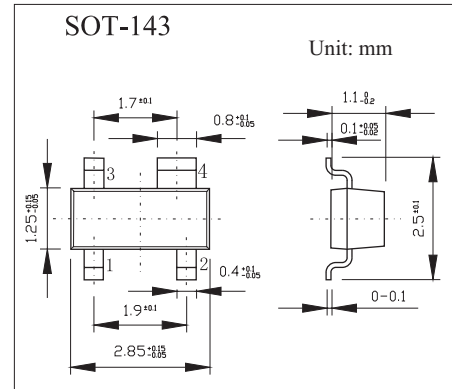


Silicon Epitaxial Planar Type

1SS306

■ Features

- Low forward voltage : $V_{F(2)} = 0.9 \text{ V(Typ)}$
- Fast reverse recovery time : $t_{rr} = 30 \text{ ns (Typ)}$
- Small total capacitance : $C_T = 1.5 \text{ pF(Typ)}$

■ Absolute Maximum Ratings $T_a = 25^\circ\text{C}$

| Parameter | Symbol | Rating | Unit |
|----------------------------------|-----------|-----------|------------------|
| Maximum (peak) reverse voltage | V_{RM} | 250 | V |
| Reverse voltage | V_R | 200 | V |
| Average forward current * | I_O | 100 | mA |
| Maximum (peak) forward current * | I_{FM} | 300 | mA |
| Surge current (10 ms) * | I_{FSM} | 2 | A |
| Power dissipation | P | 150 | mW |
| Junction Temperature | T_j | 125 | $^\circ\text{C}$ |
| Storage Temperature | T_{stg} | -55 + 125 | $^\circ\text{C}$ |

* Unit rating. Total rating = Unit rating X1.5

■ Electrical Characteristics $T_a = 25^\circ\text{C}$

| Parameter | Symbol | Test Conditions | Min | Typ | Max | Unit |
|-----------------------|------------|--------------------------------|-----|------|-----|---------------|
| Forward voltage | $V_{F(1)}$ | $I_F = 1 \text{ mA}$ | | 0.72 | 1.0 | V |
| | $V_{F(2)}$ | $I_F = 100 \text{ mA}$ | | 0.9 | 1.2 | |
| Reverse current | $I_{R(1)}$ | $V_R = 50 \text{ V}$ | | | 0.1 | μA |
| | $I_{R(2)}$ | $V_R = 200 \text{ V}$ | | | 1.0 | |
| Total capacitance | C_t | $V_R = 0, f = 1.0 \text{ MHz}$ | | 1.5 | 3.0 | pF |
| Reverse recovery time | t_{rr} | | | 30 | 60 | ns |

■ Marking

| | |
|---------|----|
| Marking | A3 |
|---------|----|