

# RAZIQA RAIF RAMLI

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## Education

### **Purdue University, West Lafayette, IN**

CGPA: 3.72

May 2022

- **Major:** Bachelor of Science in Computer Science (*Major GPA: 3.64*)
- **Minor:** Mathematics
- **Scholarship:** PETRONAS Education Sponsorship Program (Full-ride scholarship for overseas studies)
- **Relevant Coursework:** Software Engineering, Software Testing, Operating Systems, Computer Networks, Compilers, Relational Database, Data Mining & Machine Learning, Analysis of Algorithms, Virtual Reality Technology

## Work Experience

### **Rosen Center for Advanced Computing, Purdue University, IN**

#### **Software Intern - Python, Figma, Selenium, pytest, ipywidgets**

May 2021 - Aug 2021

- Designed a data submission tool that can validate, diagnose, clean, and visualize agricultural model data to streamline AgMIP researchers' ensemble modeling activities
- Engaged with stakeholders to translate domain problems into functional requirements
- Implemented a domain-driven architecture (with user interface, application, and domain layers) for code modularity
- Wrote tests with pytest and Selenium for documentation and continuous integration

#### **Software Intern - Python, SQLite, GDAL, Ipymaterialui, Ipyleaflet**

May 2020 - Aug 2020

- Rebuilt a geospatial visualization and analysis software to expand its visualization capabilities
- Acquired knowledge to process and visualize geospatial data by using GDAL and ipyleaflet libraries
- Demonstrated ability to manage a project independently and to self explore new technologies

### **Environmental & Ecological Engineering Department, Purdue University, IN**

#### **Software Developer, Volunteer - Python, Tkinter, pygubu**

May 2020 - Aug 2020

- Mentored a new software developer by preparing onboarding materials and handling weekly meetings
- Provided insights for feature developments and peer-reviewed coding implementations

#### **Software Developer, Part-time - Python, Tkinter, pygubu**

Jul 2019 - May 2020

- Developed a software suite to apply techno-economic assessment on Critical Materials Institutes' technology projects
- Re-engineered legacy codebase by incorporating a RAD tool into the development process and employing new abstractions to make software update more frictionless
- Streamlined existing user interface by simplifying user operations and adding support for multiple workspaces

## Software Projects

### **University Simple C Compiler (USCC) - C++, LLVM**

2021

- Building a compiler for a subset of C language by utilizing LLVM libraries
- Completed the recursive descent parsing, semantic analysis, and SSA parts of the compiler

### **Fortune - ReactJS, Flask, TypeScript, Python, PostgreSQL, Docker, Redux**

2020

- Built a web-based cryptocurrency trading game that operates on real-time cryptocurrency data
- Developed the game management page, in-game chat, and admin functionalities by implementing both the required frontend and backend components
- Collaborated in an agile software development cycle with a team of 6 developers

### **Fighter VR - Unity, C#**

2019

- Developed a virtual reality fighting game with Unity with a team of 3 developers
- Integrated enemy characters into the game by employing 3D models from Mixamo
- Programmed fighting logic between the player and enemy characters by leveraging Unity NavMesh components

## Skills

**Technology/ Framework:** ReactJS, Flask, Linux, Docker, Unity, Postman, Pytest, Selenium, JUnit

**Programming Languages:** Python, C++, C, Java, TypeScript, JavaScript, C#, Arduino