

MA3X704D, MA3X704E

Silicon epitaxial planar type

For switching circuits

For wave detection circuit

■ Features

- Two MA3X704As are contained in one package
- Low forward rise voltage (V_F) and satisfactory wave detection efficiency (η)
- Small temperature coefficient of forward characteristic
- Extremely low reverse current I_R

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

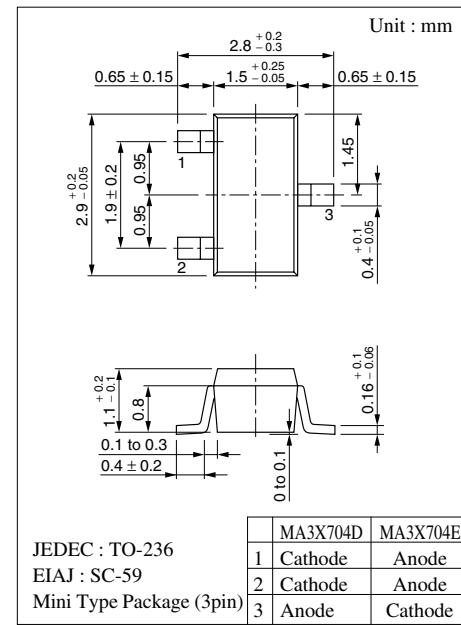
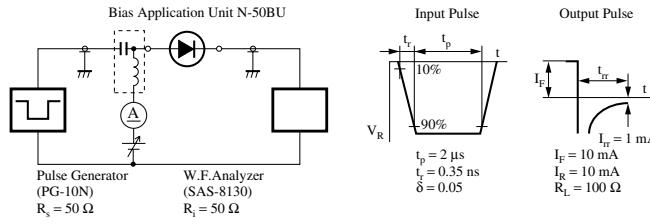
Parameter	Symbol	Rating	Unit
Reverse voltage (DC)	V_R	30	V
Peak forward current Single	I_{FM}	150	mA
Double*	110		
Forward current (DC)	I_F	30	mA
Double*	20		
Junction temperature	T_j	125	$^\circ\text{C}$
Storage temperature	T_{stg}	-55 to +125	$^\circ\text{C}$

Note) * : Value per chip

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

Parameter	Symbol	Conditions	Min	Typ	Max	Unit
Reverse current (DC)	I_R	$V_R = 30 \text{ V}$			1	μA
Forward voltage (DC)	V_{F1}	$I_F = 1 \text{ mA}$			0.4	V
	V_{F2}	$I_F = 30 \text{ mA}$			1.0	V
Terminal capacitance	C_t	$V_R = 1 \text{ V}, f = 1 \text{ MHz}$		1.5		pF
Reverse recovery time*	t_{rr}	$I_F = I_R = 10 \text{ mA}$ $I_{rr} = 1 \text{ mA}, R_L = 100 \Omega$		1.0		ns
Detection efficiency	η	$V_{in} = 3 \text{ V}_{(\text{peak})}, f = 30 \text{ MHz}$ $R_L = 3.9 \text{ k}\Omega, C_L = 10 \text{ pF}$		65		%

- 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: 2 000 MHz
 3. * : t_{rr} measuring instrument



Marking Symbol

- MA3X704D : M2P • MA3X704E : M2R
- Internal Connection

