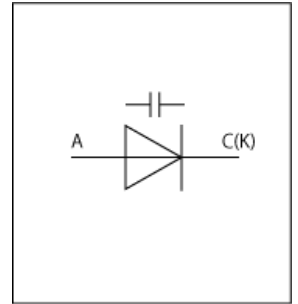


PSpice Model

Variable Capacitance Diode

SANYO

SVC321C



Model Information

Model A macro model based on general SPICE diode model
Call Name MDC_SVC321C_PS
Pin Assign 1:A 2:C
File List Model Library MDC_SVC321C_PS02.lib
 Model Report MDC_SVC321C_PS.pdf (this file)

Verified Simulator Version PSpice version 17.2
Note

References

The information which was used for modeling is as follow:

[Data Sheet]

- Date/Version Unknown
- Product name SVC321C
- Company name SANYO Electric Co., Ltd.
- Characteristics $C_jV_r, Q_{factor}V_r[Freq], I_rV_r[Temp]$

Simulation Range

This table shows the range of evaluated simulation range that was not occurs any convergence problems in this area.

Item	Range			Unit
	Min.		Max.	
Reverse Voltage	0	to	16	V
Temperature	-55	to	100	deg C

Diode

○ : Implemented
× : Not Implemented
— : Not applicable

Model Functions Table

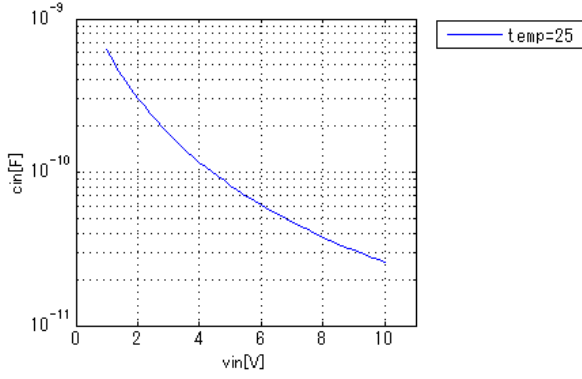
RANK=1

Functions	RANK	Implemented
IF-VF(Temp)	1	—
IR-VR(Temp)	1	○
Capacitance	1	○
Reverse recovery characteristics	1	—
Zz-Iz	1	—
Rectification characteristics(Bridge)	1	—
Surge voltage-Transient	1	—
Qfactor	1	○

Simulation results are following.
 Explanatory notes — : simulated

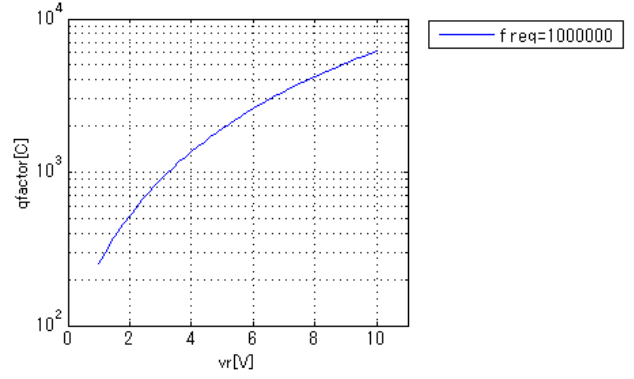
CjVr

Freq = 1000000Hz

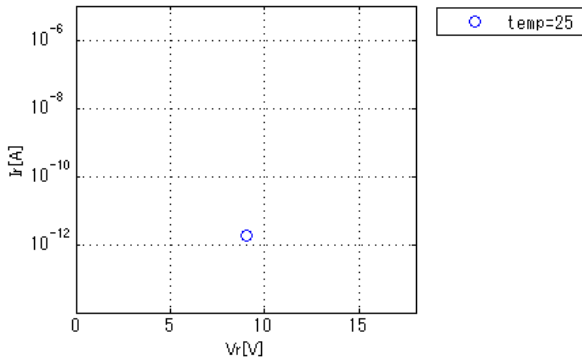


QfactorVr[Freq]

Temp = 25degC



IrVr[Temp]



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