## 8th IWRM Conference

**Date:** 13<sup>th</sup> to 15<sup>th</sup> June 2018

Where: Beijing Normal University, Beijing

## **Topic:**

Innovative Water Resources Management under Changing Environment – Understanding Interactions and Making Balance between Humankind and Nature

## Object and themes

The conference brings together experts and scholars from different countries and regions to present their researches, and discuss related issues of innovative water resources management. This conference, part of the series of IWRM conferences organized by IAHS-ICWRS, is focused on the innovative and integrated management of water resources.

During the past hundreds of years, various kinds of water resources systems have been developed to support efficient uses of water resources for humankinds worldwide. Such kinds of systems were mainly used to provide humankind with clean water for irrigation, industry and domestic uses. The history of water resources systems is part of the history of humankind itself. The development of water resources systems needs a careful analysis on water demands and environmental impact. Unfortunately, consideration on the water needs for nature is not sufficient for many water resources systems. This fact has resulted in the deterioration of water quality and even degradation of ecosystem in many river basins. Due to the rapid development of economics and society worldwide, present challenges for water resources systems are mostly unprecedented. A new effort to devise innovative technologies and solutions for present water problems should be paid much attention by research community including the International Association of Hydrological Sciences (IAHS). These challenges for water resources systems highlight that the adaptation to the changing environment is an essential field of research, which is also involved in the Panta Rhei Scientific Decade (2013-2022) of IAHS. Efficient adaptation requires gaining a forward vision on future water demands and water availability. A deep understanding of the two-way interaction between nature and humankinds is needed to develop such vision.

This fact requires an innovative approach in integrated water resources management considering balance between humankind and nature, between society and ecosystems. It requires a comprehensive analysis on ecological baseflow, river health, as well as the evaluation on advantages and limitations of anthropogenic interventions with particular attention to the socio-economic and ecological impacts, and the assessment of water uses for ecosystems.

The innovative and integrated management of water resources management, which will be discussed during this conference, is extensive. The main topics of presentations are, but not limited on:

- 1. Assessment of available water resources at regional and basin scales
- 2. Ecological baseflow /Environmental flow to keep the health of rivers and lakes
- 3. Spatiotemporal distribution of water resources availability
- 4. Water needs for the healthy society
- 5. Impact of climate change and human activities on water resources
- 6. Water resources allocation and management models
- 7. Interactions between water resources and ecosystem
- 8. Socio-hydrology as the basis of water resources management
- 9. Risk analysis for water resources systems, and
- 10. Related issues

## Venue

The conference will take place at the campus of Beijing Normal University, located in the downtown of the dynamic, hospitable metropolitan area of Beijing. The university is composed of 2 faculties, 26 schools and colleges, 2 departments and 40 research institutes (centers) with 3,100 faculties. There are 26,400 full-time students, including 10,197 undergraduates, 14,572 postgraduates and 1,700 long-term international students. The host of the 8<sup>th</sup> IWRM-conference of IAHS-ICWRS will be the College of Water Sciences, Beijing Normal University, one of the leading organizations in the field of hydrological sciences and water resources in China.