Dongbin Kim

Mt. Everest Climber/Paralysis Survivor/Positive/Creative/Critical Thinker-Doer/US Permanent Resident
dbk@hartford.edu Google Scholar Linkedin Highlighted Videos

Education

University of Nevada, Las Vegas (UNLV) **Las Vegas, NV, USA**
Ph.D. in Mechanical Engineering *01/2017 - 12/2021*

- **Selected Coursework:** Robotics, Automatic Control, Advanced Dynamics, Aerial Manipulation, Engineering Optimization
- Thesis: A Human-Embodied Drone for Dexterous Aerial Manipulation
- Advisor: Dr. Paul Y. Oh

Korea Aerospace University (KAU) **Goyang Si, South Korea**
B.S. in Aircraft System Engineering *03/2009 - 02/2017*

- **Selected Coursework:** Aerodynamics, Automatic Control, Capstone Design, Aviation Maintenance/Management, Aerospace Structures, Systems Engineering
- **Exchange Student:** Shanghai Jiaotong University (Shanghai, China), Yanbian University of Science and Technology (Yanji, China)

Research Interest

Robotics; Drones; Mobile Manipulation; Robot Swarm; Cable-Driven Robots; Machine Learning; Learning-by-Demonstration; Mixed Reality; Haptics; Dynamics and Control; Embodied Human Intelligence System;

Professional Experience

University of Hartford **West Hartford, CT, USA**
Tenure-track Assistant Professor in Department of Electrical and Computer Engineering (Robotics) *08/2024-Present*

- Director of Hartford Ubiquitous Systems for Lives (HUSL) Robotics Lab
- Research Focus: Mobile Manipulating Robots for Saving Lives
- Curriculum Committee of College of Engineering, Technology, and Architecture (CETA)

United States Military Academy **West Point, NY, USA**
U.S. Army Research Lab PostDoc Fellow *07/2022-07/2024*

- Independently developing **Computer Vision** and **Machine Learning** algorithms for tactical tools to the **Defense Threat Reduction Agency (DTRA)**.
- Designed an algorithm for **efficient task assignment** within an air-ground collaborative **robot swarm team** for **U.S. Army ISR** missions.
- Led a team of 3 researchers to provide **500+ hours** of **safe, long-range drone flights** with heavy payloads **(20kg)** in diverse terrains for **U.S. Army Research Lab/NATO SCI/DRDC Canada**.
- **Co-PI in proposal** "Maritime Robotics to Explore Cooperative Human-Robot Systems in Opposed Environments" (Office of Naval Research (ONR), **$130k**

DAAD German Academic Exchange Service **Germany**
DAAD AInet Fellow *03/2022-07/2023*

- Knowledge exchange on aerial manipulation with scholars at DLR German Aerospace Center, Munich (Dr. Jongseok Lee)
- Collaborative research on learning-by-demonstration with University of Bremen (Prof. Michael Beetz)

Team AVATAR-Hubo at $10M ANA Avatar Xprize Challenge **Las Vegas, NV, USA**
System Integration Advisor/Logistic Lead *01/2019-11/2022*

- Provided **advisory** on the integration of VR/AR/Haptic systems with a full-sized humanoid, serving as a robot avatar to execute tasks for the challenge
- Led **planning and operations** for the transportation of robots coast-to-coast, overseeing team management throughout the process.

University of Nevada, Las Vegas **Las Vegas, NV, USA**
Adjunct Assistant Professor in Mechanical Engineering *01/2022-07/2022*

- Development of a **smart warehouse managing robot**. Successfully assisted **$250k** in funding through strategic partnerships with **Tesla**.

- Assisted in writing a Hands-on-Training (HOT) proposal to **The Nevada NASA Space Grant Consortium (NVSGC) & EPSCoR** (Secured **$35k** in funding)
- Delivered **10 seminars** on the latest robot technologies at international universities and global enterprises, including Samsung and Doosan.

NSF Culturally Relevant and Responsive Teaching (CRRT) Program Fellow *09/2021-05/2022*

- Exploring the needs of **minority STEM students** and creating **inclusive learning environments**, funded by an NSF Improving Undergraduate STEM Education at Hispanic-Serving Institution Grant

Graduate Assistant/Lab Manager of Drones and Autonomous Systems Lab *01/2017-12/2021*

- Development of drones to optimize the process of DNA/blood sample delivery in the pharmaceutical lab for the **National Institutes of Health (NIH)** and was recognized as a keynote speaker at prestigious events, including Consumer Electronic Show (CES) and Society of Laboratory Automation and Screening (SLAS).
- Development of mobile drones for sensor installation, bridge inspection, and maintenance for the **U. S. Dept. of Transportation (DOT)** (**$500k** in funding)
- **Co-PI in proposal** "Robot Swarm Simulation Platform for Source Search and Mapping in Space" (NASA STTR Phase I, Secured **$250k** in funding)
- **Co-PI in proposal** "UWB based Real-time Localization in GPS Denied Environments and their Applications for Heterogeneous Robotic Swarm Exploration" (NASA STTR Phase II)
- Developed and implemented **comprehensive regulations** for lab management, ensuring compliance with Nevada State COVID-19 policies. As results, **continuous robotics R&D operations** for students during the COVID-19 pandemic.

Visiting Research Scholar *02/2016-08/2016*

- Selected scholar by **Korea Ministry of Education - U.S. Department of State** joint program
- Development of wireless controller of a delta robot and camera for mobile manipulation
- Robot hardware fabrications with **Laser cutter, CNC, 3D Printer** and multiple woodwork machines

Freelance

Web Development *06/2020-Present*

- **Full-stack developed** video-on-demand platforms for IEEE conferences such as IEEE IROS (2020-2023) and ICRA 2022.

Technology Consultant *01/2018-Present*

- Contracted with **Ideal Innovation Inc. (I3)** to deliver safe, sustainable, and long-duration drone heavy payload flight services for the U.S. Army Research Lab.
- Provided consulting services to **Samsung Engineering** for the strategic implementation of drones equipped with robot arms for the purpose of painting and inspecting power plants.
- Provided consulting services to **BobaRobo Inc**. for the comprehensive design, manufacturing, and development of robotic arm control algorithms for a boba-making robot.

National Institute for International Education — Seoul, South Korea

Social Service Agent (Army Duty) *02/2013-02/2015*

- Assisted English/Chinese Program In Korea (EPIK/CPIK) to interview/hire native English/Chinese teachers for public K-12 education in Korea
- Managed IT system and maintained security of government office desktop computers
- Korean Culture instructor to help newly hired English/Chinese teachers adjust to living in Korea

Honors and Awards

- **Connecticut-Baden Wurttemberg Faculty Mobility Program Fellow**, Baden-Wurttemberg Ministry of Education, Research and Arts (2025)
- **DAAD AInet Fellowship**, German Federal Ministry of Education DAAD (2023)
- **Distinguished Service Award**, the Robotics Society of Japan (RSJ) (2023)
- **Best Paper Award**, IEEE Annual Computing and Communication Workshop and Conference (CCWC) (2023)
- **Finalists Award** (Top 12th of 99 international teams), ANA AVATAR XPrize Challenge (2022)
- **Best Research Demo Award**, IEEE International Conference on Advanced Robotics and Its Social Impacts (ARSO) (2022)
- **Senator Commendation**, United States Senator **Catherine Cortez Masto** (2021)
- **Special Congressional Commendation**, United States Congresswoman **Dina Titus** (2021)
- **Special Congressional Commendation**, United States Congresswoman **Susie Lee** (2021)
- **Special Congressional Commendation**, United States Congressman **Steven Horsford** (2021)

- **Honorary Diversity Education Model**, University of Nevada, Las Vegas (UNLV) (2021) Click to view
- **Best Presentation Award**, U.S Department of Transportation Inspecting and Preserving Infrastructure through Robotic Exploration (INSPIRE) (2021)
- **UNLV Access Grant**, UNLV (2017-2021)
- **Tony B. Academic Award and Innovation Award Finalists**, Society of Laboratory Automation and Screening (SLAS) (2018)
- **NSF I-Corp Minor Grants**, National Science Foundation (2017)
- **Honored Scholar**, Korea Ministry of Education and U. S. Department of State (2016)
- **Appreciation Plague for volunteering in Seocho District, Seoul, Korea**, Seocho District office in Seoul, Korea (2016)
- **Presidential Award for Outstanding Contribution to the Volunteer Culture and University Society**, Korean University Council for Social Service (2015)
- **Excellent Public Service Award**, Seoul Regional Military Manpower Administration (2013)

Publication

Journals

- **D. Kim***, P. Y. Oh, "Human-Embodied Drone Interface for Aerial Manipulation: Advantages and Challenges," Journal of Intelligent Service Robots (JIST - Best Paper Finalist), 2024

Peer-Reviewed Conference Paper

- **D. Kim***, P. Y. Oh, "Skywriting Unmanned Aerial Vehicle Proof-of-Concept Design", IEEE International Conference on Unmanned Aircraft Systems (ICUAS), 2017
- **D. Kim***, P. Y. Oh, "Lab automation drones for mobile manipulation in high throughput systems", IEEE International Conference on Consumer Electronics (ICCE), 2018
- **D. Kim***, P. Y. Oh, "Towards Micro-Plate Delivery using a re-sized Lab Automation Drone in High Throughput Systems", IEEE International Conference on Ubiquitous Robots (URAI), 2018
- **D. Kim***, P. Y. Oh, "Toward Lab Automation Drones for Micro-plate Delivery in High Throughput Systems," IEEE International Conference on Unmanned Aircraft Systems (ICUAS), 2018
- J. O. Choi*, **D. Kim**, "A New UAV-based Module Lifting and Transporting Method: Advantages and Challenges," International Symposium on Automation and Robotics in Construction (ISARC), 2019
- **D. Kim***, P. Y. Oh, "Testing-and-Evaluation Platform for Haptic-based Aerial Manipulation with drones," IEEE American Control Conference (ACC), 2020
- **D. Kim***, P. Y. Oh, "Human-Drone Interaction for Aerially Manipulated Drilling using Haptic Feedback," IEEE International Conference on Intelligent Robots and Systems (IROS), 2020
- **D. Kim***, P. Y. Oh, "Toward Avatar-Drone: A Human-Embodied Drone for Aerial Manipulation," IEEE International Conference on Unmanned Aircraft Systems (ICUAS) 2021
- **D. Kim***, P. Y. Oh, "Aerial Manipulation using Embodied Human-Intelligence," IEEE International Conference on Advanced Robotics and its Social Impacts (ARSO), 2022
- A. Zagari, Z. Castrejon, **D. Kim***, P. Y. Oh, "Cable-Driven Parallel Robot for Warehouse Monitoring Tasks," IEEE Annual Computing and Communication Workshop and Conference (CCWC), 2023
- J. Hughes*, **D. Kim***, P. Manjunath, S. Henderson, "Toward Collaborative Aerial Swarming Architecture for Military Applications," IEEE International Conference on Control, Automation and Systems (ICCAS), 2023
- L. Stauffer, P. Manjunath, **D. Kims** and C. Korpela, "Tactical Autonomous Maneuver Testbed for Multi-Agent Air-Ground Teams," IEEE International Conference on Electrical, Computer, Communications and Mechatronics Engineering (ICECCME), 2023
- **D. Kim***, I. Monde, P. Manjunath, J. Davis, "Towards Virtual Reality-based tele-manipulation systems for military applications," SPIE Defense and Sensing, 2024
- J. Beason, G. Hurlock, **D. Kim***, P. Manjunath, "Dynamic, Decentralized, Task Allocation for UAS Swarms," SPIE Defense and Sensing, 2024
- **D. Kim***, P. Manjunath, E. Adeniran, J. Davis, "A Data Collection Scheme to Develop Future Autonomous Manipulation for Military Applications," IEEE International Conference on Ubiquitous Robots (UR), 2024

- **D. Kim***, "Human-Embodied Aerial Manipulation for Nuclear Material Handling," American Nuclear Society Winter Conference and Expo (ANS WC), 2024
- G. Park*, **D. Kim**, J. Yook, "Design of artificial intelligence air-to-ground guidance control device for wildfire extinguishing," 2024 Korea Institute of Military Science and Technology (KIMST), 2024
- J. Steckenrider*, **D. Kim**, P. Manjunath, "Autonomous Aerial Landmine Search, Mapping, and Path Generation," IEEE International Conference on Unmanned Aircraft Systems (ICUAS), 2025
- G. Park*, **D. Kim**, T. Nam, Y. G. Yook, "Smart Air-to-Ground Guidance System using Deep Learning for Wildfire Response," 2025 Journal of Korea Institute of Military Science and Technology (KIMST), 2025

Manuscript in Preparation

- **D. Kim***, W. Yim, "3D Gradient Decent Algorithm for UAV Swarm Source Searching," Journal of Intelligent and Robotic Systems (JINT) **(in Progress)**

Posters

- **D. Kim***, P. Y. Oh, "Parallel Manipulator-Gripper for Mobile Manipulating UAVs," Annual Meeting of Inspecting and Preserving Infrastructure Through Robotic Exploration (INSPIRE), 2018
- **D. Kim***, P. Y. Oh, "Human Collaborative Haptic-Based Mobile-Manipulating UAVs," Annual Meeting of Inspecting and Preserving Infrastructure Through Robotic Exploration (INSPIRE), 2020
- G. Park, **D. Kim***, J. Davis, J. G. Yook, "Toward a Deep Learning-guided Air-to-Ground Fire Extinguishing System for Wildfire Response," IEEE International Conference on Ubiquitous Robots (UR), 2025

Patent

- **US-12153448-B2** "Object manipulator and payload management system for unmanned aerial vehicles (UAVs)." (2024)

Invited Talk and Seminar

- Lab Automation Drones for Mobile Manipulation in High Throughput Systems - Society of Lab Automation and Screening (SLAS) International Conference and Exhibition, Tony B. Awardee talk, 2018
- A new UAV-based Module Lifting and Transporting Method, Construction Industry Institute (CII) Modularization Communities for Business Advancement (CBA) virtual meeting, 2020
- Aerial Manipulation using Embodied Human-Intelligence for Construction – CEE 710: Modular Construction, University of Nevada, Las Vegas, 2021 [Host: Prof. Jin Ouk Choi (jinouk.choi@unlv.edu)]
- A Human-Embodied Drone for Dexterous Aerial Manipulation – World Class Lecture Series 7th, Chonnam National University (University Rank 11th in South Korea), 2022 [Host: Prof. Youngwoo Lee (ylee@jnu.ac.kr)]
- Human-Embodied Drone for Aerial Manipulation in Bridge Inspection and Maintenance – City College of New York, 2022 [Host: Prof. Jizhong Xiao (jxiao@ccny.cuny.edu)]
- Aerial Manipulation using Embodied Human Intelligence – University of Hartford, 2022 [Host: Prof. Kiwon Sohn (sohn@hartford.edu)]
- Aerial Manipulation using Embodied Human Intelligence – United States Military Academy at West Point, 2022 [Host: Dr. Christopher Korpela (christopher.korpela@jhuapl.edu)]
- Toward Dexterous Aerial Manipulation using Embodied Human Intelligence for Bridge Inspection and Maintenance – Webinar, U.S. Department of Transportation, INSPIRE University Transportation Center (UTC) 2022 [Host: Prof. Genda Chen (gchen@mst.edu)]
- Aerial Manipulation using Embodied Human-Intelligence – Seoul National University, 2022 [Host: Prof. Jaeheung Park (park73@snu.ac.kr)]
- Aerial Manipulation using Embodied Human-Intelligence – Korea Advanced Institute of Science and Technology (KAIST), 2022 [Host: Dr. MinJun Kim (minjun.kim@kaist.ac.kr)]
- Aerial Manipulation using Embodied Human-Intelligence – Korea Institute of Science and Technology, 2022 [Host: Dr. Sangrok Oh (sroh@kist.re.kr)]
- From Construction to Military Applications of Aerial Manipulation, DLR (German Aerospace Center) Munich, Germany, 2023 [Host: Dr. Jongseok Lee (jongseok.lee@dlr.de)]

- From Construction to Military Applications of Aerial Manipulation, University of Bremen, Germany, 2023 [Host: Prof. Michael Beetz (mbeetz@uni-bremen.de)]
- Aerial Manipulation From Construction to Military Applications and Future plan, New Jersey Institute of Technology (NJIT), 2023 [Host: Prof. Mathew Schwartz (cadop@njit.edu)]
- Drone Research in Civil, Military, and Other Applications, Sejong University, Korea, 2024 [Host: Prof. Byeong-Un Jo (bjo@sejong.ac.kr)]
- Drone Research in Civil, Military, and Other Applications, Gwangju Institute of Science and Technology (GIST), Korea, 2025 [Host: Prof. Kyoobin Lee (kyoobinlee@gist.ac.kr)]
- Drone Research in Civil, Military, and Other Applications, DIGITRACK, Korea, 2025 [Host: Dr. Hyunkseok Choi (choihs@digitrack.co.kr)]
- Mobile Manipulation Research in Civil, Military, and Other Applications, Korea Aerospace University, Korea, 2025 [Host: Dr. Inmo Jang (inmo.jang@kau.ac.kr)]
- Mobile Manipulation Research in Civil, Military, and Other Applications, Arizona State University, 2025 [Host: Dr. Hyunglae Lee, Seunghoon Hwang (hyunglae.lee@asu.edu)]
- Research in Civil, Military, and Other Applications, Hanyang University, Korea, 2025 [Host: Dr. Wansoo Kim (wansookim@hanyang.ac.kr)]
- Mobile Manipulation Research in Civil, Military and Other Applications, Korea Atomic Energy Research Institute (KAERI), Korea, 2025 [Host: Dr. Sungmoon Joo (smjoo@kaeri.re.kr)]
- Mobile Manipulation Research in Civil, Military and Other Applications, Korea Aerospace University, Korea, 2025 [Host: Dr. Jinho Roh (jinhoroh@kau.ac.kr)]
- Mobile Manipulation Research in Civil, Military and Other Applications, Kyungpook National University, Korea, 2025 [Host: Dr. Hyunmin Joe (hmjoe@knu.ac.kr)]
- Mobile Robot Research in Multiple Domains, Korea Research Institute of Ships and Ocean Engineering (KRISO), Korea, 2025 [Host: Dr. Hyuntaek Choi (htchoi@kriso.re.kr)]
- Human-Embodied Drones for Aerial Manipulation: Advantages and Challenges, IEEE International Conference on Intelligent Robots and Systems (IROS) 2025 Workshop on Advancement on Aerial Physical Interaction [Host: Dr. Yushu Yu (yushuyu@gmail.com)]
- Breaking Stereotypes and Saving Lives, Karlsruhe Institute of Technology (KIT), Germany [Host: Prof. Tamim Asfour (asfour@kit.edu)]

Media Exposure

- Gibson MS robotics team visit UNLV (2018) Click to view
- Voice of America Korea College Tour – UNLV (2020) Click to view
- New Podcast Series: Vying for the AVATAR XPRIZE, Episode 5: Limitless Possibilities: Avatars & The Future of Work (2020) Click to view
- The Story Behind Making IROS 2020 Free With Marcia O'Malley (2020) Click to view
- A representation of the diverse UNLV & greater Las Vegas community. Optimistic, Engaged, and Continually growing (2021) Click to view

Teaching Experience

University of Hartford **West Hartford, CT, USA**

Assistant Professor *08/2024-Present*

- **List of Courses:** ES 143P (Engineering and Design), ECT 110T (Practical Projects), ECT 242 (Programming and Microcontroller Fundamentals, ECT 353 (Microcontroller and Computer Interfacing, ECE 393 (Special Topics - Introduction to Drones)

List of Advisees (5 total) *08/2024-Present*

- John Lee, Graduate (Class of 2027)
- Matthew Haughton, Undergraduate (Class of 2028)
- Jacob Davis, Undergraduate (Class of 2028)
- Jonathan Dixon, Undergraduate (Class of 2029)
- Marlon Pierre, Undergraduate (Class of 2029)
- Evan Amoro, Undergraduate (Class of 2029)

- Jacob Swendson, Undergraduate (Class of 2029)
- Sterling Lloyd, Undergraduate (Class of 2029)
- Nivea Williamson, Undergraduate (Class of 2029)

United States Military Academy **West Point, NY, USA**

Capstone/Independent Study Advisor *07/2022-07/2024*

- **Independent Study:** Utilized Mixed Reality and Robot Manipulator to create a telepresence robot manipulation course for cadets (Title: VR TeleManipulation for Military Education)
- **Capstone Study:** Assisted cadets to understand Aerial Combat Swarm (ACS) software for ISR missions developed by US Army Research Lab

List of Advisees (8 total) *01/2017-07/2021*

- CDT Iverson Monde (Class of 2024)
- CDT Alexander Derose (Class of 2026)
- CDT Micah Weiss (Class of 2024)
- CDT Christopher Anderson (Class of 2024)
- CDT Charles Rosbrook (Class of 2024)
- CDT Charles Erlandson (Class of 2024)
- CDT Derek Burg (Class of 2024)
- CDT Jack Simpson (Class of 2025)

University of Nevada, Las Vegas **Las Vegas, NV, USA**

Adjunct Assistant Professor *08/2021-07/2022*

- Developed a senior and graduate level course in robotics with LEGO NXT (ME 425/625 Robotics I)
- **Course Evaluation Avg.: 4.85/5.0**

Teaching Assistant *01/2017-07/2021*

- Developed Single Degree-of-Freedom Ball Balancing, Visual Servoing with Gantry, C++ and ROS programming courses for undergraduate robotics researchers
- ME337L (Engineering Measurements); ME421L (Automatic Controls Laboratory); ME301L (Mechanics of Materials Laboratory)
- **Course Evaluation Avg.: 4.6/5.0**

List of Research Mentees (19 total) *01/2017-07/2022*

- BaekSeok Kim (PhD Student, Class of 2026)
- Zahir Castrejon (PhD Student, Class of 2026)
- Nathan Kassai (Undergraduate, Class of 2025)
- Armaun Zargari (Undergraduate, Class of 2023, **now at United States Military Academy at West Point, USA**)
- Nicolas Kosanovic (Undergraduate, Class of 2023; **now at University of Louisville, USA**)
- SungHoon Ha (Visiting Intern from Korea Aerospace University, South Korea;**now at Hanhwa Aerospace, South Korea**)
- Gayeon Lee (Visiting Intern from Korea Aerospace University, South Korea **now at Hyundai Motors Group, South Korea)**
- Jeongeun Kim (Visiting Intern from Korea Aerospace University, South Korea; **now at Northwestern University, USA**)
- Daehyun Choi (Visiting Intern from Korea Aerospace University, South Korea; **now at Hyundai Heavy Industries, South Korea**)
- Giuk Yeom (Visiting Intern from Korea Aerospace University, South Korea; **now at Hyundai Motors Group, South Korea**)
- Joo Won Lee (Undergraduate, Class of 2021, **now at Hyundai Motors Group, USA**)
- Fausto Vega (Undergraduate, Class of 2021, **now at Carnegie Mellon University, USA**)
- Yu Hang He (Undergraduate, Class of 2020, **now at Georgia Tech, USA**)
- Leonardo Georgescu (Undergraduate, Class of 2020, **now at August Robotics, USA**)
- Jason Kreitz (Undergraduate, Class of 2020, **now at Microsoft, USA**)
- SeungRyeol Yu (WEST Intern from Korea-U.S. Dept. of State Program, **now at Korea Hydro & Nuclear Power, South Korea**)
- Hyunduk Seo (Visiting Intern from South Korea, **now at Pukyong National University, South Korea**)
- Yunki Hong (Visiting Intern from South Korea, **now at University of Tennessee Space Institute, USA**)
- Keitaro Nishimura (Undergraduate, Class of 2018, **now at Northrop Grumman, USA**)

Professional Activities

Conference Organizing Committee

- 2027 IEEE International Conference on Robotics and Automation (ICRA 2027)
- 2025 IEEE International Conference on Ubiquitous Robots (UR 2025)
- 2023 IEEE International Conference on Intelligent Robots and Systems (IROS 2023)
- 2022 IEEE International Conference on Intelligent Robots and Systems (IROS 2022)
- 2022 IEEE International Conference on Robotics and Automation (ICRA 2022)
- 2020 IEEE International Conference on Intelligent Robots and Systems (IROS 2020)

Journal and Conference Reviewer

- IEEE Transactions on Robotics (T-RO)
- IEEE Robotics and Automation Letters (RA-L)
- IEEE Robotics and Automation Magazines (RA-M)
- IEEE International Conference on Robotics and Automation (ICRA)
- IEEE International Conference on Intelligent Robots and Systems (IROS)
- IEEE American Control Conference (ACC)
- IEEE/ASME International Conference on Advanced Intelligent Mechatronics (AIM)
- IEEE International Conference on Unmanned Aircraft Systems (ICUAS)
- Journal of Intelligent and Robotic Systems (JINT)
- Mechatronics
- Journal of Service Robots (JIST)
- Journal of Social Robots (SORO)

Journal and Conference Editor

- Journal of Social Robots (SORO)

Skills

Languages: English (Fluent), Korean (Native), Chinese Mandarin (Fluent)

Hardware: Unmanned Aerial System (Freefly Alta X, Aurelia X6/X8, Pixhawk 1-5, F450/550, Skydio X2d, Anafi USA, FLIR SkyRaider), Unmanned Ground System (Boston Dynamics Spot, Clearpath Jackal/Husky, Robotis Turtlebot3), Robot Arm System (Universal Robot UR5, Robotis Dynamixel Manipulator, HDT MK2 7 DoF Manipulator), Smart Actuator(Dynamixel series, Maxon Motor), Sensing (Hokuyo LiDAR, Velodyne LiDAR, Intel T265/D435i Cameras, Prophesee Event-based Camera, Holybro RTK GPS), VR/AR System (HTC Vive, Valve Index, Hololens), 3D System Haptic Touch, 3D Printer, LEGO NXT, Tormach CNC, Full Spectrum Laser Cutter, Mill

Software: JetBrains Clion, Pycharm, MS Visual Studio, VS Code, CATIA, Solidworks, Robot Operating Systems (ROS1/2), Ubuntu, Unity/Unreal Engine, Docker, Dreamhost Web Service, Cloudflare, Google Analytics, Autodesk Fusion 360, Full Spectrum Retina Engrave, Tormach CNC Controller, MS Office

Programming: C++, Python, C#, OpenCV, HTML, CSS, JavaScript, Django, SQL, Bootstrap, Tensorflow, MATLAB

Hobbies: Golf, Basketball, Tennis, Marathon