Casey Ryan

978-866-4333 | cnryan@umass.edu | linkedin.com/in/caseyryan22465/ | 50 Minuteman Way, Tewksbury MA

EDUCATION

University of Massachusetts Amherst

Amherst, Massachusetts

Pursuing a Bachelor of Science in Computer Science

Aug 2019 - May 2023

- Relevant Coursework: Data Structures, Programming Methodology, Introduction to Computation, Introduction to Probability Theory/Statistics, Computer Systems Principles, Linear Algebra, and Multivariable Calculus
- 3.67 GPA, John and Abigail Adams Scholarship Recipient
- Former NCAA Division 1 Cross Country/Track & Field Athlete

EXPERIENCE

iRobot

Software Engineering Intern

Jun - Aug 2018 & 2019

Tewksbury, Massachusetts

Thermo Fisher Scientific

- Wrote and maintained testing suite in JavaScript and the Jasmine testing framework for a new REST API to ensure reliability for engineers and customers, while also enforcing test-driven-development
- Developed an application in Java and JavaFX to streamline software initialization, converting a 6 hour manual task into a 15 minute automated background task, and allowing engineers to spend their time doing more valuable work
- Collaborated with other developers in an agile scrum based environment

Machine Learning Data Intern

Nov 2020 - Jan 2021

Bedford, Massachusetts

• Made significant contributions to the data set used for training machine learning models

- Utilized large data sets of images to construct detailed floor plans/maps
- Utilized business tools, such as Confluence and Jira

Event/Sales Host

May 2017 - Mar 2019

Tewksbury, Massachusetts

- Wamesit Lanes
 - Worked as a host for sales events
 - Combined customer service with restaurant FOH and sales technology

Projects

$\mathbf{JavaScript}$ $\mathbf{Interpreter} \mid \mathit{JavaScript}$

- Developed a JavaScript Interpreter using JavaScript
- · Utilized programming principles such as higher-order functions, testing suites, and closures

Pseudo-Yelp Data Sorter | JavaScript

- Developed a program to take in a JSON data set of businesses and filter/reduce based off of various criteria
- Utilized programming principles such as fluent design patterns, higher-order functions, and comprehensive testing

Nondeterministic Finite State Automata | JavaScript

- \bullet Implemented an abstract Nondeterministic Finite State Automata in JavaScript
- Utilized programming principles such as fluent design patterns, higher-order functions, memento design pattern, and states

Stable Matching | JavaScript

- Developed a program to test given objects to confirm they are valid sets according to the stable matching problem
- Increased ability to write tests for code that I might not yet necessarily understand, reinforcing the ideas of test-driven-development

TECHNICAL SKILLS

Languages: Java, Python, JavaScript, C

Frameworks: Node.js, Express, Flask, JUnit, Jasmine, Selenium

Developer Tools: Git, Subversion, Jira

Libraries: Requests, NumPv

Other: FTP, REST APIs, Jupyter Notebook, SSH, LaTeX, MongoDB