

MA321

Silicon epitaxial planer type

For UHF and VHF electronic tuners

■ Features

- Large capacity variation ratio
- Small series resistance r_D

■ Absolute Maximum Ratings (Ta= 25°C)

Parameter	Symbol	Rating	Unit
Reverse voltage (DC)	V_R	30	V
Peak reverse voltage	V_{RM}^*	35	V
Forward current (DC)	I_F	20	mA
Junction temperature	T_j	150	°C
Storage temperature	T_{stg}	- 55 to + 150	°C

* $R_L=10k\Omega$

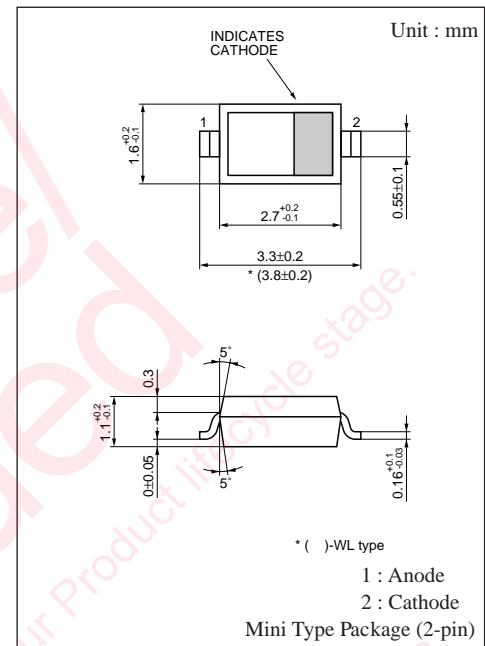
■ Electrical Characteristics (Ta= 25°C)

Parameter	Symbol	Condition	min	typ	max	Unit
Reverse current (DC)	I_R	$V_R=28V$			10	nA
Diode capacitance	$C_{D(2V)}$	$V_R=2V, f=1MHz$	14.360		16.340	pF
	$C_{D(25V)}$	$V_R=25V, f=1MHz$	2.089		2.448	pF
	$C_{D(10V)}$	$V_R=10V, f=1MHz$	5.433		6.369	pF
	$C_{D(17V)}$	$V_R=17V, f=1MHz$	2.945		3.452	pF
Capacitance ratio	$C_{D(2V)}/C_{D(25V)}$		5.95		7.26	—
Diode capacitance deviation	ΔC	$C_{D(2V)}(10V)(17V)(25V)$			2	%
Series resistance	r_D^*	$C_D=9pF, f=470MHz$			0.6	Ω

Note 1 : Rated input/output frequency : 470MHz

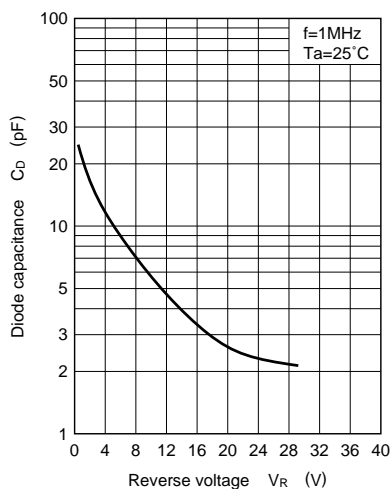
2 : * r_f measurement device : YHP MODEL 4191A RF IMPEDANCE ANALYZER

■ Marking

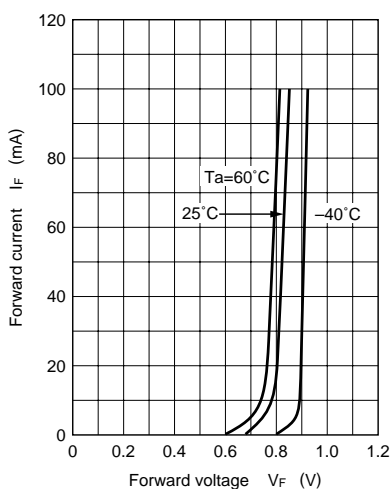


Marking Symbol : 6A

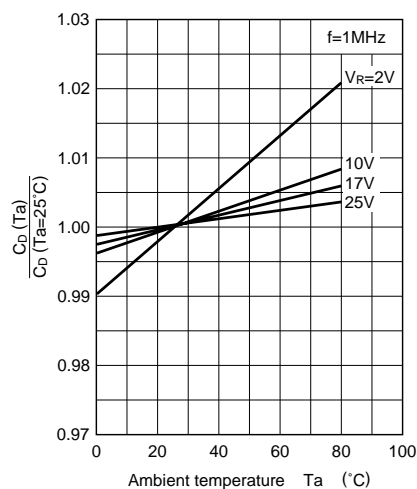
$C_D - V_R$



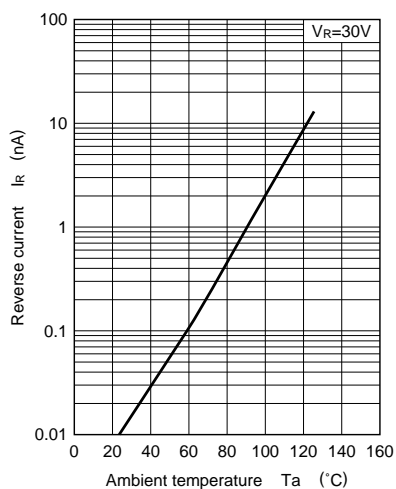
$I_F - V_F$



$C_D - T_a$

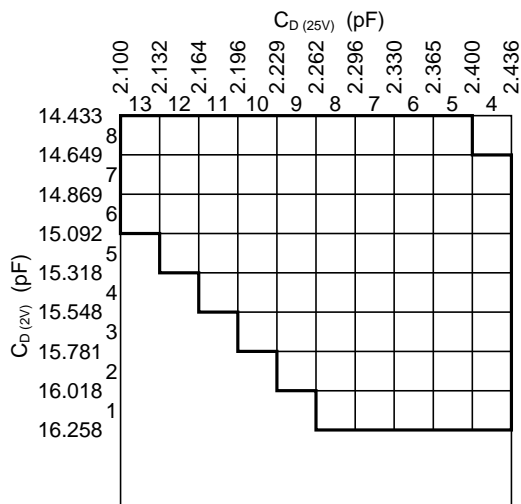


$I_R - T_a$

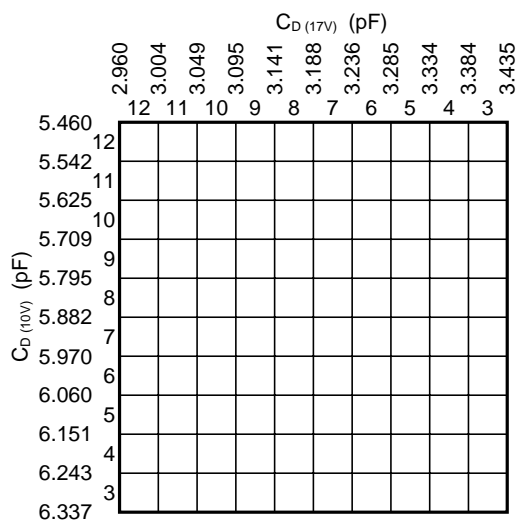


C_D rank classification

Primary rank classification



Secondary rank classification



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