



SB1620C THRU SB1660C SCHOTTKY BARRIER RECTIFIER

TECHNICAL
SPECIFICATION

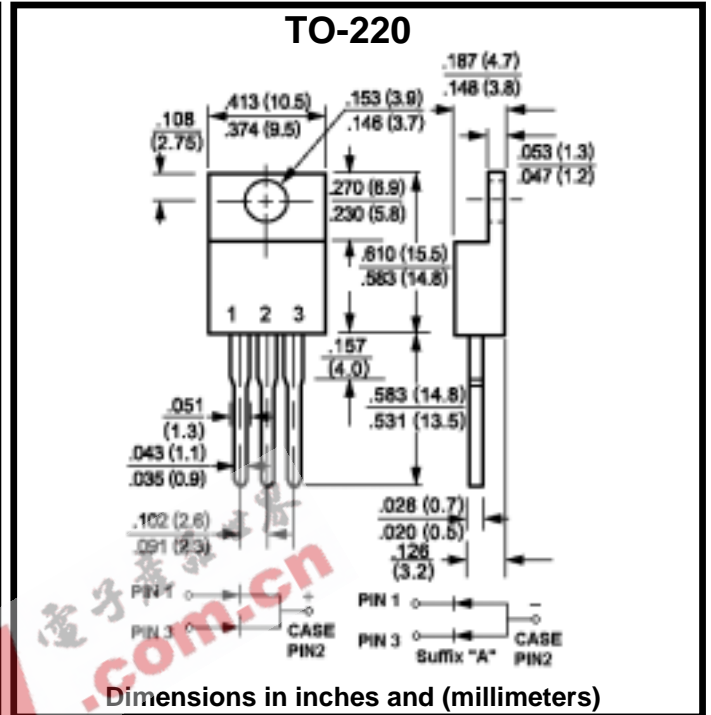
VOLTAGE: 20 TO 60V CURRENT: 16A

FEATURES

- Epitaxial construction for chip
- High current capability
- Low forward voltage drop
- Low power loss, high efficiency
- High surge capability
- High temperature soldering guaranteed:
250°C/10sec/0.375"(9.5mm) lead length
at 5 lbs tension

MECHANICAL DATA

- Terminal: Plated leads solderable per
MIL-STD 202E, method 208C
- Case: Molded with UL-94 Class V-O
recognized flame retardant epoxy
- Polarity: Common cathode, Suffix "A" Common anode
- Mounting position: Any



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

(Single-phase, half-wave, 60Hz, resistive or inductive load rating at 25°C, unless otherwise stated, for capacitive load, derate current by 20%)

RATINGS	SYMBOL	SB 1620C	SB 1630C	SB 1635C	SB 1640C	SB 1650C	SB 1660C	UNITS
Maximum Repetitive Peak Reverse Voltage	V_{RRM}	20	30	35	40	50	60	V
Maximum RMS Voltage	V_{RMS}	14	21	25	28	35	42	V
Maximum DC Blocking Voltage	V_{DC}	20	30	35	40	50	60	V
Maximum Average Forward Rectified Current ($T_C=95^\circ\text{C}$)	$I_{F(AV)}$	16						A
Peak Forward Surge Current (8.3ms single half sine-wave superimposed on rated load)	I_{FSM}	150						A
Maximum Forward Voltage (at 8.0A DC)	V_F	0.65				0.75		V
Maximum DC Reverse Current (at rated DC blocking voltage)	I_R	5.0 50.0						mA mA
Typical Junction Capacitance (Note 1)	C_J	700				500		pF
Typical Thermal Resistance (Note 2)	$R_{\theta(ja)}$	3						$^\circ\text{C}/\text{W}$
Operating Junction Temperature	T_J	-65 to +125				-65 to +150		$^\circ\text{C}$
Storage Temperature	T_{STG}	-65 to +150						$^\circ\text{C}$

Note:

1. Measured at 1.0 MHz and applied reverse voltage of $4.0V_{dc}$
2. Thermal resistance from junction to case
3. Suffix "A" common anode