

BC817-16/-25/-40

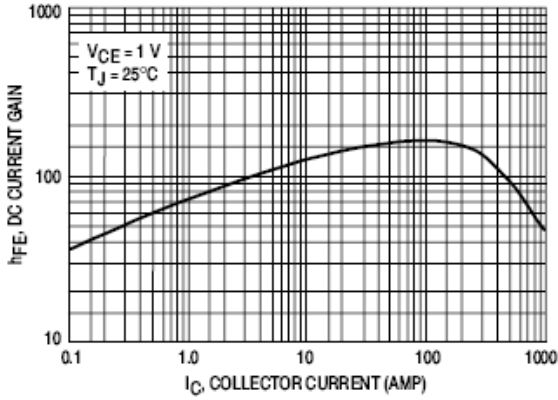


Figure 1. DC Current Gain

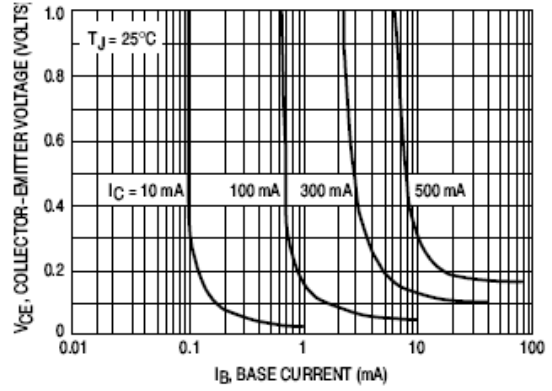


Figure 2. Saturation Region

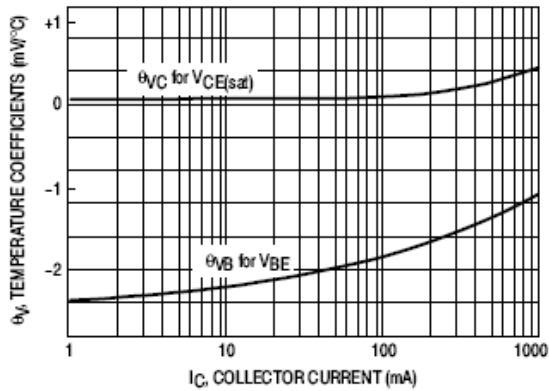


Figure 4. Temperature Coefficients

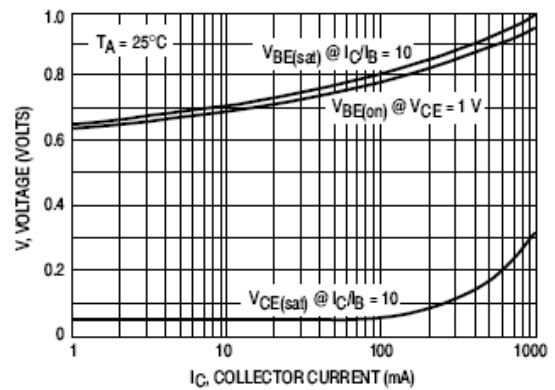


Figure 3. "On" Voltages

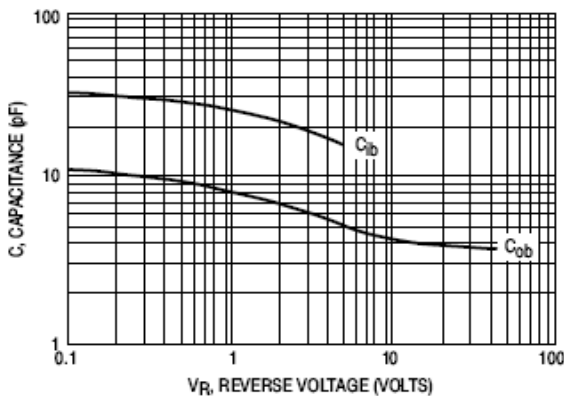


Figure 5. Capacitances

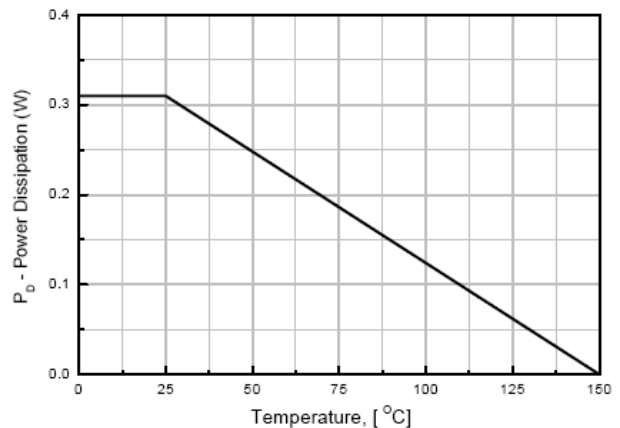
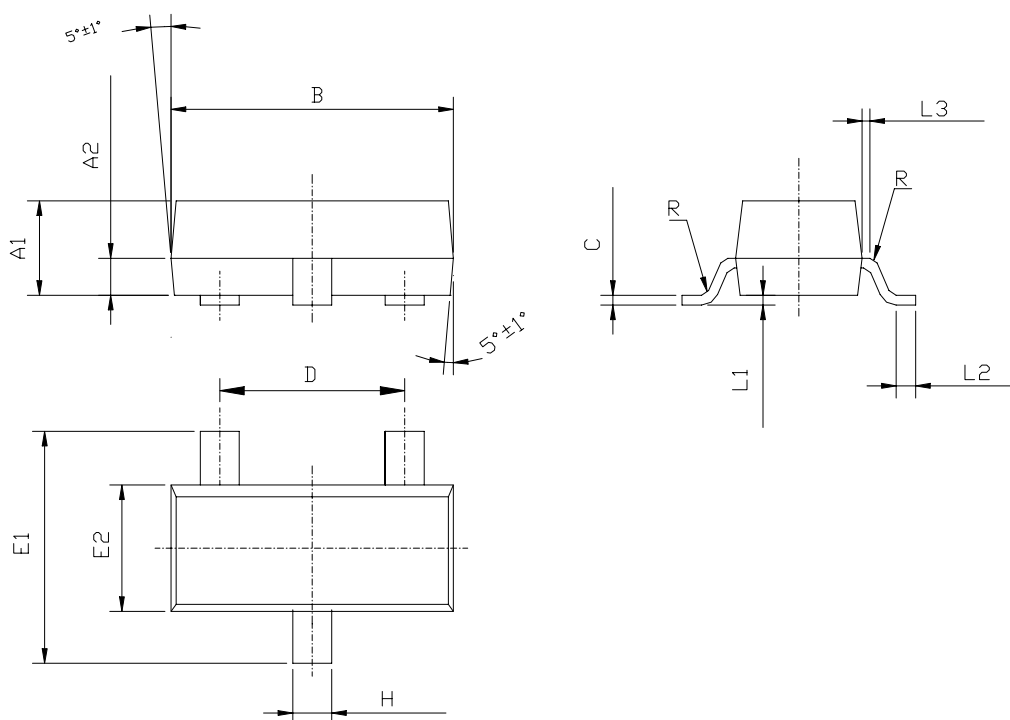
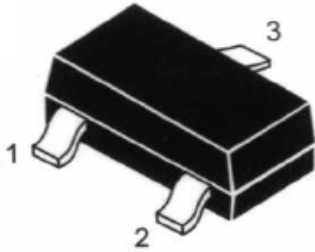


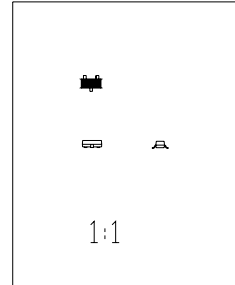
Figure 6. Power Dissipation vs Ambient Temperature



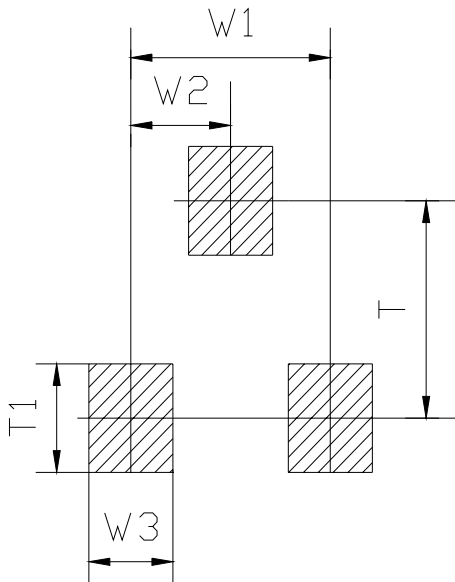
| Symbol | Dimensions in Millimeters | | | 内部结构 STYLS | 管脚 PIN | | |
|--------|---------------------------|---------|-------|---------------|------------|-----------------------|-----------------------|
| | Min | Nominal | Max | | 1 脚 | 2 脚 | 3 脚 |
| A1 | 0.900 | 0.970 | 1.000 | 6 | 基极 BASE | 发射极 EMITTER | 集电极 COLLECTOR |
| A2 | 0.350 | 0.380 | 0.410 | | 8 | 阳极 ANODE | 不连接 NO- CONNECTION |
| B | 2.800 | 2.900 | 3.000 | 9 | | 阳极 ANODE | 阳极 ANODE |
| C | 0.085 | 0.100 | 0.150 | | 11 | 阳极 ANODE | 阴极 CATHODE |
| D | 1.800 | 1.900 | 2.000 | 12 | | 阴极 CATHODE | 阴极 CATHODE |
| E1 | 2.200 | 2.400 | 2.600 | | 18 | 不连接 NO- CONNECTION | 阴极 CATHODE |
| E2 | 1.200 | 1.300 | 1.400 | 19 | | 阴极 CATHODE | 阳极 ANODE |
| H | 0.300 | 0.400 | 0.500 | | | | |
| L1 | 0.000 | | 0.100 | | | | |
| L2 | 0.200 | | | | | | |
| L3 | 0.030 | 0.080 | 0.130 | | | | |
| R | 0.080TYP | | | | | | |



OUTSIDE



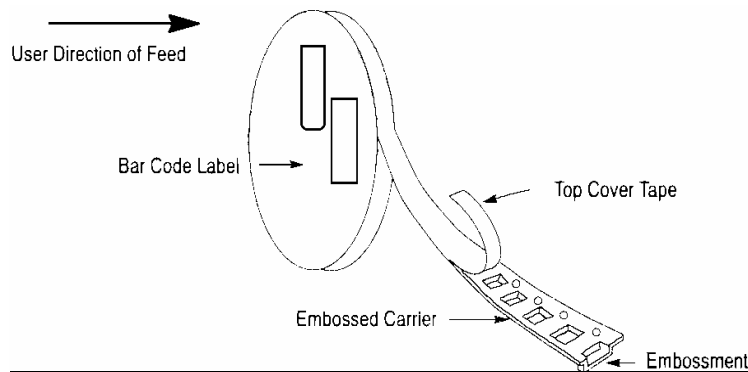
Scale 1:1 on letter size paper



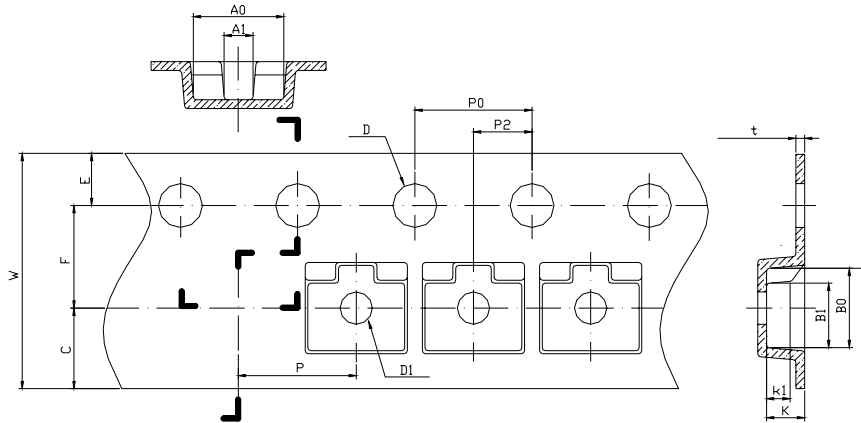
FOOTPRINTS FOR SOLDERING

| Symbol | Dimensions in Millimeters | Dimensions in Inches |
|--------|---------------------------|----------------------|
| | Nominal | Nominal |
| W1 | 1.900 | 0.0748 |
| W2 | 0.950 | 0.0374 |
| W3 | 0.800 | 0.0315 |
| T | 2.000 | 0.0787 |
| T1 | 1.000 | 0.0394 |

SOT-23 PACKAGING:

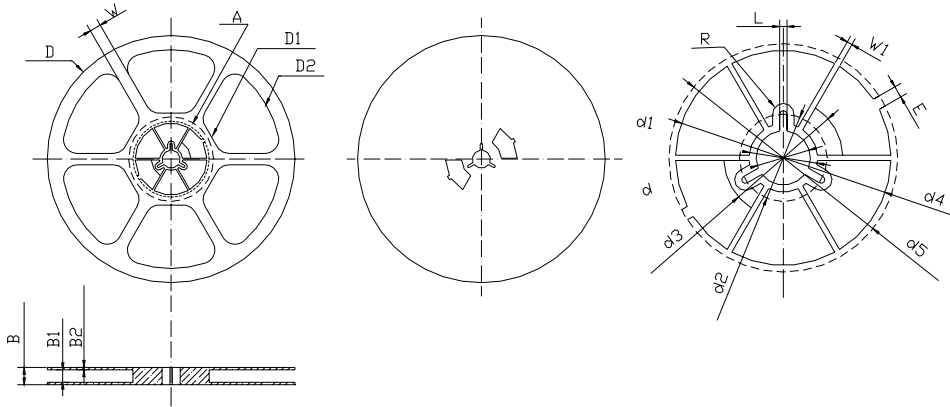


SOT-23 EMBOSSED CARRIER TAPE:



| Symbol | Dimensions in Millimeters | | | Dimensions in Inches | | |
|--------|---------------------------|---------|---------|----------------------|---------|---------|
| | Minimum | Nominal | Maximum | Minimum | Nominal | Maximum |
| A0 | 3.050 | 3.150 | 3.250 | 0.1201 | 0.1240 | 0.1280 |
| A1 | 0.900 | 1.000 | 1.100 | 0.0354 | 0.0394 | 0.0433 |
| B0 | 2.669 | 2.769 | 2.869 | 0.1051 | 0.1090 | 0.1130 |
| B1 | 2.100 | 2.200 | 2.300 | 0.0827 | 0.0866 | 0.0906 |
| C | 2.750TYP | | | 0.1083TYP | | |
| D | 1.500 | 1.500 | 1.600 | 0.0591 | 0.0591 | 0.0630 |
| D1 | 0.900 | 1.000 | 1.100 | 0.0354 | 0.0394 | 0.0433 |
| E | 1.650 | 1.750 | 1.850 | 0.0650 | 0.0689 | 0.0728 |
| F | 3.450 | 3.500 | 3.550 | 0.1358 | 0.1378 | 0.1398 |
| K | 1.119 | 1.219 | 1.319 | 0.0441 | 0.0480 | 0.0519 |
| K1 | 0.850TYP | | | 0.03346TYP | | |
| P | 3.900 | 4.000 | 4.100 | 0.1535 | 0.1575 | 0.1614 |
| P0 | 3.900 | 4.000 | 4.100 | 0.1535 | 0.1575 | 0.1614 |
| P010 | 39.800 | 40.000 | 40.200 | 1.5669 | 1.5748 | 1.5827 |
| P2 | 1.950 | 2.000 | 2.050 | 0.0768 | 0.0787 | 0.0807 |
| t | 0.216 | 0.229 | 0.242 | 0.0085 | 0.0090 | 0.0095 |
| W | 7.900 | 8.000 | 8.300 | 0.3110 | 0.3150 | 0.3268 |

SOT-23 REEL DATA:



| Symbol | Dimensions in Millimeters | | | Dimensions in Inches | | |
|--------|---------------------------|----------------|----------------|----------------------|---------------|---------------|
| | Minimum | Nominal | Maximum | Minimum | Nominal | Maximum |
| B | - | - | 12.500 | - | - | 0.4921 |
| B1 | 8.900 | 9.000 | 9.100 | 0.3504 | 0.3543 | 0.3583 |
| B2 | 1.700 | 1.750 | 1.800 | 0.0669 | 0.0689 | 0.0709 |
| D | ϕ 177.000 | ϕ 178.000 | ϕ 179.000 | Φ 6.9685 | Φ 7.0079 | Φ 7.0472 |
| D1 | Φ 67.600 TYP | | | Φ 2.6614 TYP | | |
| D2 | Φ 157.600 TYP | | | Φ 6.2047 TYP | | |
| d | Φ 12.800 | Φ 13.000 | Φ 13.200 | Φ 0.5039 | Φ 0.5118 | Φ 0.5197 |
| d1 | Φ 16.40 TYP | | | Φ 0.6457 TYP | | |
| d2 | Φ 21.000 TYP | | | Φ 0.8268 TYP | | |
| d3 | Φ 25.200 TYP | | | Φ 0.9922 TYP | | |
| d4 | Φ 50.600 | Φ 51.600 | Φ 52.600 | Φ 1.9921 | Φ 2.0315 | Φ 2.0709 |
| d5 | Φ 53.800 | Φ 54.800 | Φ 55.800 | Φ 2.1181 | Φ 2.1575 | Φ 2.1969 |
| E | 2.800 TYP | | | 0.1102 TYP | | |
| L | 1.750 TYP | | | 0.0689 TYP | | |
| R | 2.575 TYP | | | 0.1014 TYP | | |
| W | 15.000 TYP | | | 0.5906 TYP | | |
| W1 | 1.300 TYP | | | 0.0512 TYP | | |