BRENDEN DACK
La Mirada, California 90638
714-804-4161 | brendendack@gmail.com
https://www.linkedin.com/in/brendendack/

Professional Summary

Computer Engineer with experience in hardware/software integration, technical leadership, and cross-functional collaboration.

Education & Honors

California State University, Fullerton 2021-2025
Bachelor of Science in Computer Engineering, Cum Laude
Minor in Computer Science
*Active member of **Tau Beta Pi**, the national engineering honors society*
Peer tutor for Computer Science and Engineering courses, CSUF

Technical Skills

- Programming Languages: C/C++, Python, SQL, HTML, CSS, JavaScript
- Tools & Systems: Microsoft Office Suite, Linux, Windows, macOS, iOS, Android
- Hardware & Tools: Soldering, Multimeter, Oscilloscope
- Collaboration: Team leadership, communication, adaptability, problem-solving

Experience

QSC, LLC Costa Mesa, California
Pro Audio Intern May 2023 – August 2023

- Utilized a Multimeter and Oscilloscope to achieve a 20% reduction in noise margin across several devices
- Assembled touch control devices to amplifiers according to specifications, utilizing a soldering iron and Quality Control Software, averaging 30 minutes per product
- Conducted failure analysis on test devices to identify cause of return and identifying 95% of failure points
- Repaired 80% of returned devices by integrating new components (resistors, capacitors, ICs) onto circuit boards

Fluidmaster, Inc San Juan Capistrano, California
IT Helpdesk Intern May 2022 – August 2022

- Deployed new employee setups for five different employees, decreasing onboarding time by 50%
- Fulfilled employee tickets and followed up on system status with satisfaction ratings over 90%
- Coordinated with a team to deploy new 25 Gigabit switches throughout company, increasing performance by 30%
- Upgraded and redeployed user systems based on new standards, reducing downtime by 40%

Projects

- **Led a team** of 5 in developing a cutting-edge 3D Audio Player on the Raspberry Pi 5, integrating Source Separation, Head Related Transfer Functions, and Speech-to-Text using Python to boost user engagement by 30%.
- Designed a three-note digital piano with polyphonic sound using Tiva-C and a custom 4-bit DAC to enhance note processing in embedded C.
- Implemented a traffic management system using Tiva-C and Finite State Machines; reduced simulation delays by 30%.
- Built a real-time temperature alarm system using Verilog and I2C on the Nexys A7-50T FPGA to improve food safety monitoring.
- Developed a supermarket inventory management backend using Python and FastAPI, implementing a RESTful API with full CRUD operations and authentication via cookies and sessions. Utilized Pydantic schemas for data validation and MySQL for persistent data storage, enabling secure and scalable inventory and user account management