

# Aot Chanthorn

(818)-588-8399 | Chanthorn@berkeley.edu | <https://github.com/AotChn>  
Website: <https://aotchn.github.io/aotchanthorn>

## EDUCATION

---

University of California, Berkeley | Applied Mathematics

*Expected Graduation 2025*

**Relevant Skills:** (proficient): Python, C++ (familiar): Java, R, HTML, CSS, JavaScript, SQL

## EXPERIENCE

---

### Mathnasium

La Canada Flintridge, CA

*Math Instructor*

*June 2022 – July 2023*

- Collaborated with parents to determine student needs, documented student progress to streamlined learning
- Provided feedback to students using positive reinforcement techniques to encourage and build confidence
- Student outcome in the classroom resulted in a **positive** grade shift of **20-60%**

### Sano Health

Los Angeles, CA

*ACP distributor/representative*

*July 2022 – May 2023*

- Distributed discount or free internet service devices to qualified individuals
- Streamlined process resulting in a **50% increase** in processing speed
- Communicated with ACP office to fast-track individual applications

## PROJECTS

---

### Voltorb Flip Machine Learning Solver | *Personal (C++, SFML)*

- Recreated Pokémon minigame 'voltorb flip' as well as ai player with **96% win-rate** on select levels by gradient descent algorithm

### Evolution NEAT simulator | *Personal (C++, Python, SFML)*

- Modeling micro-organisms and evolution through use of genetic machine learning algorithm (NEAT)
- Collects data for each generation and packages into CSV formats for analysis and report

### Ai Speech Trainer | *Hackathon (Python, Whisper, OpenAi)*

- Program evaluates transcribed speech on a set of criteria similar to Grammarly but for speech
- Built onto of openai GPT-4 model and whisper API with a **team of two**

### Image Path Creator | *Personal (C++, OpenCV)*

- Software that identifies paths within an image and then seeks shortest paths using edge detection
- utilized OpenCV pre-processing modules to prep images for improved accuracy edge detection
- collaborated with a **team of three** utilizing version control practices

### CHIP-8 Emulator | *Personal (C++, SFML)*

- Emulator for the 1970s interpreted language "Chip-8"

### Graphing Calculator | *Academic (C++, SFML)*

- Graphic calculator with similar functionalities to Desmos with a user-friendly interface