##### **Education**

**Boston University College of Arts and Science Expected Spring 2021**

* *Bachelor of Arts:* Computer Science Major, 3.60/4.00 GPA
* Relevant coursework: Python, Java, Algorithms, Computer Graphics, Information Security, Computer Systems, Combinatoric Structures/Discrete Mathematics, Probability and Statistics, Linear Algebra, Functional Programming

##### **Work and Leadership Experience**

**Java OpenGL 3D Aquarium: *Developer* Fall 2020**

* A three-dimensional aquarium containing several fish and swordfish to simulate a predator-prey relationship for path traversal.
* Utilized frame-by-frame model transformations from Java’s OpenGL library in three-dimensional space to simulate swimming animation and movement for creatures.
* Implemented Gaussian calculations for potential functions of attractive/repulsive fields to simulate a predator’s motivation to chase prey and a prey’s ability to evade multiple predators.

**Java OpenGL 3D Creature Modeling: *Developer* Fall 2020**

* A three-dimensional display of a simple spider model, including moveable body parts controllable by the user through a set of specified keyboard controls.
* Demonstrates the implementation of chain transformations on rendered objects in a three-dimensional space to simulate proper joint movement.
* Implemented key events to allow user manipulation of the spider’s primary joints to change the pose of the model, as well as cycle through a set of preset poses.

**COVID-19 Article Summarizer: *Developer*  Spring 2020**

* Developed a web-based program that allows users to receive filter-specified news regarding COVID-19 as a collection of informative summaries.
* Incorporated the News API and SMMRY API with the objective to collect articles and accurately summarize them with minimal loss of information.

**Unity Maze Level Development Project: *Developer*  Spring 2020 - Present**

* Utilized the Unity game engine in order to expand my understanding of the platform and pursue my interests in software and game development.
* Incorporated built-in libraries and implemented various algorithms to create a randomly-generated perfect maze.
* Explored the C# programming language through the coding of scripts.

##### **Technical Skills**

**Programming Skills**

Proficient in Python, Java, LaTeX, APIs (Spotify, Weather, News, SMMRY, Twilio), data structures, graphics algorithms

Familiar with Go, C, C#, OCaml, JavaScript, graph/network algorithms

**Languages**

Fluent in English | Proficient in Cantonese Chinese

**Additional Skills**

Advanced in Microsoft Word, Microsoft Powerpoint, Google Docs, Google Slides