

**SCHOTTKY BARRIER RECTIFIERS**

**VOLTAGE RANGE: 30 --- 100 V**  
**CURRENT: 25 A**

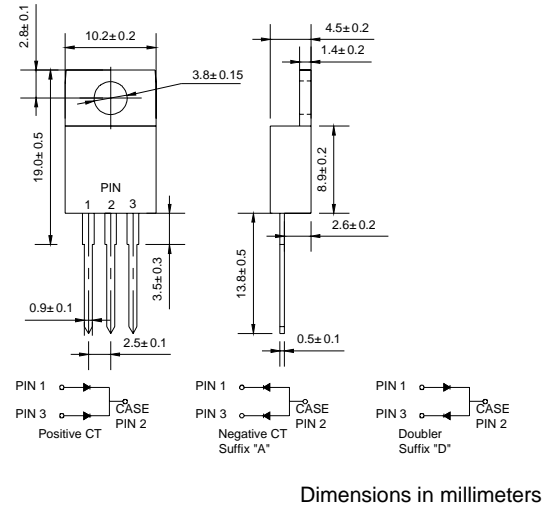
**FEATURES**

- ◇ 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 TO-220AB, molded plastic
- ◇ Terminals: Solderable per MIL-STD-750, Method 2026
- ◇ Polarity: As marked
- ◇ Weight: 0.071 ounce, 2.006 grams
- ◇ Mounting position: Any

**TO-220AB**



**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

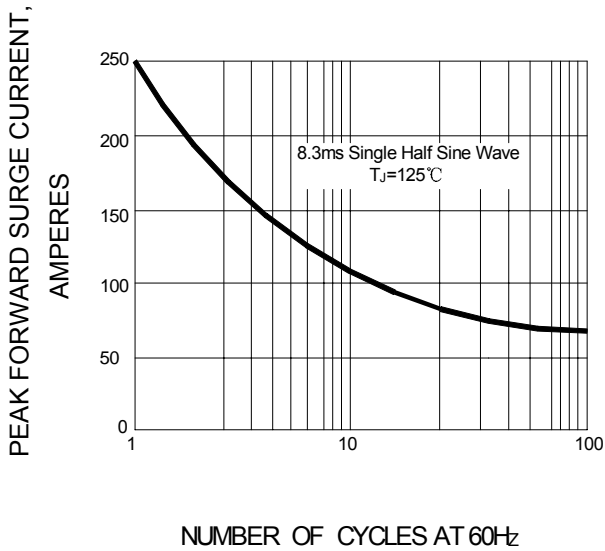
Ratings at 25°C ambient temperature unless otherwise specified.

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

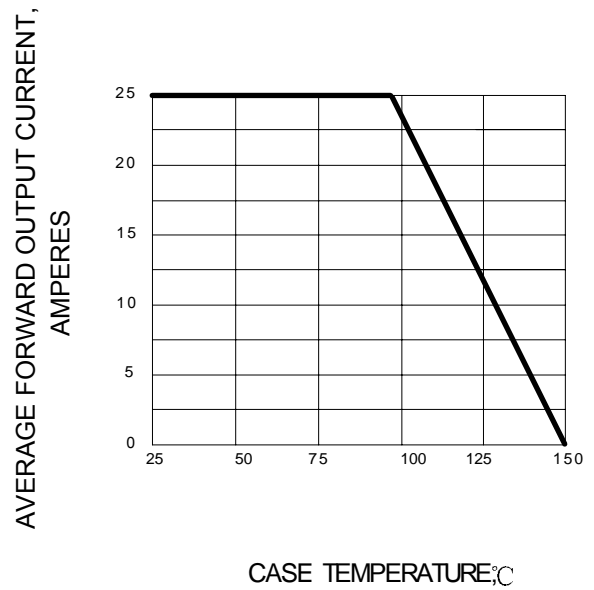
		SBL	SBL	SBL	SBL	SBL	SBL	SBL	SBL	UNITS
		2530CT	2535CT	2540CT	2545CT	2550CT	2560CT	2580CT	25100CT	
Maximum recurrent peak reverse voltage	$V_{RRM}$	30	35	40	45	50	60	80	100	V
Maximum RMS voltage	$V_{RMS}$	21	25	28	32	35	42	56	70	V
Maximum DC blocking voltage	$V_{DC}$	30	35	40	45	50	60	80	100	V
Maximum average forward rectified current $T_C=95^\circ\text{C}$	$I_{F(AV)}$	25								A
Peak forward surge current 8.3ms single half-sine-wave superimposed on rated load $T_J=125^\circ\text{C}$	$I_{FSM}$	250								A
Maximum instantaneous forward voltage @ 12.5 A	$V_F$	0.57			0.75		0.85			V
Maximum reverse current @ $T_C=25^\circ\text{C}$ at rated DC blocking voltage @ $T_C=100^\circ\text{C}$	$I_R$	1.0 50								mA
Typical thermal resistance (Note1)	$R_{\theta JC}$	2.0								$^\circ\text{C}/\text{W}$
Operating junction temperature range	$T_J$	-55 --- + 150								$^\circ\text{C}$
Storage temperature range	$T_{STG}$	-55 --- + 150								$^\circ\text{C}$

Note: 1. Thermal resistance junction to case.

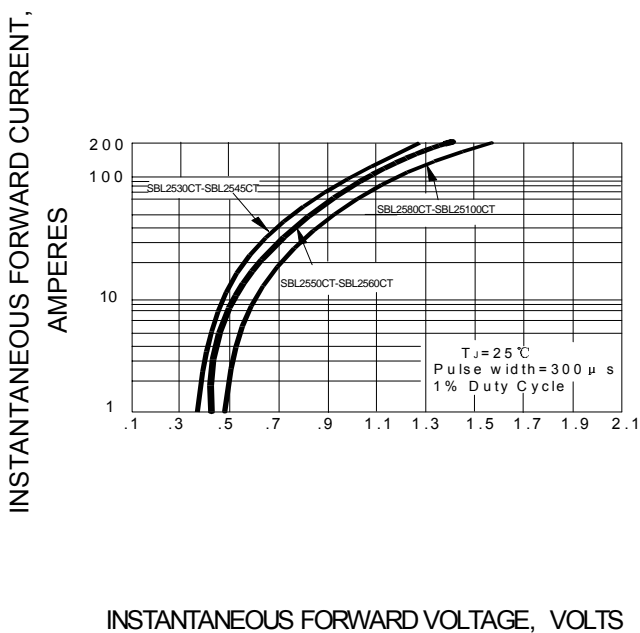
**FIG.1 – PEAK FORWARD SURGE CURRENT**



**FIG.2 – FORWARD DERATING CURVE**



**FIG.3 – TYPICAL FORWARD CHARACTERISTIC**



**FIG.4 – TYPICAL REVERSE CHARACTERISTIC**

