

# Tin Thurein

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**EIT Certification:** 166-315  
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**LinkedIn:** <https://www.linkedin.com/in/tinthurein/>  
**GitHub:** <https://github.com/tthurein>  
**Country of Citizenship:** United States of America  
**Veterans' Preference:** No  
**Job Type:** Permanent, Recent Graduates  
**Work Schedule:** Full Time  
**Desired Locations:** City of San Francisco, San Mateo County, Alameda County, Contra Costa County, Marin County

## SUMMARY

Dedicated, professional, and highly motivated electrical engineer who possesses hands-on experience, and product development experience, with excellent communication and time management skills. Proficient in a wide variety of engineering software. Excellent team player who strives to go above and beyond to deliver a project that meets and exceeds expectations and thrives on challenging tasks.

## WORK EXPERIENCE

### ***R&D Engineering Tech.***

**October 2017-Present**

Nordson March, Concord, CA

- Build and test new vacuum chamber and HFE (High-Flux Electrode) designs, configure high power RF generators along with RF matching networks.
- Develop process recipe configurations for various plasma applications and chemical depositions.
- Provide technical assistance for developing advanced plasma cleaning systems that are being used for surface treatment such as wafer-level packaging, plasma deposition, ion etching, semi-conductors manufacturing and surface adhesion, as well as medical applications.
- Improve process cycle time by performing statistical analysis on collected etch and surface activation data, optimizing RF power delivery systems, and RF matching networks for highest plasma treatment, uniformity, and throughput.

- Perform FAT (Factory Acceptance Test) during the customers' buy-offs, train customers to familiarize with the MARCH HMI software as well as perform QA and QC procedures on product shipments.
- Comply with engineering documentation standards, and system specifications to meet customers' needs.

***Entry Level Optician***

**July 2017-October 2017**

Daly City Optometry, Daly City, CA

- Evaluated prescriptions in conjunction with clients' vocational and avocational visual requirements.
- Performed administrative duties such as tracking inventory and sales, submitting patient insurance information, and performing bookkeeping.
- Measured clients' bridge and eye size, temple length, vertex distance, pupillary distance, and optical centers of eyes, using measuring devices.

***Farmers Sales Producer***

**July 2015-November 2016**

Sandra Htwe Agency, San Jose, CA

- Performed administrative tasks, such as handling policy renewals and maintaining records.
- Evaluated individual customer's needs and proposed plans to meet their criteria.
- Provided customer services, such as claims, quoting rates and follow-ups.

***Front Desk Receptionist***

**March 2014-July 2015**

City College of San Francisco, Extended Opportunity and Services

- Performed database management, data entry, and word processing.
- Maintained office schedule for counselors.
- Assisted in developing more efficient and effective ways of file keeping system, and record keeping system.

***Math & English Tutor***

**June 2012-June 2013**

- Held tutoring sessions for 12th, 11th, 6th and 5th graders, providing feedback using positive reinforcement techniques to motivate and facilitate student's academic improvement.
- Assisted with homework problems, and reviewed class materials with students by means of working on solutions to problems, worksheets and assignments.
- Monitored student performance through weekly quizzes and activities.

**EDUCATION**

***Bachelor of Science, Electrical Engineering***

**September 2015-June 2017**

University of California, Santa Cruz

-Concentration: Electronics/ Optoelectronics

-3.50 Major GPA  
-Graduated with Honors in Major

- Wide breadth of courses in Physics, Mathematics, Computer Science, Electrical, Computer and Optical Engineering, with a graduate course in Optical Electronics.

**Associate of Science & Engineering**  
City College of San Francisco  
-Dean's Honor List

**August 2012-May 2015**

## COMPUTER SKILLS

**Software Engineering:** C, C++, Python, Java, JavaScript, MIPS Assembly, Verilog, HTML.

**Computer Engineering:** Logic Design, Computer Architecture, Verilog, FPGA, DSP, Communication.

**Mechanical/ Electrical Engineering:** Analog/Power Electronics, Optical Communication, Analog & Digital Communication, Microcontroller System Design and Interfacing, Material Properties, Sensor Design, Filter Design, Electronic CAD, PCB, Circuit Simulation.

**Software:** Linux/UNIX, MATLAB, SOLIDWORKS, Autodesk Inventor, Fusion 360, Allegro PCB Design, Cadence Suite, PSPICE, Eagle CAD, National Instrument Circuit Suite, Xilinx, PSoC IDE, WireShark, p5.js, processing IDE.

**Applied Mathematics:** Discrete Logic, Discrete Mathematics, Linear Algebra Differential Equations, Vector Calculus, Machine Learning, Statistical Reasoning.

## PROJECTS

**Senior Capstone Project** (1<sup>st</sup> Place Winner at Santa Cruz IDEA Hub) **January 2017-June 2017**

- Led a four-person team to develop scalable IoT Supervisory Control and Data Acquisition (SCADA) system that is capable of continuous monitoring and alerting of multiple reservoirs in case of leakage or overflow.
- Developed sensor interfacing modules to process data, push raw data onto Azure Cloud service, translate raw data to the graphical web interface and allow authorized user to monitor sensor data and energy usage.

- Implemented a near Real-Time monitoring of water meters, tank levels, pump status, and energy readings via the web interface as well as providing secure remote control access to an authorized user, while implementing in parallel with existing infrastructure.

### ***AM/FM Receiver***

**January 2015-May 2015**

- I assisted with the design of FM receiver, where I helped developing multiple stages of FM receiver such as preselector, 2 stage mixer (for converting from RF to IF(10.7MHz), then IF to much narrower 455KHz), and demodulator stage using PLL.
- I also designed AM receiver circuit consisting of an envelope detector with a low pass filter and helped with prototyping.

### ***Audio Amplifier***

**June 2014-December 2014**

- I teamed with two peers on designing and prototyping an audio amplifier, with a low SNR, and adjustable volume and gain.
- Circuit simulation in Multisim: performed frequency and DC sweep to analyze circuit's output gain and DC voltages, ensuring our design achieves desirable requirements.

### ***Adjustable Power Supply***

**June 2014-September 2014**

- I collaborated with two peers to design, simulate and prototype a switch mode, variable power supply, with output voltage ranging from 0 to 20 Volts, and has adjustable current.
- Designed and simulated in Multisim, PCB layout in Eagle.

## **EXTRA-CURRICULAR ACTIVITIES**

**Lighting Technician at Burmese Community Events:** Performed under senior technicians to implement lighting at Burmese community fund-raising live media events and assisted in creating lighting effects.