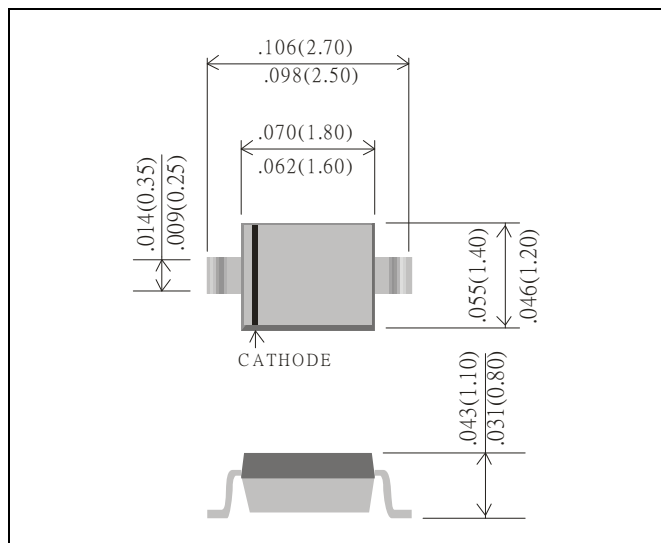


0.5A SURFACE MOUNT SCHOTTKY BARRIER



CASE : SOD-323

DIMENSIONS IN INCHES AND (MILLIMETERS)

FEATURES

- FAST SWITCHING SPEED
- HIGH CONDUCTOR
- SURFACE MOUNT PACKAGE IDEALLY SUITED FOR AUTOMATIC INSERTION
- ELECTRICAL IDENTICAL STANDARD JEDEC
- BOTH PB FREE AND HALOGEN FREE ARE AVAILABLE

MECHANICAL DATA

- CASE : SOD-323, PLASTIC
- TERMINALS : SOLDERABLE PER MIL-STD-202, METHOD 208

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

RATINGS AT 25°C AMBIENT TEMPERATURE UNLESS OTHERWISE SPECIFIED.

| PARAMETER | SYMBOL | SS0540WG | UNITS |
|---|-----------------|-----------|-------|
| DC BLOCKING VOLTAGE | V_R | 40 | V |
| RMS REVERSE VOLTAGE | V_{RMS} | 28 | V |
| PEAK REPETITIVE PEAK REVERSE VOLTAGE | V_{RRM} | 40 | V |
| NON-REPETITIVE REVERSE VOLTAGE | V_{RM} | 40 | V |
| RECTIFIED CURRENT (AVERAGE), HALF WAVE RECTIFICATION WITH RESISTIVE LOAD AND $f \geq 60\text{Hz}$ | I_O | 0.5 | A |
| PEAK FORWARD SURGE CURRENT, 8.3ms SINGLE HALF SINE-WAVE SUPERIMPOSED ON RATED LOAD | I_{FSM} | 25 | A |
| POWER DISSIPATION | P_d | 200 | mW |
| THERMAL RESISTANCE | $R_{\theta JA}$ | 600 | °C/W |
| | $R_{\theta JC}$ | 200 | |
| OPERATING JUNCTION TEMPERATURE | T_J | -65~ +150 | °C |
| STORAGE TEMPERATURE | T_{STG} | -65~ +150 | °C |

ELECTRICAL CHARACTERISTICS (AT $T_A = 25^\circ\text{C}$ UNLESS OTHERWISE NOTED)

| PARAMETER | SYMBOL | SS0540WG | UNITS |
|----------------------------|--------|-------------------|-------|
| MAXIMUM FORWARD VOLTAGE | V_F | $I_F=0.5\text{A}$ | 0.51 |
| | | $I_F=1.0\text{A}$ | 0.62 |
| MAXIMUM DC REVERSE CURRENT | I_R | 100 | uA |
| DIODE CAPACITANCE | C_J | 170 | pF |

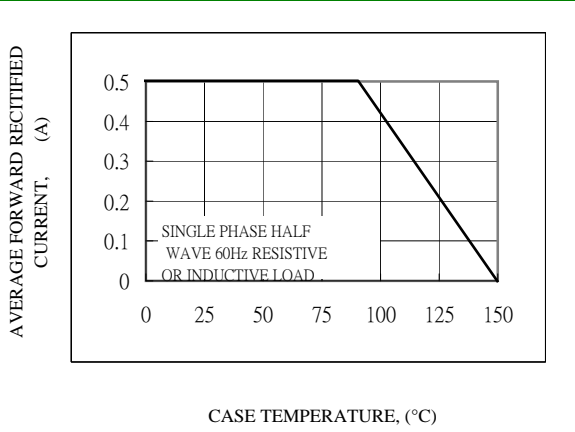


Fig. 1-FORWARD CURRENT DERATING CURVE

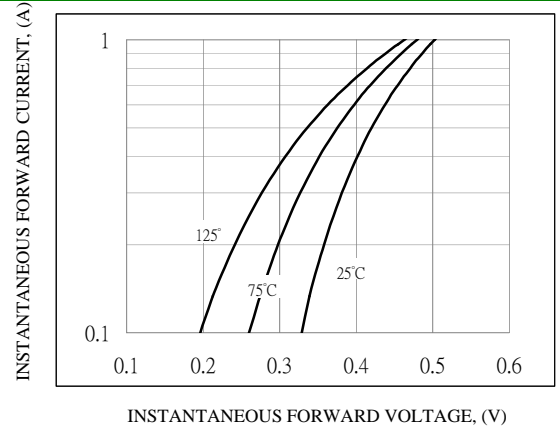


Fig. 2- TYPICAL INSTANTANEOUS FORWARD CHARACTERISTIC

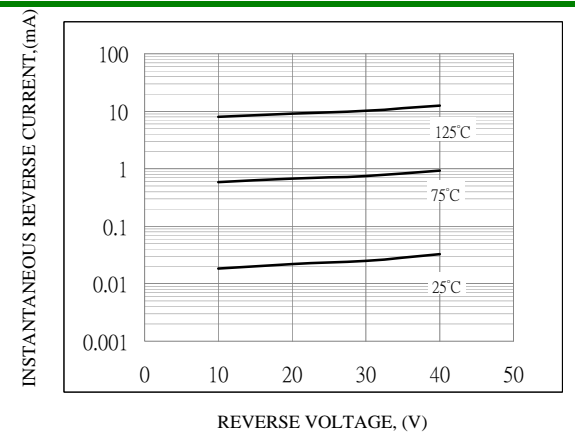


Fig. 3-TYPICAL REVERSE CHARACTERISTICS

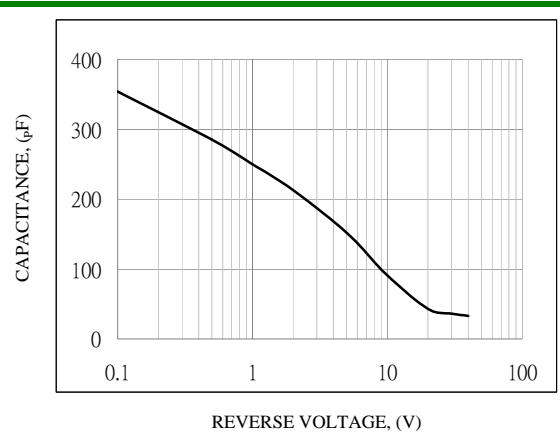


Fig. 4-TYPICAL JUNCTION CHARACTERISTIC