ALBERT WILCOX

1 (916) 945-1588 \(\phi\) albertwilcox@berkeley.edu https://github.com/albertwilcox

EDUCATION

University of California, Berkeley

Berkeley, CA

B.A. in Computer Science, Applied Mathematics

Expected May 2022

• GPA: 4.0, Major GPA: 4.0

• Relevant Coursework: Deep Reinforcement Learning, Advanced Topics in Decision Making and Control, Deep Neural Networks, Introduction to Machine Learning, Optimization Models, Probability and Random Processes, Algorithms, Linear Algebra, Multivariable Calculus, Discrete Math and Probability Theory, Abstract Algebra, Real Analysis

RESEARCH EXPERIENCE

Berkeley AI Research - AUTOLab

Berkeley, CA

Undergraduate Researcher advised by Prof. Ken Goldberg

August 2020 - Present

• Designed, implemented and deployed algorithms for robotic automation. Research areas include reinforcement learning, imitation learning, representation learning and perception.

UC Berkeley Autonomous Microsystems Lab

Berkeley, CA

Undergraduate Researcher advised by Prof. Kris Pister

August 2019 - May 2020

• Designed and implemented algorithms for accurate long-horizon dynamics model learning.

WORK EXPERIENCE

Amazon Web Services

Virtual

Software Development and Engineering Intern

May 2020 - August 2020

- Worked as a Software Development Engineering Intern at Amazon Web Services.
- Built a data lake to store data emitted by AWS Elastic Load Balancers using a variety of internaland external-facing AWS tools.

UC Berkeley EECS Department

Virtual

Reader

August 2020 - December 2020

• EECS 127 (Optimization Models in Engineering) - Created rubrics for and graded student homework and exams.

PUBLICATIONS AND PROJECTS

- 1. <u>Albert Wilcox*</u>, Justin Kerr*, Brijen Thananjeyan, Jeffrey Ichnowski, Minho Hwang, Samuel Paradis, Danyal Fer, Ken Goldberg. "Learning to Localize, Grasp, and Hand Over Unmodified Surgical Needles". *Under review*, 2021.
- 2. <u>Albert Wilcox*</u>, Ashwin Balakrishna*, Brijen Thananjeyan, Joseph E. Gonzalez and Ken Goldberg. "LS³: Latent Space Safe Sets for Long-Horizon Visuomotor Control of Sparse Reward Iterative Tasks". Conference on Robot Learning 2021. (https://arxiv.org/abs/2107.04775)
- 3. Ryan Hoque, Ashwin Balakrishna, Ellen Novoseller, <u>Albert Wilcox</u>, Daniel S. Brown and Ken Goldberg. "ThriftyDAgger: Budget-Aware Novelty and Risk Gating for Interactive Imitation Learning". Conference on Robot Learning 2021. (https://arxiv.org/abs/2109.08273)
- 4. Nathan O. Lambert, <u>Albert Wilcox</u>, Howard Zhang, Kristofer S. J. Pister and Roberto Calandra. "Learning Accurate Long-term Dynamics for Model-based Reinforcement Learning". *IEEE Conference on Decision and Control* 2021. (https://arxiv.org/abs/2012.09156)

EXTRACURRICULAR ACTIVITIES

Boy Scouts

Served various leadership rolls, and earned the Eagle Scout rank.

Athletics

Ran varsity cross country and track for two years in high school. On the club triathlon team at Berkeley.

HONORS AND PROFESSIONAL ACTIVITIES

Program Committee Member, Safe and Robust Control of Uncertain Systems Workshop, NeurIPS 2021 December 2021January 2020 - Present

Upsilon Pi Epsilon (CS Honor Society)