Aidan Brown

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EDUCATION

2020-2023

THE UNIVERSITY OF VERMONT, Burlington, VT
Bachelor's of Science in Computer Science (Completed in Three Years)
The Honors College - Climbing Team - CS Crew (Active Member)

EXPERIENCE/PROJECTS

SOFTWARE/IOT INTERNSHIP

Summer 2022

UNILEVER - BEN & JERRY'S

- Installed & maintained H2Ok spectrometer sensors
- PLC Programming - Integrated spectrometer sensors into the Ben & Jerry's PLC (Structured Text)
- IT Server and Firewall Handling - Worked with local contractors and employees to achieve corporate connectivity
- Assisted in the creation and deployment of a web proxy, to allow for easy accessibility
- Learned how to work in an industrial factory - Coordinated with team members remotely and side-by-side
- Assisted in Google Cloud integration with H2Ok Innovations

WEB DEVELOPMENT

Winter 2021-2022

SKI MOUNTAIN CALCULATOR

- Created a ski mountain generating website for UVM students to use
- Used a weight-based algorithm in C++ alongside PHP, HTML, and CSS
- Generates the ideal ski mountain in Vermont based on a short survey
- Collaborated with GitHub

PERSONAL PROJECTS

2021-2022

ROCK-CLIMBING SORTING PROJECT

- Utilized various data structures and algorithms to sort a large database of the top 1000 climbing routes in the United States (separate chaining, linear probing, bubble sort, etc.)
- Learned the efficiencies, versatilities, and drawbacks of different sorting algorithms and data structures
- Object oriented programming in C++

C++ ARCADE SIMULATOR

- Developed with C++ with OpenGL to create an arcade interface with games like Snake, Doodle Jump, Flappy Bird, and more
- Utilized Git and GitHub to collaborate with teammates
- Produced a simulator that runs on MacOS and Windows
- Succeeded with a small team

UVM CS FAIR: BASKETBALL HOOP SENSOR

- Used Python and Javascript to interact with an ultrasonic distance sensor
- Engineered a sensor to detect a basketball entering a hoop to record distance
- Integrated with a Raspberry Pi mini computer
- Learned basic circuitry and computer hardware
- Entered into the UVM CS Fair

TEACHING & MANAGEMENT

2021-2022

FACILITY OPERATIONS ATTENDANT

- Management in The University of Vermont Athletic Center
- Handled safety precautions during the COVID-19 Pandemic

TEACHER'S ASSISTANT CS124

- Assisted students taking C++ related coursework
- Improved C++ skills by teaching others
- Coordinated office hours and exam/homework help

ADDITIONAL SKILLS AND COURSEWORK

Algorithm Design and Analysis - Database Systems - Object Oriented Programming - Data Structures - Linux - Mathematical Knowledge (Calculus & Statistics) - Git - GitHub - Cloud Integration - Management - Communication - Operating Systems - Intro to Programming: Python - Advanced Programming: C++ - Intermediate Programming: Java - Data Structure and Algorithms: C++ - Computability and Complexity - Cybersecurity Law and Policy - Computer Organization (hardware) - Linear Algebra - Discrete Structures - Calculus I, II, & III - Statistics

LANGUAGES AND TECHNOLOGY

C++ - Python - Java - C - PHP - JavaScript - HTML - CSS - GIT - GitHub - Rasbian - MySQL - PLC Code