Jinquan Pan
vin3nt@bu.edu | (857) 284-3612 | Boston, MA | vin3ntking.github.io/Vin3ntKing/

EDUCATION

Boston University | Boston, MA — Expected Jan 2024
B.A. in Mathematics and Computer Science
Major GPA: 3.84/4.00 Cumulative GPA: 3.90/4.00
Academic Awards and Activities: Dean's List (all 6 semesters)
Relevant Courses: Data Structure, Data Mechanics, Informational Security, Intro to Algorithm, Software Engineering
Relevant Skill Sets: Python (including relevant data analysis libraries), Java, SQL, Azure, PowerBI, AWS, Git, GitHub

Award

CitiBank Financial Innovation Application Competition | Shanghai, CN — Jun 2022 – Jun 2023
Group member in Algo Team (*Second Place Award*)

- Utilize Python to scrape products and events information from banks and other companies' websites.
- Clean and annotate dataset scrape from websites. Preprocess datasets as input to train BERT model and do Name Entity Recognition (NER) tasks such as extracting keyword related to environment, social justice, and company governance policy. Finetune model for its peak performance.

PROJECTS

US Census Preference Tracking App | Summer Impact Team — Jun 2023 – Present
Database Engineer

- Building a robust and secure database using SQL with PostgreSQL, capable of storing and managing extensive data, including user details, preferences, representative information, and various bill details.
- Designing efficient ETL (Extract, Transform, Load) processes to transfer and transform data into the database, enabling smooth interaction between the backend and RESTful APIs.

Class Grade Calculation Web App | Personal Project — Jan 2023 – Mar 2023
Software Engineer

- Developed a web-based portal using Node.js and TypeScript, displaying final grades for students in a given class from a particular semester.
- Integrated with an API to retrieve student and assignment data, implemented complex queries to fetch required information.
- Engineered an algorithm to compute final grades based on assignment grades and their weights, even handling cases where the data was randomly generated and may not fall within the usually 0-100 grade range.

To-Do List App | Personal Project — Dec 2022 – Dec 2022
Software Engineer

- Developed a user-friendly to-do list application, enabling users to effectively manage their tasks.
- Constructed the back-end server using Node.js, providing a robust backend capable of persisting to-do items.
- Created a front-end development server, allowing users to interact with the application in their browser. Users can add, remove, and view to-do items that persist after a page refresh, enhancing usability and user experience.

Little Twitter Clone | Hacker4Impct — Sep 2022 – Nov 2022
Software Engineer

- Constructed a lightweight, responsive Twitter-like web application using Node.js, JavaScript, HTML, and MongoDB, accessible on both desktop and mobile devices, as a part of club learning activities.
- Implemented features for posting new tweets and viewing them in a reverse-chronological order, improving user interaction and the overall user experience.

WORK EXPERIENCE

Department of Computer Science | Boston University — Sep 2022 – present
Course Assistant

- Tutoring 200+ students in Python, data structures, Propositional logics, Boolean logics, JavaScript, and concepts in assembly. Critique and grade all students' homework in one CS course within a week.

Department of Mathematics and Statistics | Boston University — Sep 2022 – present
Grader/Course Assistant

- Tutoring 200+ students in various topics in probability, statistics, and calculus. Critique and grade all students' homework in one math courses within a week.

WORK EXPERIENCE

Computer Science Education in Massachusetts Schools | MassMutual May 2023 – Jun 2023

Data Scientist

- Collect data at the school district level focused on computer science courses and AP test taking. Analyze data using various data manipulation tools like Python and related libraries based on school type, geography, race, ethnicity, gender, age/ school year, and other relevant variables to understand demographic disparities by city and town across the Commonwealth.
- Build dashboard/portal using Panel, Seaborn, and matplotlib to present insights drawn from data and address stakeholders' questions about where they should focus investments to address the education divide in computer science for underrepresented Black and Brown students in Massachusetts.

Chinese Students and Scholars Association (CSSA) | Boston University Sep 2021 – Feb 2022

Associated Leader in Technology Team

- Maintained and updated of CSSA website daily, including daily updating of information, revising layouts of modules, and improving beautification of CSSA webpages.
- Built mini program in WeChat helps Boston University's Chinese students find useful information such as house renting, course selection, and school activities.