

TOSHIBA Diode Silicon Epitaxial Planar Type

JDV2S19S

VCO for the UHF band

- High capacitance ratio: $C_{1V}/C_{4V} = 1.8$ (typ.)
- Low series resistance: $r_s = 0.35 \Omega$ (typ.)
- This device is suitable for use in a small-size tuner.

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

Characteristic	Symbol	Rating	Unit
Reverse voltage	V_R	10	V
Junction temperature	T_j	150	$^\circ\text{C}$
Storage temperature range	T_{stg}	-55~150	$^\circ\text{C}$

Unit: mm

JEDEC	—
JEITA	—
TOSHIBA	1-1K1A

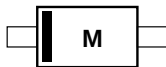
Electrical Characteristics ($T_a = 25^\circ\text{C}$)

Weight: 0.0011 g (typ.)

Characteristic	Symbol	Test Condition	Min	Typ.	Max	Unit
Reverse voltage	V_R	$I_R = 1 \mu\text{A}$	10	—	—	V
Reverse current	I_R	$V_R = 10 \text{ V}$	—	—	3	nA
Capacitance	C_{1V}	$V_R = 1 \text{ V}, f = 1 \text{ MHz}$	3.46	—	3.87	pF
	C_{4V}	$V_R = 4 \text{ V}, f = 1 \text{ MHz}$	1.83	—	2.13	
Capacitance ratio	C_{1V}/C_{4V}	—	1.74	—	1.91	—
Series resistance	r_s	$V_R = 1 \text{ V}, f = 470 \text{ MHz}$	—	0.35	0.47	Ω

Note: Signal level when capacitance is measured: $V_{sig} = 100 \text{ mVrms}$

Marking



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