MA3XD11

Silicon epitaxial planar type

For high-frequency rectification

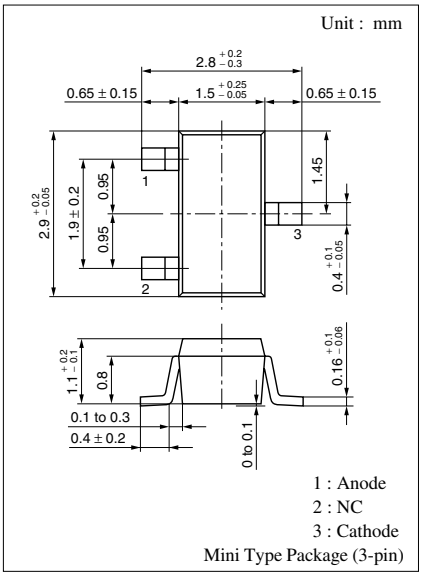
■ Features

- Sealed in the Mini type 3-pin package
- Allowing to rectify under ($I_{F(AV)}$ = 1 A) condition
- Low forward rise voltage V_F

■ Absolute Maximum Ratings $T_a = 25°C$

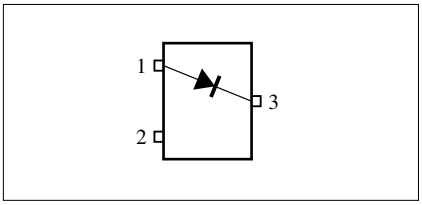
Parameter	Symbol	Rating	Unit
Reverse voltage (DC)	V_R	20	V
Repetitive peak reverse voltage	V_{RRM}	25	V
Average forward current*1	$I_{F(AV)}$	1.0	A
Non-repetitive peak forward surge current*2	I_{FSM}	3	A
Junction temperature	T_j	125	°C
Storage temperature	T_{stg}	−55 to +125	°C

Note) *1 : With a alumina PC board
*2 : The peak-to-peak value in one cycle of 50 Hz sine-wave (non-repetitive)



Marking Symbol: M6K

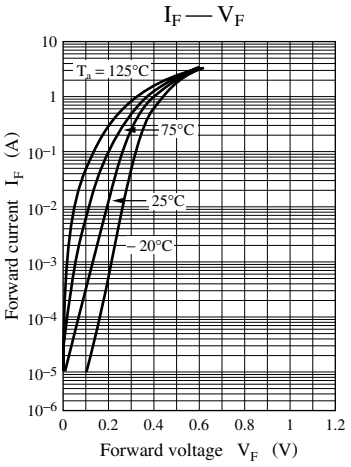
Internal Connection

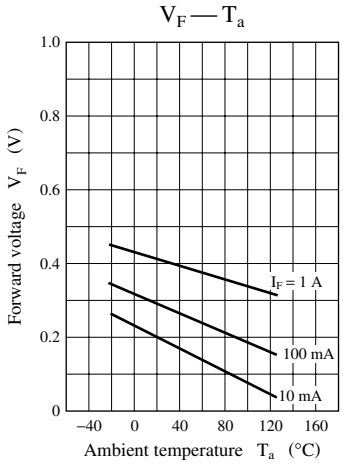


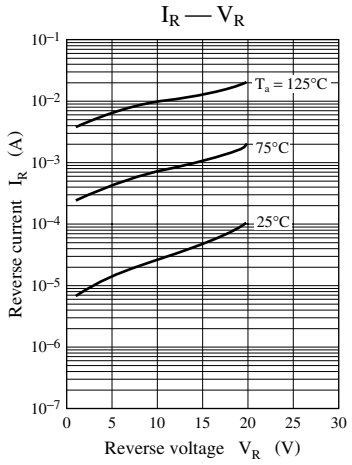
■ Electrical Characteristics $T_a = 25°C \pm 3°C$

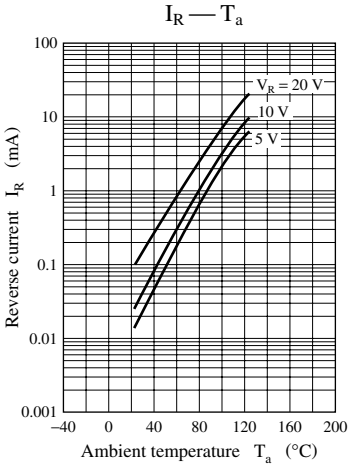
Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Reverse current (DC)	I_R	V_R = 20 V			200	μA
Forward voltage (DC)	V_F	I_F = 1.0 A			0.45	V
Terminal capacitance	C_t	V_R = 0 V, f = 1 MHz		180		pF

Note) 1. Schottky barrier diode is sensitive to electric shock (static electricity, etc.). Due attention must be paid on the charge of a human body and the leakage of current from the operating equipment
2. Rated input/output frequency: 400 MHz


I_F — V_F
T_a = 125°C
75°C
25°C
– 20°C
Forward current I_F (A)
Forward voltage V_F (V)


V_F — T_a
I_F = 1 A
100 mA
10 mA
Forward voltage V_F (V)
Ambient temperature T_a (°C)


I_R — V_R
T_a = 125°C
75°C
25°C
Reverse current I_R (A)
Reverse voltage V_R (V)


I_R — T_a
V_R = 20 V
10 V
5 V
Reverse current I_R (mA)
Ambient temperature T_a (°C)