# Joseph Kim (Young Chan)

© 202 280 5848 voungchk@andrew.cmu.edu 65032 Forbes Ave. SMC 6299 (7)/qwewy 6 qwewy.github.io

**EDUCATION** 

## Carnegie Mellon University, Pittsburgh, PA

Expected May 2019

Bachelor of Science in Electrical & Computer Engineering | Minor in Computer Science 3.77/4.0 GPA cumulative

RELEVANT COURSES Introduction to Computer Systems Parallel & Seq. Data Structures &Algorithms Computer Vision Principles of Functional Programming Structure & Design of Digital Systems Intro. to Computer Security\*

\*- Spring 2017

#### **EXPERIENCE**

### Bank of New York Mellon, Pittsburgh, PA

June - Aug 2016

Summer Analyst Program

- Worked full-stack on a webapp that manages a client information database.
- Developed a REST API that sends MySQL requests to the database and returns existing or updated data in JSON format for the AngularJS frontend.

## School of Computer Science, Carnegie Mellon University

Aug 2016 - Present

Teaching Assistant for 15-112: Introduction to Programming

- Instruct students in recitations, office hours and review sessions
- Mentor 10 students on a 3-week term project by giving suggestions and guidance.

Research Assistant May – Aug 2016

- Researched ways to color segment images using neural nets, which determines color boundaries on contexts such as lighting.
- Created a program using openCV that manually indexes YUV images and create training sets, which were used for the neural network.

## Daewoo Appliances, GwangJu, Korea

June – July 2014

Intern

Repaired various broken appliances and documented files electronically.

#### **PROJECTS**

## **Multi-threaded Proxy**

Dec 2016

• A concurrent proxy that handles GET requests & utilizes a software cache.

#### **AI for Deterministic Games**

Dec 2016

 Mini-max, alpha-beta and jamboree implementations for an AI that works for any zerosum game, given a proper estimator.

### **Dynamic Memory Allocator**

Nov 2016

 Allocates memory with a 4-byte header, 16 byte alignment and works for up to a 64 bit virtual address space.

#### **Rhythm Game Project**

Nov – Dec 2015

• A rhythm game in written in Python using Librosa and Pygame; the game lets users upload their own songs to be analyzed and played.

#### LEADERSHIP

## Carnegie Mellon University, Pittsburgh, PA

August 2017

Orientation Counselor

## Asian Student Association, Pittsburgh, PA

Jan – Dec 2016

Public Relations Chair

- Recruited new members by posting online, reaching out to individuals and hosting events every week, which increased membership and turnout.
- Managed Public Relations Committee by delegating work, which allowed for more events to be executed throughout the semester.

Booth Stool Nov 2015 – April 2016

 Worked with the chairs in leading the building of a Spring Carnival Booth, a two-story, 18x18 ft thematic building, and did much of the electrical work.

**Programming**: Python, C, Matlab, SML, x86 Assembly, HTML/CSS, AngularJS, SystemVerilog, Java, mySQL Languages: English (Native), Korean (Native), Chinese (Elementary)