

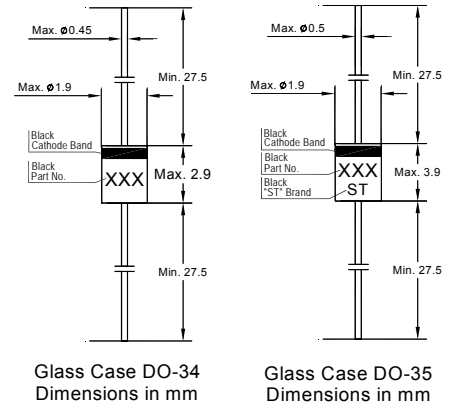
# MA700, MA700A

## Silicon Epitaxial Planar Schottky Barrier Diodes

for ordinary wave detection  
for super high speed switching

### Features

- Low forward voltage and good wave detection efficiency
- Low reverse current



### Absolute Maximum Ratings ( $T_a = 25\text{ }^\circ\text{C}$ )

Parameter	Symbol	Value	Unit
Peak Reverse Voltage	$V_{RM}$	15	V
		30	
Reverse Voltage	$V_R$	15	V
		30	
Forward Current	$I_F$	30	mA
Peak Forward Current	$I_{FM}$	150	mA
Junction Temperature	$T_j$	125	$^\circ\text{C}$
Storage Temperature Range	$T_{stg}$	- 55 to + 125	$^\circ\text{C}$

### Characteristics at $T_a = 25\text{ }^\circ\text{C}$

Parameter	Symbol	Typ.	Max.	Unit
Forward Voltage at $I_F = 1\text{ mA}$ at $I_F = 30\text{ mA}$	$V_F$	-	0.4	V
		-	1	
Reverse Current at $V_R = 15\text{ V}$ at $V_R = 30\text{ V}$	$I_R$	-	600	nA
		-	600	
Terminal Capacitance at $V_R = 1\text{ V}$ , $f = 1\text{ MHz}$	$C_T$	1.3	-	pF
Reverse Recovery Time at $I_F = I_R = 10\text{ mA}$ , $I_{rr} = 1\text{ mA}$ , $R_L = 100\text{ }\Omega$	$t_{rr}$	1	-	ns
Detection Efficiency at $V_{in} = 3\text{ V}_{(peak)}$ , $f = 30\text{ MHz}$ , $R_L = 3.9\text{ K}\Omega$ , $C_L = 10\text{ pF}$	$\eta$	60	-	%

