Fernando Vazquez

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Objective

UC San Diego graduate looking to obtain a challenging software engineering position where I can apply my skills and insights to exceed expectations; A place that offers growth as a computer scientist with a collaborative team setting

EDUCATION

UNIVERSITY OF CALIFORNIA, SAN DIEGO – *LA JOLLA, CA*   **SEP 2018 – JUN 2021**
· Bachelor of Science, Computer Engineering   **GPA: 3.213**

SKILLS & ABILITIES

Technical

· Excel · PowerPoint · Eagle · Altium Designer · Vim · Linux/Unix · Git · React · ESLint · Webstorm · IntelliJ
· Circle CI · NodeJS · Python · C · C++ · Java · HTML · CSS · JavaScript · Perl · SQL · PSpice · Oscilloscope · Waveform generator · Verilog · Assembly · GDB · Valgrind · Python · PyTorch · Quartus Prime

Relevant Coursework

   Advanced Data Structures · Advanced Software Engineering · Circuits and Systems · Components and Design Techniques for Digital Systems · Data Science in Practice · Design and Analysis of Algorithms · Linear Systems Fundamentals · Principal of Computer Operating Systems · Theory of Computation · Intro to Machine Learning

EXPERIENCE

Research Assistant | Scripps Orbit and Permanent Array Center (SOPAC) | 6/2019 – Present
· Used python Flask framework to build and develop a web application that communicates to a database using SQL queries
· Used Python to web scrape, gather, and collect data from the institution archives to update and modify files using regular expressions for string parsing

Student Avionics Engineer | Rocket Propulsion Laboratory (RPL) | 10/2018 – 6/2019
· Worked in redesigning, testing, and implementing an engine controller unit
· Designed a BJT transistor array PCB to properly toggle relays by making schematics, footprint finding, and routing in Altium Designer
· Designed an INA326 instrumentation amplifier array PCB to amplify pressure transducer readings

Warehouse Logistics & IT | Socksmith Design | 3/2016 – 8/2018
· Established new company workstations, setting up user profiles in the database and setting their appropriate permissions with the inventory software used via remote desktop connections
· Overlooked inventory and fix any issues and bugs in the system using SQL, excel, and python scripts

PROJECTS

Personal Portfolio Website | 7/2021
· Built a site plan, site diagram, wireframe to design my portfolio from a user centered perspective using the progressive enhancement design philosophy.
· Technologies used were HTML, CSS, JavaScript, and Firebase for deployment

Kappa Sigma Fraternity Pi-Psi Chapter Website | 1/2021
· Developed and deployed a basic website for the Pi Psi chapter of Kappa Sigma using React and deployed it using Github pages.

Basic Computer Processing Unit | 11/2020
· Constructed a basic pipelined CPU using Verilog that would execute basic arithmetic programs to support a self-designed ISA

Tab Manager Chrome Extension | 3/2020
· Worked with a team to develop an open-source chrome extension where I developed the tab React component

Chicago Police Dispatch Correlation Report | 2/2020
· Developed a Jupyter notebook with a team where we cleansed data found from Kaggle using a pandas dataframe
· Generated a heatmap and line graphs for visualization using matlpotlib and numpy to analyze results