



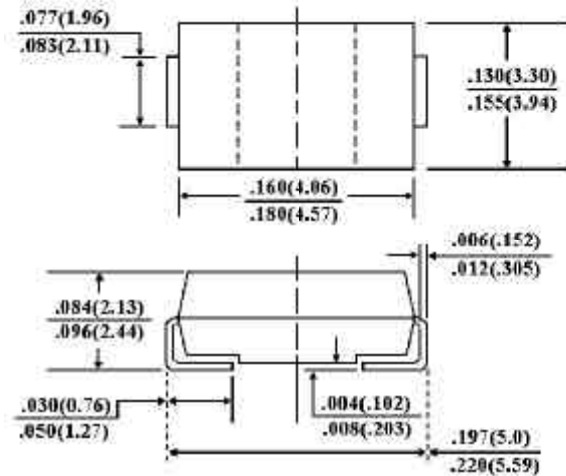
SL22 THRU SL24

LOW VF SURFACE MOUNT SCHOTTKY BARRIER RECTIFIER
VOLTAGE - 20 to 40 Volts CURRENT - 2.0 Amperes

FEATURES

Plastic package has Underwriters Laboratory
Flammability Classification 94V-O
For surface mounted applications
Low profile package
Built-in strain relief
Metal to silicon rectifier
majority carrier conduction
Low power loss, High efficiency
High current capability, low V_F
High surge capacity
For use in low voltage high frequency inverters,
free wheeling, and polarity protection applications
High temperature soldering guaranteed:
260 °C/10 seconds at terminals

SMB/DO-214AA



MECHANICAL DATA

Case: JEDEC DO-214AA molded plastic
Terminals: Solder plated, solderable per MIL-STD-750,
Method 2026
Polarity: Color band denotes cathode
Standard packaging: 12mm tape (EIA-481)
Weight: 0.003 ounce, 0.093 gram

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25 °C ambient temperature unless otherwise specified.

Resistive or inductive load.

	SYMBOLS	SL22	SL23	SL24	UNITS
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	20	30	40	Volts
Maximum RMS Voltage	V_{RMS}	14	21	28	Volts
Maximum DC Blocking Voltage	V_{DC}	20	30	40	Volts
Maximum Average Forward Rectified Current at T_J (See Figure 1)	I_{AV}	2.0			Amps
Peak Forward Surge Current 8.3ms single half sine-wave superimposed on rated load(JEDEC method)	I_{FSM}	50.0			Amps
Maximum Instantaneous Forward Voltage at 2.0A (Note 1)	V_F	0.38	0.38	0.40	Volts
Maximum DC Reverse Current $T_A=25$ °C(Note 1)	I_R	0.5			mA
At Rated DC Blocking Voltage $T_A=100$ °C		20.0			
Maximum Thermal Resistance (Note 2)	$R_{\theta KJL}$ $R_{\theta KJA}$	17 75			°C/W
Operating Junction Temperature Range	T_J	-50 to +125			°C
Storage Temperature Range	T_{STG}	-50 to +150			°C

NOTES:

- Pulse Test with PW=300 µs 1% Duty Cycle.
- Mounted on P.C.Board with 8.0mm² (.013mm thick) copper pad areas.

RATING AND CHARACTERISTIC CURVES
SL22 THRU S210

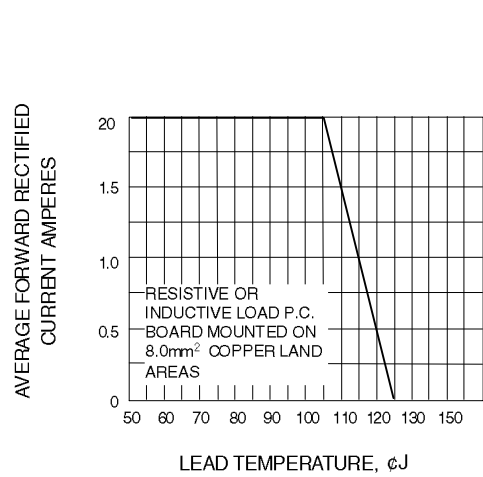


Fig. 1-FORWARD CURRENT DERATING CURVE

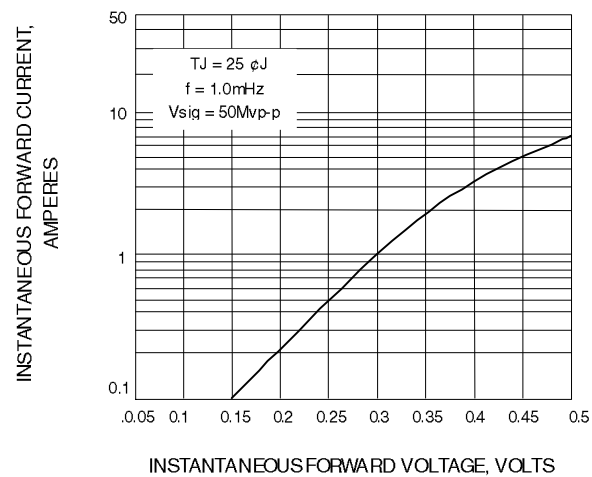


Fig. 2-TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS

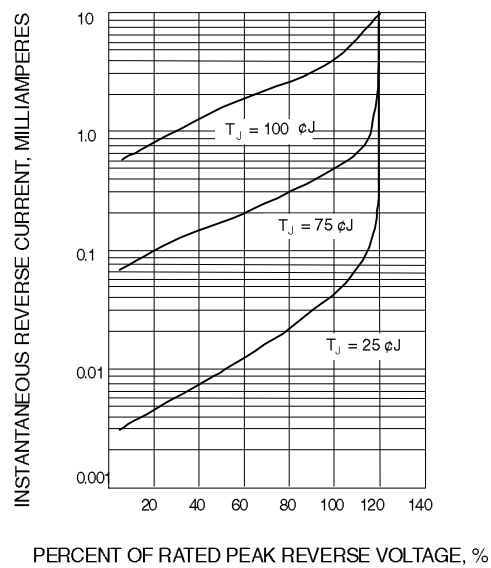


Fig. 3-TYPICAL REVERSE CHARACTERISTICS

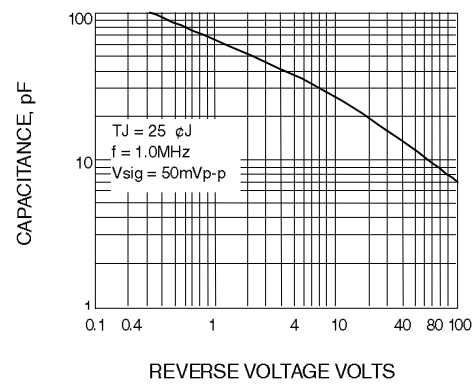


Fig. 4-TYPICAL JUNCTION CAPACITANCE

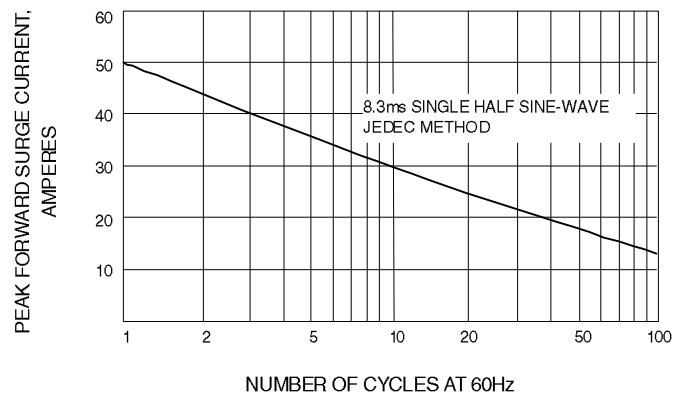


Fig. 5-MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT