Kenny Sun

864-678-0414 | sunkenny5893@gmail.com | linkedin.com/in/kenny-sun1
github.com/mystica-l | Personal Website : mystica-l.github.io

Education

Clemson University Clemson, SC
Bachelor of Science in Computer Science, Honors College, 4.0 GPA *Aug. 2023 - May 2027*

- Relevant CW: Programming Methodology, Linear Algebra, Algorithms and Data Structures, Discrete Structures for Computing, Introductory Business Statistics

Experience

Summer Undergraduate Researcher May. 2024 - Present
College of Staten Island *Staten Island, NY*

- **Technologies:** Python, MPI, Pandas, Matplotlib, Anaconda, Jupyter, Spyder, AWS Cluster
- Assisted in the development of a flood model to predict flooding in the New York area
- Used machine learning techniques to validate flood sensor data
- Analyzed the computation complexity of machine learning models with parallel processing
- Created graphs using Pandas and Matplotlib libraries in Python to effectively present data insights

Undergraduate Computer Science Teaching Assistant Jan. 2024 - Apr. 2024
Clemson University School of Computing *Clemson, SC*

- **Technologies:** C++, C, Emacs, Vim, VS Code
- Co-led lab sections for CPSC 1020 by teaching lessons and answering student questions
- Hosted office hours to help students understand class material (C++)
- Collaborated with other TAs and the professor to ensure the success of all students
- Graded lab assignments and programming projects

VEX Robotics - Volunteer Aug. 2021 - Present
Robotics Education and Competition Foundation *Greenville, SC*

- Assisted in tournament set up and help run robotics tournaments across the state to promote STEM education
- Volunteered as a referee for robotics matches
- Provided assistance with technical troubleshooting during events

Projects

Machine Learning Flappy Bird | *Python, Pygame, Machine Learning*

- Python program that trains a machine learning model to play Flappy Bird
- Uses neural networks and neurons to determine when the model should jump
- Incorporates important fundamentals of linear algebra with weights for input values and neurons

Poker Hand Evaluator | *C++, Pointers, Basic Combinatorics, OOP, Makefiles*

- Terminal program that evaluates the strength of players' hands in Texas Hold Em' Poker
- User is prompted for players' cards and community cards before printing the evaluation of each player's hands
- Uses dynamically allocated memory dependent on the number of players playing and the stage of betting

Personal Website | *HTML, CSS*

- Created a simple website using HTML and CSS to display projects

Technical Skills

Languages: C/C++, Java, Python
Developer Tools: GitHub, VS Code, Emacs, Vim, Matplotlib, Pandas, Numpy, MPI, Anaconda, Jupyter Notebooks, Spyder IDE, AWS Cluster

Awards

2023 CU Hack It Freshman Hello World Competition: Best Hardware Hack

- Worked with a team of 4 to design and model a programmable car using Fusion 360 and C++
- Utilized 3D printing, an Arduino UNO, various motor controllers, and motors to give the car functionality

South Carolina Palmetto Fellows Scholarship Recipient
2021 - 2022 VEX Robotics South Carolina State Championship: Tournament Champions