### Dr.S.KUMARAVEL

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## Qualification

# Ph.D (Analog & RF IC Design – January 2015)

Thesis titled "Design and Implementation of Power Efficient Folded Cascode OTAs for Biomedical and RF Applications"

Department of Electronics and Communication Engg. National Institute of Technology, Tiruchirappalli - 15

## M.E - VLSI Design

Year of Passing: July 2007

Easwari Engineering College, Chennai – 89

### **B.E** (Electronics & Instrumentation)

Govt .College of Technology, Coimbatore - 13 Year of Passing: June 1999

#### **Publications**

### **International Journals:**

- 1. Sudheer Raja Venishetty and S.Kumaravel, "Design and analysis of modified recycling folded cascode amplifier with improved transconductance and slew rate", **Engineering and Applied Science Research** Vol.47,No.4, pp: 430 438 (Publisher: Khon Kaen University, Muang, Khon Kaen, 40002 Thailand). (Scopus Indexed)
- 2. M Priyadharshni and S Kumaravel, "Design of Imprecise Multipliers By Using Approximate Technique for Error Resilient Applications", Journal of Circuits, Systems and Computers, World Scientific Publishing Company. September 2020, DOI: <a href="https://doi.org/10.1142/S0218126621501140">https://doi.org/10.1142/S0218126621501140</a> (Science Citation Index Expanded)

- Sanjay R, Venkataramani B, Kumaravel S, Senthilrajan V and Hari Kishore K, "A Low Noise Area Efficient Current Feedback Instrumentation Amplifier", Circuits, Systems, and Signal Processing, Springer Nature, DOI: <a href="https://doi.org/10.1007/s00034-020-01527-2">https://doi.org/10.1007/s00034-020-01527-2</a> August 2020. (Science Citation Index)
- 4. Sobhana Tayenjam, Venkata Vankuru and Kumaravel Sundaram, "An Analytical Model for Distributed Capacitance in Up–Down Series Stacked Inductors", IEEE Transactions on Electron Devices, Vol.67, No.9, Sep 2020, pp.3510-3515, IEEE Publications (Science Citation Index)
- 5. Senthilnathan S and Kumaravel S, "Power efficient implementation of pseudo random number generator using quantum dot cellular automata based D Flip Flop", Computers and Electrical Engineering, Vol. 85, July 2020, Elsevier Publishers. (Science Citation Index)
- **6.** Priyadharshni, M., Chathalingathu, A., Kumaravel, S. *et al.* Logically Optimal Novel 4:2 Compressor Architectures for High-Performance Applications. **Arabian Journal of Science and Engineering** 45, 6199–6209 (2020). <a href="https://doi.org/10.1007/s13369-020-04503-9">https://doi.org/10.1007/s13369-020-04503-9</a> (**Science Citation Index**)
- 7. V Senthil Rajan, K Hari Kishore, R Sanjay, S Kumaravel, B Venkataramani, "A novel programmable attenuator based low Gm-OTA for biomedical applications", Microelectronics Journal, Vol.97, February 2020, Elsevier Publishers. (Science Citation Index)
- 8. M Priyadharshni and S Kumaravel, "Low Power and area efficient error tolerant adder for image processing application" **International Journal of Circuit Theory and Applications**, Vol.48,No.5, May 2020,pp:696-708, John Wiley Publications. (Science Citation Index)
- 9. Venishetty, S.R., Kumaravel, S. & Durai, S.A.,"A power efficient low-noise source degenerated bio-potential amplifier", **Analog Integrated Circuits and Signal Processing**, 103, 291–301 (2020), Springer Nature. (**Science Citation Index**)
- 10. Sudheer Raja Venishetty and S.Kumaravel, "Modified recycling folded cascode OTA with enhancement in transconductance and output impedance", Turkish Journal of Electrical Engineering and Computer Sciences, Vol.27, No.6,pp:4472-4485, 2019, Academic Journals. (Science Citation Index Expanded)
- 11. Sobhana Tayenjam, Venkata Vankuru and Kumaravel Sundaram, "High-Q Variable Pitch Spiral Inductors for Increased Inductance Density and Figure-of-

- Merit", **IEEE Transactions on Electron Devices**, Vol.66, No.10, Oct 2020, pp.4481-4485, IEEE Publications (**Science Citation Index**)
- 12. V Senthil Rajan, R Sanjay, S Kumaravel, B Venkataramani, "Area and power efficient flipped voltage follower based symmetrical floating impedance scaler with improved accuracy for fully differential filters", **AEU-International Journal of Electronics and Communication Engineering**, Vol.106,pp.116-125, 2019, Elsevier Publishers. (Science Citation Index)
- 13. S. Satheesh Kumar, S., Kumaravel, "Design and analysis of SEU hardened latch for low power and high speed applications", **Journal of Low Power Electronics and Applications**, Vol. 9 No. 3, pp. 21, 2019, MDPI Publishers. (**Scopus Indexed**)
- 14. S. Satheesh Kumar, S., Kumaravel, "Low power and high reliable Triple Modular Redundancy latch for single and multi-node upset mitigation", **International Journal of Advanced Computer Science and Applications**, Vol. 10 No. 7, pp. 433, 2019, Science and Information Organization Publishers. (Scopus Indexed)
- **15.** Senthilnathan S and Kumaravel S, "Structural And Power Analysis of Ripple Carry Adder In QCA", **ARPN Journals**, 2018. (**Scopus Indexed**)
- **16.** B. Saidulu, M. Arun and S.Kumaravel, "Low Noise Low Power CMOS Telescopic-OTA for Bio-Medical Applications" **Computers** (*MDPI Publishers*), Vol.5(4), 25. October 2016. (**Scopus Indexed**)
- 17. S.Kumaravel, Anand Kukde, B.Venkataramani and R.Raja, "A High Linearity and High Gain Folded Cascode Low Noise Amplifier for Narrowband Receiver Applications" in **Microelectronics Journal** (**Elsevier**), Vol. 54, pp 101 108, August 2016.
- 18. B. Sai Abhinav, Suresh Ambati, S.Kumaravel, "A low noise chopper stabilized CMOS fully differential OP-AMP with CMFB amplifier for biopotential signals monitoring" International Journal of Applied Engineering Research (Research India Publications), Vol.10 No. 14, 2015, pp 34458 34463.