Lucas Carlos Casas

<u>lcc79@cornell.edu</u> +1 (305) 849-7280 https://github.com/lcasasp

Ithaca, NY 14850 1 Forest Park Ln

ABOUT ME

A Computer Science sophomore at Cornell University with a demonstrated passion for software engineering. Eager to apply my software engineering skills and academic knowledge in a real-world setting through a SWE internship.

EDUCATION

Cornell University, College of Engineering, Ithaca, NY

Expected May 2026

B.S - Computer Science, Minors: Data Science, Business

RELEVANT COURSEWORK:

CS 2110: Data structures and algorithms (Java), CS 2800: Discrete structures, CS 3110: Data Structures and Functional Programming (OCaml), CS 193C Client-Side Programming (JavaScript), CS 106B: Object Oriented Programming (C++), CS 4700: Foundations of Artificial Intelligence, CS 4701: Practicum in Artificial Intelligence.

PROJECTS/WORK EXPERIENCE

Flare, Founder

Mar. 2023 - Present

- Architected and developed Flare, an innovative open-source Python tool that aggregates energy and climate news from diverse sources, centralizing them into an SQLite3 database for easy access.
- Implemented advanced search capabilities leveraging Elasticsearch and Lucene, enhancing user experience through keyword matching, date filters, and a truthfulness algorithm that cross-references articles with IPCC climate report.
- Automated the extraction and summarization of academic papers using the GPT-3 API, providing users with concise insights from extensive research in a legible article format.
- Enhanced Flare's NLP capabilities through meticulous text preprocessing and machine learning techniques.

Ventures Accelerated, Software Fellow

Sep. 2023 - Present

- Served as a technical liaison between Ventures Accelerated and participating startups.
- Collaborated with a dynamic team of entrepreneurs, providing software solutions tailored to startup requirements.

Cornell Hitch, Cornell AppDev Hackathon Back-end Developer

Dec. 2022

- Developed a Flask REST API application with Python to handle ridesharing to airports for Cornell students.
- Won the second-place award out of 30 teams.
- Built student authentication with OAuth, SQL, and Alchemy.
- Collaborated in a team of four, using Git for front-end and back-end integration, resulting in a cohesive application.

McDiver

May 2023

- Used Dijkstra's algorithm to solve a maze problem in Java, with an algorithm ranked 12th out of 620 students.
- Developed an algorithm that maximizes coin value collected in x steps, implementing DFS techniques.
- Worked with Game States, GUI applications, and multi-threading programming.

Open Minds, Internship

Mar. 2021 - Dec. 2021

- Spearheaded collaboration efforts among top researchers and entrepreneurs to address critical global challenges.
- Organized a comprehensive symposium focused on the intersection of energy and climate challenges, overseeing event logistics, coordinating speaker engagements, and facilitating discussions to drive actionable insights.

SKILLS

PROGRAMMING: (Proficient) Python, Java, OCaml, JavaScript, (Familiar) C++, SQL

LIBRARIES/FW: Reactjs, Docker, SQLAlchemy, OAuth, Flask, REST APIs, Elasticsearch, Lucene, Git, Google Cloud Platform LANGUAGES: Spanish (native), English (native), Catalan (proficient)

LEADERSHIP

President, Sin Fronteras Club

- Organized the running, planning, and coordination of all events related to Hispanic culture.
- Coordinated subgroups by delegating responsibilities to sub team leaders to ensure smooth operation.

Prepare Mentor, Cornell University

• Led and mentored a diverse group of international incoming students, facilitating transition to Cornell by organizing orientation activities, fostering a welcoming environment, and addressing cultural acclimation challenges.