

# Gyeong-hyeon Kim

✉ [leonardkhh@cau.ac.kr](mailto:leonardkhh@cau.ac.kr) | 🏠 [homepage](#) | 🎓 [google-scholar](#) | 🔗 [linkedin](#)

## Research Interest

Machine Learning, Deep Learning, Computer Vision, and Video Understanding.

### Specific Research Interest:

- Temporal Action Segmentation, Action Anticipation
- Continual Learning, Multi-modal Learning, Efficient Model Training

## Education

### Chung-Ang University

Ph.D. degree in Computer Science and Engineering

- Supervised by Prof. Eunwoo Kim

Mar. 2023 - Present  
Seoul, South Korea

### Chung-Ang University

M.S. in Computer Science and Engineering.

- Dissertation title: "*Temporal Action Segmentation with Alleviating Local Context Fading*"
- GPA: 4.39/4.5
- Supervised by Prof. Eunwoo Kim

Mar. 2021 - Feb. 2023  
Seoul, South Korea

### Chung-Ang University

B.S. degree in Computer Science and Engineering

- GPA: 3.81/4.5

Mar. 2014 - Feb. 2021  
Seoul, South Korea

## Publications

(\*: Equal contributions)

### RainbowPrompt: Diversity-Enhanced Prompt-Evolving for Continual Learning

Oct. 2025

Kiseong Hong, **Gyeong-hyeon Kim**, and Eunwoo Kim

Proceedings of the IEEE International Conference on Computer Vision (ICCV '25)

### Mitigating Class Confusion in Class-incremental Semantic Segmentation

May 2025

Nayoung Ko, **Gyeong-hyeon Kim**, and Eunwoo Kim

IEEE Access, vol. 13, pp. 84130-84138

### Similarity-Aware Class Discrimination in Class-Incremental Semantic Segmentation

Oct. 2024

**Gyeong-hyeon Kim**\*, Nayoung Ko\*, and Eunwoo Kim

15th International Conference on Information and Communication Technology Convergence (ICTC '24)

### Growing a Brain with Sparsity-Inducing Generation for Continual Learning

Oct. 2023

Hyundong Jin, **Gyeong-hyeon Kim**, Chanho Ahn, and Eunwoo Kim

Proceedings of the IEEE/CVF International Conference on Computer Vision (ICCV '23)

### GhostNeXt: Rethinking Module Configurations for Efficient Model Design

Mar. 2023

Kiseong Hong, **Gyeong-hyeon Kim**, and Eunwoo Kim

Applied Sciences, vol. 13, no. 5, p. 3301

### Stacked Encoder-Decoder Transformer with Boundary Smoothing for Action Segmentation

Dec. 2022

**Gyeong-hyeon Kim**, and Eunwoo Kim

Electronics Letters, vol. 58, no. 25, pp. 972-974

## Projects

### Time-Series Action Prediction and Segmentation

Mar. 2023 - Jul. 2024

Funded by HD Hyundai Construction Equipment

- This project aims to develop high-performing and parameter-efficient deep learning models to learn and segment time-series actions for various construction equipments.

## Customized Neural Architecture Search and Proposal

Mar. 2021 - Oct. 2021

Funded by Samsung SDS

- This project aims to develop customized neural architecture search technology for visual tasks.
- Co-worked with Samsung SDS AI Vision Lab.

## Pose Estimation for Bin-Picking with a 3D Model

Oct. 2020 - Dec. 2020

Funded by Doosan Digital Innovation

- This project develops exact 6D pose estimation and instance segmentation algorithms for a bin-picking problem of a robot.

## Honors and Awards

- First Place, The Third Big Data Idea Competition by Doosan Enerbility, 2023
- Second Place, The Second Big Data Idea Competition by HD Hyundai Site Solutions, 2023
- CAU GRS Scholarship for Ph.D. Course (full scholarship for four semesters), Chung-Ang University, 2023-2025
- CAU GRS Scholarship for M.S Course (full scholarship for four semesters), Chung-Ang University, 2021-2023
- Third Place, Artificial Intelligence Problem Solving Contest, National IT Industry Promotion Agency (NIPA), 2020
- Third Place, Davinci Open Source SW-AI Deep Learning Hackathon, Chung-Ang University, 2020

## Patents

### Apparatus and Method for Classifying Motion of Objects in Video

May. 2023

Eunwoo Kim, and Gyeong-hyeon Kim

- Korea patent (applied) No. 10-2023-0056528

## Leadership and Volunteering

### Samsung Junior Software Cup

Sep. 2020 - Nov. 2020

#### College Student Mentor

- Mentored elementary, middle, and high school students as a college student mentor with an employee mentor.
- Conducted mentoring and feedback for the software implementation of mentee's ideas.

## Teaching Experience

### Advanced Artificial Intelligence (55697)

Teaching Assistant (Lecturer: Prof. Eunwoo Kim)

Department of AI, CAU  
Spring Semester, 2025

### Machine Learning (54616)

Teaching Assistant (Lecturer: Prof. Eunwoo Kim)

School of CSE, CAU  
Spring Semester, 2024

### Capstone Design (56120)

Teaching Assistant (Lecturer: Prof. Eunwoo Kim)

School of CSE, CAU  
Spring Semester, 2022

### Algorithm (13601)

Teaching Assistant (Lecturer: Prof. Eunwoo Kim)

School of CSE, CAU  
Spring Semester, 2021

## Skills

### Languages:

Python, C/C++, Java

### Machine Learning Tools:

PyTorch, TensorFlow

### Communications:

Korean, English