

JOOCHAN KIM

📍 Seoul, Korea ◊ 📩 tikitoka@snu.ac.kr ◊ 🌐 tikatoka.github.io ◊ 🎨 TikaToka ◊ 💬 TikaToka

INTEREST

Embodied AI, Data-centric AI, Multimodal AI

EDUCATION

Seoul National University

M.S. in Computer Science and Engineering

Seoul, Korea

Mar 2022 - Aug 2024

- Supervisor: Prof. Byoung-Tak Zhang, Bio-Intelligence Lab
- Thesis: Bias Analysis in Instructional Video Learning [paper]

Yonsei University

B.S. in Computer Science

Seoul, Korea

Mar 2016 - Aug 2021

PUBLICATIONS

* denotes equal contributions

◦ The Losing Winner: An LLM Agent that Predicts the Market but Loses Money

Youwon Jang, Joochan Kim*, Byoung-Tak Zhang*
NeurIPS 2025 Workshop on Generative AI in Finance [paper]

◦ Continual Vision-and-Language Navigation

Seongjun Jung, Gi-Cheon Kang, Seongho Choi, Joochan Kim, Byoung-Tak Zhang
BMVC 2025 [paper]

◦ Exploring Ordinal Bias in Action Recognition for Instructional Videos

Joochan Kim, Minjoon Jung, Byoung-Tak Zhang
ICLR 2025 Workshop on SCSL & KSC 2023 [paper] [code] [poster] [KSC 2023 paper]

◦ Background-aware Moment Detection for Video Moment Retrieval

Minjoon Jung, Youwon Jang, Seongho Choi, Joochan Kim, Jin-Hwa Kim, Byoung-Tak Zhang
WACV 2025 [paper] [code]

◦ Zero-Shot Vision-and-Language Navigation with Collision Mitigation in Continuous Environment

Seongjun Jeong, Gi-Cheon Kang, Joochan Kim, Byoung-Tak Zhang
Embodied AI Workshop @ CVPR 2024 [paper]

◦ Modal-specific Pseudo Query Generation for Video Corpus Moment Retrieval

Minjoon Jung, SeongHo Choi, Joochan Kim, Byoung-Tak Zhang
EMNLP 2022 [paper] [code]

RESEARCH EXPERIENCE

Korea Institute of Science and Technology (KIST)

Intern (Adviser: Dr. Hwasup Lim)

Seoul, Korea

Jan 2025 - Present

- Project: Self-Evolving Embodied AGI Platform Technology through Real-World Experience
 - Addressed a key data bottleneck by developing a trajectory generation pipeline to automatically label 1000+ dynamic simulated environments.
 - Focused on developing robust action models for autonomous driving and mobile manipulation, a core component of the project's VLA goals.
 - Currently exploring two key research directions: (1) enhancing 3D spatial understanding and (2) language-guided approaches for planning.

Agency for Science, Technology and Research (A*STAR)

Intern (Adviser: Dr. Haiyue Zhu)

Singapore, Singapore

Mar 2024 - Aug 2024

- Project: Deep Learning for Intelligent Robotics
 - Engineered an auto-labeling pipeline for robot vision to generate 50k+ instruction-tuning examples for Supervised Fine-Tuning (SFT)
 - Fine-tuned multimodal LLM with generated dataset
- Deployed custom LLM solutions (LangChain) for automated meeting summarization and robotics-domain recommendations.

RESEARCH PROJECTS

Question Answering using Question Generation

Capstone Design 2

Yonsei University
Sep 2020 - Dec 2020

- Propose a method to improve QA model robustness against adversarial attacks by using Question Generation to reduce unnecessary dependencies.

Effective Ways to Select Dataset from Large Corpus

Capstone Design 1

Yonsei University
Mar 2020 - Jun 2020

- Proposed and implemented an approach to reduce dataset size, minimizing training time and computational costs while improving performance.

ACADEMIC SERVICES

- **Reviewer:** NeurIPS 2025, CVPR 2026

TEACHING

Creative Integrated Design 2

Teaching Assistant

Seoul National University
Mar 2023 - Jun 2023

- Advised undergraduate students on their industry-academic cooperation projects.

Social Engagement - Middle School Students Mentoring

Mentor

Yonsei University
Jul 2018

- Mentored high school students, facilitating group activities and discussions.

HONORS AND AWARDS

Singapore International Pre-Graduate Award

Awardee

A*STAR
Jan 2024

AIM Innovation Track Student Achievement Showcase

Excellence Award

Yonsei University
Dec 2020

Graduation Work Exhibition

Grand Prize

Yonsei University
Dec 2020

Graduation Work Exhibition

Excellence Award

Yonsei University

Jun 2020

TECHNICAL SKILLS

- **Advanced** Python, PyTorch, HuggingFace, Transformers
- **Moderate** LLM Post-Training, Distributed Learning, Git, Linux, Docker, TensorFlow
- **Novice** LangChain, ROS

LANGUAGE PROFICIENCY

Fluent in English and Native in Korean.

- TOEFL iBT - 102 (Reading: 27, Listening: 29, Speaking: 22, Writing: 24)

REFERENCES

Byoung-Tak Zhang

Professor

Department of Computer Science and Engineering
College of Engineering, Seoul National University

Phone: +82-2-880-1833

Email: btzhang@bi.snu.ac.kr
<https://bi.snu.ac.kr>

Hwasup Lim

Principal Researcher

Center for Artificial Intelligence Research
Korea Institute of Science and Technology

Phone: +82-2-958-5753

Email: hslim@kist.re.kr
<https://www.hwasup.net>

Haiyue Zhu

Senior Scientist

Singapore Institute of Manufacturing Technology
Agency for Science, Technology and Research

Phone: +65-6826-6111

Email: zhu_haiyue@a-star.edu.sg
<https://h-y-zhu.github.io>