Melanie A. Chow

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EDUCATION

University of Chicago, Chicago, IL

Expected June 2021

Bachelor of Science in Computer Science, Minor in Statistics | GPA: 3.91

Stuyvesant High School, New York, NY

Graduated June 2017

Advanced Designation with Honors | SAT: 2340 | GPA: 4.0

EMPLOYMENT

Braintree Payments (PayPal Inc)

June 2019 - Present

Software Engineer Intern: Infrastructure Services Team

Medivis Inc.

June - September 2018

Software Development Intern, Brooklyn, NY

- Designed and created a CosmosDB database to effectively store and reorganize anatomy part data.
- Wrote Python scripts to migrate data from Google Sheets and Autodesk Maya to the new database
- Built a web UI for the 3D-modelling team to add and update anatomy parts, and for University clients to view additional anatomy part information (Angular, Heroku).
- Built and designed a REST API to regulate data transfer between the interface and database (Express, SQL).
- Engaged in code reviews and wrote extensive documentation for each component of the system.

PROJECTS

DestressCyborg February 2019

Wearable tech (proof-of-concept) that monitors brain waves to blur out or replace visual objects that may induce stress

- Trained a computer vision model using the Darknet Framework to detect objects that gave the user stress.
- Analyzed brain wave feeds to determine what combination of frequencies indicated a user was stressed.
- Winner of "Best Use of an IoT Device" and "Most Uncommon Hack" at Uncommon Hacks 2019

GreenFeed October 2018

A mobile application that aims to engage low-income residents in sustainable practices by offering incentives

- Offers a community for NYC Housing Authority (NYCHA) residents to share their 'green' activities, such as how many bags they've recycled, pounds of compost they've donated, or number of hours they've volunteered.
- Generates pie charts to illustrate the "green" status of each housing unit, and cultivates friendly competition by offering prizes to the most sustainable unit.

SafeRoute September 2018

A web application that determines the safest route home, based on NYC public crime data.

- Determines a safety score for each route based on the number and type of crime along the path, using geocoordinates from the Google Places API.
- Generates a crime heat map, as well as a 'cluster map', that displays crime locations with informative markers.

ACTIVITIES

UChicago TechTeam October 2018 - Present

Developer, Chicago, IL

- Created a mobile application for the Chicago Department of Health to easily help medical providers look up, research, and report diseases and protocols.
- Worked on restructuring the data and helped refactor the application from Ionic to React Native.

International Leadership Council: Entrepreneurship

September 2017 - Present

President, Chicago, IL

- Planned and taught modules to new members on market research, pitching, and business management fundamentals.
- Co-founded a stationery subscription startup that raised over \$5,000 in 100 days, and won the award for Most-Profit-Made in the club's 100 Day Startup Challenge. Served as marketing head.

TECHNICAL SKILLS:

Programming Languages: C, JavaScript, Python, Java, CSS, HTML, R, SQL **Frameworks & Development Tools:** Git, VSTS, Angular, Express JS, Node JS

Other: Adobe Photoshop CS6, Microsoft Office