# Cooper Proctor

Glenwood Springs, CO 81601

<u>cooperproctor23@gmail.com</u> | <u>www.linkedin.com/in/cooper-proctor</u> | <u>https://github.coecis.cornell.edu/chp36</u>

# **EDUCATION**

# **Cornell University**

Ithaca, NY

Bachelor of Science in Computer Science

Expected May 2026

- **GPA:** 3.55 / 4.0
- Honors & Awards: Dean's List Fall 2022, Fall 2023
- **Relevant Coursework:** Computer System Organization and Programming, Functional Programming, OOP, Data Structures, Visual Imaging, Discrete Math, Linear Algebra, Engineering Probability and Statistics
- Organizations: Cornell Concrete Canoe, Cornell Hyperloop, Climbing Club, Taekwondo Club, Boxing Club, Triathlon Club, Run Club, Hacking Club

#### WORK & LEADERSHIP EXPERIENCE

# **Department of Computer Graphics, Cornell University**

Ithaca, NY

*Undergraduate Research Assistant – Donald Greenberg's Lab* 

Jan 2024 – Present

- Implemented physics-based free-hand virtual grasping adaptable to shapes of different virtual objects
- Researched applications of new computer graphics technologies to AR/VR systems to improve performance

# **Department of Psychology, Cornell University**

Ithaca, NY

Undergraduate Research Assistant – Shimon Edelman's Lab

Sept 2023 – Dec 2023

- Developed artificial babbler from modeled orbicularis oris muscle capable of producing syllabic speech
- Researched applications of convolutional neural networks for monitoring psychological implications of turntaking in infants with different brain disorders
- Mentored by grad student and responsible for editing and improving ML model originally built in MatLab during an active translation into a more accessible PyTorch version model used for analysis of data
- Coded raw audio annotations of infant recordings with caregivers in turn-taking scenarios for analysis

### **Cornell Hyperloop**

Ithaca, NY

UI/UX Designer, Electrical Sub-team

Oct 2022 - July 2023

- Designed 4 pages for new team website alongside upperclassman using Figma
- Created onboarding project in group of 5 which connected a heat sensor and a heartbeat sensor to an Arduino and displayed the collected data to a remodeled version of the overall team's user interface
- Maintained close relationship with other sub-teams to ensure progress toward national competition in May
- Increased readability of 'Help' button within the GUI software and researched ways to interlace multiple Arduinos with multiple RaspberryPis to allow more efficient data transferal

# 2022 Big Ideas Competition First Place (LAFT)

Ithaca, NY

Co-Founder

Oct 2022 - Nov 2022

- Built LAFT (Lost by Accident, Found with Trust), a lost-and-found startup to connect losers with finders
- Won first place in Social/Climate Track out of 12 finalists at the Cornell 2022 Big Ideas Competition
- Granted \$2,000 in prize money to further develop the project with co-founder
- Entered to compete in National Round against teams from schools across the country

# **SKILLS, ACTIVITIES & INTERESTS**

**Projects:** *Ocamon* – Pokemon game built with OCaml, *Floppy Fish* – Flappy Bird game built in Unity with C#, *Planetoids* – Asteroids game built with Python, Chicken Coop - designed and built from scratch **Technical Skills:** Python, Java, JS, OCaml, SwiftUI, C++, C, C#, IntelliJ, VSCode, Git, Figma, Pandas, PyTorch **Events:** 2023 Aspen Ideas Festival, Big Red Hacks 2022, Cornell EC 2022, Cornell 2022 Big Ideas Competition **Interests:** technology/sustainability startups, bioethics, neuroscience/psychology, AI/ML, CNNs/RNNs, skiing, climbing, mountain biking, endurance physical events, cold exposure, traveling, drawing, mapping, building