



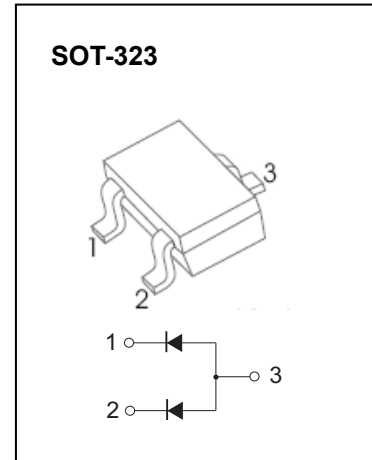
SOT-323 Plastic-Encapsulate Diodes

BAW56W SWITCHING DIODE

FEATURES

- Fast Switching Speed
- For General Purpose Switching Applications
- High Conductance

MARKING: KJC



Maximum Ratings @Ta=25°C

| Parameter | Symbol | Limit | Unit |
|--|-----------------|------------|------|
| Non-Repetitive Peak Reverse Voltage | V_{RM} | 100 | V |
| Peak Repetitive Peak Reverse Voltage | V_{RRM} | 75 | V |
| Working Peak Reverse Voltage | V_{RWM} | | |
| DC Blocking Voltage | V_R | | |
| RMS Reverse Voltage | $V_{R(RMS)}$ | 53 | V |
| Forward Continuous Current | I_{FM} | 300 | mA |
| Average Rectified Output Current | I_O | 150 | mA |
| Peak Forward Surge Current @t=1.0μs @t=1.0s | I_{FSM} | 2.0 1.0 | A |
| Power Dissipation | P_d | 200 | mW |
| Thermal Resistance Junction to Ambient | $R_{\theta JA}$ | 625 | °C/W |
| Junction Temperature | T_j | 150 | °C |
| Storage Temperature | T_{STG} | -55~+150 | °C |

Electrical Ratings @Ta=25°C

| Parameter | Symbol | Min | Typ | Max | Unit | Conditions |
|-------------------------------|------------|-----|-----|-------|------|---|
| Reverse breakdown voltage | $V_{(BR)}$ | 75 | | | V | $I_R=2.5\mu A$ |
| Forward voltage | V_{F1} | | | 0.715 | V | $I_F=1mA$ |
| | V_{F2} | | | 0.855 | V | $I_F=10mA$ |
| | V_{F3} | | | 1.0 | V | $I_F=50mA$ |
| | V_{F4} | | | 1.25 | V | $I_F=150mA$ |
| Reverse current | I_{R1} | | | 2.5 | μA | $V_R=75V$ |
| | I_{R2} | | | 25 | nA | $V_R=20V$ |
| Capacitance between terminals | C_T | | | 2 | pF | $V_R=0V, f=1MHz$ |
| Reverse recovery time | t_{rr} | | | 4 | ns | $I_F=I_R=10mA$ $I_{rr}=0.1XI_R, R_L=100\Omega$ |