

Researcher: Dr. P. Senthil

Research profile: He holds Ph.D. from Anna University in VLSI design. His research domains are in the area of hardware design for arithmetic, hardware security and computer architecture.

Profile

Education:

PhD (VLSI) Information and Communication Engineering. Jun 2014 to Feb 2021

Anna University, Chennai, India.

Dissertation title: “Design and Implementation of Subnormal Floating-point SoC for Secured Signal Processing using Pipeline Interconnect”

ME VLSI design (PT)- 7.76 CGPA 2012

Oxford Engineering College, Trichy- Affiliated to Anna University, Chennai

BE Computer Science Engineering- 68% 2007

M. Kumarasamy College of Engineering, Karur- Affiliated to Anna University, Chennai

Diploma in Electronics and Communication Engineering – 77.5% 2000

Government Polytechnic, Trichy

SSLC – 87 % 1997

Marist High School, Karur

Experience:

- Design and research experience (June 2014 to Feb 2021)-Floating point data path SoC for subnormal processing with microarchitectural design
- Teaching experience (Dec 2011 to Dec 2018) as assistant professor in Electronics and Communication Engineering, Chettinad College of Engineering and Technology Karur
- Freelance in Hardware design and VLSI (Jan 2019 to Mar 2022)

Papers presented (Journal and conference)

P.Senthil and Dr.VE.Jayanthi, “Alleviation of Data Timing Channels in Normalized/Subnormal FloatingPoint Multiplier” Journal of Circuits, Systems and Computers, World Scientific Publisher. Vol. 30, No. 1(2021), World Scientific Publishing Company. DOI:10.1142/S0218126621200012 2120001 (24 pages). (Indexed SCI-E IF: 1.369)

Dr.VE.Jayanthi, P.senthil, “Design a hybrid VLSI architecture for visible digital image watermarking in spatial and frequency domain” Journal of Circuits, Systems and Computers. World Scientific Publishing Company. Published online: DOI:10.1142/S0218126622500207. Vol. 31, No. 2 (2022 Jan). (Indexed SCI-E IF: 1.369).

A.Kavitha, Anusiya saral and P.Senthil, “Design Model of Retiming

Multiplier For FIR Filter & its Verification” International Journal of Pure and Applied Mathematics, Volume 116 No. 12 2017, 239-247. (Indexed in scopus) DOI: 10.12732/ijpam.v116i12.25

P. Senthil, P.Saravanan, Dr. Utku KOSE, Sudhir Kumar Sharma and K. Vijayakumar, “Resource Efficient Embedded Floating Point Unit with Microarchitectural State Implementation in FPGA” Microprocessor and Microsystems, Elsevier, Submitted on Jan 2021, Status-review completed as on 10.03.2021. (Indexed in SCI-E, IF: 1.139)

P.Senthil, P.Saravanan, “Area-Latency Efficient Floating Point Adder using Interleaved Alignment and Normalization” Integration the VLSI Journal. Elsevier, Submitted on August 2021. Status- with editor. (Indexed SCI-E IF: 1.211).

M. Mohanraj, **P. Senthil**, “Hybrid wave-pipelined adder” 2016 International Conference on Computing for Sustainable Global Development (INDIA.Com) Pages: 1525 – 1527 **IEEE Conference**.
Link: <https://ieeexplore.ieee.org/document/7724521>

PATENT- Published

Title of Invention: **An Effective Method of Switching Activity Reduction in Multiplexer Using Canonic Signed Digit**, Application Number: **201941028504 (U/S 11A)**, Publication Date: **02/08/2019**