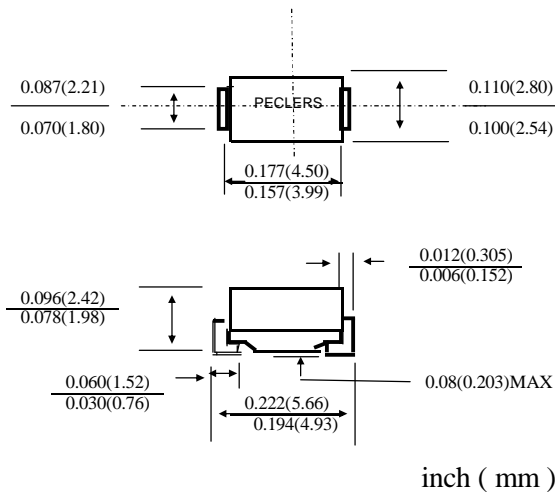


1.0A SURFACE MOUNT SCHOTTKY BARRIER RECTIFIERS

VOLTAGE RANGE: 20 to 100 VOLTS

DO - 214AC



FEATURES

- . For surface mounted applications
- . Metal silicon junction, majority carrier conduction
- . Low power loss, high efficiency
- . Built-in strain relief, ideal for automated placement
- . High forward surge current capability
- . High temperature soldering guaranteed:
250°C/10 seconds at terminals
- . The plastic material carries U/L recognition 94V-0

MECHANICAL DATA

- . Case: JEDEC DO -214AC. molded plastic
- . Terminals: Axial leads. Solderable per MIL - STD - 750 Method 2026
- . Polarity: Color band denotes cathode
- . Weight: 0.003 ounce. 0.093 grams
- . Mounting position: Any

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25 °C ambient temperature unless otherwise specified.

Single phase half wave 60HZ. resistive or inductive load. For capacitive load current derate by 20%

	SYMBOL	SS12	SS13	SS14	SS15	SS16	SS18	SS110	UNITS	
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	20	30	40	50	60	80	100	V	
Maximum RMS Voltage	V_{RMS}	14	21	28	35	42	56	70	V	
Maximum DC Blocking Voltage	V_{DC}	20	30	40	50	60	80	100	V	
Maximum Average Forward Rectified Current 9.5mm Lead Length. $T_A = 75^\circ\text{C}$	$I_{(AV)}$	1.0							A	
Peak Forward Surge Current 8.3ms Single half-sine-wave superimposed on rated $T_j = 125^\circ\text{C}$	I_{FSM}	40.0							A	
Maximum Forward Voltage at 1.0A DC	V_F	0.45	0.55	0.70	0.85				V	
Maximum Reverse Current $T_A = 25^\circ\text{C}$ at Rated DC Blocking Voltage $T_A = 100^\circ\text{C}$	I_R	0.5							m A	
Typical Junction Capacitance (Note 1)	C_j	110			90					pF
Typical Thermal Resistance (Note 2)	R_{QJA}	88.0							°C/W	
Operating Junction Temperature Range	T_j	- 65 to 125			- 65 to 150					°C
Storage Temperature Range	T_{STG}	- 65 to 150							°C	

NOTE:

1. Measured at 1.0MHz and applied reverse voltage of 4.0V DC.
2. P.C.B.mounted with 0.2×0.2 (5.0×5.0mm)copper pad areas

SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER

Reverse Voltage: 20 to 100 Volts

Forward Current: 1.0Ampere

FIG.1-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

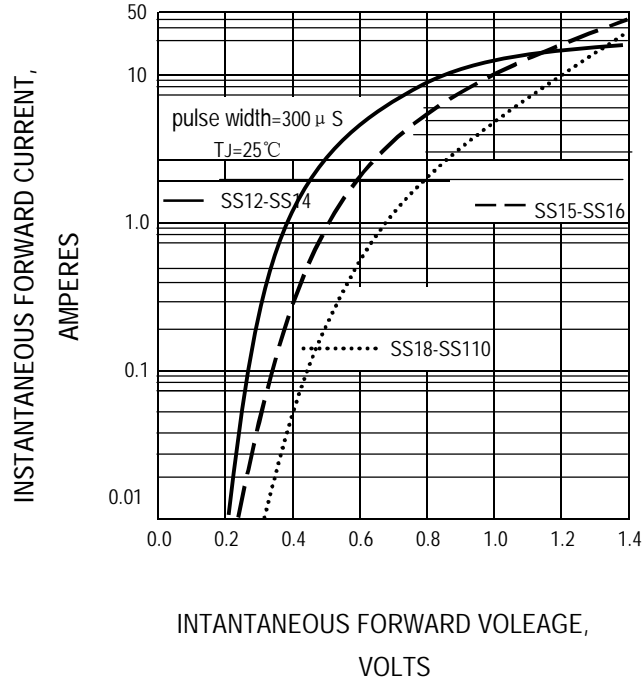


FIG.2-TYPICAL JUNCTION CHARACTERISTICS

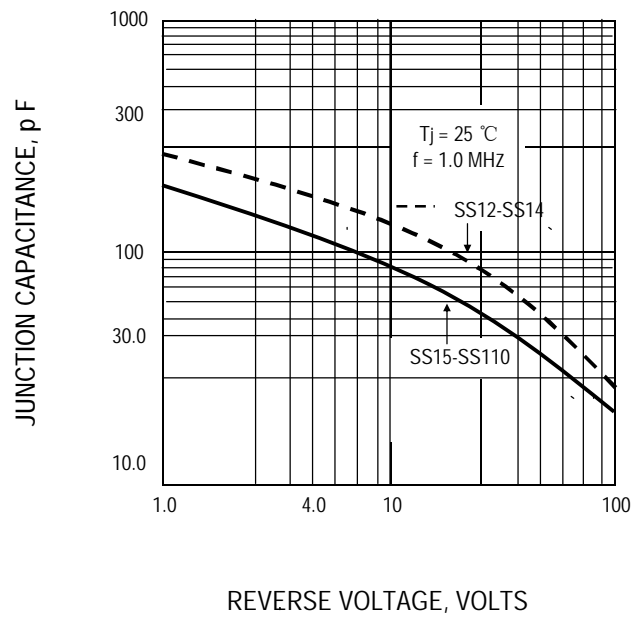


FIG.3-FORWARD CURRENT DERATING CURVE

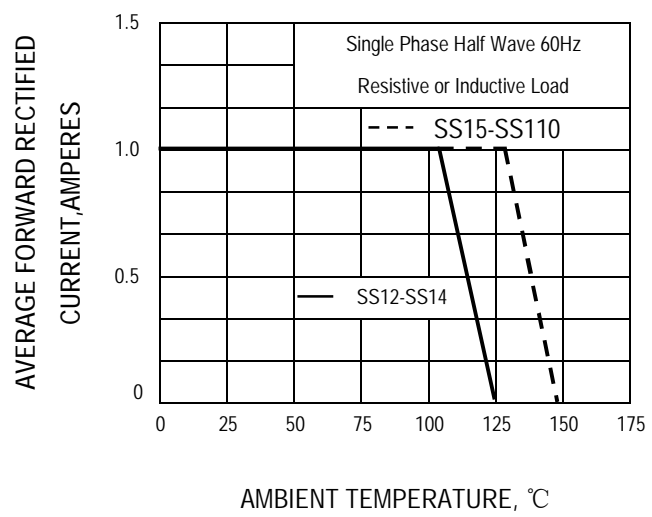


FIG.4-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

