# Felix Nampanya

135 Billings Rd, Quincy MA 02171 • nampanya.f@northeastern.edu • (339) – 216 – 2819 LinkedIn: https://www.linkedin.com/in/felix-n-6790b2ba/ Github: https://github.com/felixny

## **EDUCATION**

## Northeastern University, Boston

Fall 2020 - Present

Khoury College of Computer Sciences

Candidate for a Master of Science in Computer Science

**Related Courses:** Intensive foundation of Computer Science, Object-Oriented Design, Discrete Math, Computer Systems, Algorithms, Foundations of Software Engineering, Web Development

## University of Massachusetts, Boston

**Graduated May 2017** 

Bachelor of Science in Biochemistry

#### **TECHNICAL SKILLS**

**Languages**: Python, C, Java, Modern C++ (11/14/17/20), JavaScript, HTML, CSS **APIs**: SFML (graphics, networking, windowing), catch2 (testing), nuklear (GUI), SDL2

Tools: Visual Studio Code, IntelliJ IDEA CE, Xcode, Python IDLE, Git

#### **PROJECTS**

## **Online Painting Application**

Nov 2021 - Dec 2021

- Collaborated with a team of four people to design a paint application that allows multiple users to interact on a shared canvas and implemented chat system using SFML library.
- Designed a paint application using the Command Pattern to handle the features that allow users to draw, clear canvas, send messages, and change color of the pen by encapsulating the commands as objects in C++.
- Implemented the undo and redo functionality of commands which allows users to execute previous or next commands in C++ using stack and queue data structure.
- Created the user interface for the paint application to allow users to draw, undo, redo and execute features using Nuklear panels, menus, and buttons.
- Implemented user input functionality to allow users to execute features through the keyboard and draw with the mouse cursor using SFML library to handle mouse and keyboard events.
- Developed a command parser to allow multiple clients to execute features on the server in C++ by serializing and deserializing commands by converting sent strings to objects.

#### **Easy Animator Application**

Jan 2021 – Apr 2021

- Collaborated with a team of two to develop a Java application which supports animation of 2D shapes with 3 different formats
- Designed and implemented GUI using Java Swing which allow users to play, pause, change speed, resume, restart animation with real-time effects

## **Python GUI Memory Matching Game**

Nov 2020 - Dec 2020

- Developed a GUI interface for a memory matching card game using a data structure that assigned number to each card image and used Turtle and random modules to set up the GUI interface. Created methods that responds to user generated events such as mouse clicks, that would flip over cards
- Created a leader scoreboard that recorded each user's score to a text document and displayed it against other players' scores on the board in future games

#### WORK EXPERIENCE

# Center for Virology and Vaccine Research, Harvard Medical School

October 2017 - Present

Research Associate

- **Time management and training:** Conducted extensive translational research in timely manner to meet the data submission deadlines. Managed and trained undergraduate, and graduate students, and research assistants.
- **Teamwork:** Communicated and worked with a multiple subgroup to conduct multiple experiments to obtain research data for a manuscript.
- Adaptability: Adapted to new concepts, techniques, and situations quickly and efficiently in a tight timeframe during pandemic.
- **Problem Solving:** Troubleshooted the experimental design and applied unifying patterns and themes in virology and use them in new and changing situations.