Power Transistors Panasonic

## 2SD2573

## Silicon NPN triple diffusion planar type

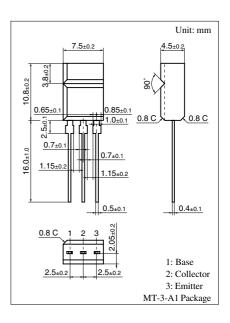
For high current amplification, power amplification

#### ■ Features

- $\bullet$  Low collector to emitter saturation voltage  $V_{\text{CE}(\text{sat})}$
- Allowing automatic insertion with radial taping

### ■ Absolute Maximum Ratings $T_C = 25$ °C

| Parameter   | Symbol           | Rating      | Unit |  |
|---|------------------|-------------|------|--|
| Collector to base voltage                           | $V_{CBO}$        | 80          | V    |  |
| Collector to emitter voltage                        | V <sub>CEO</sub> | 60          | V    |  |
| Emitter to base voltage                             | V <sub>EBO</sub> | 6           | V    |  |
| Peak collector current                              | $I_{CP}$         | 6           | A    |  |
| Collector current                                   | $I_{C}$          | 3           | A    |  |
| Collector power dissipation ( $T_C = 25^{\circ}C$ ) | P <sub>C</sub>   | 1.5         | W    |  |
| Junction temperature                                | T <sub>j</sub>   | 150         | °C   |  |
| Storage temperature                                 | $T_{stg}$        | -55 to +150 | °C   |  |



### ■ Electrical Characteristics $T_C = 25$ °C

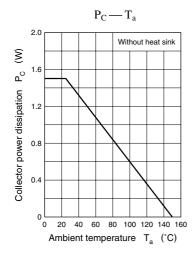
| Parameter                               | Symbol               | Conditions  |     | Тур | Max   | Unit |
|---|----------------------|---|-----|-----|-------|------|
| Collector cutoff current                | $I_{CBO}$            | $V_{CB} = 80 \text{ V}, I_{E} = 0$                                |     |     | 100   | μΑ   |
|   | $I_{CEO}$            | $V_{CE} = 40 \text{ V}, I_B = 0$                                  |     |     | 100   | μΑ   |
| Emitter cutoff current                  | $I_{EBO}$            | $V_{EB} = 6 \text{ V}, I_{C} = 0$                                 |     |     | 100   | μΑ   |
| Collector to emitter voltage            | $V_{CEO}$            | $I_C = 25 \text{ mA}, I_B = 0$                                    | 60  |     |       | V    |
| Forward current transfer ratio *        | $h_{FE}$             | $V_{CE} = 4 \text{ V}, I_{C} = 0.5 \text{ A}$                     | 500 |     | 2 500 |      |
| Collector to emitter saturation voltage | V <sub>CE(sat)</sub> | $I_C = 2 A, I_B = 0.05 A$   |     |     | 1.0   | V    |
| Transition frequency                    | $f_T$                | $V_{CE} = 12 \text{ V}, I_C = 0.2 \text{ A}, f = 200 \text{ MHz}$ |     | 50  |       | MHz  |

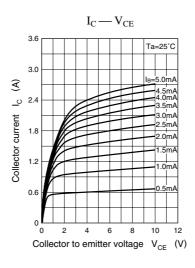
Note) \*: Rank classification

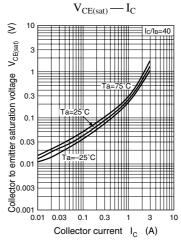
| _ | Rank     | Р            | Q            | R              |  |
|---|----------|--------------|--------------|----------------|--|
|   | $h_{FE}$ | 500 to 1 000 | 800 to 1 500 | 1 200 to 2 500 |  |

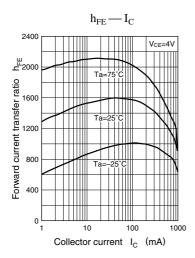
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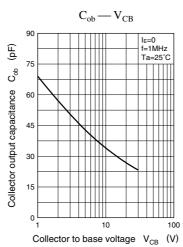
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