

The 11th IAHR International Symposium on Hydraulic Structures and the 10th International Junior Researcher and Engineer Workshop on Hydraulic Structures Successfully Held in Chengdu

From June 29 to July 2, 2026, the 11th IAHR International Symposium on Hydraulic Structures (ISHS2026) and the 10th IAHR International Junior Researcher and Engineer Workshop on Hydraulic Structures (IJREWHS2026) were successfully held in Chengdu, Sichuan, China. The joint conferences were organized by the IAHR Technical Committee on Hydraulic Structures, co-hosted by the State Key Laboratory of Hydraulics and Mountain River Engineering at Sichuan University and POWERCHINA Chengdu Engineering Co., Ltd, and supported by the Hydraulics Committee of the Chinese Hydraulic Engineering Society.

The Local Organizing Committee was chaired by Prof. Xu Weilin, Academician of the Chinese Academy of Engineering, with Liu Chao, Vice President of Sichuan University and Director of the State Key Laboratory of Hydraulics and Mountain River Engineering, and Xia Yong, Chief Engineer of POWERCHINA Chengdu, serving as Co-Chairs. Wang Hang from Sichuan University acted as Executive Chair. The Chair of the International Scientific Committee and the Chair of the Junior Workshop Organizing Committee were held by Valentin Heller from the University of Nottingham and Daniel Valero from Imperial College London, respectively. Under the theme "Hydraulic Structures: Engineering Wisely and Responsibly with Nature", the conference attracted 229 experts, scholars, engineers and students from 20 countries, including 52 international participants from Australia, Germany, Italy, Spain, Switzerland, the United Kingdom, Belgium, Argentina, Japan, the United States, Sweden, the Netherlands, France, Ireland, Portugal, Brazil, Canada, Thailand, and Malaysia.



On the morning of June 29, the opening address was held in the Wufu Hall of Wangjiang Hotel, with over 160 attendees. Lin Pengzhi, Professor at Sichuan University and Deputy Director of the State Key Laboratory of Hydraulics and Mountain River Engineering, and Xia Yong, Chief Engineer of POWERCHINA Chengdu, delivered welcome speeches on behalf of the local organizing parties. IAHR President Philippe Gourbesville extended congratulations via video message, and Sean Mulligan, Chair of the IAHR Technical Committee on Hydraulic Structures, expressed gratitude for the

preparatory work and officially declared the symposium open. The ceremony was moderated by Executive Chair Wang Hang.



Following the opening address, three keynote presentations were delivered by Tetsuya Sumi from Kyoto University, Sébastien Erpicum from the University of Liège, and Liu Bin from POWERCHINA Chengdu, covering topics related to reservoir sediment management, nonlinear weirs for dam upgrading and optimization, and flood discharge and energy dissipation technologies for high dams in confined valleys. At noon, the IAHR Technical Committee on Hydraulic Structures held an open meeting, during which the committee leadership team reported on annual progress and engaged in

an open discussion with attendees regarding future activities. In the afternoon, two parallel technical sessions were held simultaneously in the Juying Hall and the International Conference Hall of Wufu Building at Wangjiang Hotel, featuring in-depth exchanges on Dams & Reservoirs, Hydro-Environment Impact, and Modelling Technology. The first day's agenda concluded successfully at 6:00 PM.



On the morning of June 30, Chris Nielsen from Engineers Australia and Wei Wangru from Sichuan University delivered keynote addresses on challenges in water infrastructure projects, and fundamental research and applications of high-speed air-water flows, respectively. Parallel sessions continued with discussions on Dams & Reservoirs, Sediment & Debris, Coastal Defence Structures, and Infrastructure Resilience. Over the two days, a total of 64 delegates presented in the parallel sessions. At 6:00 PM that afternoon, the closing address of the ISHS was held. The International Scientific Committee presented the Philip H. Burgi Best Paper Award to the team led by Ismail Albayrak from ETH Zurich. Sean Mulligan announced that the 12th IAHR International Symposium on Hydraulic Structures and the 11th Junior Workshop will be held in Porto, Portugal, in two years. That evening, over 80 delegates attended the Gala Dinner in Kuanzhai Alley, enjoying an immersive experience of Chengdu's signature hotpot cuisine and cultural performances.



On July 1, two technical tours were organized: 51 participants visited the Dujiangyan Irrigation Project, Yingxiu Earthquake Ruins, and Zipingpu Hydropower Station on the northern route, while 43 participants visited the Jianzishan Navigation-Power Hub, Leshan Giant Buddha waterway, and Angu Hydropower Station on the southern route, integrating academic exchange with engineering practice and historical culture.



On July 2, the Junior Workshop was held at the College of Water Resources and Hydropower at Sichuan University's Wangjiang Campus, with over 50 young scholars and senior experts from various countries in attendance. This year marked the 20th anniversary of the workshop's founding. Organizing Committee Chair Daniel Valero reviewed the workshop's history and presided over keynote presentations by Michele Palermo from the University of Pisa on jet-driven scour theory, and by Valentin Heller from the University of Nottingham on scientific paper writing. Zhang Gangfu from Australia shared his career journey from academia to industry and eventually to entrepreneurship. Subsequently, eight postgraduate students and postdoctoral researchers presented their research progress and engaged in in-depth interactions with senior experts present. At noon, some participants, led by Wang Hang, toured several hydraulic experimental model facilities at the State Key Laboratory of Hydraulics and Mountain River Engineering. The workshop concluded successfully at 5:30 PM.



From July 3 to 4, a two-day post-event technical tour was organized, with 35 delegates visiting the Ertan Hydropower Station dam and powerhouse, as well as the Panzhihua Third-Line Construction Museum, to appreciate the milestone achievements in China's hydropower development history.



Since its inception in 2004, the IAHR International Symposium on Hydraulic Structures has been held across five continents, consistently serving as a premier international academic platform for innovation in hydraulic structure design, facilitating the sharing of cutting-edge findings and engineering breakthroughs, and fostering forward-looking dialogues on emerging challenges and future directions. The IAHR International Junior Researcher and Engineer Workshop on Hydraulic Structures, established in 2006, is dedicated to providing a relaxed and open exchange environment for young researchers and practitioners, enhancing the quality of academic presentations through senior expert feedback, and building bridges between academia and industry.

The joint conferences continued the high academic standards of the series. The proceedings, containing 86 peer-reviewed papers, will be officially published by IAHR, with outstanding papers recommended for a special article collection of the *Journal of Hydraulic Research*, subject to content expansion and independent peer-review. The successful hosting of this conference not only showcased to the international community Sichuan University's remarkable achievements in integrating research and engineering practice in hydraulic engineering hydraulics but also further expanded the university's international academic influence in this field. The conference received support from Polytec (China), and 29 student volunteers from Sichuan University provided support and services throughout the event, making significant contributions to its smooth operation.





