# **Daisy Zheng**

daisyzheng9@gmail.com | (571) 639-6750 | Los Angeles, CA | http://daisyzheng.me

#### **EDUCATION**

### University of California, Los Angeles (UCLA)

Master of Science, Computer Science 2020 - 2022 (Expected)

**Cornell University** 

Bachelor of Science, Computer Science Minor: Biological Sciences

2014 - 2018 GPA: 3.598

### **EXPERIENCE**

Yext

July 2018 - August 2020

Software Engineer (Tech-3 Level)

- Led implementation of a prototype for a new system of site generation and publishing, which was one of the first projects to use the company's next generation infrastructure the new system eases and accelerates the generation/publishing workflow and increases robustness
- Rebuilt the web scraping server using Docker in Kubernetes, drastically reducing error rates and decreasing scan latency from several minutes down to just a few seconds
- Designed and implemented new features and optimized existing flows for the flagship Answers product and others as part of the R&D team
- Mentored an intern over the summer, took on a lot of responsibility and independence early on after becoming the sole full-time developer on my team before merging into a larger team

**Biogen** 

June 2017 - August 2017

R&D IT Intern

- Built a 3D neuron tracer and dendritic spine detector that automates the time-consuming and labor-intensive task of manually analyzing neuron scans, reports on various metrics, and visualizes the results in interactive 3D
- Tackled an industry challenge that has so far been met with limited success, providing a proof of concept that paves the way for target screening capabilities with reduced bias

**Infinity ProAV** 

June 2016 - August 2016

Computer Vision Intern

• Worked with a stereo camera system to reconstruct a 3D mesh of the environment from 2D photos and extract the foreground object of interest using Python, optimized the stereo algorithm for use in real-time detection of vehicles

#### **SKILLS**

Java, Python, C++, Go, JavaScript, HTML/CSS, WebGL, Three.js, NumPy, jQuery, D3

### **PROJECTS**

- Mobile and desktop game developed over two separate semesters that were released to the public at the Game Design Initiative at Cornell's annual showcase. Led the implementation of diverse enemy AI and the fog/visibility system (both core features) as well as visual effects shaders and program architecture. 1st place Audience Choice Award. Software lead of mobile game (team of 7). Graphics lead of desktop game (team of 6). Named MVP through team member reviews.
- Random terrain generator with interactive camera controls. Simulated rain/snow weather effects and day/night environments, included effects like water animation, reflections, displacement mapping, and atmospheric scattering.
- Interactive data visualization of educational standards and crosswalks. Implemented a clean design for easy identification of hierarchal and cross-standard relationships and detailed information to assist with curriculum planning. **Mindsumo challenge winner.**

## **AWARDS**

Graduated Cum Laude from Cornell University	2018
1st Place Audience Choice Award at GDIAC public showcase for team's mobile game	2018
Most Valuable Player of GDIAC 6-student team based on peer reviews	2017
3 <sup>rd</sup> Place Audience Choice Award at GDIAC public showcase for team's video game	2017
Dean's List from Cornell University - Fall '17, Spring '17, Spring '15, Fall '14	2017
Mindsumo Challenge Winner for data visualization competition entry at Mindsumo.com	2016
2 <sup>nd</sup> Place Cache of Kings Bot in class-wide single elimination tournament	2015
Harvard Book Award for academic excellence and strong character	2014

## **AWARDS**

Cornell Wushu – Practice Leader	August 2014 – May 2018
Illuminations Dance Troupe – Choreographer	August 2015 – May 2018
<b>Project Hope at Cornell</b> – Co-publicity Chair	August 2016 – May 2017
Concrete Canoe Project Team – Aesthetics Subteam, Historian	August 2014 – May 2015

## SELECT COURSEWORK

- Machine Learning in Bioinformatics
- Introduction to Bioinformatics
- Computer Vision
- Computer Graphics
- Computer Graphics Practicum
- Introduction to Analysis of Algorithms
- Data-Driven Web Applications
- Operating Systems
- Advanced Computer Game Architecture
- Foundations of Artificial Intelligence

- Neuroengineering
- Proteins and Metabolism
- Molecular Biology
- Principles of Animal Physiology
- Genetics and Genomics
- Laboratory in Genetics and Genomics
- Music on the Brain
- Introduction to Behavior
- Introduction to Organic and Biological Chemistry