

TOSHIBA Variable Capacitance Diode Silicon Epitaxial Planar Type

# 1SV160

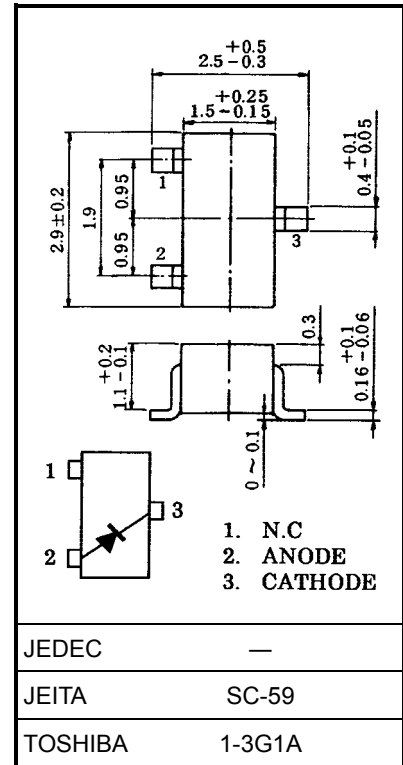
## AFC Application for FM Receiver

- Small package.
- Low series resistance:  $r_s = 0.7 \Omega$  (typ.)

### Maximum Ratings (Ta = 25°C)

Characteristics	Symbol	Rating	Unit
Reverse voltage	$V_R$	15	V
Junction temperature	$T_j$	125	°C
Storage temperature range	$T_{stg}$	-55~125	°C

Unit: mm

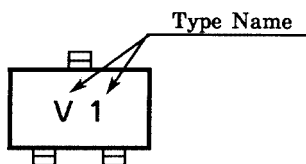


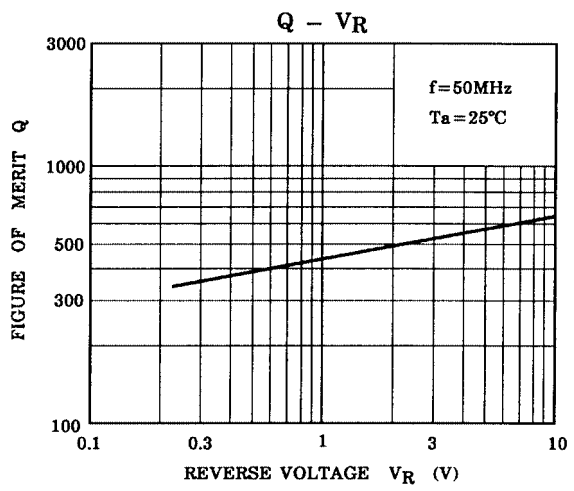
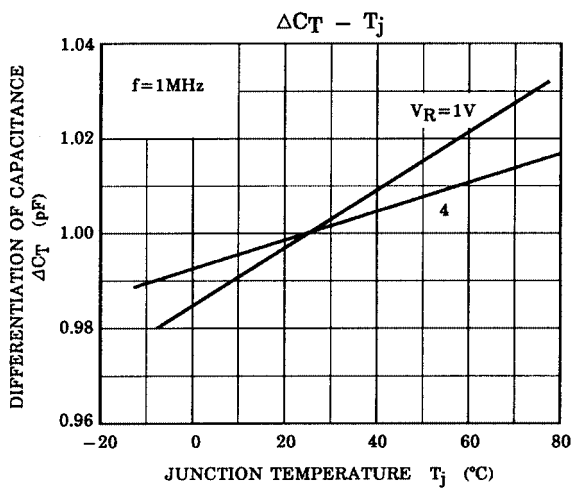
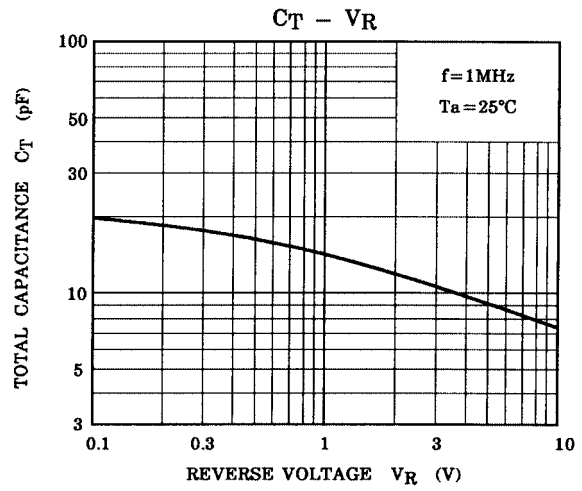
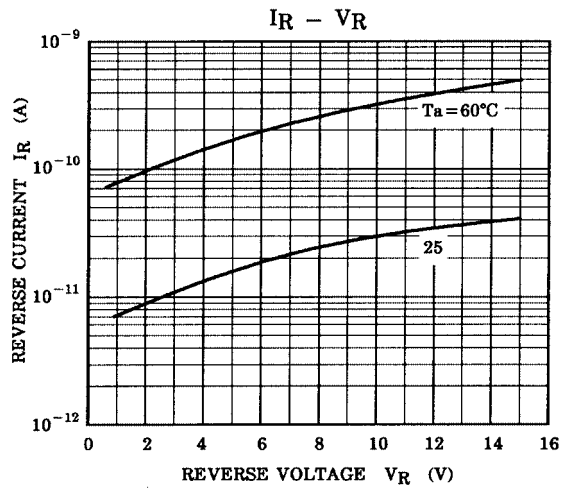
### Electrical Characteristics (Ta = 25°C)

Weight: 0.012 g (typ.)

Characteristics	Symbol	Test Condition	Min	Typ.	Max	Unit
Reverse current	$I_R$	$V_R = 4 \text{ V}$	—	—	100	nA
Reverse voltage	$V_R$	$I_R = 10 \mu\text{A}$	15	—	—	V
Total capacitance	$C_T$	$V_R = 4 \text{ V}, f = 1 \text{ MHz}$	7	—	14	pF
Capacitance ratio	$C_2 \text{ V}/C_4 \text{ V}$	—	1.2	—	1.5	—
Series resistance	$r_s$	$V_R = 4 \text{ V}, f = 50 \text{ MHz}$	—	0.7	1.2	$\Omega$

### Marking





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