Abhay Singh

contact

■ as2626@cornell.edu **↓** (404) 353-0477 education

Cornell University – GPA: 4.16/4.00 B.S. Computer Science Aug 2018 – May 2021 (expected)

experience

Incoming Technology Summer Analyst - Morgan Stanley

June 2019 – Aug 2019

- Implemented UI using Android Studio and XML in preparation of launch
- Sped up workflow by 1 week by designing wireframes that allowed concurrent implementation of logic and UI design
- Consulted higher management and collaborated with the CEO & Managing Director to streamline the app's UX design and flow

Instructor & Curriculum Developer – Data Science for India — July 2017 – October 2017 Developed curriculum of 11 interactive-programming Jupyter notebooks, 12 statistics-based worksheets, and 1 final project, which was taught to over 400 students across India

- Instructed course in-person to 38 students, beginning with fundamentals of Python and statistics
- Extensively used numpy, pandas, and matplotlib to visualize, manipulate, and discern useful data from large data sets

projects

Space Invaders ?

built using Python, Kivy

- Fully-functioning implementation of the retro arcade game Space Invaders with Model-View-Controller (MVC) and State design patterns
- Thoroughly utilizes OOP fundamentals of data abstraction, encapsulation, and inheritance

Virtual Stock Market ()

built using Flask, Python, SQLite, JavaScript, HTML, CSS

- RESTful web app that gives users \$10,000 of paper money and scrapes/parses live stock prices as JSON objects, storing them as purchases and sales of a given user in a database
- Allows users to: sign-up, login, change password, quote live stock prices, buy and sell stocks at live prices, view index of owned stocks with total live value, & view trade history

Spellchecker \mathfrak{O} built using C

- Checks inputted text file for misspellings against a changeable dictionary and prints out all misspelled words in a command-line interface (CLI)
- Stores every word of entire English dictionary in a self-implemented hash table, using low-level memory management with pointer references, malloc(), and free()

Reddit Playlist

built using Java, XML, Android Studio

- Android app that converts user-selected subreddits into objects for conversion into live YouTube playlists to watch or listen
- Retrieves video posts using a subreddit's RSS feed and YouTube's API to format into a ListView

JPEG Recovery ()

built using C

• CLI application that recovers JPEG files from formatted memory cards (.raw files)

Tweet Sentiment Analyzer (7)

built using Flask, Python, HTML, CSS

• Takes an inputted Twitter username and scores user's tweets as positive, neutral, or negative

Puzzle of Fifteen ()

built using C

• Plays the puzzle of fifteen game (en.wikipedia.org/wiki/15_puzzle) in a CLI