

Linyi Jin

Education

☎ (734)882-7087 • ✉ jinlinyi@umich.edu • 🌐 jinlinyi.github.io

University of Michigan

M.S. in Robotics.

Michigan, USA

2019–2021(*expected*)

University of Michigan

B.S.E. in Computer Science. GPA: 3.89/4.00

Michigan, USA

2017–2019

Shanghai Jiao Tong University

B.S.E. in Mechanical Engineering.

Shanghai, China

2015–2019

Publication

Andrew Price*, Linyi Jin*, Dmitry Berenson

Inferring Occluded Geometry Improves Performance When Retrieving an Object from Dense Clutter

International Symposium on Robotics Research (ISRR), 2019

- Augmented a manipulation planner for cluttered environments with a state-of-the-art RGB-D segmentation and constructed a 3D reconstruction perception pipeline to reduce the amount of occluded space to explore.
- Project Page: <https://jinlinyi.github.io/mps.html>

Work Experience

YITU Technology

Research Intern in Computer Vision

Shanghai, China

2019.5–2019.8

- Implemented novel algorithms for image classification systems. Increased final accuracy on large-scale datasets.

University of Michigan

Instructional Aide for EECS 442 Computer Vision

Ann Arbor, MI

2019.1–2019.4

- Re-designed all the assignments in Python and OpenCV. Held office hours, taught recitation classes every week.
- Course website: https://web.eecs.umich.edu/~fouhey/teaching/EECS442_W19/

Research Experience

Fouhey AI Lab, University of Michigan

Directed study, Advisor: Prof. David Fouhey.

Ann Arbor, MI

2019.5–present

- Working on developing novel algorithms to reconstruct 3D scenes from RGB images.

Autonomous Robotic Manipulation Lab (ARM Lab), University of Michigan

Independent researcher, Advisor: Prof. Dmitry Berenson, Sponsor: Toyota Research Institute.

Ann Arbor, MI

2018.4–2019.4

- Worked on the MPS project which is published to ISRR 2019.

Michigan Vision & Learning Lab (UMich-vl), University of Michigan

Undergraduate research assistant, Advisor: Prof. Jia Deng.

Ann Arbor, MI

2018.5–2018.8

- Worked on DARPA's Active Interpretation of Disparate Alternatives (AIDA) Challenge. Matched images with corresponding texts to build a knowledge graph.

Selected Projects

Convision: Bring Vision to the Blind through Conversation

Capstone Project, Prof. Jason Mars, University of Michigan

Ann Arbor, MI

2019.1–2019.4

- Developed a smart conversation AI implemented on the Clinc platform. This tool will interact with users and help them understand the content of the image input.

Single-view Surface Normal Prediction

EECS 442 Computer Vision, Prof. Jia Deng, University of Michigan

Ann Arbor, MI

2018.3–2018.4

- Developed a machine learning model using a Stacked Hourglass Network and proposed a novel loss function to predict the surface normal from a single image. Reached 0.356 MEA (mean angle error) accuracy and breaks the record from previous years.

Skills

- **Skills:** Python, Matlab, C++/C, Java; \LaTeX , HTML/CSS; Pytorch, Tensorflow; Arduino, ROS, RViz.