



# BZT52C4V7(S)---20(S)

## 主要参数 MAIN CHARACTERISTICS

|          |          |
|----------|----------|
| $I_{zT}$ | 5mA      |
| $V_z$    | 4.7V-20V |

## 封装 Package



SOD-123/SOD-323

## 产品特性

低阻抗  
高稳定性  
高可靠性  
表面贴装，适用于自动

## FEATURES

Low Zener Impedance  
High Stability  
High Reliability  
Surface mount package ideally suited for

## 绝对最大额定值 ABSOLUTE RATINGS ( $T_c=25^\circ\text{C}$ )

| 项 目<br>Parameter                              | 符 号<br>Symbol | 数 值<br>Value | 单 位<br>Unit      |
|---|---------------|--------------|------------------|
| 正向压降<br>Forward Voltage ( $I_F=10\text{mA}$ ) | $V_F$         | 0.9          | V                |
| SOD-123 耗散功率<br>SOD-123 Power Dissipation     | $P_D$         | 500          | mW               |
| SOD-323 耗散功率<br>SOD-323 Power Dissipation     | $P_D$         | 200          | mW               |
| 最高结温<br>Maximum Junction Temperature          | $T_j$         | 150          | $^\circ\text{C}$ |
| 储存温度<br>Storage Temperature Range             | $T_{STG}$     | -65~+150     | $^\circ\text{C}$ |





## 电特性 ELECTRICAL CHARACTERISTICS

| Type Number   | Mark-ing Code | Zener Voltage Range |         |         |     | Maximum Zener Impedance |          |     | Maximum Reverse Current |      | Typical Temperature Coefficient @IzTC mV/°C |     | Test Current IzTC |
|---------------|---------------|---------------------|---------|---------|-----|-------------------------|----------|-----|-------------------------|------|---|-----|-------------------|
|               |               | Vz @IzT             |         |         | IzT | ZzT @IzT                | ZzK @IzK | IzK | IR                      | @VR  | Min   | Max |                   |
|               |               | Nom (V)             | Min (V) | Max (V) | mA  | Ω                       |          | mA  | uA                      | V    |   |     |                   |
| BZT52C4V7(S)  | W7            | 4.7                 | 4.4     | 5       | 5   | 80                      | 500      | 1   | 3                       | 2    | -3.5  | 0.2 | 5                 |
| BZT52C5V1(S)  | W8            | 5.1                 | 4.8     | 5.4     | 5   | 60                      | 480      | 1   | 2                       | 2    | -2.7  | 1.2 | 5                 |
| BZT52C5V1A(S) | W8            | 5.1                 | 4.8     | 5.4     | 5   | 60                      | 480      | 1   | 2                       | 2    | -2.7  | 1.2 | 5                 |
| BZT52C5V6(S)  | W9            | 5.6                 | 5.2     | 6       | 5   | 40                      | 400      | 1   | 1                       | 2    | -2  | 2.5 | 5                 |
| BZT52C5V6A(S) | W9            | 5.6                 | 5.2     | 6       | 5   | 40                      | 400      | 1   | 1                       | 2    | -2  | 2.5 | 5                 |
| BZT52C6V2(S)  | WA            | 6.2                 | 5.8     | 6.6     | 5   | 10                      | 150      | 1   | 3                       | 4    | 0.4   | 3.7 | 5                 |
| BZT52C6V8(S)  | WB            | 6.8                 | 6.4     | 7.2     | 5   | 15                      | 80       | 1   | 2                       | 4    | 1.2   | 4.5 | 5                 |
| BZT52C7V5(S)  | WC            | 7.5                 | 7       | 7.9     | 5   | 15                      | 80       | 1   | 1                       | 5    | 2.5   | 5.3 | 5                 |
| BZT52C8V2(S)  | WD            | 8.2                 | 7.7     | 8.7     | 5   | 15                      | 80       | 1   | 0.7                     | 5    | 3.2   | 6.2 | 5                 |
| BZT52C9V1(S)  | WE            | 9.1                 | 8.5     | 9.6     | 5   | 15                      | 100      | 1   | 0.5                     | 6    | 3.8   | 7   | 5                 |
| BZT52C10(S)   | WF            | 10                  | 9.4     | 10.6    | 5   | 20                      | 150      | 1   | 0.2                     | 7    | 4.5   | 8   | 5                 |
| BZT52C11(S)   | WG            | 11                  | 10.4    | 11.6    | 5   | 20                      | 150      | 1   | 0.1                     | 8    | 5.4   | 9   | 5                 |
| BZT52C12(S)   | WH            | 12                  | 11.4    | 12.7    | 5   | 25                      | 150      | 1   | 0.1                     | 8    | 6   | 10  | 5                 |
| BZT52C13(S)   | WI            | 13                  | 12.4    | 14.1    | 5   | 30                      | 170      | 1   | 0.1                     | 8    | 7   | 11  | 5                 |
| BZT52C15(S)   | WJ            | 15                  | 13.8    | 15.6    | 5   | 30                      | 200      | 1   | 0.1                     | 10.5 | 9.2   | 13  | 5                 |
| BZT52C16(S)   | WK            | 16                  | 15.3    | 17.1    | 5   | 40                      | 200      | 1   | 0.1                     | 11.2 | 10.4  | 14  | 5                 |
| BZT52C18(S)   | WL            | 18                  | 16.8    | 19.1    | 5   | 45                      | 225      | 1   | 0.1                     | 12.6 | 12.4  | 16  | 5                 |
| BZT52C20(S)   | WM            | 20                  | 18.8    | 21.2    | 5   | 55                      | 225      | 1   | 0.1                     | 14   | 14.4  | 18  | 5                 |

\*正常为 SOD-123 封装；-(S)为 SOD-323 封装。





热特性 THERMAL CHARACTERISTICS

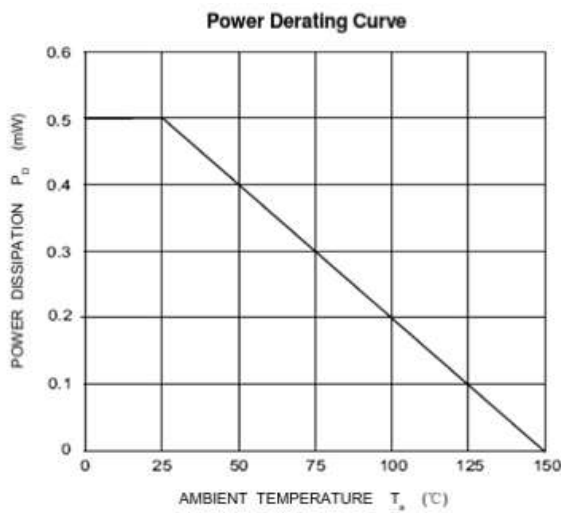
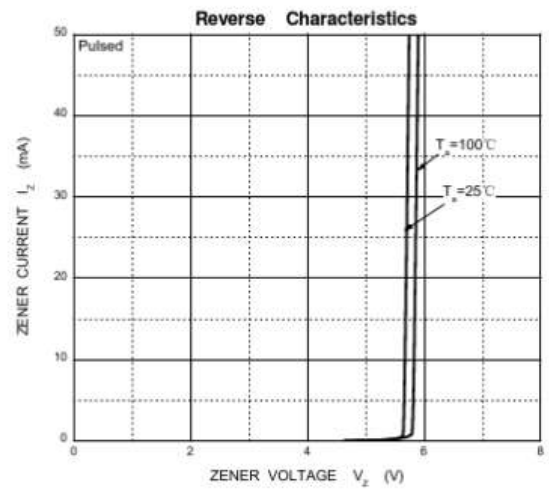
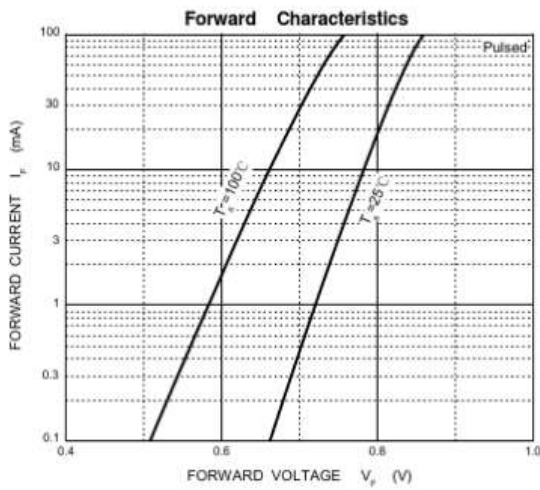
| 项 目<br>Parameter  | 符 号<br>Symbol   | 数 值<br>Value | 单 位<br>Unit   |
|---|-----------------|--------------|---------------|
| SOD-123 结到环境的热阻<br>SOD-123 Thermal Resistance Junction to Ambient | $R_{\theta JA}$ | 305          | $^{\circ}C/W$ |
| SOD-323 结到环境的热阻<br>SOD-323 Thermal Resistance Junction to Ambient | $R_{\theta JA}$ | 625          | $^{\circ}C/W$ |





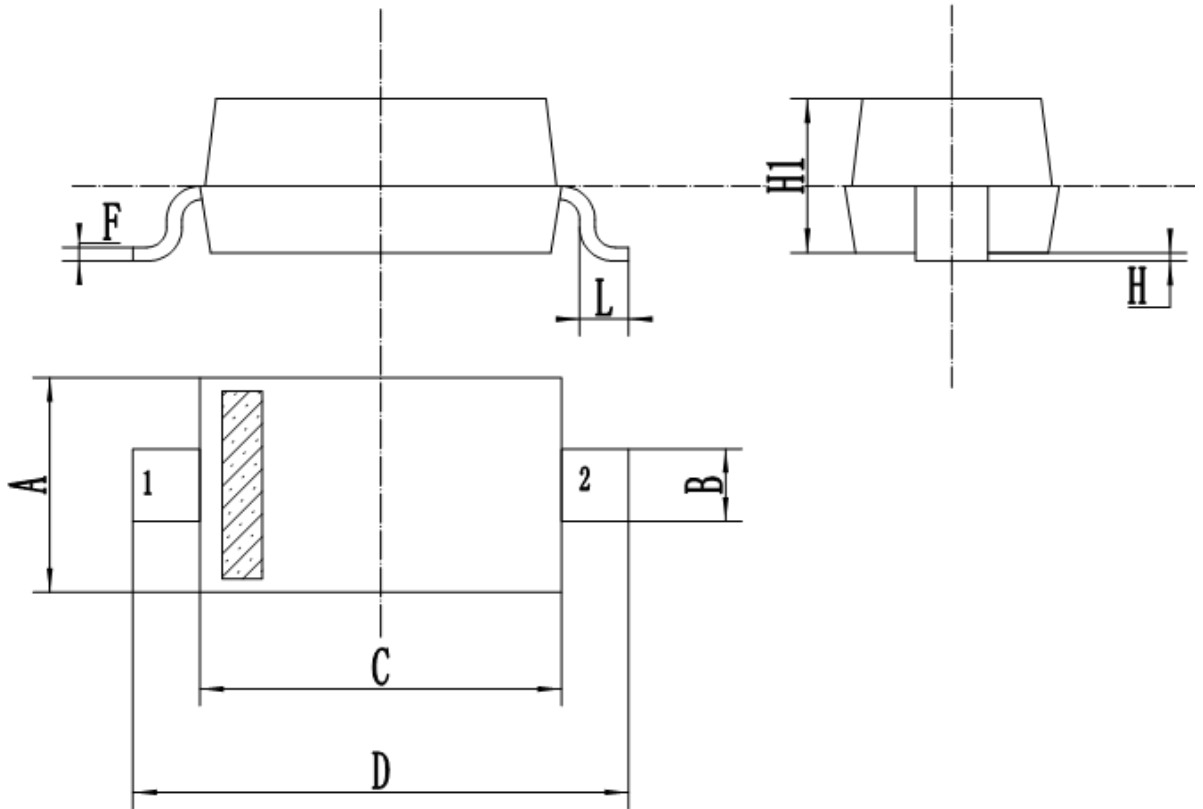
特征曲线

线 ELECTRICAL CHARACTERISTICS (curves)-BZT52C5V6





SOD-123 外形尺寸 PACKAGE MECHANICAL DATA

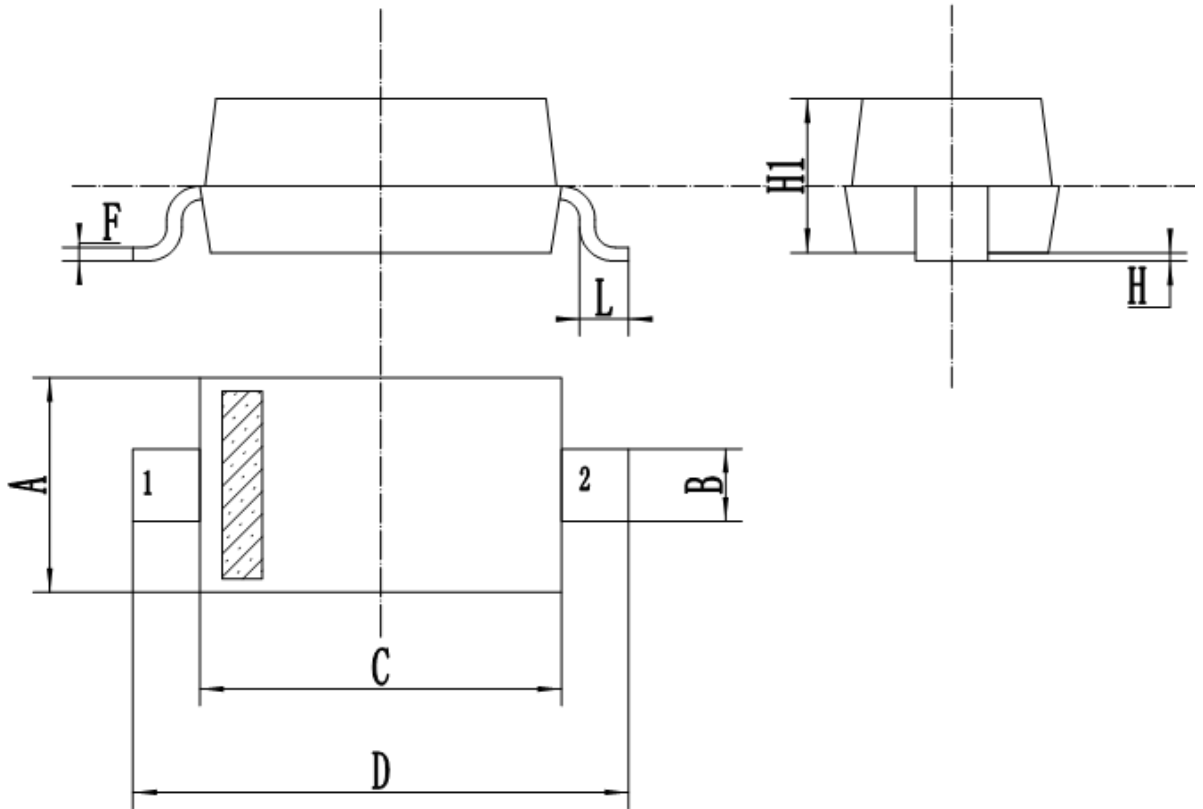


| SYMBOL | mm   |      |
|--------|------|------|
|        | MIN  | MAX  |
| A      | 1.50 | 1.80 |
| B      | 0.45 | 0.70 |
| C      | 2.50 | 2.80 |
| D      | 3.45 | 3.95 |
| F      | 0.05 | 0.15 |
| L      | 0.20 | 0.50 |
| H      | 0.01 | 0.20 |
| H1     | 0.90 | 1.30 |





SOD-323 外形尺寸 PACKAGE MECHANICAL DATA



| SYMBOL | mm   |      |
|--------|------|------|
|        | MIN  | MAX  |
| A      | 1.20 | 1.40 |
| B      | 0.25 | 0.35 |
| C      | 1.60 | 1.80 |
| D      | 2.50 | 2.70 |
| F      | 0.08 | 0.15 |
| L      | 0.25 | 0.40 |
| H      | 0.00 | 0.10 |
| H1     | 0.80 | 0.90 |





## 注意事项

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