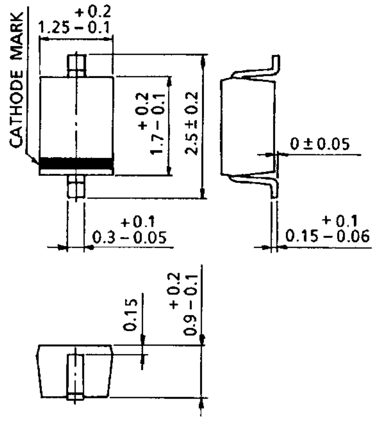
TOSHIBA Diode Silicon Epitaxial Planar Type

1SV322

TCXO/VCO

Unit: mm



USC

JEDEC	—
JEITA	—
TOSHIBA	1-1E1A

Weight: 0.004 g (typ.)

- High capacitance ratio: $C_{1\,V}/C_{4\,V} = 4.3$ (typ.)
- Low series resistance: $r_s = 0.4\ \Omega$ (typ.)
- Useful for small size tuner.

Maximum Ratings (Ta = 25°C)

Characteristics	Symbol	Rating	Unit
Reverse voltage	V_R	10	V
Junction temperature	T_j	125	°C
Storage temperature range	T_{stg}	−55~125	°C

Electrical Characteristics (Ta = 25°C)

Characteristics	Symbol	Test Condition	Min	Typ.	Max	Unit
Reverse voltage	V_R	$I_R = 1\ \mu A$	10	—	—	V
Reverse current	I_R	$V_R = 10$ V	—	—	3	nA
Capacitance	$C_{1\,V}$	$V_R = 1$ V, f = 1 MHz	26.5	—	29.5	pF
Capacitance	$C_{4\,V}$	$V_R = 4$ V, f = 1 MHz	6.0	—	7.1	pF
Capacitance ratio	$C_{1\,V}/C_{4\,V}$	—	4.0	4.3	—	—
Series resistance	r_s	$V_R = 4$ V, f = 100 MHz	—	0.4	0.8	Ω

Note: Signal level when capacitance is measured: Vsig = 500 mVrms

Marking