Data Sheet

Schottky Barrier Diode

RB070MS-40

●Applications

General rectification

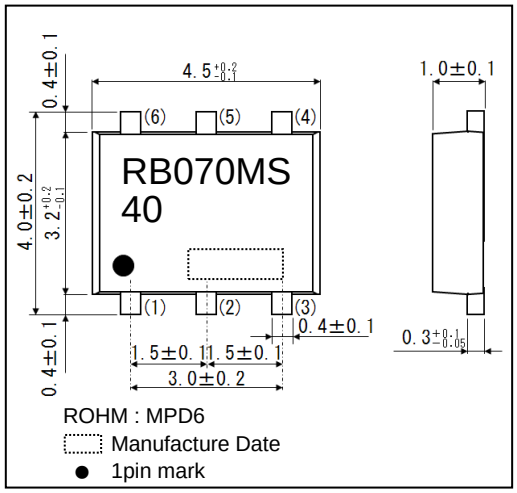
●Features

1)Small power mold type.(MPD6)
2)Low VF
3)High reliability

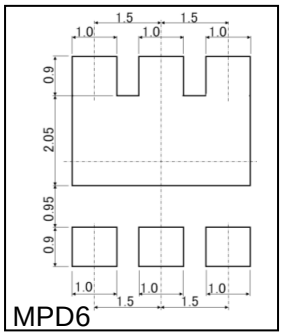
●Construction

Silicon epitaxial

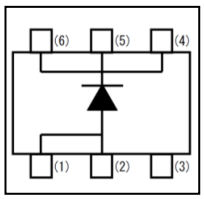
●External Dimensions(Unit : mm)



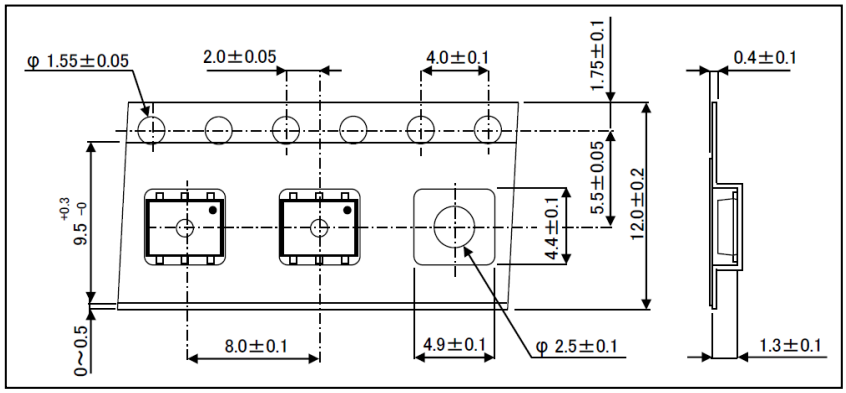
●Land Size Figure(Unit : mm)



●Structure



●Taping Dimensions(Unit : mm)



●Absolute Maximum Ratings(Ta=25°C)

Parameter	Symbol	Limits	Unit
Reverse voltage (repetitive)	V_{RM}	40	V
Reverse voltage (DC)	V_R	40	V
Average rectified forward current	Io	5	A
Forward current surge peak (60Hz・1cyc)	I_{FSM}	30	A
Junction temperature	Tj	150	°C
Storage temperature	Tstg	−55 to +150	°C

(*1)Mounting on epoxi 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=5.0A
Reverse current	I_R	–	–	250	μA	V_R=40V

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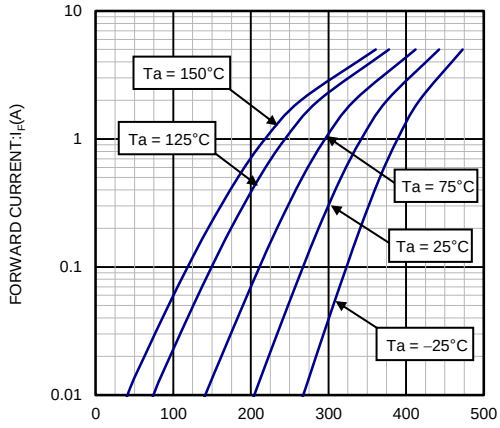
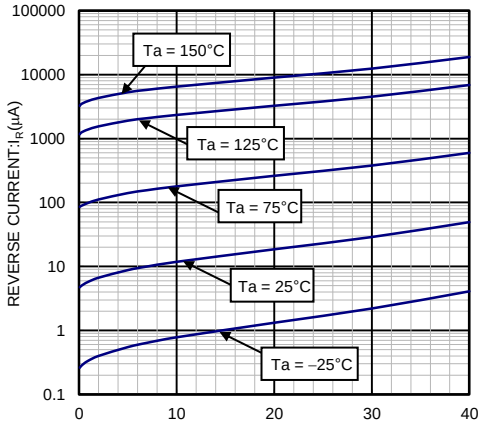
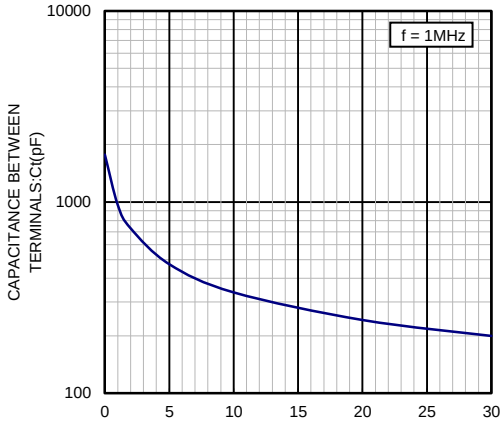


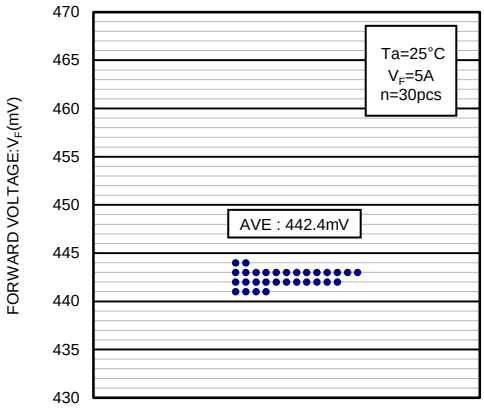
FORWARD VOLTAGE:V_F(mV)
V_F-I_F CHARACTERISTICS



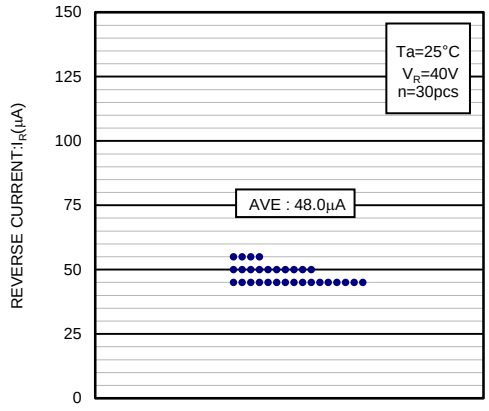
REVERSE VOLTAGE:V_R(V)
V_R-I_R CHARACTERISTICS



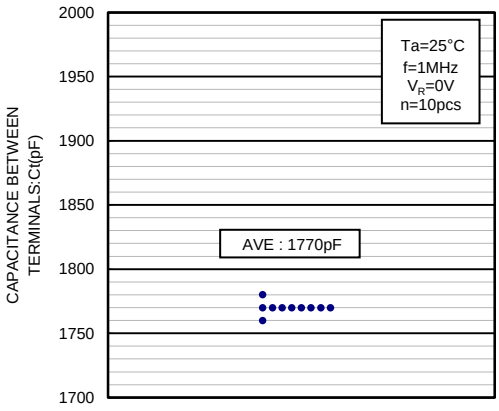
REVERSE VOLTAGE:V_R(V)
V_R-Ct CHARACTERISTICS



V_F DISPERSION MAP



I_R DISPERSION MAP



Ct DISPERSION MAP

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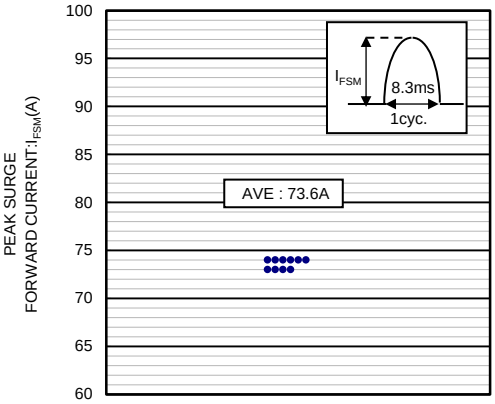
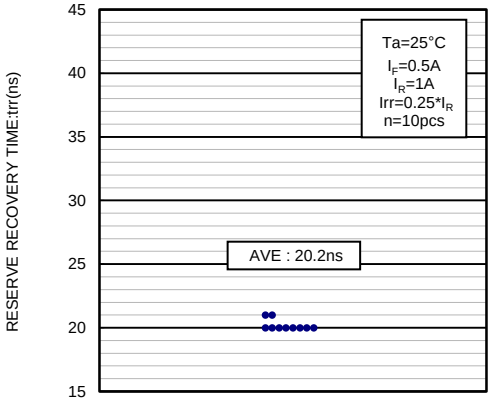
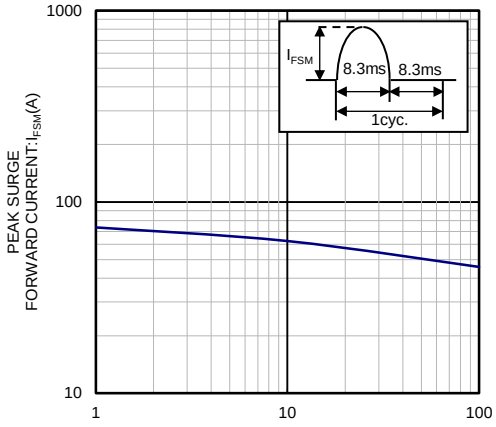


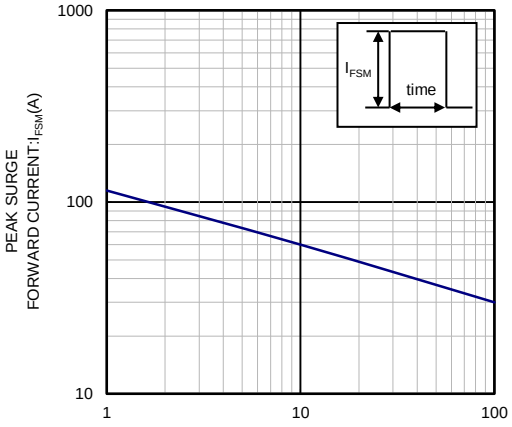
I_{FSM} DISRESION MAP



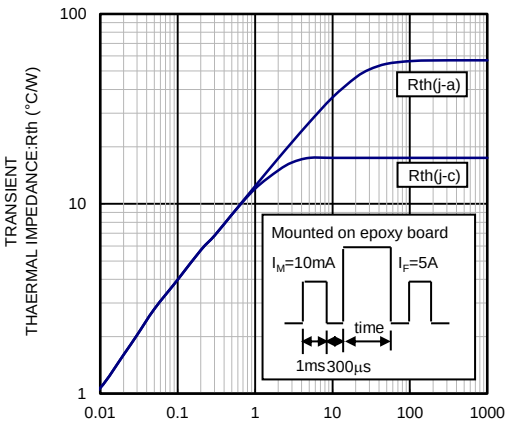
trr DISPERSION MAP



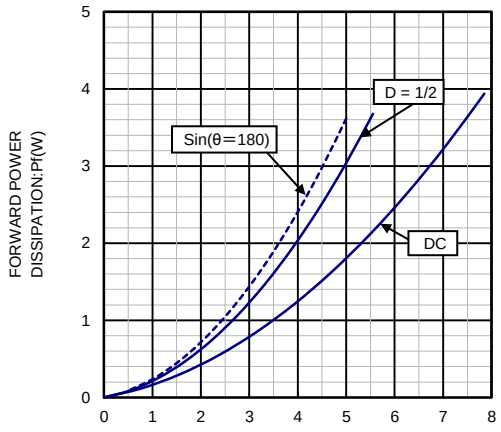
NUMBER OF CYCLES
I_{FSM}-CYCLE CHARACTERISTICS



TIME:t(ms)
I_{FSM}-t CHARACTERISTICS



TIME:t(s)
Rth-t CHARACTERISTICS



AVERAGE RECTIFIED
FORWARD CURRENT:Io(A)
Io-Pf CHARACTERISTICS

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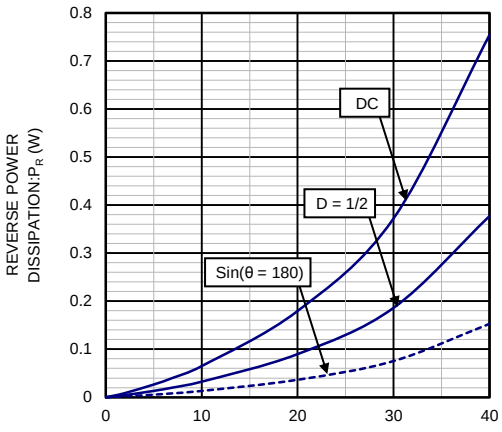
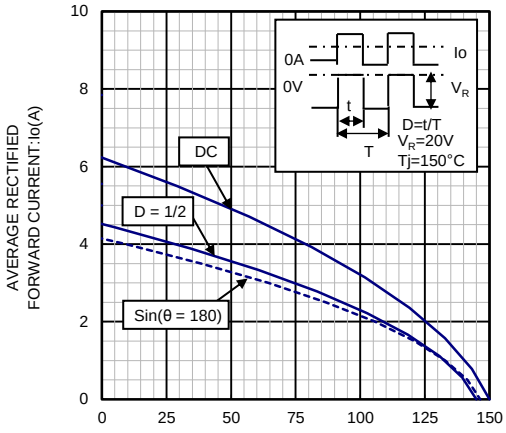
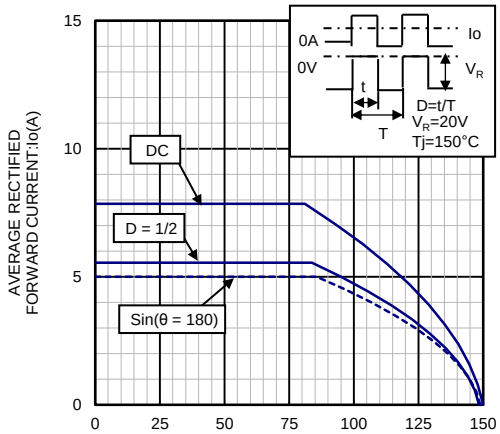


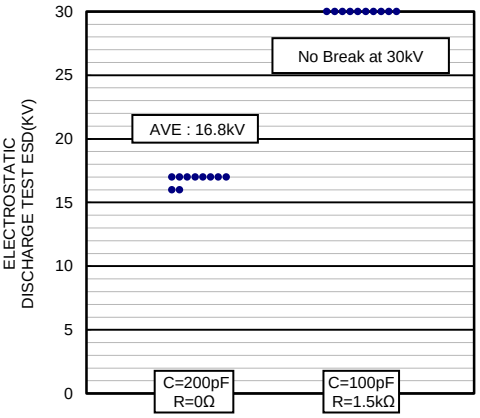
REVERSE VOLTAGE:V_R(V)
V_R-P_R CHARACTERISTICS



AMBIENT TEMPERATURE:Ta(°C)
DERATING CURVE(Io-Ta)



CASE TEMPARATURE:Tc(°C)
DERATING CURVE(Io-Tc)



ESD DISPERSION MAP

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