

SCHOTTKY BARRIER RECTIFIERS

VOLTAGE RANGE: 30 --- 100 V
CURRENT: 8.0 A

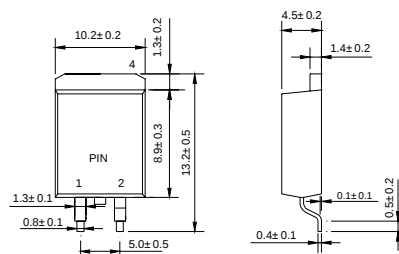
FEATURES

- ◇ Metal-Semiconductor junction with guard ring
- ◇ Epitaxial construction
- ◇ Low forward voltage drop, low switching losses
- ◇ High surge capability
- ◇ For use in low voltage, high frequency inverters free wheeling, and polarity protection applications
- ◇ The plastic material carries U/L recognition 94V-0

MECHANICAL DATA

- ◇ Case: JEDEC D²PAK, molded plastic
- ◇ Terminals: Solderable per MIL-STD-750, Method 2026
- ◇ Polarity: As marked
- ◇ Weight: 0.052 ounces, 1.47 grams
- ◇ Mounting position: Any

D²PAK



Dimensions in millimeters

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Ratings at 25°C ambient temperature unless otherwise specified.

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

		SBLB 830	SBLB 835	SBLB 840	SBLB 845	SBLB 850	SBLB 860	SBLB 870	SBLB 880	SBLB 890	SBLB 8100	UNITS
Maximum recurrent peak reverse voltage	V _{RRM}	30	35	40	45	50	60	70	80	90	100	V
Maximum RMS voltage	V _{RMS}	21	25	28	32	35	42	49	56	63	70	V
Maximum DC blocking voltage	V _{DC}	30	35	40	45	50	60	70	80	90	100	V
Maximum average forward rectified current T _C =95°C	I _{F(AV)}	8.0										A
Peak forward surge current 8.3ms single half-sine-wave superimposed on rated load T _J =125°C	I _{FSM}	200										A
Maximum instantaneous forward voltage @ 8.0A	V _F	0.55				0.70		0.85				V
Maximum reverse current @T _C =25°C at rated DC blocking voltage @T _C =100°C	I _R	0.5 55										mA
Typical thermal resistance (Note1)	R _{θJC}	6.9										°C/W
Operating junction temperature range	T _J	-55--- + 150										°C
Storage temperature range	T _{STG}	-55--- + 150										°C

Note: 1. Thermal resistance junction to case.

FIG.1 – PEAK FORWARD SURGE CURRENT

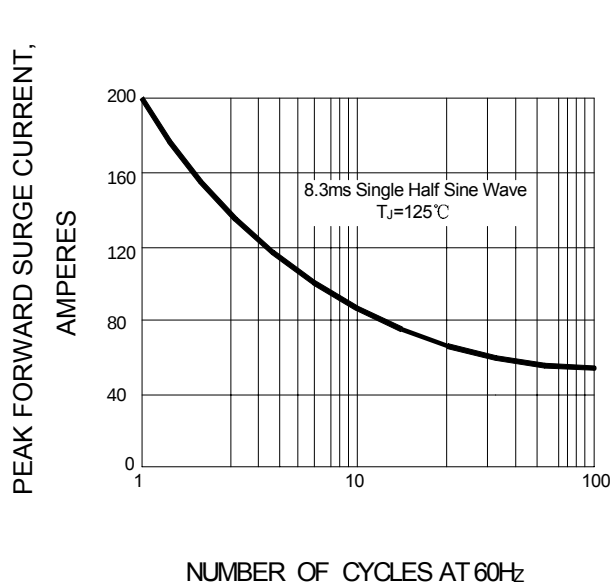


FIG.2 – FORWARD DERATING CURVE

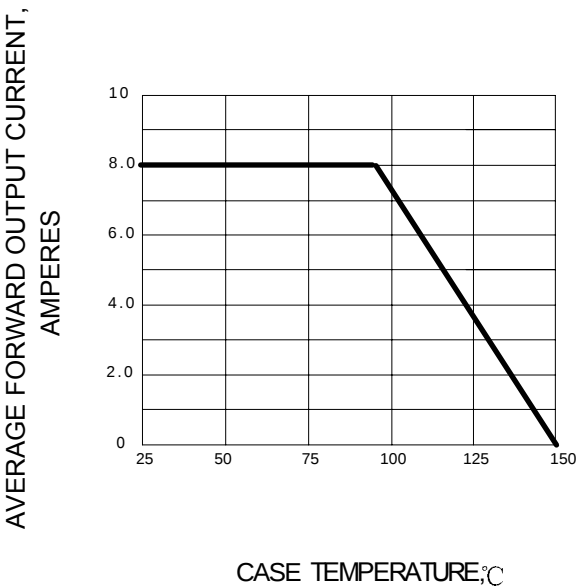


FIG.3 – TYPICAL FORWARD CHARACTERISTIC

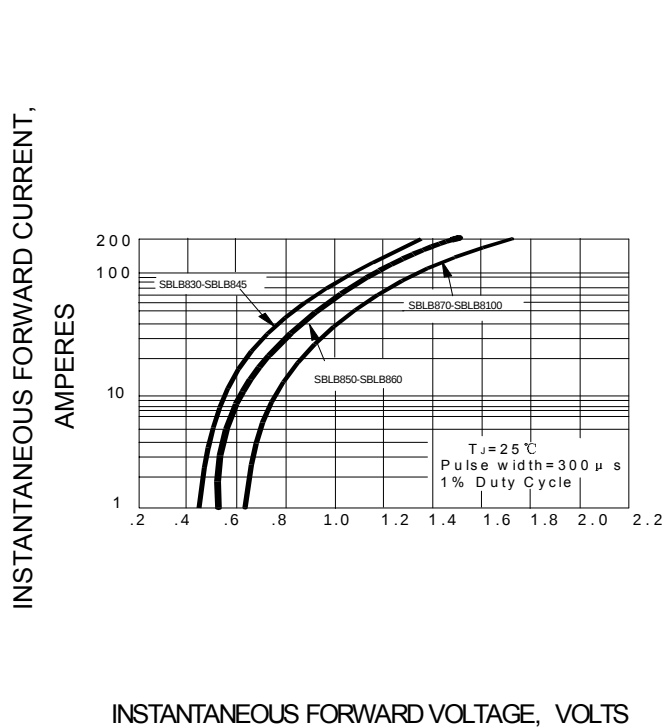


FIG.4 – TYPICAL REVERSE CHARACTERISTIC

