CARLOS DAVID RIVERA

Education

Georgia State University

Atlanta, GA

Bachelor of Science in Computer Science

June 2022 - December 2023

Georgia Institute of Technology

Atlanta, GA

Bachelor of Science in Computer Engineering

January 2024 - May 2027

• Concentration: Cybersecurity and Systems/Architecture

- Minor: FinTech (Financial Technology)
- Relevant Coursework: Object-Oriented Programming, Algorithms and Data Structures, Design and Analysis of Algorithms, Programming Hardware/Software Systems, Digital Design

Research

Defense Industrial Base Cyber Compliance | VIP (Vertically Integrated Projects)

Atlanta, GA

Research Project

January 2025 - Present

- Developed and deployed strategies to assist small companies with DoD contracts in achieving Cybersecurity Maturity Model Certification (CMMC) compliance, aligning processes with NIST 800-171 standards
- Implemented **risk management frameworks** for manufacturers and suppliers, focusing on compliance with cybersecurity guidelines and best practices to ensure robust protection of sensitive data

Projects

Spotify Wrapper | Class Project

- Coordinated team roles and responsibilities using **SCRUM methodology**, ensuring smooth progress, effective collaboration, and timely achievement of project milestones
- Designed and built a responsive Spotify Wrapper interface using **ReactJS** and **Material UI**, delivering an enhanced user experience for viewing Spotify data
- Utilized **Django** to develop a robust backend API, integrating **Spotify API** endpoints to handle user data and requests

Minecraft Snake Game | Class Project

- Designed and implemented a **custom Doubly Linked List (DLL)** in C++ on an ARM Cortex-M platform to manage dynamic memory for the snake body in real-time.
- Engineered a fully playable **Snake game on an MBed microcontroller**, utilizing a uLCD screen and navigation switch for real-time user input and feedback.
- Created custom sprite rendering for game visuals and integrated advanced mechanics including **item spawning**, **collision detection**, **boost logic**, and memory-optimized growth behavior.

Work Experience

Burger 21

Lawrenceville, GA

Front-of-House Staff

February 2022 - August 2023

- Took on a variety of roles, including customer service, inventory management, and operational support, to seamlessly address and resolve staffing shortages and ensure uninterrupted service
- Collaborated with a team of 5-10 members per shift to ensure performance, adherence to standards, and effective communication, while supporting the General Manager in operations and decision-making

Skills

Programming: Python, Java, JavaScript, C/C++, RISC-V Assembly

Hardware: VHDL

Developer Tools: Git, VSCode, Figma, Mbed Studio **Libraries/Frameworks**: Django, ReactJS, Material UI

Languages: Spanish (native), English (fluent), French (conversational)