Jhen Hsieh

✉ spen940408@gmail.com
🌐 https://www.csie.ntu.edu.tw/ b12902015/
in Jhen Hsieh
⌗ spen2005

About Me

I am Jhen Hsieh, a third-year undergraduate student at National Taiwan University, currently conducting robotics research in the Embodied AI Lab. My interests lie in robotics and accelerated computing. Specifically, I am passionate about modeling and developing novel methods for generalized robotic manipulation.

Education

2023.8 - **Bachelor of Science in Computer Science**, *National Taiwan University*, Taipei, Taiwan

Experience

2024.12 - **Undergraduate Researcher in Embodied AI Lab**, *Supervised by Tsung-Wei Ke*,

Publications

2024.6 **Neural Network-Based Tracking and 3D Reconstruction of Baseball Pitch Trajectories from Single-View 2D Video**, `https://arxiv.org/abs/2405.16296`

Projects

2024.12 - **DexMan: Learning Dexterous Manipulation from Human Demonstration**, `git@github.com:spen2005/DexManEnvs.git`
  ○ Training RL policy in Isaac Gym.
  ○ Building digital twin in simulator from single view videos.

2024.11 - 12 **ViT.c**, *Course in Parallel Computing*, `git@github.com:spen2005/ViT.c.git`
  ○ Write Vision Transformer in raw cuda C/C++.
  ○ Technologies used: cuda C/C++.

2024.5 - 6 **Neural Network-Based Tracking and 3D Reconstruction of Baseball Pitch Trajectories from Single-View 2D Video**, *Course in Computer Graphics*, `https://github.com/spen2005/pitching_tracker`
  ○ Predict the location of baseball by training a deep-learning model.
  ○ Technologies used: Python, PyTorch, OpenCV, Blender.

Skills

Programming Languages Python, C, C++

Frameworks & Libraries	PyTorch, Isaac Gym, Isaac Sim, Isaac Lab, rlgames, Genesis, HaWoR, HaMeR, FoundationPose
Graphics & Simulation Tools	OpenGL, CUDA, OpenMP
Languages	Chinese (native), English