

Silicon NPN Power Transistors

2SC1185

DESCRIPTION

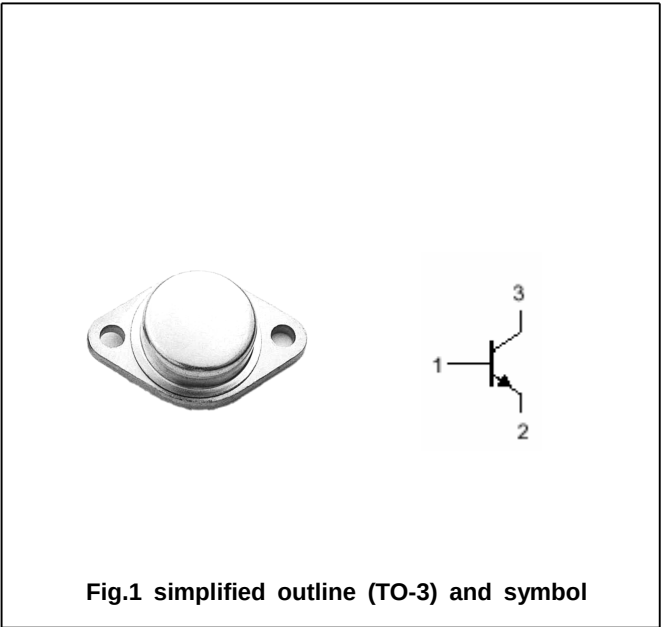
- With TO-3 package
- Wide area of safe operation
- High breakdown voltage  
:V<sub>CEO</sub>=250V(min)

APPLICATIONS

- For voltage regulator,inverter,switching mode power supply applications.

PINNING(see Fig.2)

| PIN | DESCRIPTION |
|-----|-------------|
| 1   | Base        |
| 2   | Emitter     |
| 3   | Collector   |



Absolute maximum ratings(Ta=?)

| SYMBOL           | PARAMETER                 | CONDITIONS          | VALUE   | UNIT |
|------------------|---------------------------|---------------------|---------|------|
| V <sub>CBO</sub> | Collector-base voltage    | Open emitter        | 300     | V    |
| V <sub>CEO</sub> | Collector-emitter voltage | Open base           | 250     | V    |
| V <sub>EBO</sub> | Emitter-base voltage      | Open collector      | 5       | V    |
| I <sub>C</sub>   | Collector current         |                     | 0.7     | A    |
| P <sub>D</sub>   | Total power dissipation   | T <sub>C</sub> =25? | 50      | W    |
| T <sub>J</sub>   | Junction temperature      |                     | 150     | ?    |
| T <sub>stg</sub> | Storage temperature       |                     | -55~150 | ?    |

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## CHARACTERISTICS

Tj=25? unless otherwise specified

| SYMBOL        | PARAMETER                            | CONDITIONS             | MIN | TYP. | MAX | UNIT    |
|---------------|--------------------------------------|------------------------|-----|------|-----|---------|
| $V_{(BR)CEO}$ | Collector-emitter breakdown voltage  | $I_C=30mA; I_B=0$      | 250 |      |     | V       |
| $V_{(BR)CBO}$ | Collector-base breakdown voltage     | $I_C=1mA; I_E=0$       | 300 |      |     | V       |
| $V_{(BR)EBO}$ | Emitter-base breakdown voltage       | $I_E=1mA; I_C=0$       | 5   |      |     | V       |
| $V_{CEsat}$   | Collector-emitter saturation voltage | $I_C=500mA; I_B=100mA$ |     |      | 1.0 | V       |
| $V_{BEsat}$   | Base-emitter saturation voltage      | $I_C=500mA; I_B=100mA$ |     |      | 1.5 | V       |
| $I_{CBO}$     | Collector cut-off current            | $V_{CB}=200V; I_E=0$   |     |      | 10  | $\mu A$ |
| $I_{EBO}$     | Emitter cut-off current              | $V_{EB}=5V; I_C=0$     |     |      | 10  | $\mu A$ |
| $h_{FE}$      | DC current gain                      | $I_C=0.4A; V_{CE}=10V$ | 40  |      | 200 |         |

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PACKAGE OUTLINE

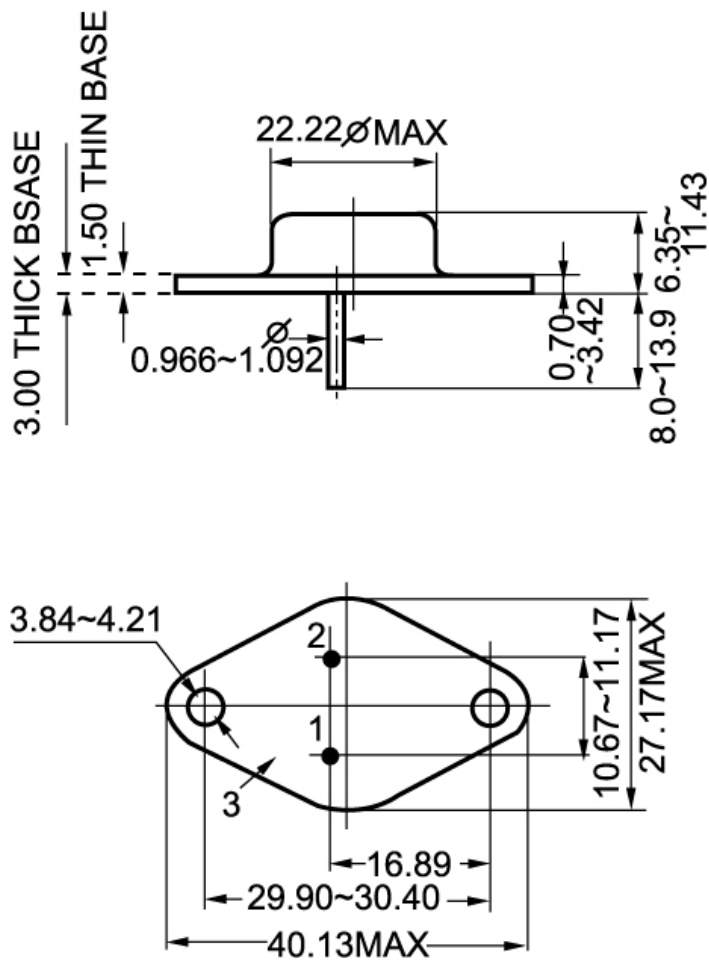


Fig.2 outline dimensions