



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from,Europe,America and south Asia,supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



Contact us

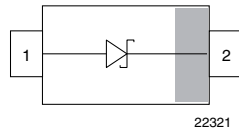
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Small Signal Schottky Diode



FEATURES

- This diode features very low turn-on voltage and fast switching
- This device is protected by a PN junction guard ring against excessive voltage, such as electrostatic discharges
- Space saving SOD-523 package
- Material categorization: For definitions of compliance please see www.vishay.com/doc?99912



RoHS
COMPLIANT
GREEN
(5-2008)

MECHANICAL DATA

Case: SOD-523

Weight: approx. 1.4 mg

Molding compound flammability rating: UL 94 V-0

Terminals: high temperature soldering guaranteed:
260 °C/10 s at terminals

Packaging codes/options:

08/3K per 7" reel (8 mm tape), 15K/box

PARTS TABLE

| PART | ORDERING CODE | INTERNAL CONSTRUCTION | TYPE MARKING | REMARKS |
|---------------|------------------|-----------------------|--------------|---------------|
| BAS70-02V-V-G | BAS70-02V-V-G-08 | Single diode | .X | Tape and reel |

ABSOLUTE MAXIMUM RATINGS ($T_{amb} = 25\text{ °C}$, unless otherwise specified)

| PARAMETER | TEST CONDITION | SYMBOL | VALUE | UNIT |
|---------------------------------|----------------|-----------|-------|------|
| Repetitive peak reverse voltage | | V_{RRM} | 70 | V |
| Forward continuous current | | I_F | 100 | mA |
| Surge forward current | | I_{FSM} | 600 | mA |
| Power dissipation | | P_{tot} | 150 | mW |

THERMAL CHARACTERISTICS ($T_{amb} = 25\text{ °C}$, unless otherwise specified)

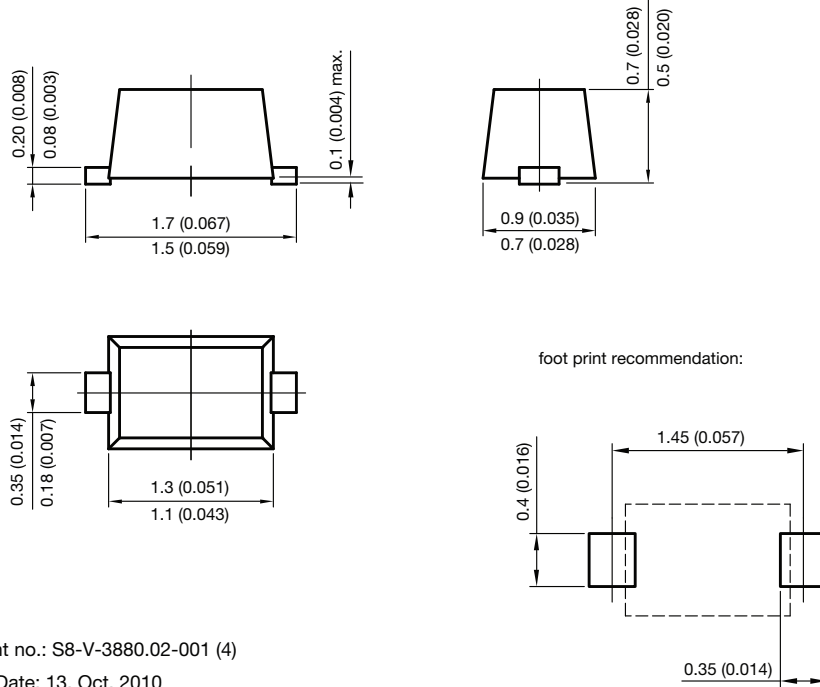
| PARAMETER | TEST CONDITION | SYMBOL | VALUE | UNIT |
|--|----------------|------------|---------------|------|
| Thermal resistance junction to ambient air | | R_{thJA} | 680 | K/W |
| Junction temperature | | T_j | 125 | °C |
| Storage temperature range | | T_{stg} | - 65 to + 150 | °C |

ELECTRICAL CHARACTERISTICS ($T_{amb} = 25\text{ °C}$, unless otherwise specified)

| PARAMETER | TEST CONDITION | SYMBOL | MIN. | TYP. | MAX. | UNIT |
|---------------------------|--|------------|------|------|------|------|
| Reverse breakdown voltage | $I_R = 10\text{ }\mu\text{A}$ (pulsed) | $V_{(BR)}$ | 70 | | | V |
| Leakage current | $V_R = 50\text{ V}$, $t_p < 300\text{ }\mu\text{s}$ | I_R | | 20 | 100 | nA |
| Forward voltage | $t_p < 300\text{ }\mu\text{s}$, $I_F = 1.0\text{ mA}$ | V_F | | | 410 | mV |
| | $t_p < 300\text{ }\mu\text{s}$, $I_F = 15\text{ mA}$ | V_F | | | 1000 | mV |
| Diode capacitance | $V_R = 0\text{ V}$, $f = 1\text{ MHz}$ | C_D | | 1.5 | 2 | pF |
| Reverse recovery time | $I_F = 10\text{ mA}$, $I_R = 10\text{ mA}$, $i_R = 1\text{ mA}$, $R_L = 100\text{ }\Omega$ | t_{rr} | | | 5 | ns |



PACKAGE DIMENSIONS in millimeters (inches): **SOD-523**



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