

MATTHEW PAULY

mpauly@college.harvard.edu | (612) 801-4323

Education

Harvard University

A.B., Mathematics and Computer Science — GPA 3.71

Cambridge, MA

Expected Graduation May 2023

Saint Paul Academy

Diploma, Cum Laude — GPA 3.96 / 4.0

Saint Paul, MN

Graduated June 2019

Work, Leadership, and Projects

CS 50 Course Assistant

September 2020 - Present

Harvard University

Hold office hours every week to help students with their work in CS 50 (Intro to Computer Science)

Card Game Machine Learning Agents

Summer 2020

Personal coding project, built two separate computer agents, one using deep reinforcement learning and one with Information Set Monte Carlo Tree Search, for the card game Gang of Four (https://github.com/mtp61/gof_PPOalgorithm, https://github.com/mtp61/gof_ISMCTS)

Image Recognition

May 2019

Senior Project at Saint Paul Academy, built a deep neural network from scratch in Python using NumPy for image classification of objects relevant to self-driving cars (traffic lights, stop signs, etc.) achieving ~93% accuracy with instruction from a University of Minnesota graduate student (<https://github.com/mtp61/ImageClassificationNeuralNet>)

Eagle Scout

2012 - 2019

Boy Scout Troop 110

Served as Senior Patrol Leader; Directed Eagle Scout Project involved preservation of the Latham Raspberry, a 98 year-old University of Minnesota variety

Skills and Interests

Software Development: Data Structures and Algorithms, Object Oriented Programming

Programming Languages: Moderate experience with Python and Java; some experience with C, C++, Javascript, and HTML

Interests: Personal Coding Projects (<https://github.com/mtp61>), Board & Card Games, Backpacking, Ultimate Frisbee — play for Harvard Redline, the top men's team