SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER

SSL42 THRU SSL44

VOLTAGE RANGE **20 to 40 Volts**

CURRENT **4.0 Ampere**

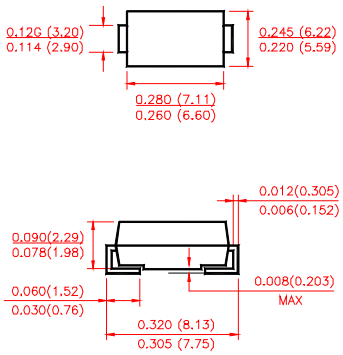
FEATURES

- Low profile surface mount package
- Built-in strain relief
- High switching speed, low V_F
- Low voltage drop, high efficiency
- For use in low voltage high frequency inverters, Free willing ,and polarity protection applications
- Guardring for over voltage protection

MECHANICAL DATA

- Case: Transfer molded plastic
- Epoxy: UL 94V-0 rate flame retardant
- Lead: Solder plated, solderable per MIL-STD-750 method 2026
- Polarity: Color band denotes cathode end
- Weight: 0.007 ounce, 0.25 gram-DO-214AB(SMC)

DO-214AB(SMC)



Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

- Ratings at 25℃ ambient temperature unless otherwise specified.
- Single phase, half wave, 60Hz, resistive or inductive load.
- For capacitive load derate current by 20%.

		SYMBOLS	SSL42	SSL43	SSL44	UNIT
Maximum Repetitive Peak Reverse Voltage		V_{RRM}	20	30	40	Volts
Maximum RMS Voltage		V_{RMS}	20	30	40	Volts
Maximum DC Blocking Voltage		V_{DC}	20	30	40	Volts
Maximum Average Forward Rectified Current at T_L see figure1 T_L=95℃		$I_{(AV)}$	4.0			Amps
Peak Forward Surge Current 8.3mS single half sine-wave superimposed on rated load (JEDEC method)		I_{FSM}	100			Amps
Maximum Instantaneous Forward Voltage @ 4.0A(Note1)		V_F	0.42		0.46	Volts
Maximum DC Reverse Current at rated DC Blocking Voltage per element	T_A = 25℃	I_R	0.5			mA
	T_A = 100℃		10.0			
Typical Thermal Resistance (Note 2)		$R_{\theta JA}$	55			℃/W
		$R_{\theta JL}$	12			
Operating Junction Temperature		T_J	(-55 to +150)			℃
Storage Temperature Range		T_{STG}	(-55 to +150)			℃

Notes:

1. Pulse test: 300μs pulse width,1% duty cycle
2. PCB mounted with 0.2"×0.2"(5.0cm×5.0cm) copper pads

SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER

SSL42 THRU SSL44

VOLTAGE RANGE	**20 to 40Volts**
CURRENT	**4.0 Ampere**

RATING AND CHRACTERISTIC CURVES SSL42 THRU SSL44

FIG.1-TYPICAL FORWARD CURRENT DERATING CURVE

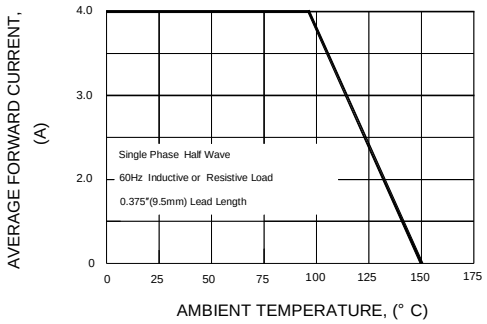


FIG.2-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

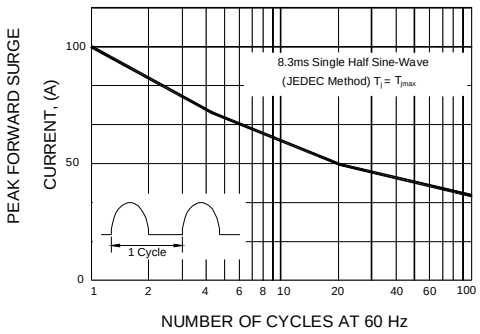


FIG.3-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

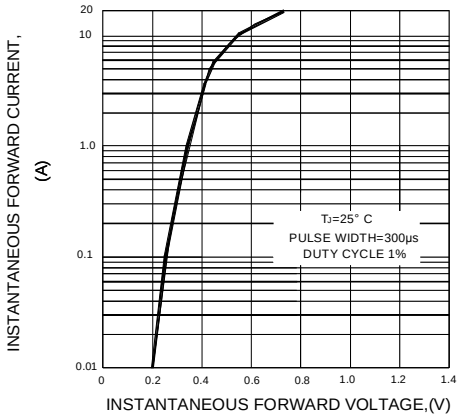


FIG.4-TYPICAL REVERSE CHARACTERISTICS

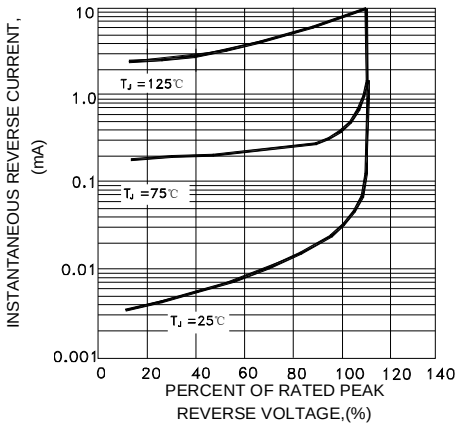


FIG.5-TYPICAL JUNCTION CAPACITANCE