

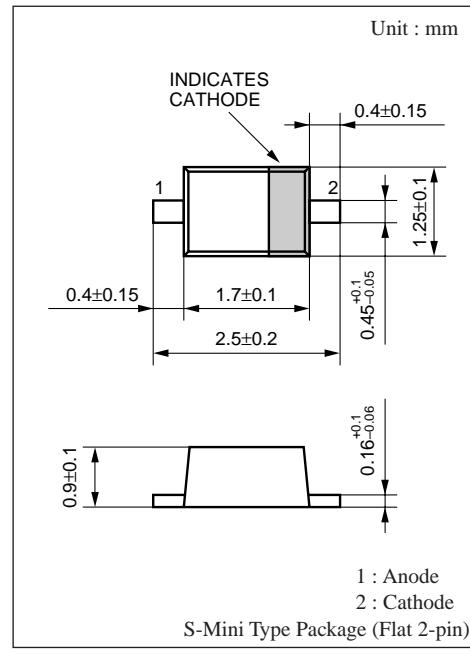
MA357J

Silicon epitaxial planer type

For CATV tuner

■ Features

- Large capacity variation ratio
- Small series resistance r_D



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

Parameter	Symbol	Rating	Unit
Reverse voltage (DC)	V_R	34	V
Peak reverse voltage	V_{RM} *	35	V
Junction temperature	T_j	150	$^\circ\text{C}$
Storage temperature	T_{stg}	-55 to +150	$^\circ\text{C}$

* $R_L=10\text{k}\Omega$

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

Parameter	Symbol	Condition	min	typ	max	Unit
Reverse current (DC)	I_R	$V_R = 30\text{V}$			10	nA
Diode capacitance	$C_{D(0V)}^*$ ²	$V_R = 0\text{V}, f = 1\text{MHz}$	58.0			pF
	$C_{D(2V)}$	$V_R = 2\text{V}, f = 1\text{MHz}$	29.00		34.30	pF
	$C_{D(25V)}$	$V_R = 25\text{V}, f = 1\text{MHz}$	2.53		2.92	pF
	$C_{D(10V)}$	$V_R = 10\text{V}, f = 1\text{MHz}$	6.40		8.32	pF
	$C_{D(17V)}$	$V_R = 17\text{V}, f = 1\text{MHz}$	3.50		4.35	pF
Capacitance ratio	$C_{D(2V)}/C_{D(25V)}$		11.0			—
Diode capacitance deviation	ΔC	$C_D(2V)(10V)(17V)(25V)$			2.0	%
Series resistance	r_D^* ¹	$C_D = 9\text{pF}, f = 470\text{MHz}$			0.54	Ω

Note 1. Rated input/output frequency : 470MHz

2. r_D measurement device : YHP MODEL 4191A RF IMPEDANCE ANALYZER

3. * 2 : Low Signal Level

■ Marking



