



The 5th International Symposium

on Advanced Technology for River Management

May 15 ~ 17, 2017

Seoul National University

Organizer: Advanced Research Center for
River Operation and Management,
Seoul National University, KOREA

Sponsor: MOLIT, KAIA, SNU, IOER



ARCROM

첨단기술 기반 하천 운영 및 관리 선진화 연구단

INVITATION

You are cordially invited to the 5th International Symposium on Advanced Technology for River Management. The Symposium is designed to share the knowledge and experiences of river management, and to address future perspectives of engineering challenges laid in Korea and overseas countries. We hope our efforts and collaborations make an advance to our linkage among foreign countries and Korea.

Your presence would be highly appreciated.

Sincerely,

Seo, Il Won

Director, Advanced Research Center for River Operation and Management (ARCROM)
Professor, Seoul National University

초청의 글

<제 5차 ARCROM 국제 심포지엄>은 한국과 해외 하천 및 수자원 전문가들이 모여 함께 소통하고, 하천 관리 경험과 지식을 공유하기 위해 마련되었습니다. 본 심포지엄에서는 여러 국가들과 함께 공학기술 연구 및 미래 협력방안을 모색하고자 합니다.

국제적 명성의 수자원 전문가들을 한자리에 모시는 이번 국제 심포지엄에 참석하시어 자리를 빛내 주시길 바랍니다.

서 일 원

첨단기술 기반 하천 운영 및 관리 선진화 연구단장
서울대학교 건설환경공학부 교수



International Symposium Timetable

Date: May 15 ~ 17, 2017

Venue: Seoul National University (Yang Doo Suk Hall, Kwanjeong Library)

Monday May 15, 2017

17:30 – 18:30 Round Table Meeting

18:30 – 20:00 Welcome Reception

Tuesday May 16, 2017

08:30 – 08:50 Registration

08:50 – 09:00 Opening Address

09:00 – 11:00 International Symposium Session I

11:00 – 11:20 Coffee Break

11:20 – 12:40 International Symposium Session II

12:40 – 14:00 Lunch

14:00 – 16:00 International Symposium Session III

16:00 – 16:20 Coffee Break

16:20 – 18:00 International Symposium Session IV

18:30 – 20:30 Symposium Dinner

Wednesday May 17, 2017

09:30 – 17:30 Technical Visit
- Integrated Water Resources Management Dept., K-water
- Water Quality Research Center, K-water
- Daechung Dam

International Symposium Program

Monday, May 15, 2017

17:30 – 18:30

Round Table Meeting

18:30 – 20:00

Welcome Reception

Tuesday, May 16, 2017

08:30 – 08:50

Registration

08:50 – 09:00

Opening Address

Seo, Il Won – Director, Advanced Research Center for River Operation and Management (ARCROM), KOREA

Session I - Hydraulics and River Engineering I

Chair Person: Hwang, Jin Hwan - Professor, Seoul National University, KOREA

09:00 – 09:20

Lecture I – 1

Nelson, Jonathan – Director, Geomorphology and Sediment Transport Laboratory, USGS, USA
"A field test of a computational approach for modeling river flooding with high infiltration rates"

09:20 – 09:40

Lecture I – 2

Seo, Il Won – Professor, Seoul National University, KOREA
"Modeling pollutant transport in natural rivers with storage zone using the two-dimensional particle dispersion model"

09:40 – 10:00

Lecture I – 3

Shimizu, Yasuyuki – Professor, University of Hokkaido, JAPAN
"Typhoon disaster in Hokkaido 2016 and its clarifications with iRIC"

10:00 – 10:20

Lecture I – 4

Song, Chang Geun – Professor, Incheon National University, KOREA
"Total acceleration method for computation of shallow water flows on steep terrain"

10:20 – 10:40

Lecture I – 5

Kinzel, Paul – Hydrologist, USGS, USA
"Remote measurement of surface-water velocity using infrared videography and PIV: a proof-of-concept for Alaskan Rivers"

10:40 – 11:00

Lecture I – 6

Kim, Young Do – Professor, Inje University, KOREA
"Techniques for assessment of riverfront facility stability and natural fishway efficiency using numerical analysis and field measurement"

11:00 – 11:20

Coffee Break

Session II - Hydrologic and Water Resources Engineering I

Chair Person: Hwang, Jin Hwan - Professor, Seoul National University, KOREA

11:20 – 11:40

Lecture II – 1

Kjeldsen, Thomas Rodding – Professor, University of Bath, UK
"On the use of a four-parameter Kappa distribution in regional frequency analysis"

11:40 – 12:00

Lecture II – 2

Bakhsh, Allah – Professor, University of Agriculture Faisalabad, PAKISTAN
"Quantifying River Chenab contribution to groundwater recharge of Faisalabad water supply scheme"

12:00 – 12:20

Lecture II – 3

Lee, Hyo Sang – Professor, Chungbuk National University, KOREA
"Prediction of stream flow using generalized approaches at Geum River, Korea"

12:20 – 12:40

Lecture II – 4

Van der Werf, Mike – Researcher, Deltares, NEDERLAND
"Fibre optics as a 21th century measurement technology for river management"

12:40 – 14:00

Lunch

International Symposium Program

Tuesday, May 16, 2017

Session III- Hydraulics and River Engineering II

Chair Person: Nguyen, Van Tinh - Professor, Seoul National University, KOREA

14:00 – 14:20	Lecture III – 1 Lee, Joseph H.-W. –Chair Professor, The Hong Kong Univeristy of Science and Technology, HONG KONG "Geyser formation by release of entrapped air from horizontal pipe into vertical shaft"
14:20 – 14:40	Lecture III – 2 Kim, Dongsu – Professor, Dankook University, KOREA "Gum-based uncertainty assessment for ADCP streamflow discharge measurements in a real-scale river experimental facility"
14:40 - 15:00	Lecture III – 3 McDonald, Richard – Hydrologist, Geomorphology and Sediment Transport Laboratory, USGS, USA "Larval drift modeling in upland rivers"
15:00 – 15:20	Lecture III – 4 Kim, Eu Gene – Researcher, RNA Solution, KOREA "Development of river diagnosis and management system"
15:20 – 15:40	Lecture III – 5 Kimura, Ichiro – Professor, University of Hokkaido, JAPAN "Experimental and numerical studies driftwood motions around obstacles in curved open channel flows"
15:40 – 16:00	Lecture III – 6 Tsai, Christina – Professor, National Taiwan University, TAIWAN "Physically based sediment transport modeling approaches in open channel flow: from 'deterministic' to 'stochastic'"
16:00 – 16:20	Coffee Break

Session IV- Hydrologic and Water Resources Engineering II

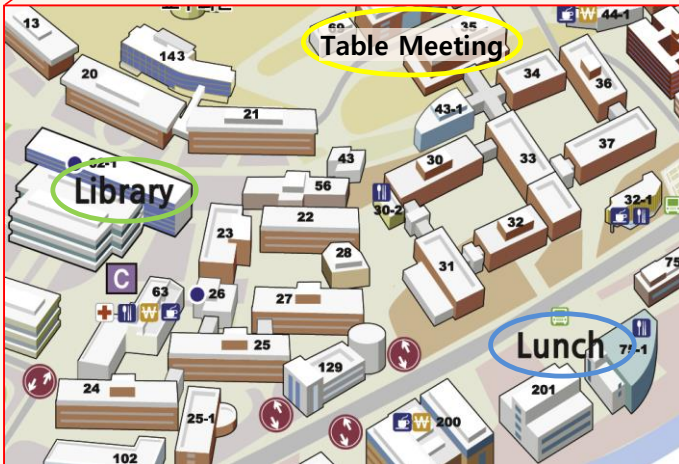
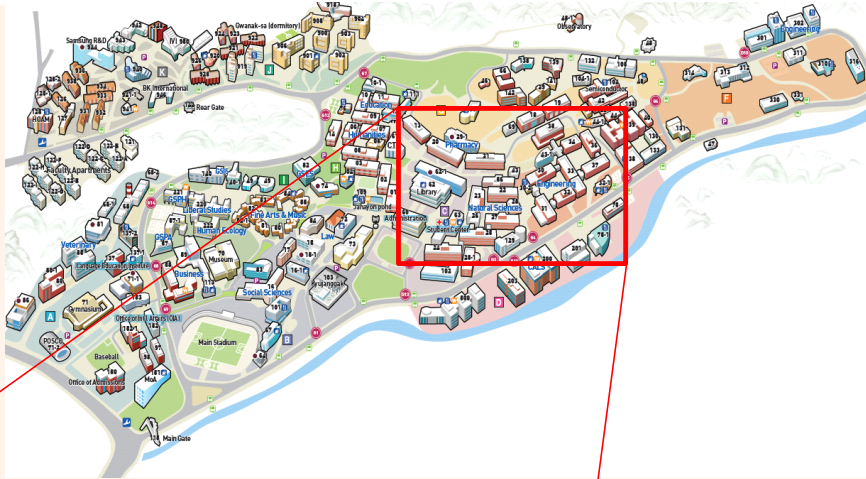
Chair Person: Nguyen, Van Tinh - Professor, Seoul National University, KOREA

16:20 – 16:40	Lecture IV – 1 Penning, Ellis – Senior Researcher, Deltares, NEDERLAND "New monitoring techniques for spatial information on vegetation development to help reduce flood risk and enhance ecological values in streams"
16:40 – 17:00	Lecture IV – 2 Koh, Deuk Koo, – Vice-president, Dongbu Engineering, KOREA "Some countermeasures suggestion against water management complexity"
17:00 – 17:20	Lecture IV – 3 Lee, Sang Ho – Professor, Pukyong National University, KOREA "Development of a graphical user interface for automatic calibration of SWMM 5"
17:20 – 17:40	Lecture IV – 4 Maeng, Seung Jin – Professor, Chungbuk National University, KOREA "Water balance analysis for water demand and supply assessment of administrative districts"
17:40 – 18:00	Lecture IV – 5 Kyuka, Tomoko – Researcher, University of Hokkaido, JAPAN "Characteristics of seeds distribution on alternate sandbars and braided channels"
18:30 – 20:30	Symposium Dinner

Wednesday, May 17, 2017

09:30 – 11:30	Palace Hotel to K-water
11:30 – 12:30	Integrated Water Resources Management Dept., & Water Quality Research Center, K-water
12:30 – 13:30	Lunch
14:00 – 15:30	Daechung Dam
15:30 – 17:30	Daechung Dam to Palace Hotel

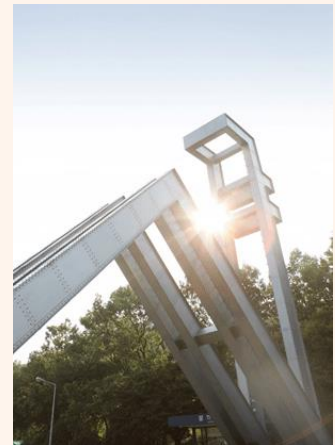
International Symposium Map



Building 35: Dept. of Civil & Environ. Eng

Building 62-1: Kwanjeong Library

Building 75-1: Doorea-Midam Restaurants



The 5th International Symposium on Advanced Technology for River Management

The Secretariat of ARCROM
1 Gwanak-ro, Gwanak-gu, Seoul 08826, Korea
Tel. +82-2-885-7345, +82-2-880-8270 Fax. +82-2-873-2684
Homepage: <http://www.arcrom.re.kr>