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|--------------|---|--|
| Education    | <b>Massachusetts Institute of Technology</b><br>Ph.D. in Electrical Engineering and Computer Science<br><b>MIT Presidential fellowship</b>  | September 2017 - Present<br>GPA: 5.00/5.00 |
|              | <b>University of California, Berkeley</b><br>B.S. in Electrical Engineering and Computer Science<br><b>Graduated with Highest Honors (top 3%)</b>   | August 2013 - May 2017<br>GPA: 3.95/4.00   |
| Experience   | <b>Improbable AI Lab</b><br>(Adviser: Pulkit Agarwal) <ul style="list-style-type: none"><li>• Building deep RL algorithms that leverages past interactions to learn priors that promote behavior transfer</li><li>• Identifying and fixing key optimization bottlenecks in deep RL</li></ul>  | September 2019 - Present                   |
|              | <b>Google Brain Research Internship</b><br>(Advisers: Ofir Nachum and Sergey Levine) <ul style="list-style-type: none"><li>• Worked on leveraging (unlabelled) offline data to extract skills which allows for improved offline reinforcement learning, online reinforcement learning and few-shot imitation learning.</li></ul>              | June 2020 - August 2020                    |
|              | <b>Learning and Intelligent Systems Group</b><br>(Advisers: Leslie Kaelbling and Josh Tenenbaum) <ul style="list-style-type: none"><li>• Worked on leveraging physics engine for dynamics model learning and control</li><li>• Worked on curiosity driven exploration for reinforcement learning in environment with sparse rewards</li></ul> | September 2017 - September 2019            |
|              | <b>Madry Lab</b> (with Aleksander Madry) <ul style="list-style-type: none"><li>• Worked towards understanding the fundamentals of deep learning and on designing adversarially robust deep learning models.</li><li>• Worked on robust style transfer for images and videos</li></ul>   | March 2019 - September 2019                |
|              | <b>Berkeley Artificial Intelligence Research Lab</b><br>(Advisers: Pieter Abbeel and Sergey Levine) <ul style="list-style-type: none"><li>• Worked on deep learning for state estimation</li><li>• Developed model-based sample efficient reinforcement learning algorithm</li></ul>  | October 2014 - May 2017                    |
|              | <b>Is Conditional Generative Modeling all you need for Decision Making?</b><br><b>Anurag Ajay*</b> , Yilun Du*, Abhi Gupta*, Josh Tenenbaum, Tommi Jaakkola, Pulkit Agrawal.<br>International Conference on Learning Representations (ICLR), Kigali, Rwanda, May 2023 (In Submission).  |  |
| Publications | <b>Parallel-Q-Learning: Scaling Off-policy Reinforcement Learning</b><br>Zechu Li, Tao Chen, Zhang-Wei Hong, <b>Anurag Ajay</b> , Pulkit Agrawal.<br>International Conference on Learning Representations (ICLR), Kigali, Rwanda, May 2023 (In Submission).   |  |
|              | <b>Distributionally Adaptive Meta Reinforcement Learning</b><br><b>Anurag Ajay*</b> , Abhishek Gupta*, Dibya Ghosh, Sergey Levine, Pulkit Agrawal.<br>Neural Information Processing Systems (NeurIPS), New Orleans, USA, December 2022.   |  |
|              | <b>Offline RL Policies should be trained to be Adaptive</b><br>Dibya Ghosh, <b>Anurag Ajay</b> , Pulkit Agrawal, Sergey Levine.<br>International Conference on Machine Learning (ICML), Baltimore, USA, July 2022.  |  |
|              | <b>Overcoming The Spectral Bias of Neural Value Approximation</b><br>Ge Yang*, <b>Anurag Ajay*</b> , Pulkit Agrawal.<br>International Conference on Learning Representations (ICLR), Virtual, May 2022.   |  |

### **Understanding the Generalization Gap in Visual Reinforcement Learning**

**Anurag Ajay\***, Ge Yang\*, Ofir Nachum, Pulkit Agrawal.

ICML Reinforcement Learning for Real Life Workshop, July 2021.

### **OPAL: Offline Primitive Discovery for Accelerating Offline Reinforcement Learning**

**Anurag Ajay**, Aviral Kumar, Pulkit Agrawal, Sergey Levine, Ofir Nachum.

International Conference on Learning Representations (ICLR), Vienna, Austria, May 2021.

### **Learning Action Priors for Visuomotor transfer**

**Anurag Ajay**, Pulkit Agrawal.

ICML Inductive biases, invariances and generalization in RL workshop, July 2020.

### **Long-Horizon Prediction and Uncertainty Propagation with Residual Point Contact Learners**

Nima Fazeli, **Anurag Ajay**, Alberto Rodriguez.

IEEE International Conference on Robotics and Automation (ICRA), Paris, France, May 2020.

### **Learning Skill Hierarchies from Predicate Descriptions and Self-Supervision**

Tom Silver\*, Rohan Chitnis\*, **Anurag Ajay**, Josh Tenenbaum, Leslie Pack Kaelbling.

AAAI Workshop on Generalization in Planning (GenPlan), 2020.

### **Learning to Navigate Endoscopic Capsule Robots**

Mehmet Turan, Yasin Almalioglu, Hunter B Gilbert, Faisal Mahmood, Nicholas J Durr, Helder Araujo, Alp Eren Sar, **Anurag Ajay**, Metin Sitti.

Robotics and Automation Letters (RA-L), 2019.

### **Combining Physical Simulators and Object-Based Networks for Control**

**Anurag Ajay**, Maria Bauza, Jiajun Wu, Nima Fazeli, Joshua B. Tenenbaum, Alberto Rodriguez, Leslie P. Kaelbling.

IEEE International Conference on Robotics and Automation (ICRA), Montreal, Canada, May 2019.

### **Augmenting Physical Simulators with Stochastic Neural Networks: Case Study of Planar Pushing and Bouncing**

**Anurag Ajay**, Jiajun Wu, Nima Fazeli, Maria Bauza, Leslie P. Kaelbling, Joshua B. Tenenbaum, Alberto Rodriguez.

IEEE International Conference on Intelligent Robots and Systems (IROS), Madrid, Spain, October 2018.

**Best Paper for Cognitive Robotics**

### **Reset-Free Guided Policy Search: Efficient Deep Reinforcement Learning with Stochastic Initial States**

**Anurag Ajay\***, William Montgomery\*, Chelsea Finn, Pieter Abbeel, Sergey Levine. IEEE International Conference on Robotics and Automation (ICRA), Singapore, May 2017.

### **Backprop KF: Learning Discriminative Deterministic State Estimators**

Tuomas Haarnoja, **Anurag Ajay**, Sergey Levine, Pieter Abbeel.

Neural Information Processing Systems (NIPS), Barcelona, Spain, December 2016.

**Technical Skills** Python, ROS, Caffe, Tensorflow, Pytorch, JAX, Spark