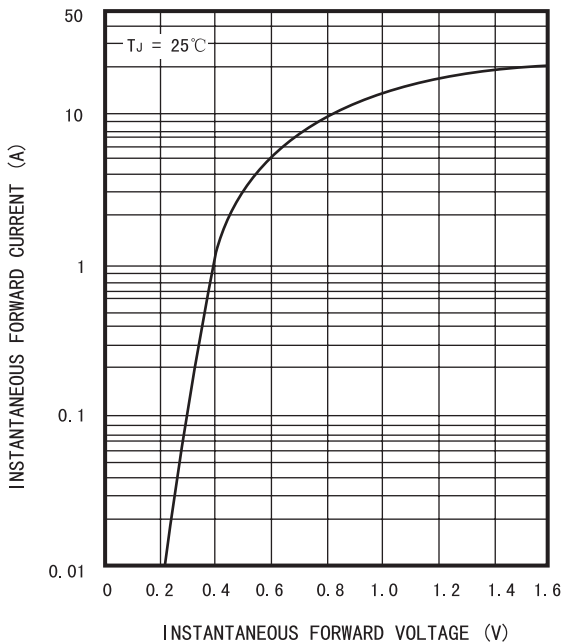
## Electrical Characteristics Curves



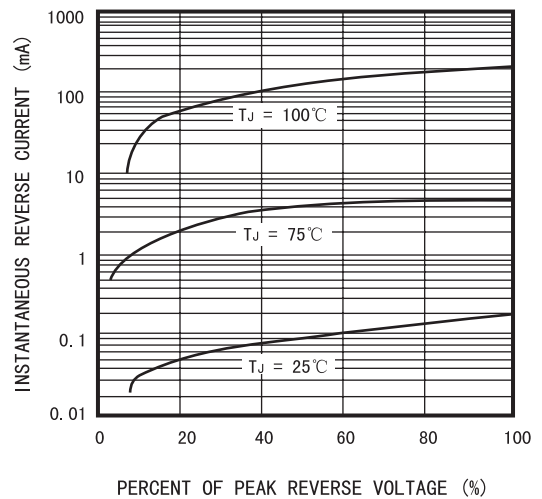
Forward Current Derating Curve



2-Maximum Non-Repetitive Peak Forward Surge Current

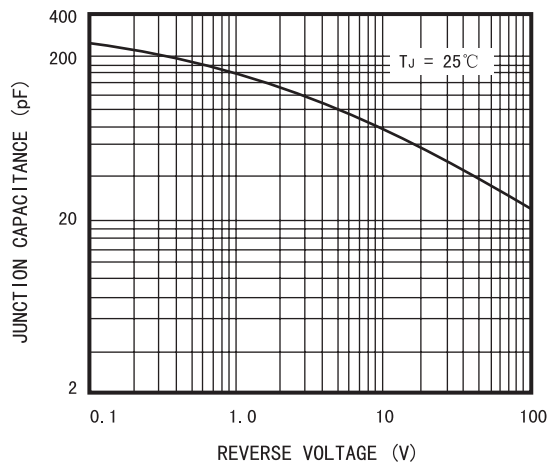


Typical Instantaneous Forward Characteristics

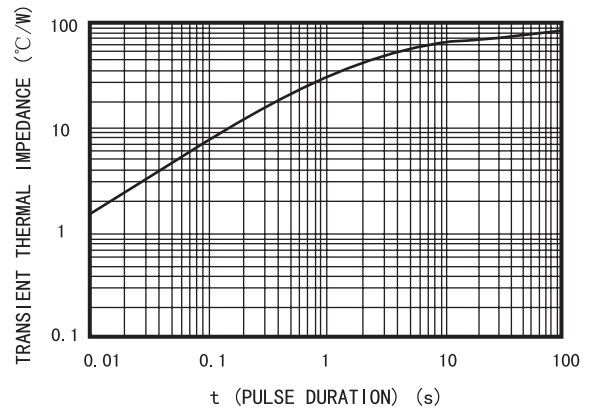


Typical Reverse Characteristics

## 1N5817-1N5819



Typical Junction Capacitance



Typical Transient Thermal Impedance