

Zijun Ning

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Education

University of Michigan

Ann Arbor, MI

2nd-year Electrical Engineering BSE

2021 - 2025

- GPA: 3.952/4.0
- Intro to Electronic Circuits, Programming & Intro Data Structures, Intro to Signals and Systems, Electrical Engineering System Design
- Branstrom Freshman Prize: Top 5% in academic achievement in the college class
- IEEE HKN: Tech Talk Chair. TBP member

Projects / Teams

Autonomous Robotic Vehicle Team

Ann Arbor, MI

Embedded Systems Team Assistant Lead

2021 - present

- Designed electrical and control system for autonomous vehicle and analyzed the interaction of subsystems
- Developed remote/physical emergency-stop system, controlled the light systems with Arduino, tuned the motor PID parameters

Mechanical Keyboard PCB And Case

Arcadia, CA

Personal Hardware Project

Summer 2022

- Designed a two-layer PCB with KiCad featuring USB type C and STM32 microcontroller, produced working physical prototype with china-based manufacturers
- Coded firmware in C++, utilized AutoCAD to model an acrylic case

Terrain Mapping With Autonomous Drone

Ann Arbor, MI

School software project

Fall 2021

- Developed virtual prototype in Unreal Engine for an autonomous drone that mapped the terrain for avalanche prediction
- Collected and processed lidar data with python and used the data to generate a height map, achieving errors less than 0.2 meters

Work Experience

Zhao's International Trading Corporation

Los Angeles, CA

Market Research / Technical Assistant

Summer 2020 - 2022

- Provided automation solutions for industrial production line to clients by installing, calibrating, and optimizing machineries, boosted productivity by 500%
- Communicated with clients and engineers to define the requirements, constraints, and production goals.
- Reached out to potential clients via phone call, and emails. Boosted revenue by 200% every month for 6-month

Awards / Leaderships

Real World Design Challenge

Arcadia, CA

Math Correspondent

2021

- Designed long-range package delivery drones with a team, calculated power consumption, air drag, and lift of the drone
- Earned 1st place in California in competition

Skills

Technical Skills

- C++, Python, MATLAB, Arduino, Linux, Verilog HDL
- KiCAD (PCB Design), LTspice (circuit simulation)
- Oscilloscope, Vector Network Analyzer, Soldering

Soft skills

- Chinese Mandarin, fluent
- Technical Documentation, communication
- Leadership, event planning
