

2SC2315

2SC2316

Silicon NPN Triple Diffused Mesa

☆ Super Beta Transistor

Application Example :
General Purpose

● Outline Drawing 1MT-25(TO220)

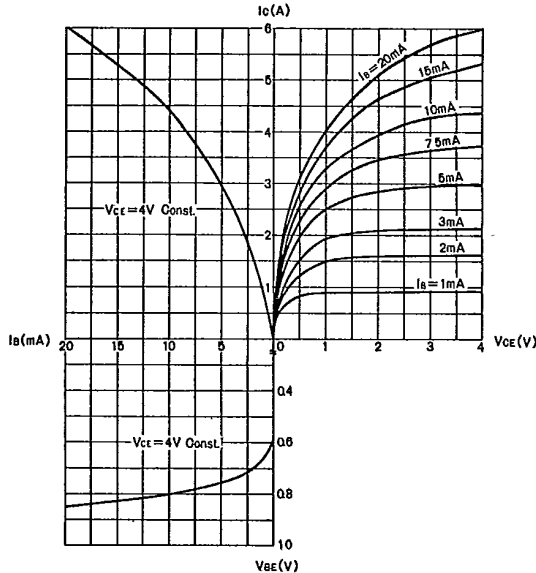
Absolute Maximum Ratings

| Symbol | 2SC2315 | 2SC2316 | Unit |
|-----------|------------------------------------|---------|------------------|
| V_{CB0} | 80 | 100 | V |
| V_{CE0} | 60 | 80 | V |
| V_{EBO} | 6 | | V |
| I_C | 6 | | A |
| I_B | 3 | | A |
| P_C | 50 ($T_{FL} = 25^\circ\text{C}$) | | W |
| T_J | 150 | | $^\circ\text{C}$ |
| T_{stg} | -55 ~ +150 | | $^\circ\text{C}$ |

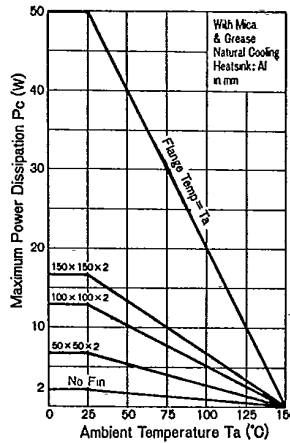
Electrical Characteristics

| Symbol | Conditions | 2SC2315 | 2SC2316 | Unit |
|---------------|---|---------|---------|---------------|
| I_{CBO} | | 100max | 100max | μA |
| | $V_{CB} =$ | 80 | 100 | V |
| I_{EBO} | $V_{EB} = 6\text{V}$ | 1.0max | | mA |
| $V_{(BR)CEO}$ | $I_C = 25\text{mA}$ | 60min | 80min | V |
| h_{FE} | $V_{CE} = 4\text{V}, I_C = 0.5\text{A}$ | 500min | | |
| $V_{CE(sat)}$ | $I_C = 3\text{A}, I_B = 0.06\text{A}$ | 1.0max | | V |
| f_r | $V_{CE} = 12\text{V}, I_E = -0.5\text{A}$ | 30typ | | MHz |

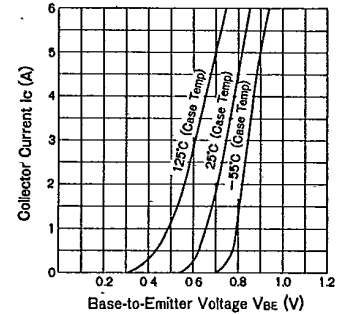
Common Emitter Characteristics (Typical Value)



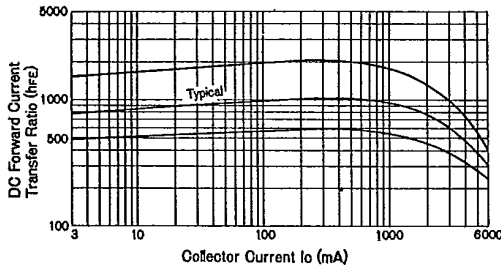
Power Derating



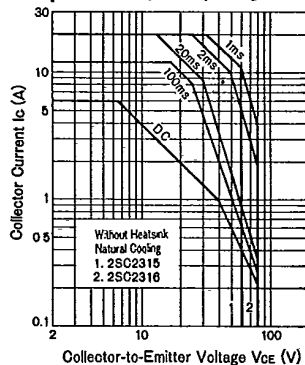
Temperature Characteristics ($V_{CE} = 4\text{V}$ Const.)



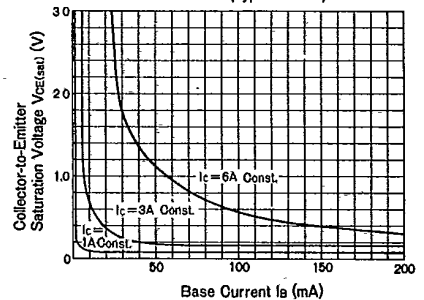
DC Current Gain Characteristics ($V_{CE} = 4\text{V}$ Const.)



Maximum Areas For Safe Operation (ASO) (Single Pulse)



Collector-to-Emitter Saturation Characteristics (Typical Value)



DC Current Gain Temperature Characteristics ($V_{CE} = 4\text{V}$ Const.)

