

# BZX84B2V4-AU SERIES

## SURFACE MOUNT SILICON ZENER DIODES

**VOLTAGE** 2.4 to 75 Volt **POWER** 410 mWatt

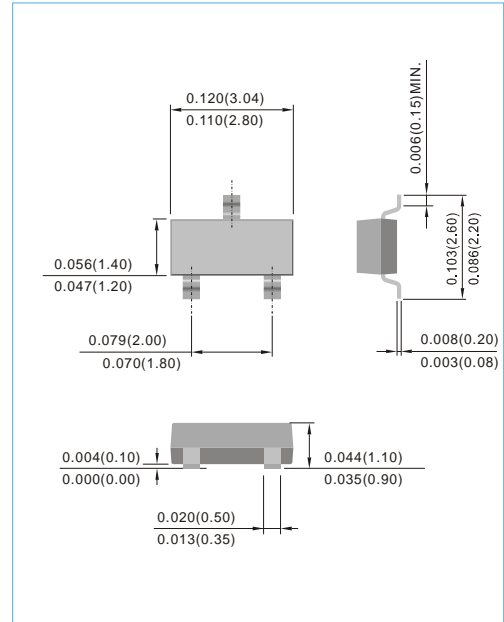
**SOT-23** Unit : inch(mm)

### FEATURES

- Planar Die construction
- 410mW Power Dissipation
- Zener Voltages from 2.4~75V
- Ideally Suited for Automated Assembly Processes
- Lead free in compliance with EU RoHS 2011/65/EU directive
- Green molding compound as per IEC61249 Std. . (Halogen Free)
- Acquire quality system certificate : TS16949
- AEC-Q101 qualified

### MECHANICAL DATA

- Case: SOT-23, Molded Plastic
- Terminals: Solderable per MIL-STD-750, Method 2026
- Polarity: See Diagram Below
- Approx. Weight: 0.0003 ounces, 0.0084 grams

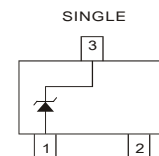


### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

| Parameter  | Symbol         | Value       | Units |
|--|----------------|-------------|-------|
| Maximum Power Dissipation (Notes A) at 25°C      | P <sub>D</sub> | 410         | mW    |
| Operating Junction and Storage Temperature Range | T <sub>J</sub> | -55 to +150 | °C    |

#### NOTES:

A. Mounted on 5.0mm<sup>2</sup>(.013mm thick) land areas.



# BZX84B2V4-AU SERIES

| Part Number             | Nominal Zener Voltage            |        |        | Max. Zener Impedance              |     |                                   |      | Max Reverse Leakage Current     |      | Marking Code |
|-------------------------|----------------------------------|--------|--------|-----------------------------------|-----|-----------------------------------|------|---------------------------------|------|--------------|
|                         | V <sub>Z</sub> @ I <sub>ZT</sub> |        |        | Z <sub>ZT</sub> @ I <sub>ZT</sub> |     | Z <sub>ZK</sub> @ I <sub>ZK</sub> |      | I <sub>R</sub> @ V <sub>R</sub> |      |              |
|                         | Nom. V                           | Min. V | Max. V | Ω                                 | mA  | Ω                                 | mA   | μA                              | V    |              |
| 410 mWatts Zener Diodes |                                  |        |        |                                   |     |                                   |      |                                 |      |              |
| BZX84B2V4-AU            | 2.4                              | 2.35   | 2.45   | 100                               | 5.0 | 600                               | 1.00 | 50                              | 1.0  | W1           |
| BZX84B2V7-AU            | 2.7                              | 2.64   | 2.75   | 100                               | 5.0 | 600                               | 1.00 | 20                              | 1.0  | W2           |
| BZX84B3-AU              | 3.0                              | 2.94   | 3.06   | 95                                | 5.0 | 600                               | 1.00 | 10                              | 1.0  | W3           |
| BZX84B3V3-AU            | 3.3                              | 3.23   | 3.37   | 95                                | 5.0 | 600                               | 1.00 | 5.0                             | 1.0  | W4           |
| BZX84B3V6-AU            | 3.6                              | 3.52   | 3.67   | 90                                | 5.0 | 600                               | 1.00 | 5.0                             | 1.0  | W5           |
| BZX84B3V9-AU            | 3.9                              | 3.82   | 3.98   | 90                                | 5.0 | 600                               | 1.00 | 3.0                             | 1.0  | W6           |
| BZX84B4V3-AU            | 4.3                              | 4.21   | 4.39   | 90                                | 5.0 | 600                               | 1.00 | 3.0                             | 1.0  | W7           |
| BZX84B4V7-AU            | 4.7                              | 4.61   | 4.79   | 80                                | 5.0 | 500                               | 1.00 | 3.0                             | 2.0  | W8           |
| BZX84B5V1-AU            | 5.1                              | 5.00   | 5.20   | 60                                | 5.0 | 480                               | 1.00 | 2.0                             | 2.0  | W9           |
| BZX84B5V6-AU            | 5.6                              | 5.49   | 5.71   | 40                                | 5.0 | 400                               | 1.00 | 1.0                             | 2.0  | WA           |
| BZX84B6V2-AU            | 6.2                              | 6.08   | 6.32   | 10                                | 5.0 | 150                               | 1.00 | 3.0                             | 4.0  | WB           |
| BZX84B6V8-AU            | 6.8                              | 6.66   | 6.94   | 15                                | 5.0 | 80                                | 1.00 | 2.0                             | 4.0  | WC           |
| BZX84B7V5-AU            | 7.5                              | 7.35   | 7.65   | 15                                | 5.0 | 80                                | 1.00 | 1.0                             | 5.0  | WD           |
| BZX84B8V2-AU            | 8.2                              | 8.04   | 8.36   | 15                                | 5.0 | 80                                | 1.00 | 0.7                             | 5.0  | WE           |
| BZX84B8V7-AU            | 8.7                              | 8.53   | 8.87   | 15                                | 5.0 | 100                               | 1.00 | 0.7                             | 5.0  | 87C          |
| BZX84B9V1-AU            | 9.1                              | 8.92   | 9.28   | 15                                | 5.0 | 100                               | 1.00 | 0.5                             | 6.0  | WF           |
| BZX84B10-AU             | 10                               | 9.80   | 10.20  | 20                                | 5.0 | 150                               | 1.00 | 0.2                             | 7.0  | WG           |
| BZX84B11-AU             | 11                               | 10.78  | 11.22  | 20                                | 5.0 | 150                               | 1.00 | 0.1                             | 8.0  | WH           |
| BZX84B12-AU             | 12                               | 11.76  | 12.24  | 25                                | 5.0 | 150                               | 1.00 | 0.1                             | 8.0  | WI           |
| BZX84B13-AU             | 13                               | 12.74  | 13.26  | 30                                | 5.0 | 170                               | 1.00 | 0.1                             | 8.0  | WK           |
| BZX84B14-AU             | 14                               | 13.72  | 14.28  | 30                                | 5.0 | 170                               | 1.00 | 0.1                             | 10.0 | WJ           |
| BZX84B15-AU             | 15                               | 14.70  | 15.30  | 30                                | 5.0 | 200                               | 1.00 | 0.1                             | 10.5 | WL           |
| BZX84B16-AU             | 16                               | 15.68  | 16.32  | 40                                | 5.0 | 200                               | 1.00 | 0.1                             | 11.2 | WM           |
| BZX84B17-AU             | 17                               | 16.66  | 17.34  | 40                                | 5.0 | 200                               | 1.00 | 0.1                             | 12.2 | 17C          |
| BZX84B18-AU             | 18                               | 17.64  | 18.36  | 45                                | 5.0 | 225                               | 1.00 | 0.1                             | 12.6 | WN           |
| BZX84B20-AU             | 20                               | 19.60  | 20.40  | 55                                | 5.0 | 225                               | 1.00 | 0.1                             | 14.0 | WO           |
| BZX84B22-AU             | 22                               | 21.56  | 22.44  | 55                                | 5.0 | 250                               | 1.00 | 0.1                             | 15.4 | WP           |
| BZX84B24-AU             | 24                               | 23.52  | 24.48  | 70                                | 5.0 | 250                               | 1.00 | 0.1                             | 16.8 | WR           |
| BZX84B27-AU             | 27                               | 26.46  | 27.54  | 80                                | 5.0 | 300                               | 1.00 | 0.1                             | 18.9 | WS           |
| BZX84B28-AU             | 28                               | 27.44  | 28.56  | 80                                | 5.0 | 300                               | 1.00 | 0.1                             | 20.5 | 28C          |
| BZX84B30-AU             | 30                               | 29.40  | 30.60  | 80                                | 5.0 | 300                               | 1.00 | 0.1                             | 21.0 | WT           |
| BZX84B33-AU             | 33                               | 32.34  | 33.66  | 80                                | 5.0 | 325                               | 1.00 | 0.1                             | 23.1 | WU           |
| BZX84B36-AU             | 36                               | 35.28  | 36.72  | 90                                | 5.0 | 350                               | 1.00 | 0.1                             | 25.2 | WW           |
| BZX84B39-AU             | 39                               | 38.22  | 39.78  | 130                               | 5.0 | 350                               | 1.00 | 0.1                             | 27.3 | WX           |
| BZX84B43-AU             | 43                               | 42.14  | 43.86  | 150                               | 5.0 | 375                               | 1.00 | 0.1                             | 30.1 | WY           |
| BZX84B47-AU             | 47                               | 46.06  | 47.94  | 170                               | 5.0 | 375                               | 1.00 | 0.1                             | 32.9 | WZ           |
| BZX84B51-AU             | 51                               | 49.98  | 52.02  | 100                               | 5.0 | 400                               | 1.00 | 0.1                             | 38.0 | XA           |
| BZX84B56-AU             | 56                               | 54.88  | 57.12  | 135                               | 2.5 | 1000                              | 1.00 | 0.1                             | 42.0 | X2           |
| BZX84B62-AU             | 62                               | 60.76  | 63.24  | 150                               | 2.5 | 1000                              | 1.00 | 0.1                             | 46.0 | X3           |
| BZX84B68-AU             | 68                               | 66.64  | 69.36  | 200                               | 2.5 | 1000                              | 1.00 | 0.1                             | 51.0 | X4           |
| BZX84B75-AU             | 75                               | 73.50  | 76.50  | 250                               | 2.5 | 1000                              | 1.00 | 0.1                             | 56.0 | X5           |

# BZX84B2V4-AU SERIES

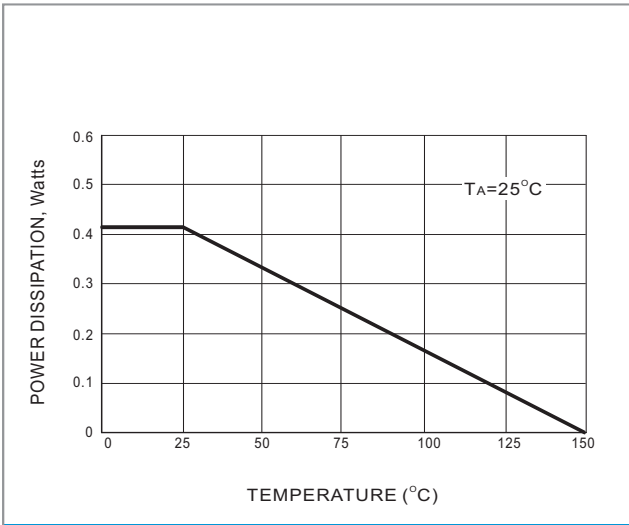


Fig.1 STEADY STATE POWER DERATING

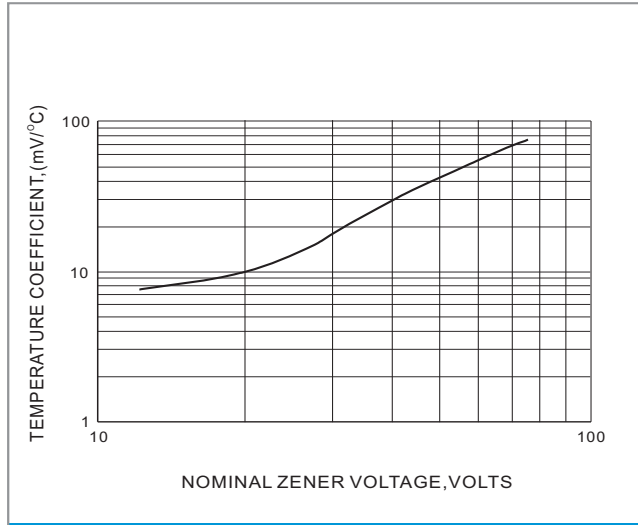


Fig.2 TEMPERATURE COEFFICIENTS

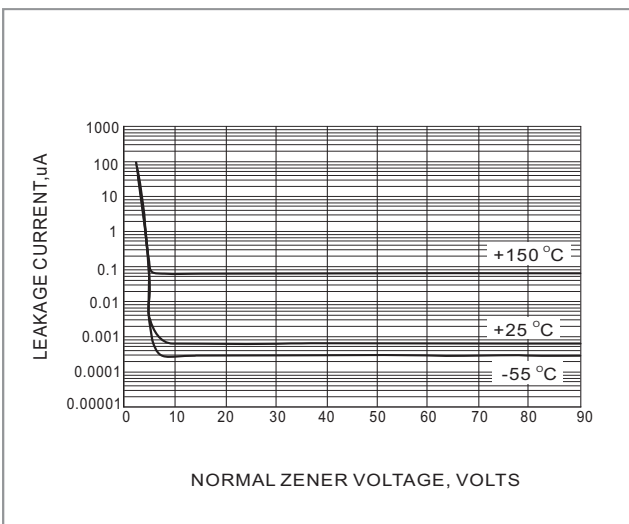


Fig.3 TYPICAL LEAKAGE CURRENT

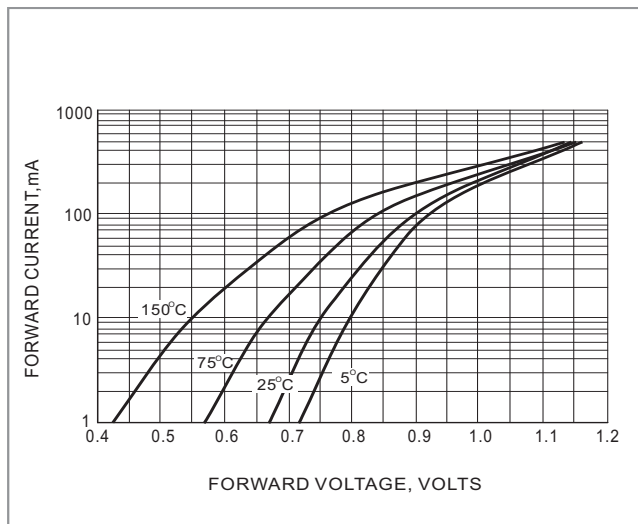


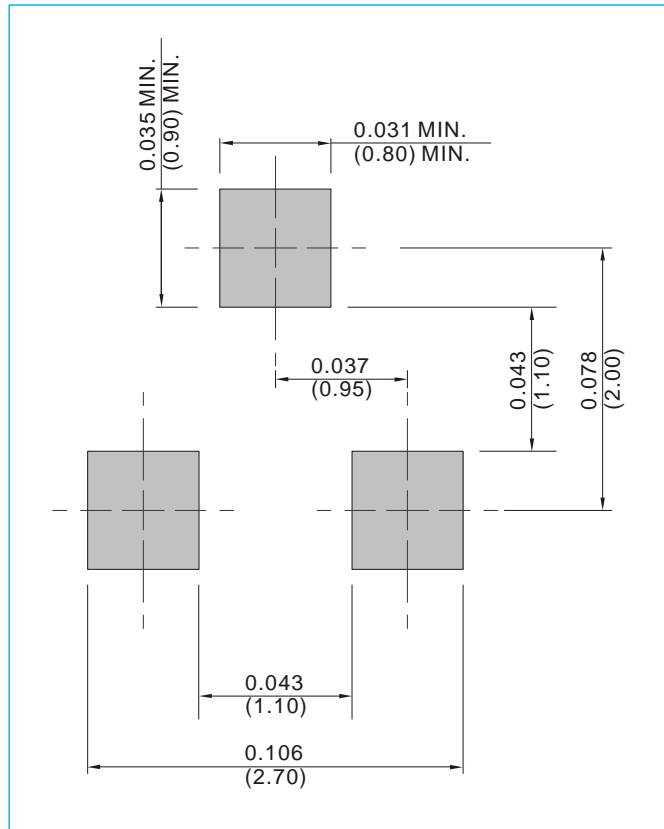
Fig.4 TYPICAL FORWARD VOLTAGE

# BZX84B2V4-AU SERIES

## MOUNTING PAD LAYOUT

**SOT-23**

Unit : inch(mm)



## ORDER INFORMATION

- Packing information
  - T/R - 12K per 13" plastic Reel
  - T/R - 3K per 7" plastic Reel

## **BZX84B2V4-AU SERIES**

---

### **Disclaimer**

- Reproducing and modifying information of the document is prohibited without permission from Panjit International Inc..
- Panjit International Inc. reserves the rights to make changes of the content herein the document anytime without notification. Please refer to our website for the latest document.
- Panjit International Inc. disclaims any and all liability arising out of the application or use of any product including damages incidentally and consequentially occurred.
- Panjit International Inc. does not assume any and all implied warranties, including warranties of fitness for particular purpose, non-infringement and merchantability.
- Applications shown on the herein document are examples of standard use and operation. Customers are responsible in comprehending the suitable use in particular applications. Panjit International Inc. makes no representation or warranty that such applications will be suitable for the specified use without further testing or modification.
- The products shown herein are not designed and authorized for equipments requiring high level of reliability or relating to human life and for any applications concerning life-saving or life-sustaining, such as medical instruments, transportation equipment, aerospace machinery et cetera. Customers using or selling these products for use in such applications do so at their own risk and agree to fully indemnify Panjit International Inc. for any damages resulting from such improper use or sale.
- Since Panjit uses lot number as the tracking base, please provide the lot number for tracking when complaining.

# Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

[Panjit:](#)

[BZX84B33-AU\\_R1\\_100A1](#) [BZX84B33-AU\\_R1\\_000A1](#)