
OBJECTIVE

Graduate Architecture Intern at Hillsboro or Santa Clara

EDUCATION

- **Portland State University** Portland, OR
M.Sc Electrical and Computer Engineering, - / 4.0 *Fall 2021 – Spring 2023*
 - **Relevant Courses:**
 - * **ECE 581:** ASIC Modelling and Synthesis (Dr. Xaiyou Song - Fall 2021
 - * **ECE 585:** Microprocessor System Design (Mark Faust) - Fall 2021
 - * **(tentative) ECE 586 :** Computer Architecture (Mark Faust) - Winter 2022
 - * **(tentative) ECE 587:** Advanced CompArch I (Yuchen Huang) - Spring 2022
 - * **(tentative) ECE 588:** Advanced CompArch II (Yuchen Huang) - Fall 2022
- **College of Engineering, Pune** Pune, Maharashtra, India
B.Tech Electronics and Telecommunication Engineering, 3.2 / 4.0 (7.99/10) *May 2015 – June 2019*

EXPERIENCE

- **Tejas Networks** Mumbai, Maharashtra, India
Research and Development Engineer *August 2019 - August 2021*
 - **Networking Technologies:** Working with DHCP, VLAN tagged Traffic management, VPNs, Downstream Ingress Bandwidth, HQOS queuing, Traffic Shaping Profiles, etc.
 - **C/C++:** The software used for configuring switching capabilities of a network card is largely based in C for device drivers and C++ for higher level UI.
 - **Feature Development:** Implemented Zero Touch In-Band Management feature request by Tejas Network's client with inputs from the Sales team and feedback from QA team.
 - **Python:** Extensive scripting to trivialize monotonous commands with flexibility to adapt to situations.
 - **Training:** Trained new recruits to the team and enabled them to contribute meaningfully.
 - **SQL:** Switching Configuration stored on the network cards is in a database, which needs to be created , updated, or re-played onto the hardware as required.
- **DOT Sys Technologies** Mumbai, Maharashtra, India
Design Intern *May 2018 - August 2018*
 - **Transistor Theory:** Implemented Pulse Width Modulation to control voltage and current levels to make a within constrains of Transistor hardware.
 - **Power Electronics:** Used loose capacitors, inductions and Transformers to convert main lines supply to transistor switching compatible levels.
 - **Arduino:** Made a Programmable Battery Charger with UI implemented on Arduino + Transistor Theory and Power Electronics to manage the actual charging.
- **Eduvance** Mumabai, Maharashtra, India
Intern (B.Tech. project - Smart Paper Tracking System) *May 2017 - January 2020*
 - **IoT:** Used RPi to collect data from devices via Bluetooth and IBM cloud services to implement data storage, sync, and decision making on cloud
 - **Bluetooth:** Used Cypress Semiconductors PSOC4-BLE boards as portable markers to be attached to files to track them and provide information to RPi for syncing.

PROJECTS

- **hamming_code:** Asynchronous Hamming Encoder and Decoder in System Verilog.
- **fifo:** Parameterized fifo with no handshaking protocols for outgoing communication.
- **i2c:** I2C master and slave implemented in Verilog, currently re-writing code in to System Verilog.
- **ffind:** Small wrapper for find command in linux to make it accept grep-like arguments. Written in golang and rust.
- **Music-Player-GO:** Feature Contributions to open source Music Player app. Written in kotlin.

PERSONAL PUBLICATIONS

- **Modified MD5 Algorithm for Low-End IoT Edge Devices.:** Viraj Khatri, Dr. Vanita Agarwal. ICCCNT2019