Columbia University 24 W. 76th Street, 1F New York, NY 10023 Jthimot90@gmail.com JThimot@ee.columbia.edu 570-709-0193 (cell)

Education:

Current:

Columbia University - P.C. Rossin College of Engineering and Applied Science

PhD Candidate - Advisor: Ken Shepard

MS Electrical Engineering – Degree Date: May 21st 2014 Cumulative GPA – 3.8

Previous:

Lehigh University - P.C. Rossin College of Engineering and Applied Science

Cumulative GPA – **3.96** Date Attended: Fall 2008 – Spring 2013

BS Electrical Engineering – Degree Date: May 21st 2012 – Highest Honors

BS Engineering Physics – Degree Date: May 27th 2013 – Highest Honors

Employment and Research Experience:

Wirelessly Powered Data Transfer System for Biological Systems

Columbia University Bioelectronic Systems Laboratory

Fall 2013 - Present

Designed wirelessly powered integrated systems capable of transmitting and receiving data via non-invasive methods for biological systems; both RF energy and Ultrasound energy were used as wireless power transmission methods; ASK and LSK modulation schemes were used for data transfer; the designs also used low noise amplifiers attached to biosensors and the design of a 10 bit precision SAR Data Converter

Internship in Game Systems Microprocessor Development

IBM Summer 2012

Wrote code in Groovy and SQL performing an automated statistical analysis of manufacturing functional test data for microprocessors designed for the xBox360; the code formed customizable regressions that identified hardware data that was unusual or out of product specifications and flagged wafers that were outside of yield spec.

Research on LED Digital Display Drivers

Sherman Fairchild Center for Solid State Studies

Summer 2011

Performed analog circuit design while working as a research assistant for Dr. Miltiadis Hatalis; The research goal was to create a circuit that would improve the accuracy and efficiency of the current system used to power digital display drivers.

Fabrication and Characterization of MANOS type gate stacks

Lehigh University

Summer 2010

Worked as a research assistant at the Sherman Fairchild Laboratory for Solid State Studies for the NSF REU program at Lehigh University; worked alongside Dr. Marvin White. Fabricated MANOS (a modification the SONOS NVSM gate structure) memory devices in a fabrication laboratory and performed CV measurements and analysis in LabVIEW

Jordan A. Thimot

Teaching Experience

Engineering Minor Course Teaching Assistant/Grader Fall 2012, Spring 2013 Acted as the grader and teaching assistant for two engineering minor courses on the basics of Electrical Engineering. The classes focused primarily on basic circuitry and electronic machinery.

Skills/Experience

- Experience programming in C++, Assembly, Verilog, Groovy, SQL, MIPS, JAVA
- Experience working with Cadence 16.3 Virtuoso and Encounter, MatLab, Maple12, SPICE, Microsoft Word, Excel, Powerpoint, LabVIEW, Xilinx Design Suite 12.4, ATMEL ModelSim, EAGLE PCB Layout, TannerTools L-Edit, Mathematica
- Experience in a wafer fabrication laboratory and am familiar with clean-room procedures
- Lab Experience with FPGAs, Microcontrollers, ADCs, DACs, PLLs, and most other basic circuit components
- Experience in mixed signal circuit design, data converter design, and digital synthesis
- IC design experience with 180nm, 90nm, and 32nm technologies, both traditional CMOS and SOI

Honors/Awards

Columbia University IGERT Fellowship Recipient, Elisha P. Wilbur Scholarship Prize, Joseph C. Gabuzda Memorial Prize, Harold J. Horn Prize, Philip Francis du Pont Memorial Prize in EE ('12 and '13), Lehigh Presidential Scholar, ΤΒΠ Honors Fraternity, ΦΒΚ Honors Fraternity, 2012 Lehigh ECE Senior Project Award – 1st Place, IEEE Morton Student Paper Contest – 3rd Place

Relevant Coursework

Microelectronic Circuits

Signals and Systems

Digital VLSI Circuits

Quantum Mechanics I

Advanced Analog Integrated Circuits Atomic and Molecular Physics
Advanced Circuits and Systems Nuclear and Particle Physics

Electromechanics Thermal Physics

Electricity and Magnetism I & II Analog Systems in VLSI
Digital System Design Microwave Circuit Design

Computer Architecture Digital Signal Processing

Computer Architecture Digital Signal Processing
Advanced Computer Architecture Advanced Antenna Design

Applied Integrated Circuits Control Theory

Design of Linear Electronic Circuits Optoelectronic Physics and Lightwaves

Fundamentals of Semiconductor Devices Physics of Solids

Communication Circuits Programming and Data Structures

VLSI Design Advanced Optics Laboratory
Physics Models for Electrical Devices Methods of Applied Analysis