



# DATA SHEET

## SB620CT~SB660CT

### SCHOTTKY BARRIER RECTIFIERS

VOLTAGE 20 to 60 Volts CURRENT - 6 Ampere

#### FEATURES

- Plastic package has Underwriters Laboratory Flammability Classification 94V-O utilizing Flame Retardant Epoxy Molding Compound.
- Exceeds environmental standards of MIL-S-19500/228
- Low power loss, high efficiency.
- Low forward voltage, high current capability
- High surge capacity.
- For use in low voltage, high frequency inverters free wheeling, and polarity protection applications.

#### MECHANICAL DATA

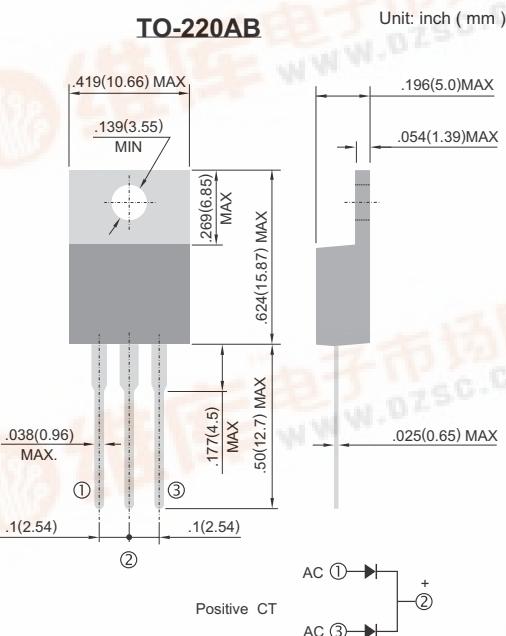
Case: TO-220AB full molded plastic package

Terminals: Lead solderable per MIL-STD-202, Method 208

Polarity: As marked.

Mounting Position: Any

Weight: 0.08 ounces, 2.24grams.



#### 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 current by 20%

	SB620CT	SB630CT	SB640CT	SB650CT	SB660CT	UNITS
Maximum Recurrent Peak Reverse Voltage	20	30	40	50	60	V
Maximum RMS Voltage	14	21	28	35	42	V
Maximum DC Blocking Voltage	20	30	40	50	60	V
Maximum Average Forward Rectified Current at Tc=75°C				6.0		A
Peak Forward Surge Current, 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)				75		A
Maximum Forward Voltage at 3.0A per element	0.55			0.70		V
Maximum DC Reverse Current at Tc=25°C DC Blocking Voltage per element Tc=100°C			0.1 15			mA
Typical Thermal Resistance Note R <sub>θJC</sub> R <sub>θJA</sub>			6.0 80			°C/W
Operating and Storage Temperature Range			-50 to +125			°C
Storage Temperature Range			-50 to +150			°C

#### NOTES:

1. Thermal Resistance Junction to Ambient .



## RATING AND CHARACTERISTIC CURVES

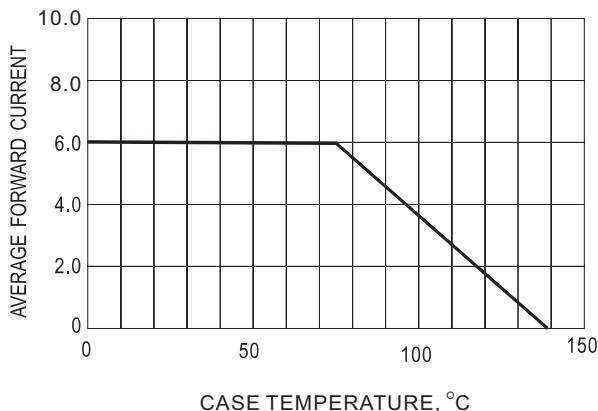


Fig.1- FORWARD CURRENT DERATING CURVE

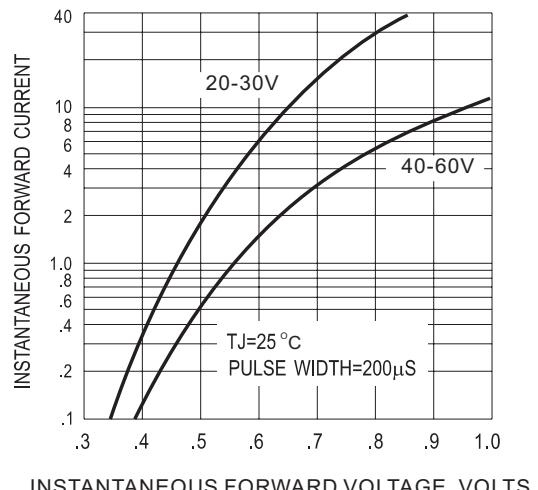


Fig.2- TYPICAL INSTANTANEOUS FORWARD CHARACTERISTIC

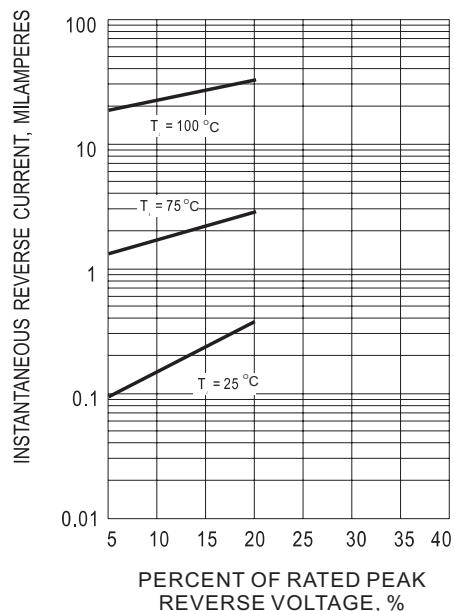


Fig.3- TYPICAL REVERSE CHARACTERISTIC

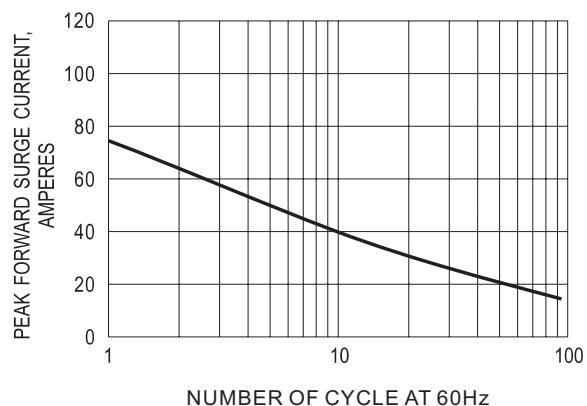


Fig.4- MAXIMUM NON-REPETITIVE SURGE CURRENT

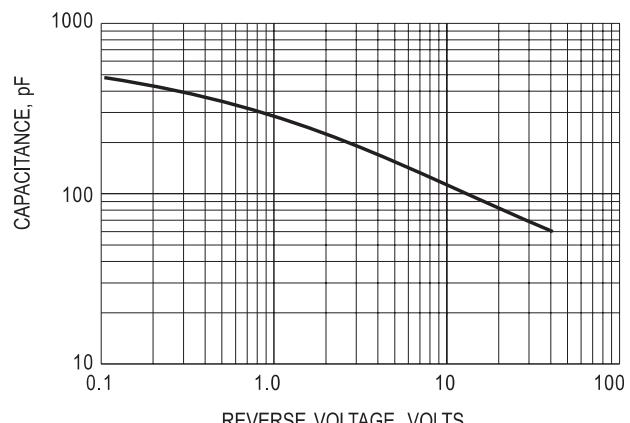


Fig.5- TYPICAL JUNCTION CAPACITANCE