



SVC389 — AM Low Voltage Electronic Tuning Applications

Hyper-Abrupt Junction Type Silicon Composite Varactor

Features

- Twin type varactor diode for AM electronic tuning use.
- Miniaturization and high-integration of tuner sets can be easily achieved due to the small package.
- High capacitance ratio and high quality factor.
- Provided in a tape reel packaging.
- Surface mount type.

Specifications

Absolute Maximum Ratings at Ta=25°C

Parameter	Symbol	Conditions	Ratings	Unit
Reverse Voltage	V _R		16	V
Junction Temperature	T _J		150	°C
Storage Temperature	T _{stg}		-55 to +150	°C

Electrical Characteristics at Ta=25°C

Parameter	Symbol	Conditions	Ratings			Unit
			min	typ	max	
Breakdown Voltage	V(BR)R	I _R =10μA	16			V
Reverse Current (One diode)	I _R	V _R =9V			100	nA
Interterminal Capacitance (Capacitance value of one diode)	C _{1V}	V _R =1V, f=1MHz *1	470		525	pF
	C _{6V}	V _R =6V, f=1MHz		50		pF
	C _{8V}	V _R =8V, f=1MHz	18		24	pF
Quality Factor	Q	V _R =1V, f=1MHz	200			
Capacitance Ratio	CR	C _{1V} / C _{8V} , f=1MHz	19.5			
Matching Tolerance *2	ΔC _m	(C _{max} -C _{min}) / C _{min} X100				
		V _R =1V, f=1MHz			1.5	%
		V _R =6V, f=1MHz			2.0	%
		V _R =8V, f=1MHz			2.0	%

Marking : V7

*1 : 1MHz signal : 20mVrms

*2 : Matching tolerance between D1 and D2

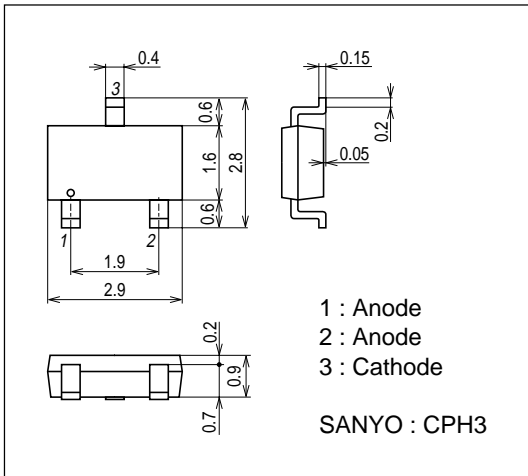
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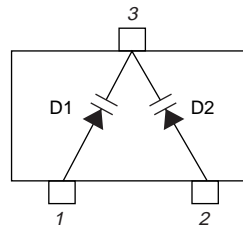
SVC389

Package Dimensions

unit : mm
7015-002

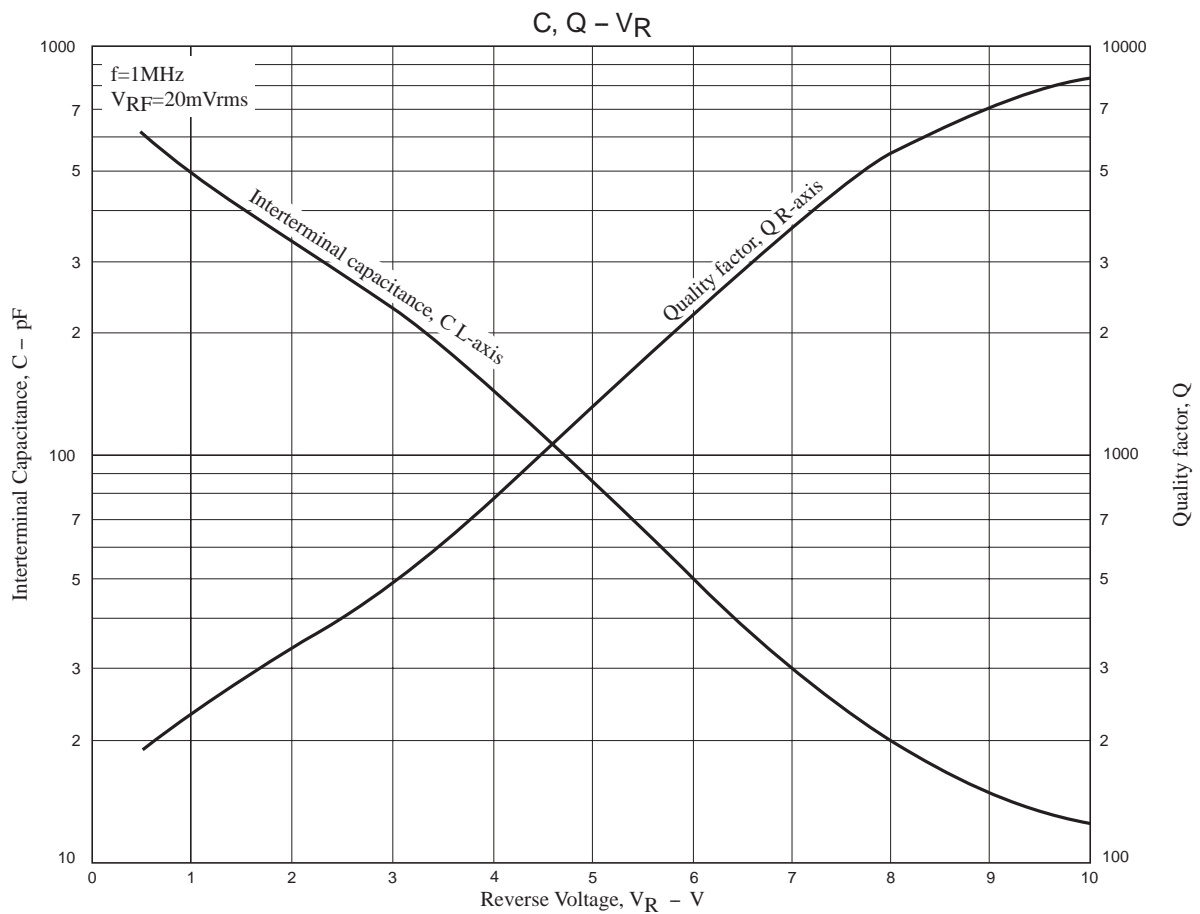


Electrical Connection



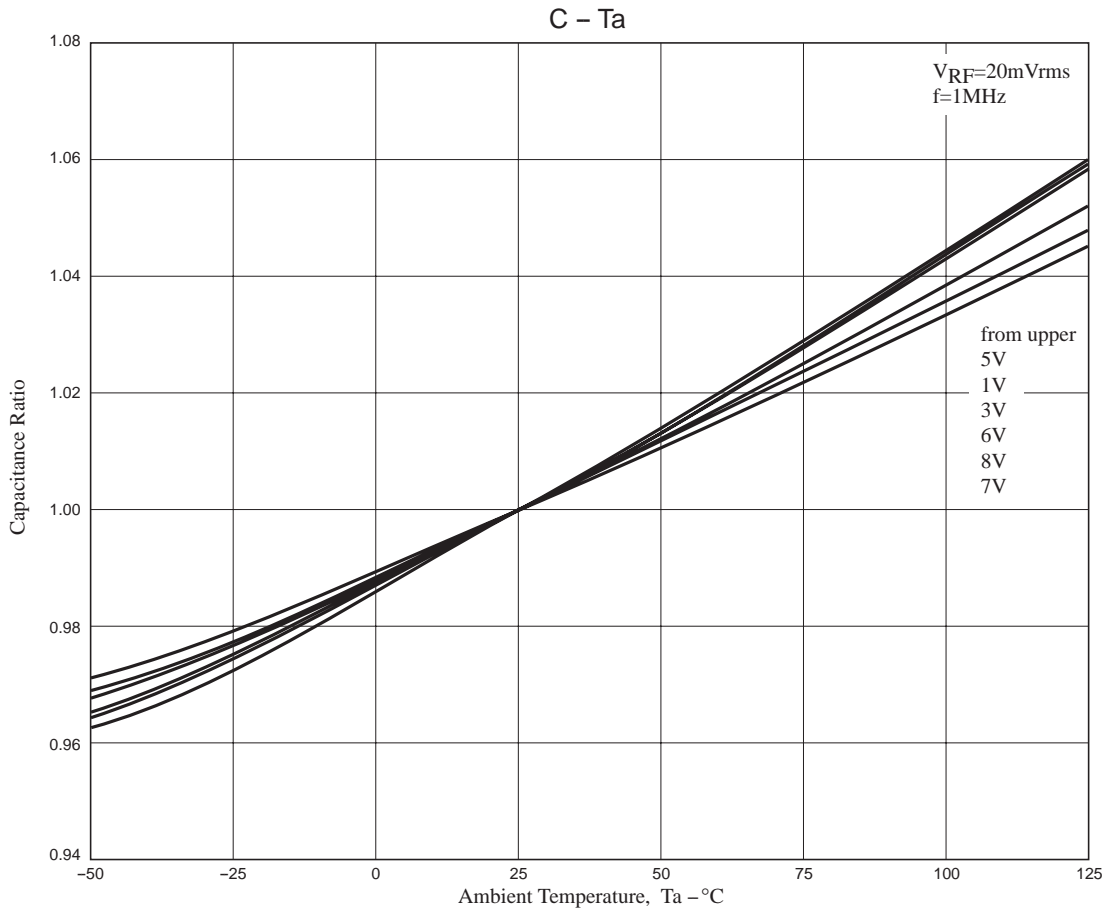
1 : Anode
2 : Anode
3 : Cathode

Top view



IT10402

SVC389



IT08372

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