

MA2J111

Silicon epitaxial planar type

For switching circuits

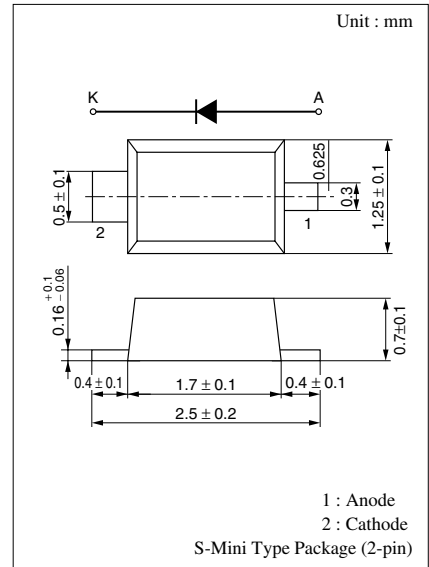
■ Features

- Small S-mini type package, allowing high-density mounting
- Short reverse recovery time t_{rr}
- Small terminal capacitance, C_t
- High breakdown voltage ($V_R = 80$ V)

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

Parameter	Symbol	Rating	Unit
Reverse voltage (DC)	V_R	80	V
Peak reverse voltage	V_{RM}	80	V
Average forward current	$I_{F(AV)}$	100	mA
Peak forward current	I_{FM}	225	mA
Non-repetitive peak forward surge current*	I_{FSM}	500	mA
Junction temperature	T_j	150	$^\circ\text{C}$
Storage temperature	T_{stg}	-55 to +150	$^\circ\text{C}$

Note) * : $t = 1$ s



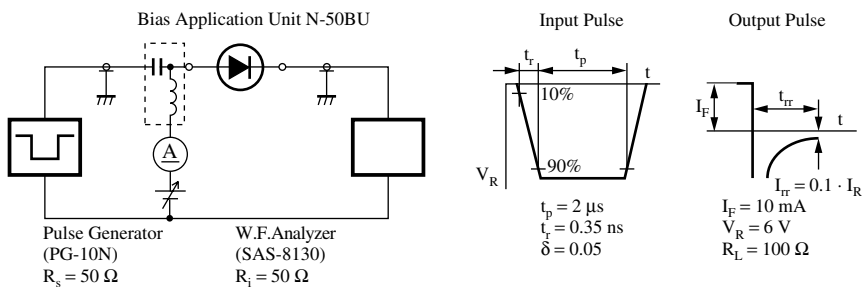
Marking Symbol: 1B

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

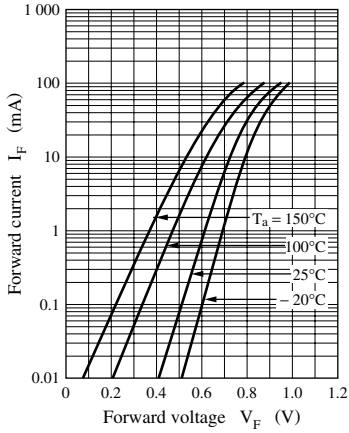
Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Reverse current (DC)	I_R	$V_R = 75$ V			100	nA
Forward voltage (DC)	V_F	$I_F = 100$ mA		0.95	1.2	V
Reverse voltage (DC)	V_R	$I_R = 100$ μA	80			V
Terminal capacitance	C_t	$V_R = 0$ V, $f = 1$ MHz		0.6	1.2	pF
Reverse recovery time*	t_{rr}	$I_F = 10$ mA, $V_R = 6$ V $I_{rr} = 0.1 \cdot I_R$, $R_L = 100$ Ω			3	ns

Note) 1. Rated input/output frequency: 100 MHz

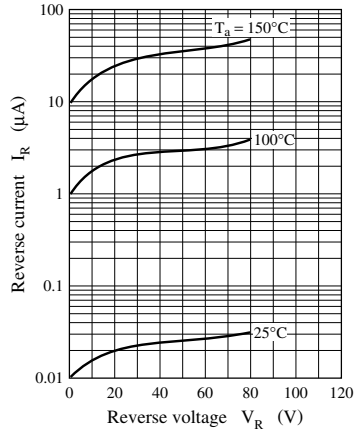
2. * : t_{rr} measuring circuit



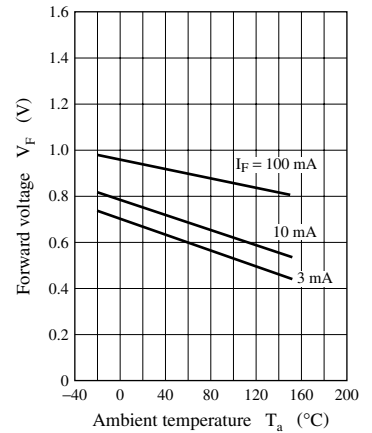
$I_F - V_F$



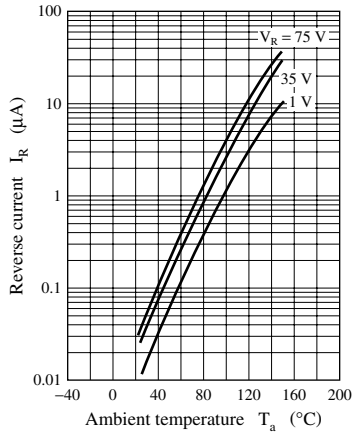
$I_R - V_R$



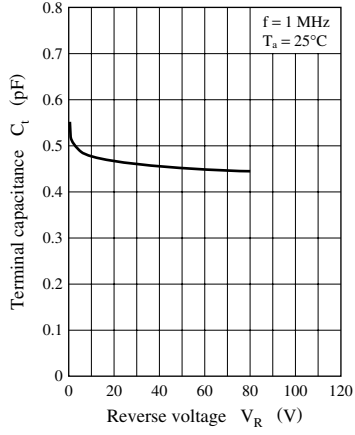
$V_F - T_a$



$I_R - T_a$



$C_t - V_R$



$I_{F(surge)} - t_w$

