# 2021 Joint Laboratory Workshop on Nuclear Engineering between Kyushu University and Seoul National University

June. 24, 2021

# Zoom link for online meeting: https://snu-ac-kr.zoom.us/j/86189676090

#### **Tentative AGENDA**

# June 24, Thursday

09:30 ~ 09:50

Greeting

Opening remark Prof. Morita Self-introduction All students

## Special lecture (chair: Prof. Kim)

09:50 ~ 10:20 Prof. H.S. Park

Progress in Corium Coolability during Severe Accidents

#### Lab. Introduction (chair: Prof. Kim)

10:20 ~ 11:10 Overview of Research Activities at KU Profs. Morita & Liu 11:10 ~ 11:50 Overview of Research Activities at SNU Profs. Kim & Cho

#### Lunch break

# Technical Session 1: (chair: Prof. Liu)

13:30 ~ 15:10

- 1. Joon Sung Choi, Spatial reinforcement of PIV velocity field using deep learning
- 2. Akihiro Endo, Friction factor in micro-channels
- 3. Jin-Seong Yoo, Status of NEOUL-R test designed for critical heat flux measurement under rolling motion
- Ting Zhang, Particle-Based Simulation of Heat Transfer Behavior in EAGLE ID1 In-Pile Test
- 5. Hyung Joo Seo, MARS-KS motion Model in Multid Component for Multi-Dimensional Flow Analysis under Marine Condition

# Break

### Technical Session 2: (chair Prof. Cho)

15:30 ~ 17:10

- 1. S. W. Whang, Turbulent Modeling for Deep Analysis of In-Vessel Corium Pool Natural Convection
- 2. Takeshi Nakamura, Numerical Simulation of Bubble Expansion Behavior with Liquid Entrainment

- 3. Young Beom Jo, SPH-DEM Simulation on 3-Phase Hydrodynamic Behavior of Debris Particles
- 4. M.A.Rafiq Akand, Bubble lift-off diameter in subcooled flow boiling under in-vessel retention (IVR) condition
- 5. So Hyun Park Numerical Simulation of In-Vessel Retention Phenomena Using SPH method

Closing remark Prof. G.C. Park

Wrap-up

**Banquet**