

## WORK EXPERIENCE

### UVA, Department of CS | CS2110 Teaching Assistant

January 2021 – Present | Charlottesville, VA

- Helped students understand various data structures taught in class and their implementations
- Held 5+ office hours per week to review labs with students and answered questions about coding problems from that week's lecture

## PERSONAL PROJECTS

### Library Catalog – Java Application

- Developed a desktop application where librarians can review books and users that have a connection with the library
- Utilized the **JavaFX** Library to create unique and separate User Interfaces for Librarians and Users.
- Connected the respective portals to a central Library database to ensure both parties know the books that are available

### Periodic Table Guide – Java Application

- Created an interactive desktop application using the **JavaFX** Library to help high school students understand & learn the periodic table
- Implemented a quiz system where students can test their understanding of the periodic table
- Constructed a word search game with a Graphical User Interface that generates a word search puzzle using random elements from the periodic table

### Type Master – Python Game

- Used the **PyGame** Library to create a typing game that allows users to practice their typing while having an interactive game to make the task more enjoyable
- Utilized the **Hash Chaining** Data Structure to generate random words to type and store them for a speedy retrieval subsequently

## EDUCATION

### University of Virginia

BS in Computer Science

Expected May 2023

GPA: 3.63 / 4.0

### Garfield High School

IB Diploma Recipient

Graduated May 2019

GPA: 4.6 / 5.0

## Languages

Java

Python

C/C++

HTML

CSS

## Frameworks

Django

PyGame

JavaFX

Terminal

GIT

## Coursework

Data Structures and Algorithms

Software Testing

Digital Logic Design

Software Development Methods

Program and Data Representation

Introduction to Programming

Discrete Mathematics

Theory of Computation

Ordinary Differential Equations

## Links

Github:// ayubshahab

LinkedIn:// ayubs

Website: ayubshahab.github.io