Julian Sam





Education—

B.S. in Computer Science, Carnegie Mellon University

Minor: Business Administration

Honors: Deans' List in Fall 2015 and Fall 2016

GPA: 3.78/4.00, Expected Date of Graduation: May 2019

Technical Skills -

Proficient: C, Python, Standard ML, Photoshop, HTML/CSS Familiar: Javascript, Haskell, LabVIEW, Mathematica, LaTeX

Projects -

Nixt Chatbox Winter 2016

A terminal-based instant messaging system programmed in C, for Unix systems. The multi-threaded program allows for both private and group chats. Developed the communication protocol between clients, handled threaded client I/O and implemented the user-interface.

Proxy Server Fall 2016

Developed a concurrent proxy server in C. The proxy handles basic HTTP requests from the client and returns the response from the server. The proxy also caches recently requested webpages for the client.

Malloc Package Fall 2016

Implemented a C dynamic memory allocator package that performs efficient searching for memory storage space using segregated lists. Includes several optimizations including elimination of footers and distinct structures for free and allocated block, to reduce total fragmentation (extra space used), and also to increase throughput of the functions.

FIFO 16 Fall 2015

Created and developed a 2D multiplayer football game in Python, built on the PyGame library. Worked with building the rigid body physics of the players as well as an interactive scoreboard.

Experience-

Undergraduate Course Assistant

Fall 2016

15-112: Fundamentals of Programming and Computer Science

Held office hours for the introductory programming course at CMU, and helped students with homework. Also assisted in writing code for the auto-grader used to check student's homework.

Vice President of the Computing Club

Fall 2016

Manage events for the club, such as campus-wide programming competitions, public faculty interviews, programming workshops, etc. Aided students in starting independent robotics projects and assisted in marketing the club to incoming and current students.

Awards-

1st Place in Harvard's CS50x Course Hackathon

Summer 2016

Competed and won against over 600 teams around the world, in a 72-hour programming contest to solve 10 algorithmic challenges. Competition hosted by Harvard University.