Inwoo Hwang

Education

Seoul National University

Ph.D. in Electrical and Computer Engineering

B.S. in Electrical and Computer Engineering

* military service completed (12/2017 - 12/2019)

Seoul Science High School for the gifted

Major: Mathematics 03/2013 - 02/2016

Honors and Awards

Excellent Research Talent Fellowship, BK21. 2023

The Hyundai Motor Scholarship (Ph.D. scholarship, \$40,000), Chung Mong-Koo foundation. 2022 – Current

The Presidential Science Scholarship (Field: Mathematics, \$40,000), Ministry of Science and ICT. 2016 – 2022

Gold medal, University Mathematics Competition, for mathematics major.

Silver medal, University Mathematics Competition.

15th place, Simon Marais Mathematics Competition, Undergraduate Mathematics Competition Asia-Pacific. 2019

Excellence award, High school Mathematics Competition, Final Korean Mathematical Olympiad (FKMO). 2015

Work Experience

Computational Imaging Team, Snap Research

Goal-Driven Human Motion Synthesis in Diverse Tasks

Inwoo Hwang, Jinseok Bae, Donggeun Lim, and Young Min Kim

research keywords: Motion Synthesis, Spatial Control, Human-Scene Interaction, Diffusion Model

New York City, New York

Research Intern

05/2024 - 09/2024

CVPRW 2025
paper project

Seoul, Korea

2020

2019

- Working on physically plausible reconstruction of human motion and scenes from real-world videos.
- Mentors: Bing Zhou, Chuan Guo, Jian Wang.

Publications

SceneMI: Motion In-betweening for Modeling Human-Scene Interaction Inwoo Hwang, Bing Zhou, Young Min Kim, Jian Wang, and Chuan Guo research keywords: Motion Synthesis, Human-Scene Interaction, Diffusion Model, 3D Reconstruction	ICCV 2025 paper project
Motion Synthesis with Sparse and Flexible Keyjoint Control Inwoo Hwang, Jinseok Bae, Donggeun Lim, and Young Min Kim research keywords: Motion Synthesis, Spatial Control, Diffusion Model	ICCV 2025 ② paper project
Less is More: Improving Motion Diffusion Models with Sparse Keyframes Jinseok Bae, Inwoo Hwang, Young Yoon Lee, Ziyu Guo, Joseph Liu, Yizhak Ben-Shabat, Young Min Kim, and Mubbasir Kapadia research keywords: Motion Synthesis, Diffusion Model	ICCV 2025
Event-Driven Storytelling with Multiple Lifelike Humans in a 3D Scene Donggeun Lim, Jinseok Bae, Inwoo Hwang, Seungmin Lee, Hwanhee Lee, and Young Min Kim research keywords: Motion Synthesis, Multiple Humans	ICCV 2025 paper project
A Survey on Human Interaction Motion Generation Kewei Sui, Inwoo Hwang*, Anindita Ghosh*, Bing Zhou, Jian Wang, and Chuan Guo research keywords: Human Interaction	ArXiv 2025 ② paper project

Versatile Physics-based Character Control with Hybrid Latent Representation Eurographics 2025 Jinseok Bae, Jungdam Won, Donggeun Lim, Inwoo Hwang, and Young Min Kim paper project research keywords: Physics-based Animation Text2Scene: Text-driven indoor scene stylization with part-aware details CVPR 2023, Highlight paper project Inwoo Hwang, Hyeonwoo Kim and Young Min Kim research keywords: 3D Stylization Text2PointCloud: Text-Driven Stylization for Sparse PointCloud Eurographics 2023, Short Inwoo Hwang, Hyeonwoo Kim, Donggeun Lim, Inbum Park and Young Min Kim paper project research keywords: 3D Stylization Ev-NeRF: Event Based Neural Radiance Field **WACV 2023** Inwoo Hwang, Junho Kim, and Young Min Kim paper project research keywords: 3D Reconstruction, Neural Radiance Field, Event Based Vision Ev-TTA: Test-Time Adaptation for Event-Based Object Recognition CVPR 2022 Junho Kim, Inwoo Hwang, and Young Min Kim paper project research keywords: Test-Time Adaptation, Event Based Vision

Research Experience

Laboratory for Imaging Science and Technology, Seoul National University

Seoul, Korea

paper project

IROS 2022

Research Intern

MaskGrasp: Mask-based Grasping for Scenes with Multiple General Real-world Objects

12/2020 - 02/2021

• Worked on MRI Image Reconstruction.

Robot Learning Laboratory, Seoul National University

Junho Lee, Junhwa Hur, Inwoo Hwang, and Young Min Kim

research keywords: Object Recognition, Robot Manipulation

Seoul, Korea

Research Intern

08/2020 - 12/2020

Worked on 3D object detection and robot manipulation.

Academic Activities

Reviewer: CVPR 2023, 2024, 2025 ICCV 2023, 2025 NeurIPS 2025 3DV 2025 ICRA 2023 RA-L 2023