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Deliver impactful solutions by leveraging technical skills and fostering an environment built on teamwork and a shared passion for growth.

EDUCATION

Michigan State University - East Lansing, MI

May 2026

Bachelor of Science, Electrical Engineering (Additional Major: Computer Engineering)

GPA: 4.0

Skills: Python, MATLAB, C++, C, LTspice, KiCAD, Verilog, Altium Designer, Vivado Suite

PROJECTS

PetQs: Animal Sentiment Analysis

September 2023 - May 2024

- Worked as part of a team of 4 to develop an AI-powered web app to help determine animal sentiment from user-uploaded video input, leveraging Git for version control and collaboration.
- Developed backend using Flask framework, providing routes for users to post media and linking inputs to the model.

Fan-Based Cooling System with LED Indicators

November 2023

- Designed and implemented a fan-based cooling system using a thermistor and cascaded op-amp comparators, documenting the schematic diagram using KiCAD.
- Evaluated circuit performance using LTspice and bench equipment, measuring key performance metrics such as current draw and robustness to noisy input.

EXPERIENCE

DayDream Inc. - Remote

Application Development Intern

August 2024 - Present

- Used Altium Designer to draft initial designs for a smart Rubik's Cube powered by the ESP32 SoC, performing schematic capture and PCB layout.
- Developed C++ code to implement core functionalities such as cube state tracking, orientation tracking, and Bluetooth communication.
- Worked with a team of 3 in implementing and testing a functional prototype, measuring key performance such as power consumption to ensure project guidelines were attained.

KPIT Technologies - Novi, MI

Software Development Intern

June - August 2024

- Developed a formatting tool using Python to help with the implementation of MISRA C guidelines for generated C scripts, identifying 96 inconsistencies in 0.472s in testing.
- Automated the generation of Lauterbach PRACTICE test scripts using Excel and Python, lowering the
 prerequisite technical barrier and accelerating script development.
- Prepared project documentation and presentations to keep key stakeholders apprised of progress, and obtain their feedback.

Physical Ultrasonics, Microscopy and Acoustics (PUMA) Lab - East Lansing, MI

Undergraduate Research Assistant

September 2022 - May 2024

- Implemented data augmentation techniques to enhance the diversity of datasets containing time-series signals using MATLAB.
- Employed data preprocessing methods to clean raw data from ultrasonic testing and prepare it for machine learning applications using Python.
- Utilized ultrasonic testing for material characterization, gathering data on material elasticity.