

Curriculum Vitae (24.01.04)

- Name: Seung Gyu Cho
- e-mail: sgcho@unist.ac.kr
- Mobile: +82-10-2716-3799



1. AFFILIATION

4th year in Combined Master-Ph.D. Program

Nuclear Safety Assessment and Plant HMI Evolution (NuSAPHE) Laboratory

Department of nuclear engineering at Ulsan National Institute of Science and Technology (UNIST, 50, UNIST-gil, Ulsan 44919, Republic of Korea)

2. EDUCATION

- Combined M.S.-Ph.D. program
 - Department of Nuclear Engineering
 - UNIST, Ulsan, Korea, 2021.03 – present
- Bachelor of Engineering
 1. Department of Nuclear Engineering
 - 1st Major: Nuclear science and engineering
 - 2nd Major: Computer science and engineering
 2. UNIST, Ulsan, Korea, 2014.03 - 2021.02

3. RESEARCH INTERESTS

1. Operator support system
2. Anomaly detection and classification
3. AI application in the real field

4. CERTIFICATES

- Awards & Scholarship

1. ASRAM 2023 EXCELLENT PAPER AWARD (2023.12)

- Training

1. MARS-KS, RELAP5, TRACE, RELAP/SCDAPSIM training course (Barcelona, Spain, 2022.06)
2. Compact Nuclear Simulator training course (Daejeon, Korea, 2021.03)
3. APR 1400 Simulator operating training by Korea Institute of Nuclear Safety (Daejeon, Korea, 2022.08)

5. PUBLICATIONS

- SCI Paper

- Non-SCI Paper

1. **Seung Gyu Cho**, Jeonghun Choi, Ji Hyeon Shin and Seung Jun Lee, "Multi-Abnormality Attention Diagnosis Model Using One-vs-Rest Classifier in a Nuclear Power Plant", *Journal of Nuclear Engineering* 4.3 (2023): 467-483.
<https://doi.org/10.3390/jne4030033>

- International Conferences

1. **Seung Gyu Cho** and Seung Jun Lee, "Multi Abnormal State Diagnosis Model Using Convolutional Neural Network and One-Vs-Rest Classifier", ICSRS 2021 (2021.11)
2. **Seung Gyu Cho**, and Seung Jun Lee, "A Deep Support Vector Data Description Model for Abnormality Detection and Application with Abnormality Classification in a Nuclear Power Plant", ESREL 2022 (2022.08)
3. **Seung Gyu Cho**, and Seung Jun Lee, "STRATEGY TO DIAGNOSE ABNORMALITIES THROUGH A FUZZIFICATION BASED NEURAL NETWORK MODEL WITH DATA CONSIDERING ACTUAL NUCLEAR POWER PLANT TRENDS", ASRAM 2023 (2023.12)

- Domestic Conferences

1. **Seung Gyu Cho** and Seung Jun Lee, "Abnormal State Detection Model Using Deep One-Class Classification in a Nuclear Power Plant", KNS 2022 Spring (2022.05)

2. **Seung Gyu Cho**, and Seung Jun Lee, "The Compatible Abnormality Diagnosis Model in the distinct Nuclear Power Plants", KNS 2023 Autumn (2023.10)