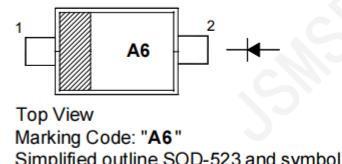


FEATURES

- Small Package
- Low Reverse Current
- Fast Switching Speed
- Surface Mount Package Ideally Suited for Automatic Insertion


PINNING

| PIN | DESCRIPTION |
|-----|-------------|
| 1 | Cathode |
| 2 | Anode |

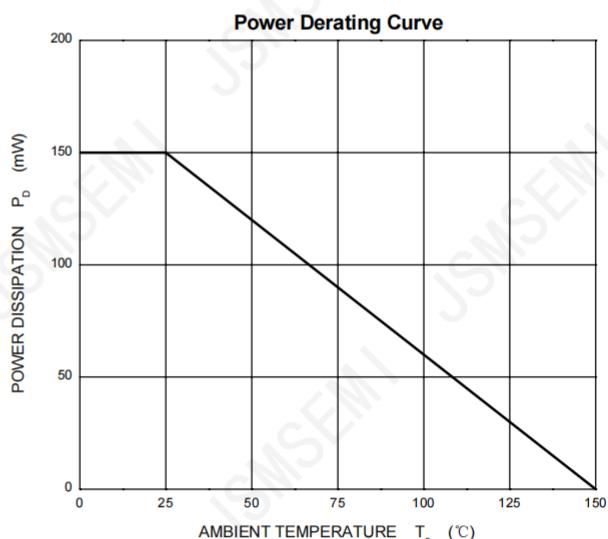
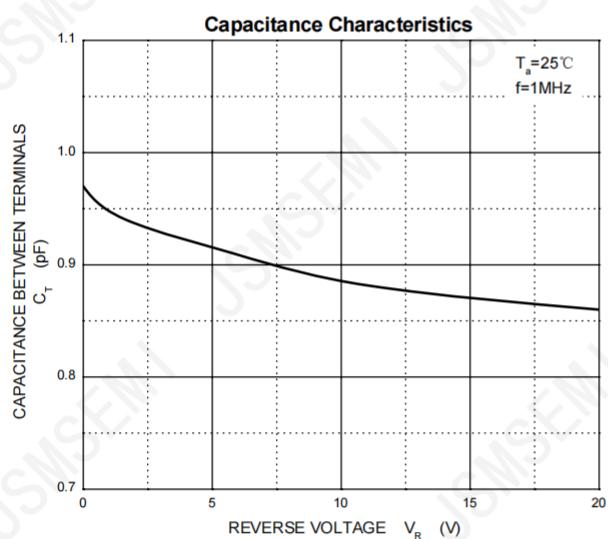
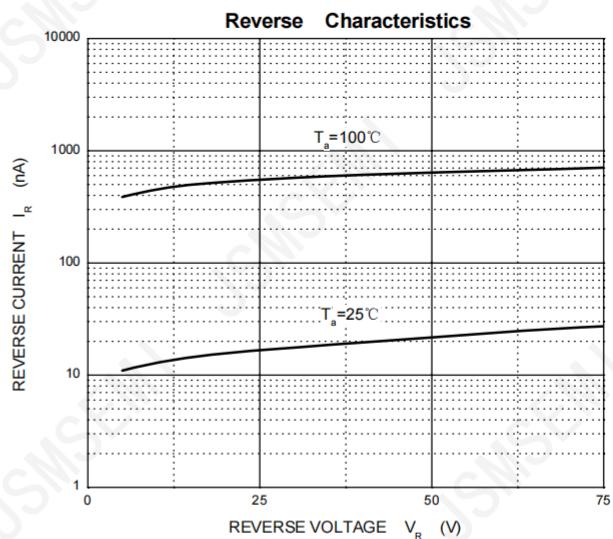
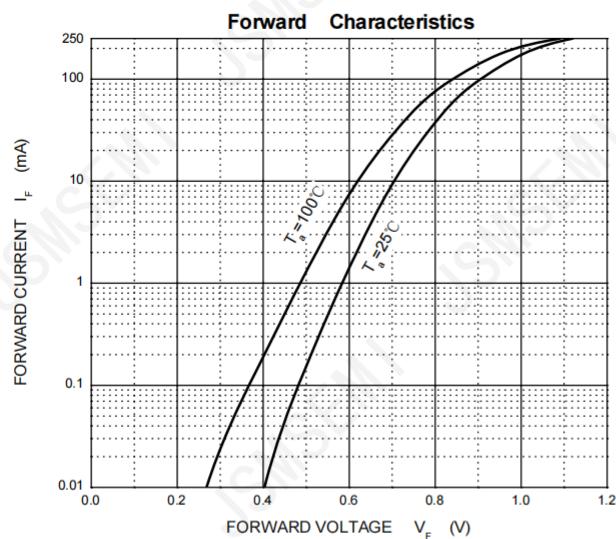
MAXIMUM RATINGS ($T_a=25^\circ\text{C}$ unless otherwise noted)

| Symbol | Parameter | Value | Unit |
|---------------------|---|----------|------|
| V_{RM} | Non-Repetitive Peak Reverse Voltage | 100 | V |
| V_{RRM} | Peak Repetitive Reverse Voltage | 75 | V |
| V_{RWM} | Working Peak Reverse Voltage | | |
| $V_{R(\text{RMS})}$ | RMS Reverse Voltage | 53 | V |
| I_o | Average Rectified Output Current | 250 | mA |
| I_{FSM} | Peak Forward Surge Current @ $t=1\mu\text{s}$ | 4 | A |
| | Peak Forward Surge Current @ $t=1\text{s}$ | 0.5 | A |
| P_D | Power Dissipation | 150 | mW |
| $R_{\Theta JA}$ | Thermal Resistance from Junction to Ambient | 833 | °C/W |
| T_j | Junction Temperature | 150 | °C |
| T_{stg} | Storage Temperature | -55~+150 | °C |

ELECTRICAL CHARACTERISTICS($T_a=25^\circ\text{C}$ unless otherwise specified)

| Parameter | Symbol | Test conditions | Min | Typ | Max | Unit |
|-----------------------|-------------------|---|-----|-----|-------|------|
| Reverse voltage | $V_{(\text{BR})}$ | $I_R=100\mu\text{A}$ | 75 | | | V |
| Reverse current | I_R | $V_R=25\text{V}$ | | | 30 | nA |
| | | $V_R=75\text{V}$ | | | 1 | μA |
| Forward voltage | V_F | $I_F=1\text{mA}$ | | | 0.715 | V |
| | | $I_F=10\text{mA}$ | | | 0.855 | V |
| | | $I_F=50\text{mA}$ | | | 1 | V |
| | | $I_F=150\text{mA}$ | | | 1.25 | V |
| Total capacitance | C_{tot} | $V_R=0\text{V}, f=1\text{MHz}$ | | | 1 | pF |
| Reverse recovery time | t_{rr} | $I_F = I_R = 10\text{mA}, I_{\text{rr}}=0.1*I_R, R_L=100\Omega$ | | | 4 | ns |

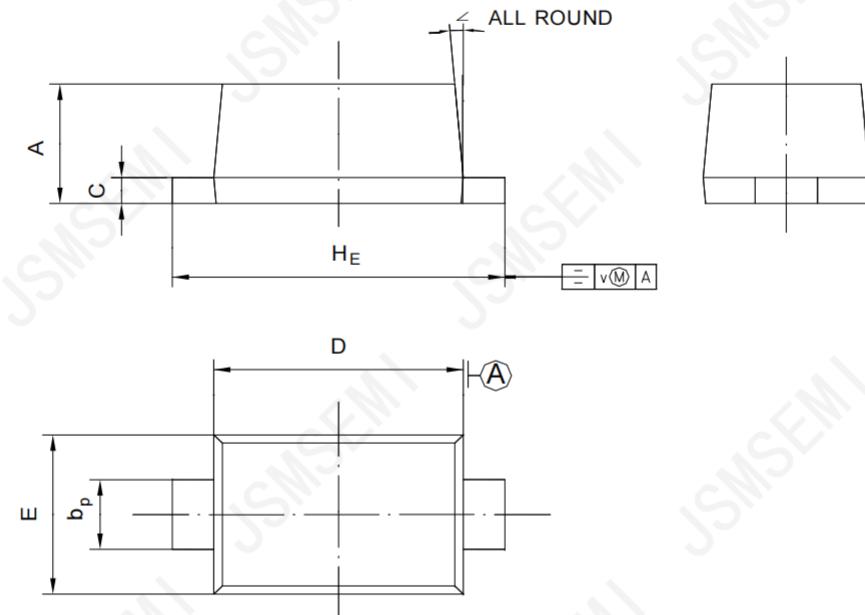
Typical Characteristics



PACKAGE OUTLINE

Plastic surface mounted package; 2 leads

SOD-523



| UNIT | A | b_p | C | D | E | H_E | V | \angle |
|------|--------------|------------|----------------|--------------|--------------|------------|-----|----------|
| mm | 0.70 0.60 | 0.4 0.3 | 0.135 0.100 | 1.25 1.15 | 0.85 0.75 | 1.7 1.5 | 0.1 | 5° |

Revision History

| Rev. | Change | Date |
|------|-----------------|-----------|
| V1.0 | Initial version | 2/23/2024 |
| | | |

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