

Kyuhwan Shim

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EDUCATION	Seoul National University , Seoul, Korea Master Student in Graduate School of Artificial Intelligence Sogang University , Seoul, Korea Bachelor of Engineering in Computer Science Chungnam Science High School , Chungnam, Korea	Sep 2024 – Present Mar 2019 – Aug 2024 Mar 2016 – Feb 2019
RESEARCH EXPERIENCE	LG AI Research Research Scientist Intern, Physical Intelligence Lab Universität Bonn, Deutschland Visiting Student Researcher, Autonomous Intelligent Systems Group Seoul National University Undergraduate Student Researcher, Biointelligence Lab ExploreCSR, Graduate School of Data Science & Google Research	Nov 2025 – Present Jul 2024 – Aug 2024 Dec 2023 – Aug 2024 Dec 2023 – Feb 2024
WORK EXPERIENCE	TIDYBOY-DSPL , Seoul, Korea Vision Engineer <ul style="list-style-type: none">▪ Robocup2024 Team from Seoul National University, Pusan National University▪ Developed Robot Vision Pipeline for real-time environment understanding Nota Inc. , Seoul, Korea Machine Learning Engineer Intern <ul style="list-style-type: none">▪ Developed Vision-based Pipeline Models for Intelligent Traffic System on Edge Device▪ Construct Datalake and ML Pipeline on AWS and GCP OCONNECT , Ulsan, Korea Co-Founder, Chief Design & Operating Officer <ul style="list-style-type: none">▪ [LINK] UNIST Based Student Venture which makes Easy-Insert Socket, OneStep▪ R&D Didimdal, JAMES DYSON AWARD, Pre-startup Package, Youth Entrepreneurship Academy Yeongdong Firestation , Yeongdong, Chungbuk, Korea Conscripted Firefighters (Military Duty)	Mar 2024 – Aug 2024 Mar 2023 – Aug 2023 Jun 2020 – Feb 2023 Aug 2020 – Apr 2022
AWARDS &ACTIVITIES	Encouragement Award , Seoul National University Finalist (Top 3) , Robocup Federation Finalist (Top 2) , Seoul National University Top 30 & Talent Pool , Samsung Advanced Institute of Technology & DACON Top 30 , LG AI Research & Ministry of Employment and Labor Grand Prize , Gangseo-gu Office Grand Prize , National Information Society Agency, Ministry of Science and ICT Excellence Award , Chungnam Science Fair (64th) Special Prize , Chungnam Science Fair(63th)	2024, 2025 Aug 2024 2024 Sep 2023 Sep 2023 2023 2022 2018 2017
SCHOLARSHIPS	SNU AI Fellowship , Seoul National University Sogang University Alumni Scholarship , Sogang University Alumni Association Priest Villarreal Memorial Smilegate Scholarship, General Scholarship, Startup Talents Scholarship Albatross SW Scholarship , Sogang University	2024 2022-2024 2019
MEDIA	Excellence Paper Award in the Undergraduate Division at KCC 2024 , Sogang People 'Nunettine' wins Grand Prize at Gangseo-gu Big Data Contest , Sogang People 'DAVENGERS' wins BIGCONTEST Data Analytics Innovation League , Sogang People	Jun 2024 May 2023 Dec 2022

PUBLICATIONS**INTERNATIONAL CONFERENCE**

- [C3] **ESPADA: Execution Speedup via Semantics Aware Demonstration Data Downsampling for Imitation Learning**, Byungju Kim, Pahk Jinu, ChungWoo Lee, Jaejoon Kim, Jangha Lee, Theo Taeyeong Kim, Kyuhwan Shim, Jun Ki Lee, Byoung-Tak Zhang[†]
RA-L 2026 (Under Review)
- [C2] **Mixture of Action Queries for Action Chunking Policies**, Suhyung Choi, Youngseok Joo, Hyundo Lee, Kyuhwan Shim, Kisung Shin, ChungWoo Lee, Jun Ki Lee, Byoung-Tak Zhang[†]
ICRA 2026 (Under Review)
- [C1] **CLIP-RT : Learning Language-Conditioned Robotic Policies from Natural Language Supervision**, Gi-Cheon Kang*, Junghyun Kim*, Kyuhwan Shim, Jun Ki Lee[†], Byoung-Tak Zhang[†]
Robotics: Science and Systems (RSS), 2025
Conference of Robot Learning (CoRL) 2024, Workshop on Language and Robot Learning

DOMESTIC JOURNALS

- [D4] **Scaling Language-Conditioned Policies with Fast and Lightweight Architectures**, Junghyun Kim*, Gi-Cheon Kang*, Kyuhwan Shim, Eungseo Kim, Jun Ki Lee[†], Byoung-Tak Zhang[†]
Korea Computer Congress 2024
 Excellent Presentation Award
- [D3] **Generalizing Language-Conditioned Robotic Policies via Large Language Models**, Junghyun Kim*, Gi-Cheon Kang*, Kyuhwan Shim, Eungseo Kim, Jun Ki Lee[†], Byoung-Tak Zhang[†]
Korea Computer Congress 2024
 Excellent Presentation Award
- [D2] **Stochastic Trajectory Diversification for Language-based Robot Action Learning**, Junghyun Kim*, Gi-Cheon Kang*, Kyuhwan Shim, Jun Ki Lee[†], Byoung-Tak Zhang[†]
Korea Software Congress 2024
 Excellent Presentation Award
- [D1] **KIRINO: An Interactive Chatbot System for User Persona**, Geon Choi*, Ganghun Kim*, Hyunjae Kim*, Kyuhwan Shim*, Myoungwan Koo[†]
Korea Computer Congress 2024
 Excellent Paper Award

TEACHING EXPERIENCE

Artificial Intelligence (4190.408), Seoul National University
Translation Volunteer, Khan Academy & Chonnam Science High School

Mar 2025 – Jun 2025
Jun 2017 – Dec 2017

SPEECH

- **[PDF] Seminar Samsung DACON Challenge - Domain Adaptation @ Release(Sogang CS)** Dec 2023
- **[PDF] Seminar Dive into YOLOv8 @ Nota Inc.** Mar 2023
- **[PDF] Undergraduate Speech** at Carbon Neutral Workshop @ Shinhan Card & World Bank 2023

ENTREPRENEUR

OCONNECT - a student venture based at UNIST, founded to address usability challenges in everyday life.
The team developed **ONE STEP**, a rotating, easy-to-plug-in electrical outlet designed to enable more intuitive and convenient plug insertion.

Awards

- **JAMES DYSON AWARD 2022 - Nat'l, Korea**, James Dyson Foundation
 - Winner (TOP 3), International Competition Jul 2022
- **PIN UP Concept Design Award 2021**, KAID
 - BEST 100 in Living Goods Design Dec 2021
- **Busan-Ulsan-KyungPook Startup Day Innovation Ventures League**
Samsung Electronics
KyungPook, Ulsan, Busan Creative Econ. & Innov. Center
 - Excellence Prize at Futures' League Dec 2021
- **Challenge K-Startup Expo : Collegiate Competition**
Ministry of SMEs and Startups,
Korean Institute of Startup & Entrepreneurship Developement

• Top 10, Offline Exhibition	Oct 2021
• Top 50, Offline Exhibition	Aug 2019
▪ Social Challenge alpha 7 , OhMyCompany, BSS, LISCC	
• Challenge Award, Crowd Funding (Funded 1,424,000 KRW)	Sep 2020 – Dec 2020
▪ Ulsan Collegiate Startup Excellent Idea Contest	
Ulsan Creative Econ. & Innov. Center	
• Winner : Grand Prize	Nov 2020
▪ Institute of Science & Technology Startups Competition	
KAIST, GIST, DGIST, UNIST, POSTECH	
• Representative of UNIST (Top 2 at UNIST)	Dec 2020
• Representative of UNIST (Top 3 at UNIST)	Nov 2019

Fundings & Support Programs

▪ DIDIMDOL First Step - Startup Growth Development Project , Ministry of SMEs and Startups,	Aug 2022 – Jul 2023
• Recommended from Ulsan Creative Econ. & Innov. Center	
▪ Ulju Youth Startup Academy , Ulsan Youth Startup Center	Mar 2022 – Dec 2022
▪ Pre-IBK Changgong @ UNIST , UNIST, IBK Changgong	Jul 2022 – Nov 2022
▪ Private-Sector Open Start-up Revitalization Project , Ulsan Creative Econ. & Innov. Center	May 2022 – Oct 2022
▪ BUSAN BIGS Program , Busan-si, KSD, KHUG, KOSPO, HF, KIBO, Busan PA, BNK	Mar 2022 – Sep 2022
▪ Innopolis Campus for Ulsan Collegiate , UNIST, Innopolis	Jun 2021 – Aug 2022
▪ 12th UEPA Startup Incubator , Ulsan Youth Startup Center	Mar 2021 – Dec 2021
▪ SBC Youth Entrepreneurship Academy , Korea SMEs and Startups Agency	
• Most Funded Startup Company (100,000,000 KRW)	
• Excellent Completion at Pre-School	
• 'Pre-School' Completion of Excellence & Youth Startup Academy	Nov 2020 – Nov 2021
▪ UNIST UNIcorn Start-Up Support Program , UNIST	
• Funding (12,000,000 KRW)	
• Participated for Four Semesters	Sep 2019 – Feb 2021
▪ KISED Pre-Startup Package (General Field) , Korea Institute of Startup & Entrepreneurship Development	
• Most Funded (70,000,000 Won)	Apr 2020 – Dec 2020

Media Coverage

▪ UNIST Startup OCONNECT wins at JAMES DYSON AWARD 2022 , UNIST Press, CHOSUN Ilbo, Segye Ilbo, Sisa-news, Newsis	Feb 2022
▪ UNIST 2021 Innopolis Performance Presentation , UNIST Press, UlsanDaily, ETNews	Feb 2022
▪ UNIST UNISPARK for Young Entrepreneurs UNIST Magazine 2021 Winter	Dec 2021
▪ Southeast Venture Competition held by UNIST Lab Startup Innovation Group The Korea Economy TV	Dec 2021
▪ "New evolution of electrical outlets..." OneStep is released The Korea Economic Daily	Dec 2021
▪ "Make a 'National Outlet' which 'Connects' warmth to each other" UNIST Magazine 2021 Spring	Feb 2021
▪ "Doing businesses regardless of COVID-19" - Leap forward with technology SBS, UBC	Feb 2021