

PROFESSIONAL SUMMARY

Robotics and Autonomous Systems graduate student enrolled at Arizona State University pursuing an internship where I can learn, implement my skills, and grow. Background in the CMP process of semiconductor manufacturing with experience in reliability testing, physics simulations and game development. Experience using many programming languages to aid in data analysis, system operations, process statistics and mobile applications.

SKILLS

- | | | |
|---|-----------------------------|--|
| • Programming: Java, Python, C#, Ruby, JavaScript, JSL, VBA/VBS | • ROS | • Unity |
| • MATLAB | • MoveIt | • Structural Simulations |
| • JMP | • Ansys Physics Simulations | • Thermal Simulations |
| | • AR/VR Development | • Random Shock and Vibration Simulations |
| | • CAD | |

EXPERIENCE

Student Process Engineer | 14 nm CMP | Intel Corporation | Chandler AZ Apr. 2020 – Jul. 2021

- Worked alongside a team of interdisciplinary engineers to maintain a fleet of CMP tools for 14 nanometer semiconductor manufacturing.
- Utilized SQL and JMP to query and analyze manufacturing data.
- Managed multiple CMP tools and worked to dispositioned product to ensure customer quality standards were met.

Reliability Testing Intern | NXP Semiconductors | Chandler AZ May 2019 – Aug. 2019

- Used CAD software to aid in the design of pressure vessels for HTOLP testing on TPMS parts.
- Assembled and prepared an RF HTOL test chamber for use.
- Performed maintenance on THB test chambers.

Student Researcher | Arizona State University Luminosity Lab | Tempe AZ Dec. 2019 - Current

- 2020 NASA Big Idea Challenge Finalist
 - Used Solidworks to aid in the design of a lunar lander probe launching payload that would be used to collect data from the permanently shadowed regions of the moon.
 - Lead the team in Ansys physical simulations to analyze a lunar probe and launcher system. Simulations included random shock and vibration, transient thermal, drop testing and static structural.
 - Presented final work at the 2020 NASA Big Idea Challenge Forum.
- 2021 Gaia
 - Used Unity to develop a confidential AR data visualization application for a large food and beverage company. The HoloLens application was developed alongside a desktop version to mirror its functionality.

Piano Instructor | Self Employed | Chandler AZ Nov. 2016 – Current

- Instructed 4 students in learning to play the piano and perform pieces.
- Taught elementary school students music theory and how to interpret sheet music.

Developed the Mobile Application ADD-ictive Oct. 2019

- Utilized Unity, C# and multiple Apple development tools to develop a puzzle game for mobile devices.

Math and Physics Tutor | Chandler-Gilbert Community College | Chandler AZ Aug. 2017 – Mar. 2020

- Communicated expectations and curriculum requirements to reinforce classroom goals.
- Aided in student understanding of mathematics and physics course content through Differential Equations and Physics 2

EDUCATION

Mechanical Engineering Student, BSE

Arizona State University, Tempe Campus, Tempe, AZ

- 4.0 GPA
- Graduated Summa Cum Laude December 13, 2021

Robotics and Autonomous Systems, MS

Arizona State University, Tempe Campus, Tempe, AZ

- 4.0 GPA
- Expected graduation of December 12, 2022

AWARDS AND ACKNOWLEDGMENTS

Eagle Scout

Dec. 2016

- Held many leadership and training positions within BSA Troop 923
- Participated in 100+ hours of community service

Solidworks CSWP Certification

Aug. 2019

Robotics Awards | VEX Team #8800 and FRC Team #1492

2016 – 2018

- 2016 and 2017 FRC State Champion
- 6-Time Excellence Award winner
- One of five 2017 VEX World Design Award winners for best implemented and documented design process.

Moeur Award

2021

Ira A. Fulton Schools of Engineering Deans List

2018 – 2021

Awarded New American University Scholarship President's Award

2018 – 2022

GIVE BACK

Mentor to FRC Robotics team 1492

Volunteered at ASU Polytechnic 2020 VEX Robotics Competition