# Osi Mayungbo

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Fife, United Kingdom Sep 2024 - Jun 2027

Jun 2025 - Aug 2025

Dublin, Ireland

Apr 2025

Apr 2025

Mar 2025

# Education

### University of St Andrews

BSc (Honours) Computer Science

• Current Grade: First Class Honours

• Direct entry into the 2nd year of a 4-year degree

Experience

Cambridge, United Kingdom Arm

Software Engineer Intern

• Incoming Software Engineer Summer Intern on the Numerics Team (Performance Optimisation with C/C++)

Susquehanna International Group

Technology Discovery Day Attendee

Selected to attend exclusive upcoming Spring Insight programme

Bank Of America Chester, United Kingdom

Global Technology & Global Operations Spring Insight Attendee

• Selected to attend exclusive upcoming Spring Insight programme

Citadel London, United Kingdom

Discover Citadel & Citadel Securities Attendee

Selected to attend exclusive upcoming Spring Insight programme

**PreFessionals** Remote

Software Engineer Intern

Jun 2024 - Sep 2024 • Contributed to the growth of a startup that connects student freelancers with small and medium-sized enterprises

- Led the development of a secure, real-time messaging system using React, Node.js, and Firebase
- Developed a user review system that displays an overall rating of freelancers with sorting and filtering options
- Redesigned a long sign-up form into a friendlier multi-step form estimated to increase user completion rates by 33%

# Projects & Extracurricular

#### Ant Colony Simulator | Python, NumPy

- Developed custom algorithms to replicate realistic ant behaviour in a user-friendly interactive environment
- Designed an ant colony optimisation algorithm for pathfinding, improving ant food collection efficiency by 74.78%
- Integrated vector mathematics and geometric algorithms to accurately detect and resolve collisions between entities
- Implemented a grid system using NumPy matrices to efficiently manage pheromone strengths and positions

# Terminal-Based Text Editor $\mid C$

- Developed a text editor using C without external libraries, featuring search functionality and syntax highlighting
- Implemented a dynamic text buffer to handle text insertions and deletions, reducing memory reallocation by 90%
- Utilised low-level system calls and terminal control sequences to handle keyboard input and cursor movement

#### Breast Cancer Patient Management System | Django, Pandas, Python Image Library (PIL), React, PostgreSQL

- Led a team of 4 in developing a web app for oncologists during the TechAcademia x DotPlot Accelerator programme
- Developed a tool using PIL to automatically highlight tumor regions on a torso image based on specified coordinates
- Implemented Django models and RESTful APIs to handle CRUD operations and to process data using pandas

# Mercury Capital Management (Student Led Investment Fund) | Python, NumPy, QuantConnect

- Developed a statistical arbitrage trading strategy achieving 38% annual returns and presented to the fund's members
- Collaborated with a team to analyse market data, backtest strategies, and implement risk management protocols

#### SKILLS

Programming Languages: Python, Java, C, C++, SQL, JavaScript, TypeScript, HTML, CSS Technologies/Frameworks: NumPy, Pandas, Matplotlib, Flask, Django, ExpressJS, React, NodeJS **Tools**: Git, Firebase, Postman, Figma