

School Address:
10001 Chester Ave
Apt. 210 Cleveland, OH 44106
(412) 417-9805

Permanent Address:
2021 Broadhill Farms Rd.
Coraopolis, PA 15108
(724) 457-9779

EDUCATION

Case Western Reserve University
Doctor of Medicine

Cleveland, OH
Expected, May 2023

The University of Chicago
Bachelor of Arts in Neuroscience

Chicago, IL
Sep 2015 - Jun 2019

- Dean's List, Egyptian Education Foundation (EEF) Scholar

RESEARCH

Michael Benninger, MD, Cleveland Clinic
Volunteer Research Assistant

Cleveland, OH
Dec 2019 – Pres.

Nicholas G. Hatsopolous Lab, University of Chicago
Volunteer Research Assistant

Chicago, IL
Apr 2017 – Jun 2019

- Conducted kinematic processing of movement data from macaque monkeys to determine joint angles during reaching and grasping movement
- Implemented use of neural nets to derive kinematic data from mp4 video footage of macaques via Python, Tensorflow, and the modification of the existing Tensorflow package DeepLabCut
- Redesigned and rebuilt the lab website, <https://pondside.uchicago.edu/oba/faculty/Hatsopoulos/lab/>

Children's Hospital of Pittsburgh
Volunteer Research Assistant

Pittsburgh, PA
Jun 2014 – Aug 2015

- Participated in projects involving Characterization of Brain Morphometry and Cognitive Development in Neonates
- Carried out processing and analysis of magnetic resonance imaging data, and heavily involved coding and scripting.
- Used BrainSuite and FreeSurfer to perform volumetric segmentation of several brain MRI scans, as well as analyze them.

LEADERSHIP AND VOLUNTEER EXPERIENCE

Case Western RU School of Medicine Committee of Student Representatives
Technology Representative

Cleveland, OH
Dec 2019 – Pres.

- As a board member of student government, serve as a liaison between Information Technology (IT) for the school and the student body
- Responsible for running the School of Medicine student government website

Case Western Reserve University School of Medicine
Admissions Interviewer

Cleveland, OH
Nov 2019 – Pres.

- Responsible for interviewing prospective applicants and reporting back to the admissions committee

Case Western Reserve University School of Medicine Assessment Committee
Student Representative

Cleveland, OH
Oct 2019 – Pres.

- Serve as a liaison between the Curriculum Assessment Committee and the student body, providing feedback and suggestions
- Spearheading a complete re-design of the school's eAssessment portal, the website where students submit most assignments. Used Sketch to design new mock-ups for the website.

University Hospitals / CWRU School of Medicine
Sickle Cell Buddy

Cleveland, OH
Sep 2019 – Pres.

- Paired with a child whom I spend some time with each month as they receive a blood transfusion as treatment for their sickle cell anemia.

Case Western Reserve University School of Medicine
Admissions Tour Guide

Cleveland, OH
Sep 2019 – Pres.

- Responsible for giving interviewees and prospective students a comprehensive tour of the Health Education Campus, as well as answering any relevant application questions

UChicago's A Cappella Council
Web-master, Sound Engineer

Chicago, IL
Dec 2017 – Jun 2019

- Built and maintained <http://uchicagoacappella.org/> and <http://unaccompaniedwomen.uchicago.edu/>
- Sound engineer and mixer during performances for six of the eight groups at UChicago

Uncommon Hacks, UChicago's hackathon**Chicago, IL****Tech Team Lead**

Aug 2017 – Jun 2019

- Oversaw the technology team for UChicago's hackathon, a 24-hour event where 250 students from all over the country came in order to build new web and mobile technologies. We coordinated all websites and technology, as well as registration
- Built / maintain <http://uncommonhacks.com/>, <http://landing.uncommonhacks.com/>, <http://make.uncommonhacks.com/>

Run for Cover, an A Cappella singing group**Chicago, IL****President, Web-master, Sound Engineer**

Mar 2017 – Jun 2019

- Oversaw all logistics for the group, including rehearsals, gigs, performances, fundraising, and upcoming album release
- Built and maintained <http://runforcover.uchicago.edu/>

All for One, St. Mary's Coptic Orthodox Church**Ambridge, PA****Co-Founder**

Sep 2013 – Pres

- Organized bake / t-shirt sales (also designed shirts), raising 225,000 Egyptian pounds for orphaned children in Egypt in the process.

St. Mary's Coptic Orthodox Church**Ambridge, PA****Web-master and Children's Camp Counselor**

Sept 2011 – Pres

- Built and maintain <http://stmarypittsburgh.org/>
- Help teach kids various songs and the Coptic language, and take care of them while their parents are away.
- Set-up and maintain all technology systems, as part of a subcommittee of the Board of Directors

TEACHING EXPERIENCE**Case Western Reserve University School of Medicine****Cleveland, OH****Anatomy Camp Instructor**

Oct 2019 - Pres

- Help teach interested high school students different aspects of anatomy and physiology

CWRU School of Medicine / John Hay School of Science and Medicine**Cleveland, OH****After School Tutor**

Oct 2019 - Pres

- Tutor high school students after school and help them with SAT/ACT preparation as well as any school homework they require assistance with

University of Chicago**Chicago, IL****Teaching Assistant**

Mar 2018 – Mar 2019

- As primary laboratory TA for the **Mathematical Modeling for Pre-Med. Students** course (Mar 2018 – Jun 2018), I taught students to use the programming language R for statistical data analysis. I oversaw the other lab teaching assistants along with any lab related action items. I wrote and graded the weekly quizzes administered to all students, in addition to weekly summaries to help them prepare. I was also given the task of modifying the labs themselves, writing their answer keys, and preparing the weekly presentations that the other lab assistants and I gave each week.
- As a lecture TA for **Systems Neuroscience** (Mar 2018 – Jun 2018), **Fundamental Neuroscience** (Sep 2018 – Dec 2018), **Perspectives of Human Physiology** (Sep 2018 – Dec 2018), and **Cellular Neuroscience** (Jan 2019 – Mar 2019), my responsibilities included grading papers, quizzes, and exams, in addition to holding weekly office hours and review sessions.
- As a grading TA for **Microbial and Human Cell Biology** (Jan 2019 – Mar 2019), I was responsible for grading quizzes and exams.

EMPLOYMENT**JPMorgan Chase & Co.****Jersey City, NJ****Summer Technology Analyst**

Jun – Aug 2018

- Used AngularJS to build several new features for an internal company application which is used by a large portion of the employees working for the company.

Accenture**Chicago, IL****Summer Technology Analyst**

Jun – Sep 2017

- Used Angular2 and React to build the front-end of several client demo applications, one of which helped close an \$80 million deal. Also wrote functional tests using Cucumber / Selenium and unit tests using Jasmine.

Inventory Connection, LLC**Pittsburgh, PA****Full Stack Designer and Developer**

Jun 2016 – Jun 2017

- Designed and built the company's main application using ASP.NET, HTML, CSS, and jQuery.

Explorer Surgical**Chicago, IL****Technical Operations Intern**

May 2016 – Nov 2016

- Help with various technology-related issues and HIPAA compliance.

SKILLS AND INTERESTS

Languages: Basic Proficiency in Spanish, Advanced Proficiency in Arabic, Beginner in Coptic

Computer Languages: HTML, CSS, jQuery, Java, Javascript, Ruby, Python, C#, Swift, R, Stata, Angular4, ReactJS

Computer Software: BrainSuite, FreeSurfer, ITK-Snap, Adobe Photoshop/Lightroom, Microsoft Office, Sketch, BESA Research Software, Garageband, XMALab

Music: Member of Docappella, Case Western's medical student-run a cappella singing group, as well as a member of Doc Opera, a musical fundraiser put on each year by Case Western's medical students (Sep 2019 – Pres)

Photography: Frequently take photographs for various organizations in the area I am in. Most recently, I photographed Illinois' first student sexual misconduct conference, where one of my photos was featured in an article of the Chicago Tribune (<https://www.chicagotribune.com/lifestyles/ct-life-illinois-sexual-misconduct-conference-20181108-story.html>)

Other: Piano, Squash