Abstract

In this paper, a current-mode all-pass filter employing single multi-output dual-X second-generation current conveyor, a grounded resistor and a grounded capacitor is proposed. The circuit is as good as ideal for current-mode cascading by possessing low input and high output impedances. The use of grounded passive components makes the circuit, ideal for IC implementation. The effect of non-idealities and parasitics associated with the real MO-DXCCII implementation is also considered. The theoretical results are validated through PSPICE simulation program using 0.35µm CMOS process parameters.

References

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Single Active Element based Current-Mode All-Pass Filter


Index Terms

Computer Science
Digital Signals

Keywords

Active filters  current conveyor  all-pass filter  analog signal processing.