# Schottky barrier diode

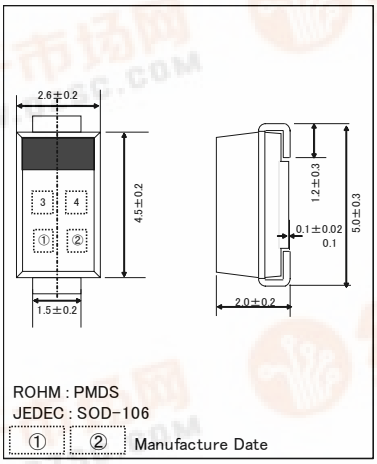
## RB160L-40

●**Applications**
General rectification

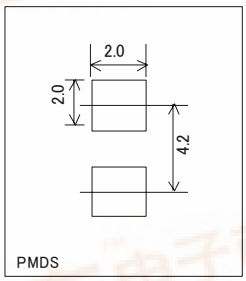
●**Features**
1) Small power mold type. (PMDS)
2) Low $I_R$.
3) High reliability.

●**Construction**
Silicon epitaxial planar

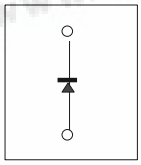
● **External dimensions** (Unit : mm)



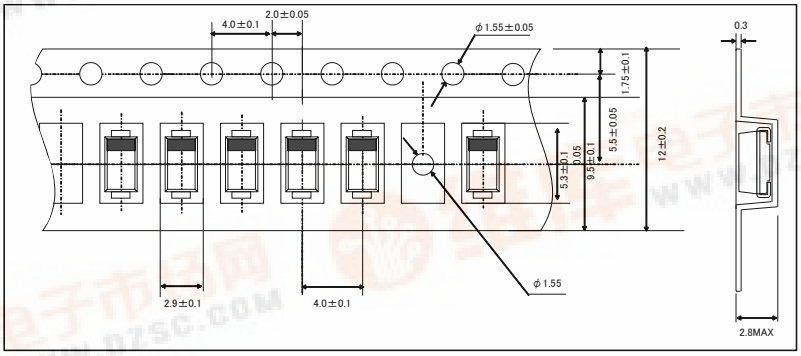

● **Land size figure** (Unit : mm)




●**Structure**



● **Taping specifications** (Unit : mm)




●**Absolute maximum ratings** (Ta=25°C)

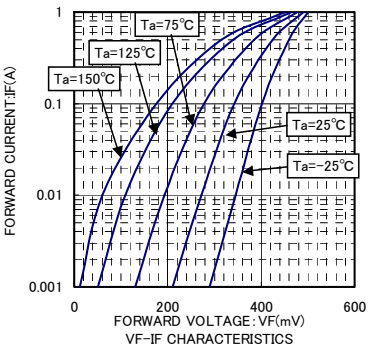
| Parameter | Symbol | Limits | Unit |
|---|---|---|---|
| Reverse voltage (repetitive peak) | $V_{RM}$ | 40 | V |
| Reverse voltage (DC) | $V_R$ | 40 | V |
| Average rectified forward current | Io | 1 | A |
| Forward current surge peak (60Hz・1cyc) | $I_{FSM}$ | 70 | A |
| Junction temperature | Tj | 150 | ℃ |
| Storage temperature | Tstg | -40 to +150 | ℃ |

(*1)Tc=90℃max Mounted on epoxy board. 180° Half sine wave

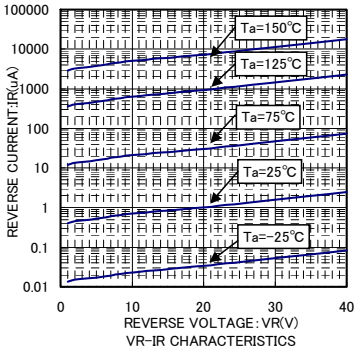
●**Electrical characteristics** (Ta=25°C)

| Parameter | Symbol | Min. | Typ. | Max. | Unit | Conditions |
|---|---|---|---|---|---|---|
| Forward voltage | $V_F$ | - | - | 0.55 | V | $I_F$=1.0A |
| Reverse current | $I_R$1 | - | - | 10 | μA | $V_R$=6V |
| | $I_R$2 | - | - | 100 | μA | $V_R$=40V |

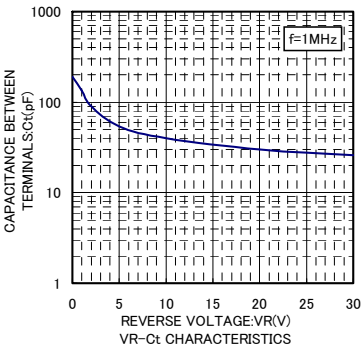
●**Electrical characteristic curves** (Ta=25°C)



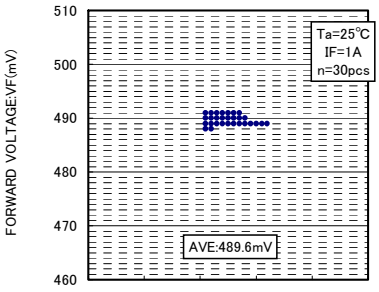

VF-IF CHARACTERISTICS



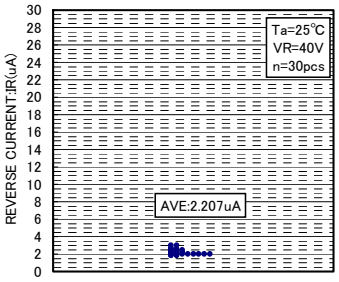

VR-IR CHARACTERISTICS



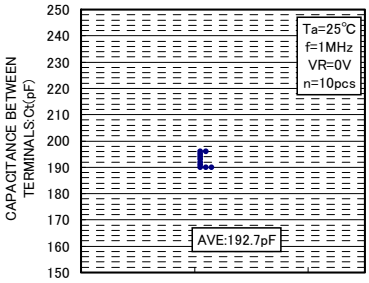

VR-Ct CHARACTERISTICS



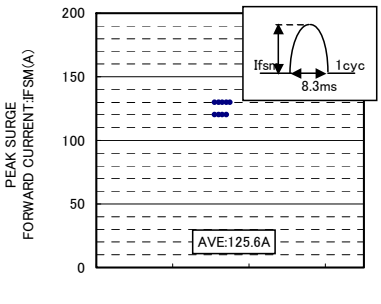

VF DISPERSION MAP



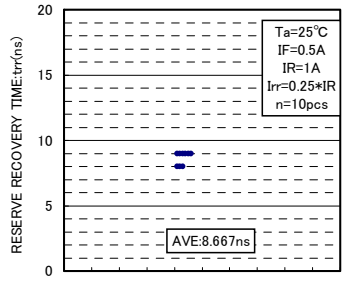

IR DISPERSION MAP



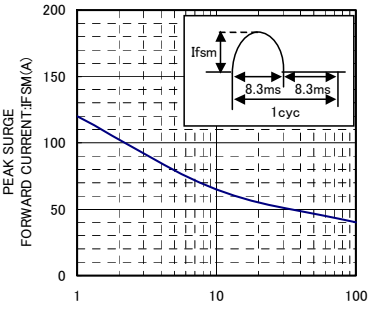

Ct DISPERSION MAP



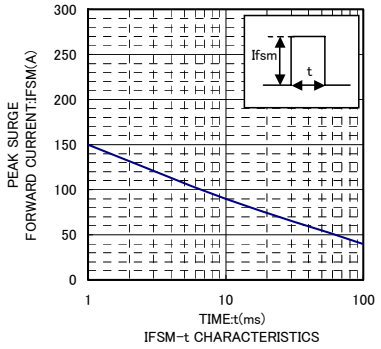

IFSM DISRESION MAP



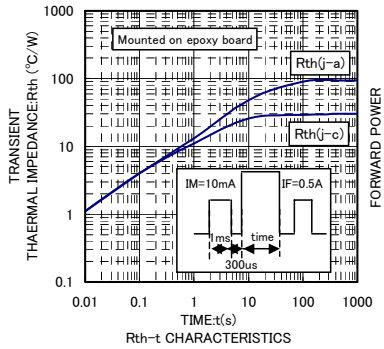

trr DISPERSION MAP



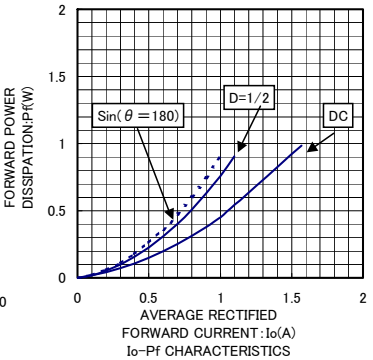

IFSM-CYCLE CHARACTERISTICS



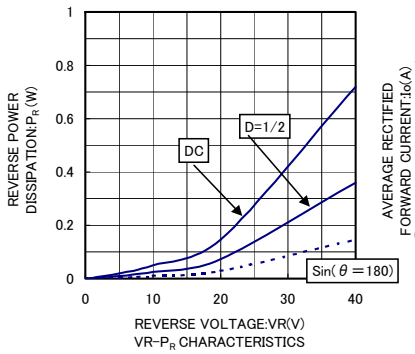

IFSM-t CHARACTERISTICS

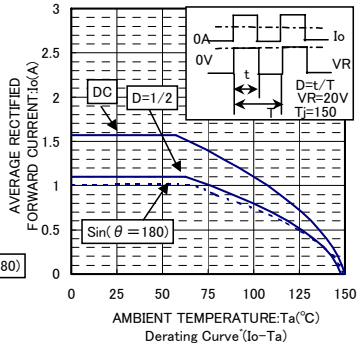


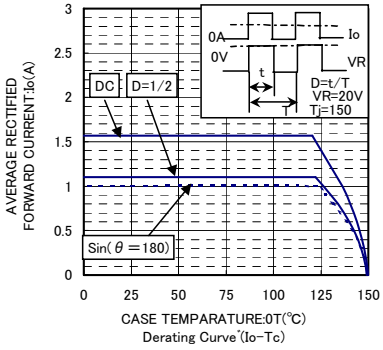

Rth-t CHARACTERISTICS

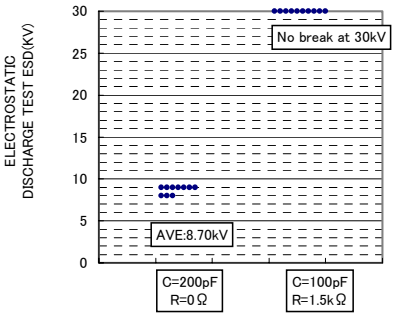



Io-Pf CHARACTERISTICS




ESD DISPERSION MAP

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