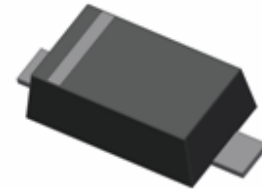
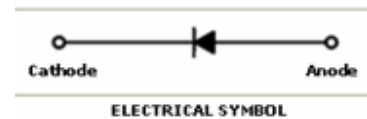


200mW SOD-523 SURFACE MOUNT Very Small Outline Flat Lead Plastic Package Schottky Barrier Diode

Green Product



SOD-523 Flat Lead



Absolute Maximum Ratings T_A = 25°C unless otherwise noted

| Symbol | Parameter | Value | Units |
|--------------------|-----------------------------------|-------------|-------|
| P _D | Power Dissipation | 200 | mW |
| T _{STG} | Storage Temperature Range | -65 to +125 | °C |
| T _J | Operating Junction Temperature | +125 | °C |
| V _{RRM} | Repetitive Peak Reverse Voltage | 30 | V |
| V _R | Maximum DC Blocking Voltage | 30 | V |
| I _{F(AV)} | Average Forward Rectified Current | 200 | mA |
| I _{FSM} | Peak Forward Surge Current | 4 | A |

These ratings are limiting values above which the serviceability of the diode may be impaired.

Specification Features:

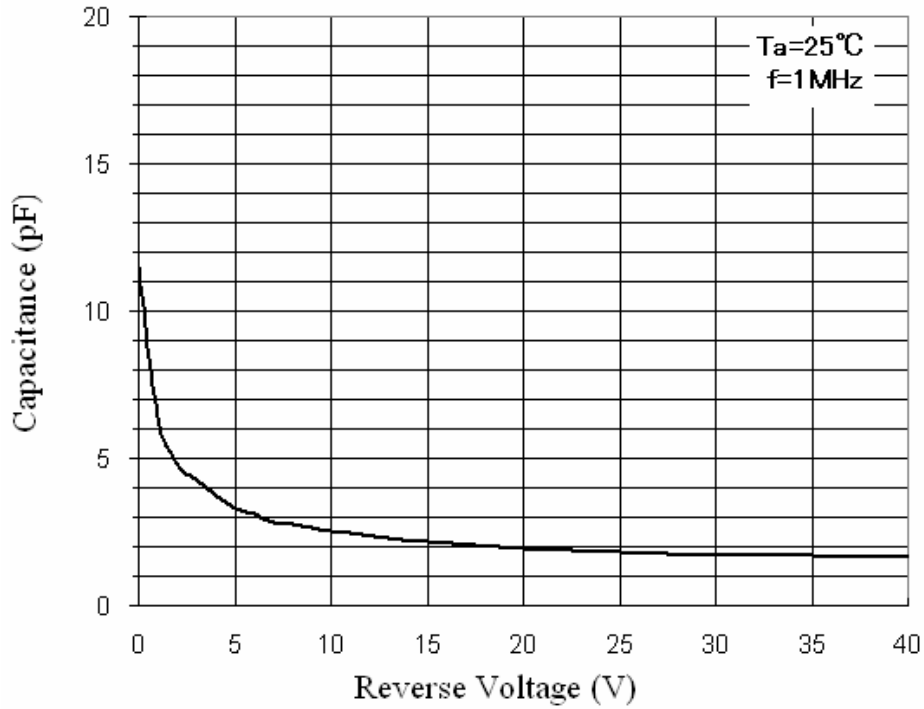
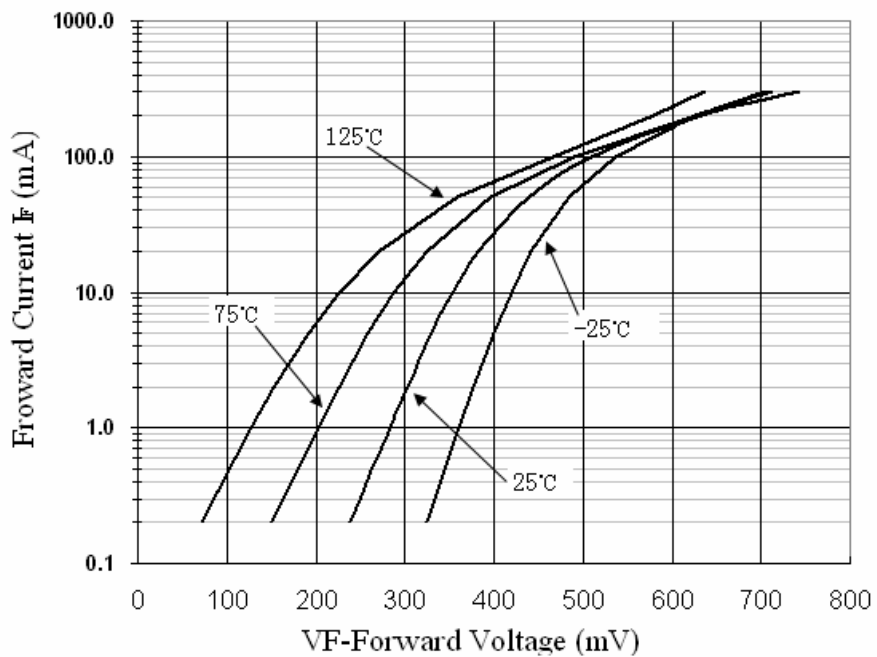
- Low Forward Voltage Drop
- Flat Lead SOD-523 Small Outline Plastic Package
- Extremely Small SOD-523 Package
- Surface Device Type Mounting
- RoHS Compliant
- Green EMC
- Matte Tin(Sn) Lead Finish
- Band Indicates Cathode

DEVICE MARKING CODES:

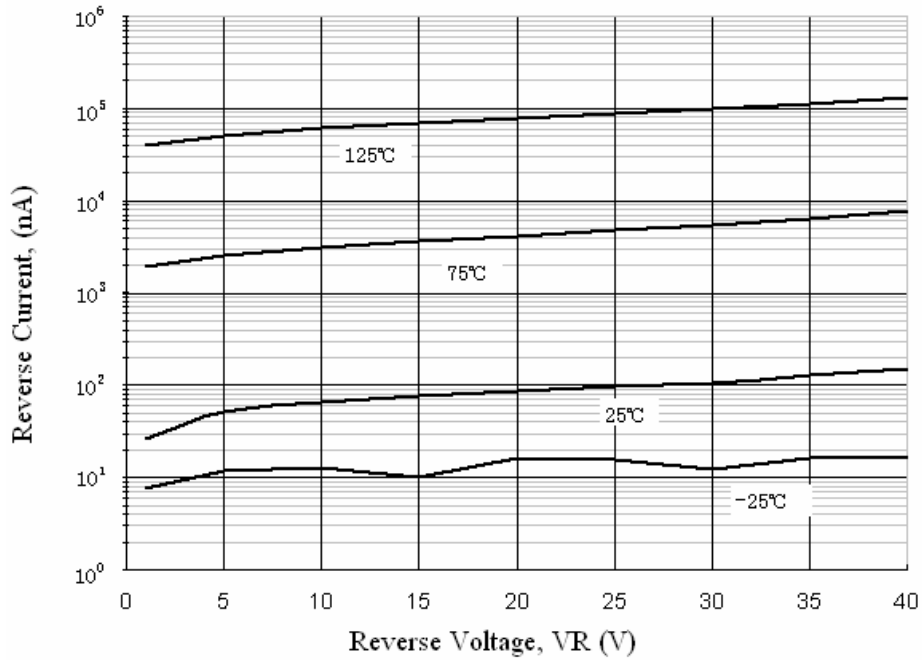
| Device Type | Device Marking |
|-------------|----------------|
| BAT54XV2 | 5B |

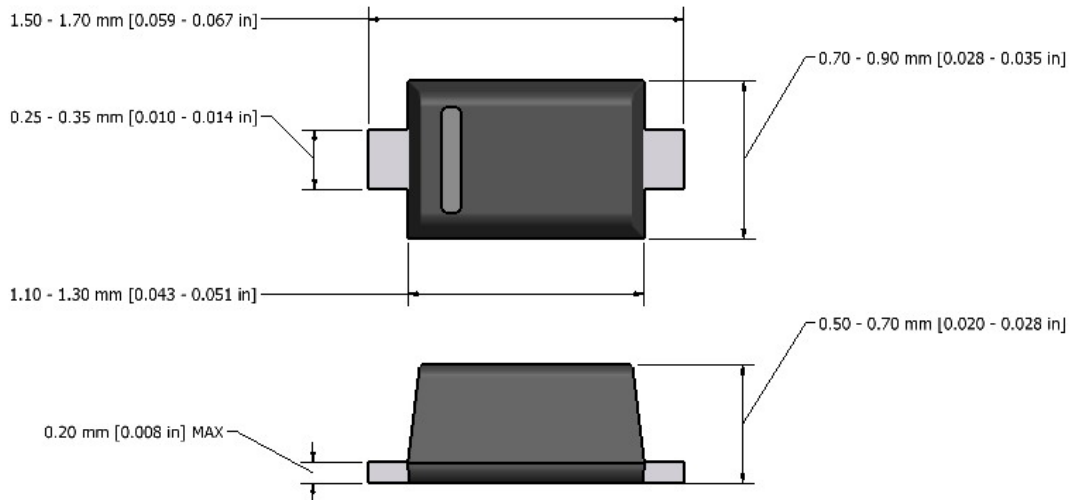
Electrical Characteristics T_A = 25°C unless otherwise noted

| Symbol | Parameter | Test Condition | Limits | | Unit |
|-----------------|-------------------------|---|--------|--------------------------------------|-------|
| | | | Min | Max | |
| B _V | Breakdown Voltage | I _R =10μA | 30 | | Volts |
| I _R | Reverse Leakage Current | V _R =25V | | 2 | uA |
| V _F | Forward Voltage | I _F =0.1mA I _F =1mA I _F =10mA I _F =30mA I _F =100mA | | 0.24 0.32 0.40 0.50 0.80 | Volts |
| T _{RR} | Reverse Recovery Time | I _F =I _R =10mA R _L =100Ω I _{RR} =1mA | | 5 | nS |
| C | Capacitance | V _R =1V, f=1MHz | | 10 | pF |

Typical Performance Characteristics
Total Capacitance

Forward Voltage vs Ambient Temperature


Reverse Current vs Reverse Voltage




Flat Lead SOD-523 Package Outline

This datasheet presents technical data of Tak Cheong's Schottky Barrier Diodes. Complete specifications for the individual devices are provided in the form of datasheets. A comprehensive Selector Guide is included to simplify the task of choosing the best set of components required for a specific application. For additional information, please visit our website <http://www.takcheong.com>.

Although information in this datasheet has been carefully checked, no responsibility for the inaccuracies can be assumed by Tak Cheong. Please consult your nearest Tak Cheong's sales office for further assistance.

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