

Variable Capacitance Diode

Silicon Epitaxial Planar Type

VCO For UHF Ratio

Features

- Ultra Low Series Resistance : $r_s = 0.2\Omega$ (Typ.)
- Useful for Small Size Set

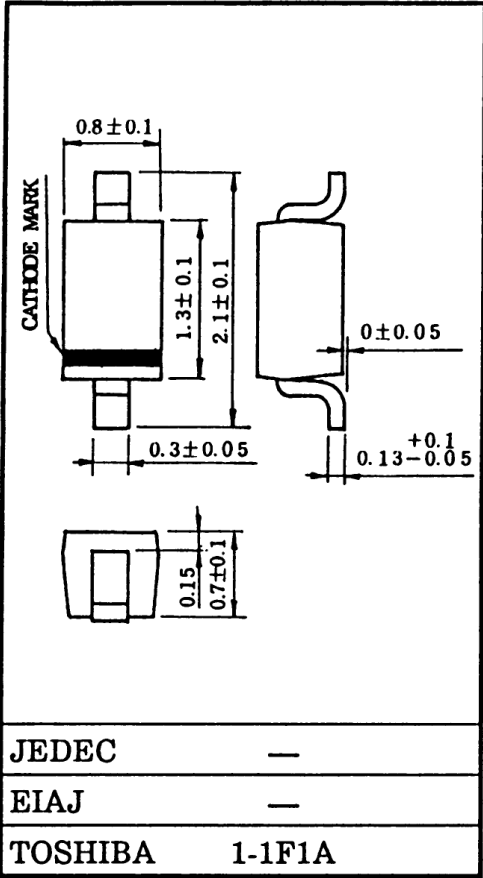
Absolute Maximum Ratings (Ta = 25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Reverse Voltage	V_R	15	V
Junction Temperature	T_j	125	°C
Storage Temperature Range	T_{stg}	-55 ~ 125	°C

Electrical Characteristics (Ta = 25°C)

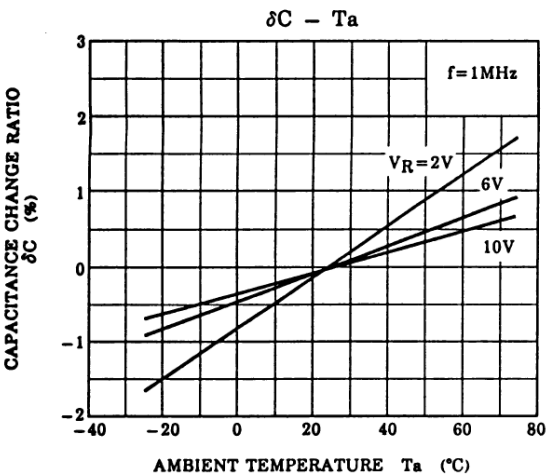
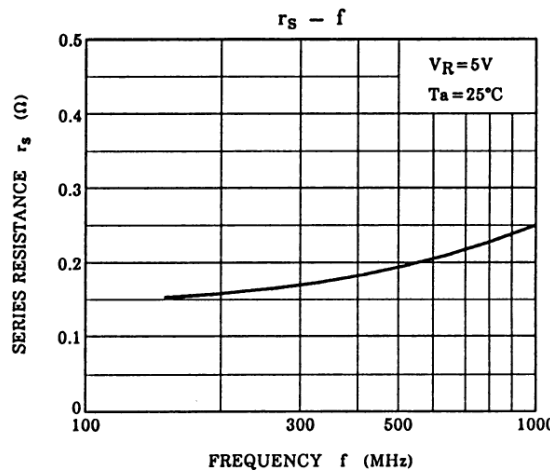
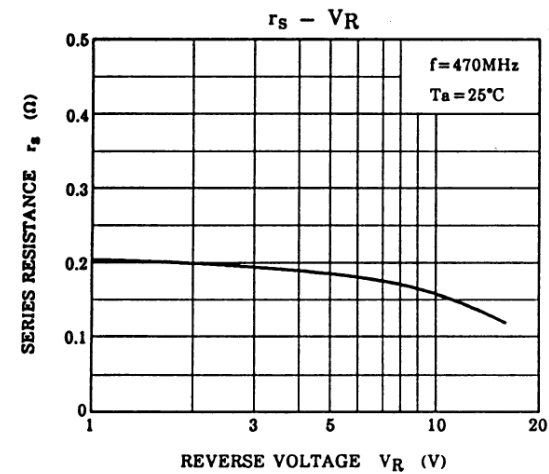
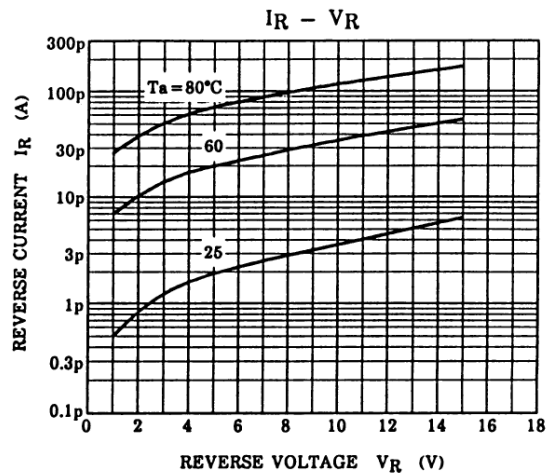
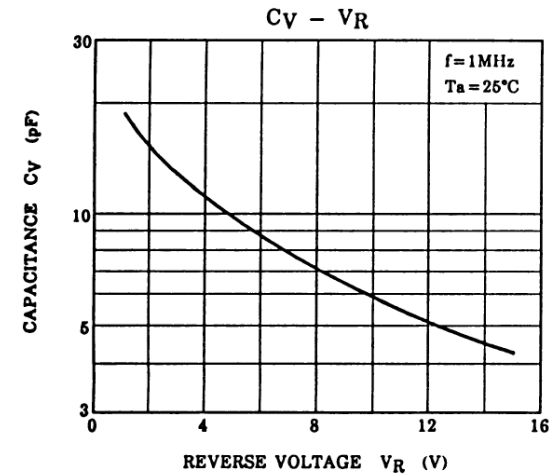
CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Reverse Voltage	V_R	$I_R = 1\mu A$	15	—	—	V
Reverse Current	I_R	$V_R = 15V$	—	—	3	nA
Capacitance	C2V	$V_R = 2V, f = 1MHz$	14	15	16	pF
Capacitance	C10V	$V_R = 10V, f = 1MHz$	5.5	6	6.5	pF
Capacitance Ratio	C2V/C10V	—	2.0	2.5	—	—
Series Resistance	r_s	$V_R = 5V, f = 470MHz$	—	0.2	0.4	Ω

Unit in mm



Marking





NOTE : $\delta C (\%) = \frac{C(T_a) - C(25)}{C(25)} \times 100$

The information contained here is subject to change without notice.
The information contained herein is presented only as guide for the applications of our products. No responsibility is assumed by TOSHIBA for any infringements of patents or other rights of the third parties which may result from its use. No license is granted by implication or otherwise under any patent or patent rights of TOSHIBA or others. These TOSHIBA products are intended for usage in general electronic equipments (office equipment, communication equipment, measuring equipment, domestic electrification, etc.) Please make sure that you consult with us before you use these TOSHIBA products in equipments which require high quality and/or reliability, and in equipments which could have major impact to the welfare of human life (atomic energy control, spaceship, traffic signal, combustion control, all types of safety devices, etc.). TOSHIBA cannot accept liability to any damage which may occur in case these TOSHIBA products were used in the mentioned equipments without prior consultation with TOSHIBA.