Michael Piseno

Education

2021 - 2023 Stanford University

MS Computer Science

GPA: 4.0

2017 - 2021 Georgia Institute of Technology

BS Computer Science with highest honors, Minor in Mathematics Major GPA: 4.0, Overall GPA: 3.82

Research Experience

Winter 2022 - Intelligent and Interactive Autonomous Systems Group (ILIAD) MS STUDENT

Present Student in ILIAD, which is part of Stanford AI Lab (SAIL), advised by Dorsa Sadigh. Research on using language goals for robot control policies. We fine-tune CLIP to enforce more structure in the CLIP joint embedding space and show increased generalization on downstream language-conditioned control tasks. Research in progress and will result in a first-author paper.

Spring 2022 - Robotics @ Google Research Intern

Research on natural-looking locomotion policies for humanoid robots. We utilize Style Augmented Mutual Information (SAMI) and 7 seconds of human walking data to learn realistic locomotion for a Digit bipedal robot in the real world. Research in progress and will result in a first-author paper. This work is also a collaboration with students from the Robot Learning Lab and Hybrid Robotics Lab at UC Berkeley.

Summer 2021 IBM Research RESEARCH INTERN

Research on applying off-policy RL algorithms to optimize millimeter-wave communications in a 5G cellular network. We propose a system for learning to control the direction and power levels of multiple 5G cell towers in a simulated environment.

Industry Experience

Summer 2020 Dropbox Software Engineer Intern

Worked on a chrome extension for organizing workflow, where I built the ML infrastructure for predicting tabs that are considered clutter and can therefore be closed. This included building the infrastructure for client-server interaction, training the ML model, and displaying the results on the front end. We launched the product to approximately 500 users during internship.

Winter 2020 Facebook Al Research SOFTWARE ENGINEER INTERN

Built an image extraction tool used for computer vision research on top of Habitat, a photo-realistic 3D indoor scene simulator. Trained instance segmentation models like Mask R-CNN using the image extractor as a proof of concept. View a tutorial for the tool here.

Summer 2019 Amazon Software Engineer Intern

Developed a method for semantic segmentation in images along linear boundaries that performs with 95% accuracy*. The method was created in support of the augmented reality features in the Amazon shopping app. *Accuracy determined by IoU thresholds on a held-out data set.

Summer 2018 Georgia Tech Research Institute RESEARCH INTERN

- Fall 2018 Added neural networks to an open-source ML framework which I then used to classify noisy digital signals. In a separate project, I used Q Learning to train multiple agents to collaboratively search an environment in the game StarCraft II.

Teaching Experience

Fall 2021 Stanford University Course Assistant

Course Assistant (CA) for CS 221: Artificial Intelligence: Principles and Techniques. Responsibilities include managing course content, hosting office hours, and grading assignments. Course website

Fall 2019 - Georgia Institute of Technology TEACHING ASSISTANT

Spring 2021 Teaching Assistant for CS 7643: Deep Learning. Created and maintained course material, graded assignments, and assisted students in office hours. Topics include vision and language models, generative models, and reinforcement learning. Course website

Awards and Honors

April 2022 National Defense Science and Engineering Graduate (NDSEG) Fellowship

Graduate fellowship award to pursue research on intelligent robotics. Acceptance rate: 2%

May 2021 Highest Honors, BS Computer Science, Georgia Institute of Technology

Graduated from the Georgia Institute of Technology with a BS in Computer Science with highest honors.

July 2020 Intel SHPE Undergraduate Scholarship

Scholarship sponsored by Intel awarded through the Society of Hispanic Professional Engineers (SHPE). More info here.

July 2020 Tapia Conference Scholarship

Awarded a scholarship to cover the cost of attendance to the ACM Richard Tapia Conference.

July 2020 LSAMP Scholarship

Scholarship awarded primarily to underrepresented students in STEM. Awarded by the LSAMP program through Georgia Tech.

April 2020 Generation Google Scholarship

Awarded by Google for accomplishment in Computer Science. More info here.

Nov 2019 Cisco Enterprise Scholarship

Awarded a Cisco Enterprise Business Group Scholarship through a program in Georgia Tech's College of Computing.

Aug 2019 SHPE Undergraduate Scholarship

Awarded a SHPE Undergraduate Scholarship for my involvement in the Society of Hispanic Professional Engineers (SHPE). This scholarship was awarded to roughly three dozen students.