

Schottky Barrier Diode

FS1J2E

Features

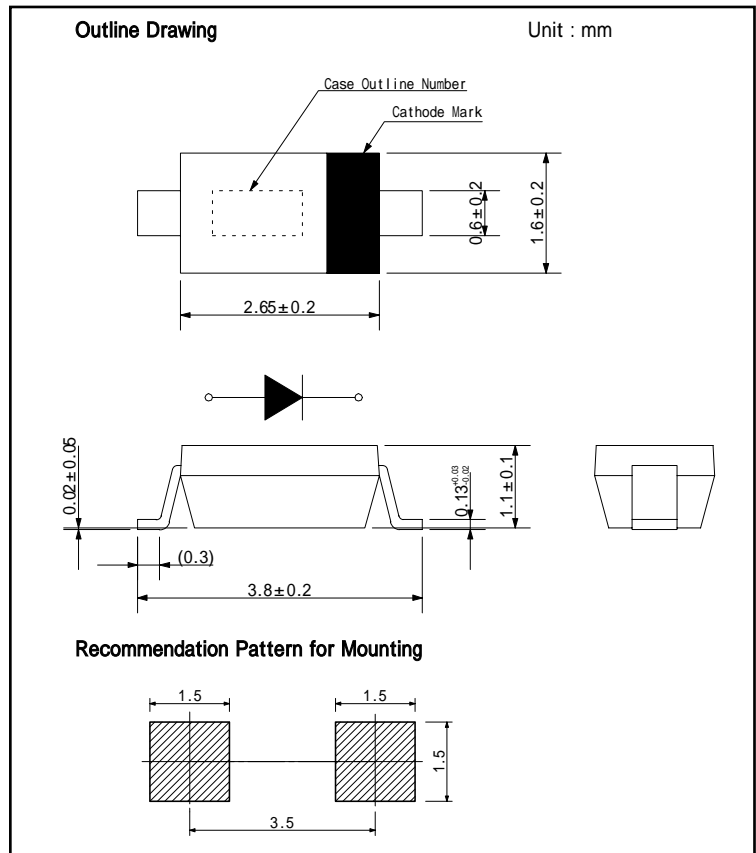
- Super Small size
- Various kinds
- Taping capable of high density mounting

Applications

- Small size power supplies
- OR diode : Preventing from reverse current by Wrong setting of a battery

Structures

- Marking symbol : [KA]
- Weight : 11mg
- Terminal plating : Sn-3Cu
- Conforms to RoHS regulations



Absolute Maximum Ratings (Ta=25 °C)

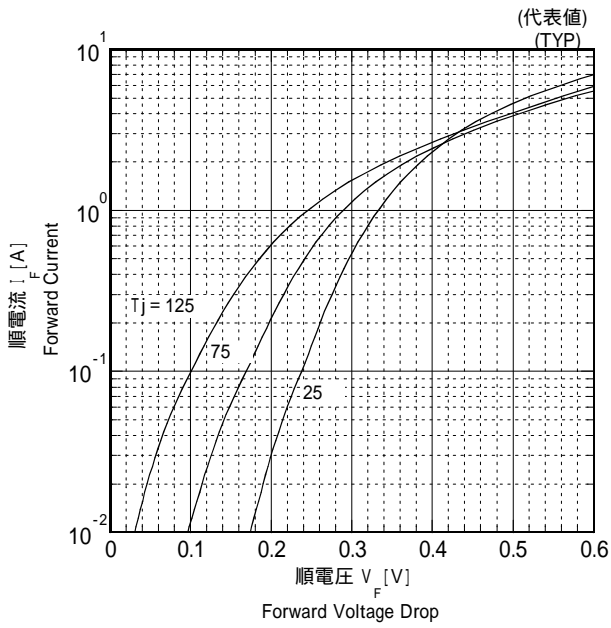
| Items | Symbol | Conditions | Ratings | Unit |
|-------------------------------------|-----------|---|------------|------|
| Repetitive Peak Reverse Voltage | V_{RM} | | 20 | V |
| Non-Repetitive Peak Reverse Voltage | V_{RSM} | | 25 | V |
| Average Rectified Forward Current | I_O | Ta=25 °C, Half sin wave 180 °, R-Load | 1 | A |
| Peak Forward Surge Current | I_{FSM} | Tj=25 °C, 50Hz, Single-phase, Half sin wave, Non-Repetitive | 10 | A |
| Operating Junction Temperature | T_J | | -40 ~ +125 | |
| Storage Temperature | T_{stg} | | -40 ~ +125 | |

Electrical Characteristics (Tj=25 °C)

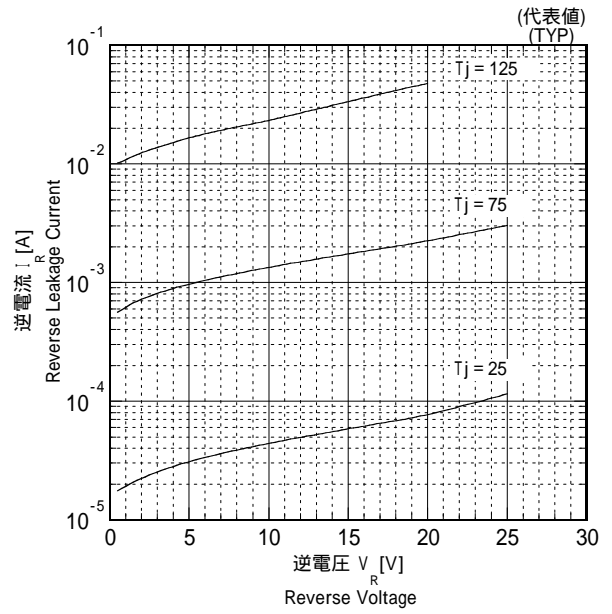
| Items | Symbol | Conditions | TYP. | MAX. | Unit |
|----------------------|----------|--|------|------|------|
| Forward Voltage Drop | V_{F1} | $I_F=0.5A$ | 300 | - | mV |
| | V_{F2} | $I_F=1A$ | 330 | 360 | mV |
| Reverse Current | I_R | $V_R=20V$ | - | 1 | mA |
| Terminal Capacitance | C_T | $V_R=10V, f=1MHz$ | 60 | - | pF |
| Thermal resistance | Rth(j-a) | Junction to Ambient, Glass Epoxy Substrate mounted () | - | 300 | /W |

() Glass Epoxy mounted. (PC board size : 20mm × 20mm, Cu land size : 4mm × 4mm)

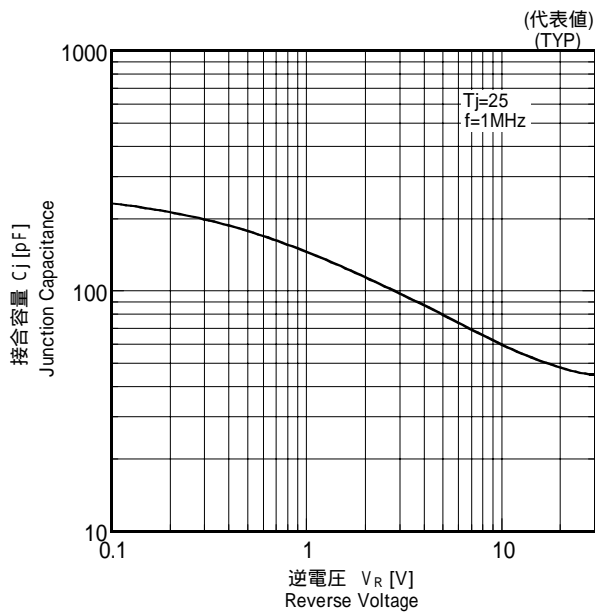
Characteristics Diagrams



FORWARD CHARACTERISTICS



REVERSE CHARACTERISTICS



TYPICAL JUNCTION CAPACITANCE