

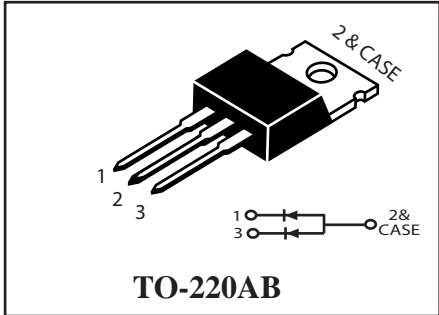
### High Voltage Power Schottky Rectifier

**(Pb)** Lead(Pb)-Free

#### Features:

- \*Plastic Package Has Underwriters Laboratory Flammability Classifications 94V-0.
- \*Metal Silicon Junction, Majority Carrier Conduct.
- \*Low Reverse Leakage Current.
- \*Avalanche Capability Specified

**HIGH VOLTAGE  
SCHOTTKY  
6 AMPERES  
200 VOLTS**

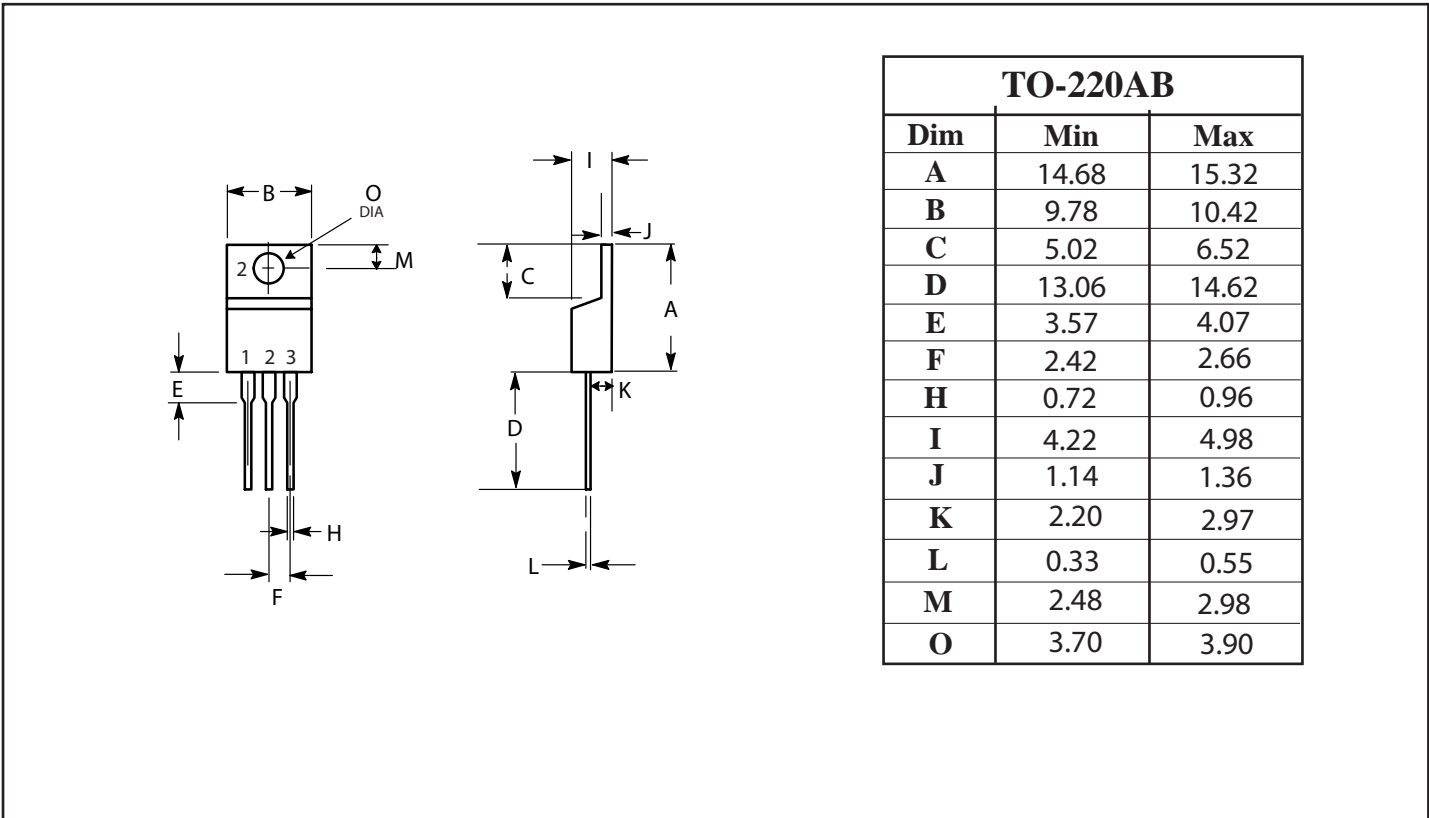


#### Mechanical Data:

- \*Case: JEDEC TO-220AB Molded Plastic Body.
- \*Terminals: Plastic Leads, Solderable per MIL-STD-750, Meldod 2026.
- \*High Temperature Soldering Guaranteed: 250°C/10 seconds, 0.25" (6.35mm) from Case.
- \*Polarity: As Marked
- \*Mounting Position: Any
- \*Mounting Torque: 10 in-lbs Maximum
- \*Weight: 2.24grams

### TO-220AB Outline Dimensions

Unit:mm



## Maximum Rating

| Characteristic  | Symbol          | Value        | UNIT                        |
|---|-----------------|--------------|-----------------------------|
| Peak Repetitive Reverse Voltage   | $V_{RRM}$       | 200          | V                           |
| Working Peak Reverse Voltage  | $V_{RWM}$       |              |                             |
| DC Blocking Voltage   | $V_R$           |              |                             |
| Average Rectifier Forward Current at $T_c=125^{\circ}\text{C}$<br>per Diode<br>per Device                     | $I_F(AV)$       | 3<br>6       | A                           |
| Non-Repetitive Peak Square Current<br>(Surge Applied at Rated Load Condition<br>Halfwave, Single Phase, 60Hz) | $I_{FSM}$       | 75           | A                           |
| Maximum Thermal Resistance, Junction to Case  | $R_{\theta JC}$ | 3.0          | $^{\circ}\text{C}/\text{W}$ |
| Voltage Rate of Change (rated $V_R$ )   | $dv/dt$         | 1000         | $\text{V}/\mu\text{s}$      |
| Operating Junction Temperature Range  | $T_J$           | -65 to + 150 | $^{\circ}\text{C}$          |
| Storage Temperature Range   | $T_{STG}$       | -65 to + 150 | $^{\circ}\text{C}$          |

## Electrical Characteristic (1) (per Diode)

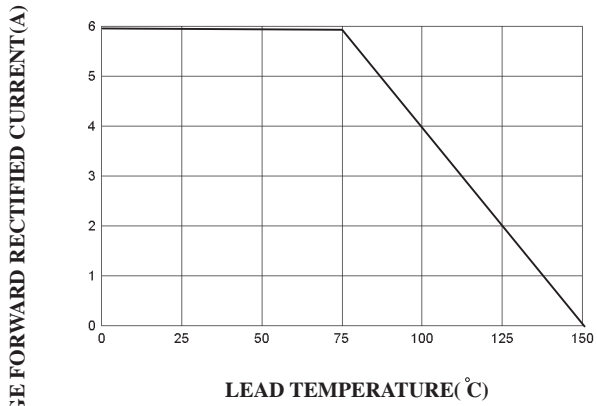
| Characteristic   | Symbol | Value        | UNIT |
|--|--------|--------------|------|
| Maximum Instantaneous Forward Voltage<br>at $I_F=3\text{A}, T_C=25^{\circ}\text{C}$<br>at $I_F=3\text{A}, T_C=125^{\circ}\text{C}$       | $V_F$  | 0.95<br>0.85 | V    |
| Maximum Instantaneous Reverse Current<br>(Rated DC Voltage, $T_c=25^{\circ}\text{C}$ )<br>(Rated DC Voltage, $T_c=125^{\circ}\text{C}$ ) | $I_R$  | 0.1<br>5.0   | mA   |

## Device Marking

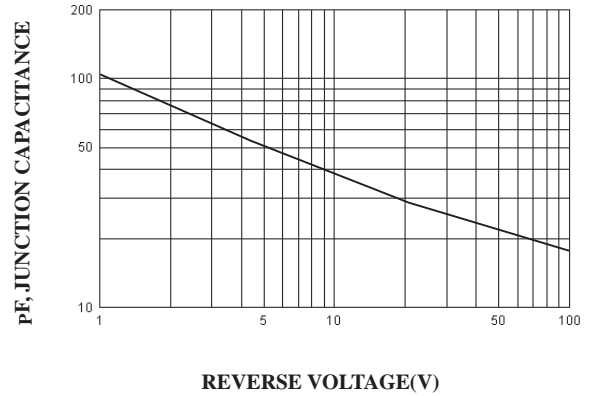
WSB06200AT=D0620

Note:

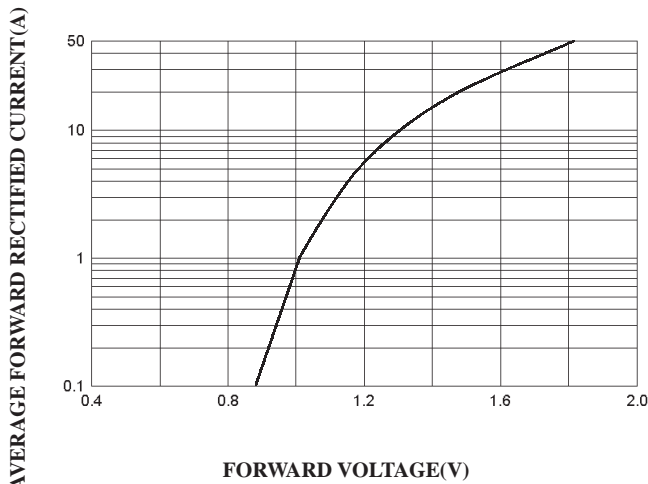
1. Pulse test: 300us pulse width, 1% duty cycle



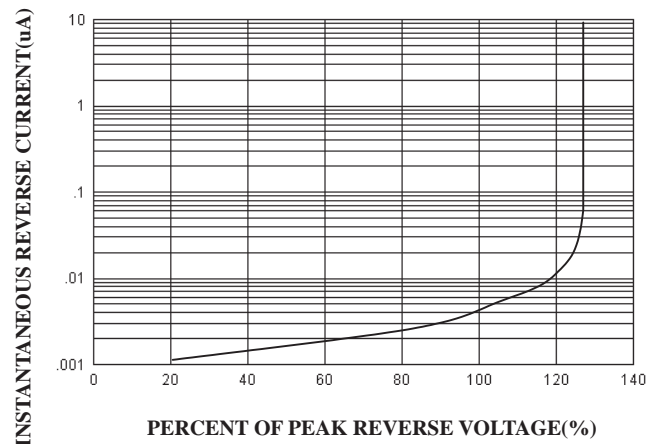
**FIG.1 Forward Current Derating Curve**



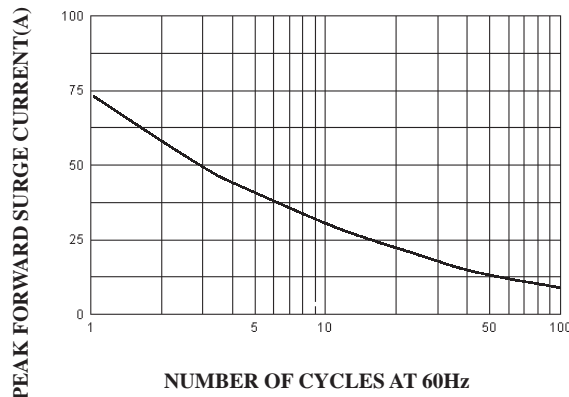
**FIG.2 Typical Junction Capacitance**



**FIG.3 Typical Forward Characteristics**



**FIG.4 Typical Reverse Characteristics**



**FIG.5 Peak Forward Surge Current**