2SD2479

Silicon NPN epitaxial planar type

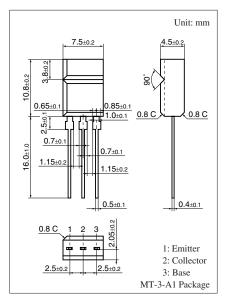
For low-frequency amplification

■ Features

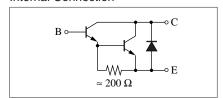
- High forward current transfer ratio h_{FE}
- Allowing supply with the radial taping

■ Absolute Maximum Ratings $T_a = 25$ °C

| Parameter | Symbol | Rating | Unit | |
|---------------------------------------|------------------|-------------|------|--|
| Collector-base voltage (Emitter open) | V _{CBO} | 120 | V | |
| Collector-emitter voltage (Base open) | V _{CEO} | 100 | V | |
| Emitter-base voltage (Collector open) | V_{EBO} | 5 | V | |
| Collector current | I_C | 2 | A | |
| Peak collector current | I_{CP} | 3 | A | |
| Collector power dissipation | P _C | 1.5 | W | |
| Junction temperature | T_{j} | 150 | °C | |
| Storage temperature | T_{stg} | -55 to +150 | °C | |



Internal Connection



■ Electrical Characteristics $T_a = 25$ °C ± 3 °C

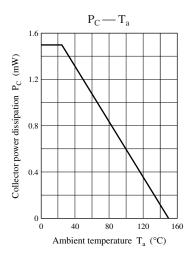
| Parameter | Symbol | Conditions | Min | Тур | Max | Unit |
|--|----------------------|--|------|-----|--------|------|
| Collector-base voltage (Emitter open) | V _{CBO} | $I_C = 100 \ \mu A, I_E = 0$ | 120 | | | V |
| Collector-emitter voltage (Base open) | V _{CEO} | $I_C = 1 \text{ mA}, I_B = 0$ | 100 | | | V |
| Emitter-base voltage (Collector open) | V _{EBO} | $I_E = 100 \mu\text{A}, I_C = 0$ | 5 | | | V |
| Collector-base cutoff current (Emitter open) | I_{CBO} | $V_{CB} = 25 \text{ V}, I_E = 0$ | | | 0.1 | μΑ |
| Emitter-base cutoff current (Collector open) | I_{EBO} | $V_{EB} = 4 \text{ V}, I_C = 0$ | | | 1 | μΑ |
| Forward current transfer ratio *1, 2 | h _{FE} | $V_{CE} = 10 \text{ V}, I_{C} = 1 \text{ A}$ | 4000 | | 40 000 | _ |
| Collector-emitter saturation voltage *1 | V _{CE(sat)} | $I_C = 1 A, I_B = 1 mA$ | | | 1.5 | V |
| Base-emitter saturation voltage *1 | V _{BE(sat)} | $I_C = 1 A, I_B = 1 mA$ | | | 2 | V |
| Transition frequency | f_T | $V_{CB} = 10 \text{ V}, I_E = -50 \text{ mA}, f = 200 \text{ MHz}$ | | 150 | | MHz |

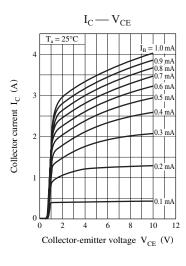
Note) 1. Measuring methods are based on JAPANESE INDUSTRIAL STANDARD JIS C 7030 measuring methods for transistors.

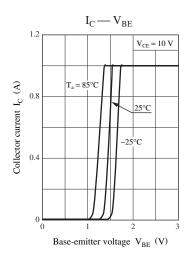
2. *1: Pulse measurement

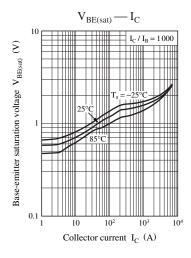
*2: Rank classification

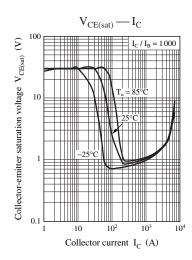
| Rank | Q | R | S | | |
|----------|---------------|-----------------|------------------|--|--|
| h_{FE} | 4000 to 10000 | 8 000 to 20 000 | 16 000 to 40 000 | | |

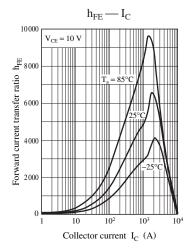


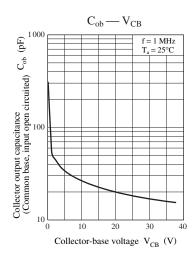












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