Santa Clara, CA | vincentklim@berkeley.edu | (408) 890-9493 | github.com/vincentkslim

### **Education** University of California, Berkeley

Bachelor of Arts, Computer Science GPA: 4.0/4.0 Class of 2023

#### Relevant coursework:

- CS 285: Deep Reinforcement Learning, Policy Gradients, Actor-Critic, DQN (self-study)
- CS 61A: Python, Scheme, SOL, Data Abstraction, Functional Programming, OOP
- EECS 16A: Linear Algebra, Circuits, Machine Learning
- DATA 8: Intro to Data Science, Statistical Inference
- STAT 33B: Advanced Programming in R

Coursera: Deep Learning Specialization

• Feedforward Neural Networks, CNNs, RNNs, Optimizers, Regularization

## Monta Vista High School

GPA: 4.0/4.0

Class of 2020

- AP Computer Science A (5), AP Physics 1 (5), AP Chemistry (5), AP Physics C: Mechanics (5), AP Calculus BC (5)
- SAT: 1560/1600 (99th percentile), SAT II: Math Level II: 800, Chemistry: 770

# Concurrent Enrollment, Foothill College, De Anza College

Advanced Java (A), Network Security (A), Object-Oriented Programming in Python (A)

## **Work Experience**

## Software Engineer Intern, Material in Motion, Atlanta, GA

July 2019 - August 2019

- Developed a new backend API for an internal digital signage system in Python
- Used the Flask web framework to communicate with several Raspberry Pis
- Used the Requests package to scrape data from multiple internal sources

#### **Skills & Interests**

Languages: Java, Python, R, SQL, Scheme, LATEX

Libraries: TensorFlow, PyTorch, Keras, Pandas, Matplotlib, Requests, Flask, BeautifulSoup4

**Software:** Linux, FreeNAS, Proxmox, Git, Solidworks, Cura, PrusaSlicer

**Interests:** Classical Music, Bassoon, Cycling, Deep Learning, Reinforcement Learning, Web

Scraping, Competitive Programming, 3D Printing, CAD

# Leadership

# **President of Engineering,** Valkyrie Robotics FRC #299

April 2019 - April 2020

- Led and coordinated the engineering department of a championship-attending robotics team
- Headed the design of several major subassemblies of our robot in Solidworks
- Led the team to its best placement ever and a playoff appearance at the Los Angeles North regional, a competition with many strong 'powerhouse' teams

## Secretary, Monta Vista Computer Science Club

*May 2019 - May 2020* 

• Organized and led regular club meetings that taught advanced computer science topics such as machine learning and cryptography.

# Projects (on Github)

- **budgetkeras**. A functional clone of the deep learning library Keras using the numpy library. Implemented Dense layers, non-linear activations, weight initialization techniques, and more.
- **Poker**. A recreation of Texas Hold'em in Java. Built a GUI using the Java Swing toolkit and implemented multiplayer support using Sockets.
- Ender i3 Pro. Designed upgrades to the Ender 3 Pro 3D printer in Solidworks, redesigned the x-axis carriage with support for direct drive, full metal hotend, and dual extruder gears.

## Achievements and Awards

**Achievements and** USA Computing Olympiad Platinum Division

• Top division of a series of nationwide algorithmic contests for high school students

• Developed strong problem solving skills and a solid foundation in data structures and algorithms

Harker Programming Invitational 2019 - 1st Place

<a href="https://www.commons.com/">hack> Cupertino 2019 - 1st Place</a>

National Merit Semifinalist

MadTown Throwdown 2019 PG&E Excellence in Engineering Award