Conference Report

The Yangtze River and Regional Development—4th Yangtze Forum, Nanjing, China, 18–20 April 2011

The Yangtze River’s Chinese name is Changjiang, which literally means the Long River. And long (6418 km) as well as big is the Yangtze, on any measure. The runoff (951 km$^3$ per year) exceeds 17 times of that of the River Nile; the population within its basin is one-third of China’s total (400 million); and the surface area of the basin is 1.76 million km$^2$, bigger than the UK, France, the Benelux countries, Germany and Spain combined.

The big river is subjected to big challenges. China’s contemporary dynamic and vibrant situation is very concrete and visible in the Yangtze basin. Cities mushroom, economy soars, and the river is the artery that feels the changes and their consequences in the most tangible way. Everybody knows that the artery is tapped by the planet’s largest hydropower dam, the Three Gorges Dam, which is used to generate more power than 20 conventional nuclear power plants. Besides notable power production, the dam offers flood protection to a considerable part of the basin’s dwellers. However, it is not only the river and its sediment dynamics that have been modified perhaps more with this interference than all the interventions in the history of the Country at the Centre—as the Chinese call their country—in the past five millennia. Also, over 1 million people have been displaced from the towns and villages that have been inundated by the water. Besides the Three Gorges Dam, the Yangtze basin houses 46,000 dams.

Less spectacular and less catchy in the media, albeit not less important, are the other major changes and challenges that the artery has suffered and to which it is being subjected. Deteriorating ecosystems, flattened floods, rapidly changing land use, growing water-quality problems, threats to the fish populations, adverse effects of hydraulic constructions, etc., all pose challenges to the sustainable development of the basin.

We are used to consider river basins that are shared by two or more nations as transboundary basins, and tend to pay less attention on the administrational complexity of large river basins that are completely in the territory of one country. The Yangtze’s basin is shared by 11 provinces and autonomous regions (Figure 1). It provides an important lifeline for most of them. Their development interests, though, vary greatly. They also exhibit the similar upstream–downstream setting than what used to be thought of in transboundary basins. Many of the problems and changes that are induced upstream accumulate in downstream areas.

The 4th Yangtze River Forum that was held in Nanjing on 18–19 April 2011 elaborated the change processes and challenges of the development of the Yangtze Basin. It was organized by the government of Jiangsu province, the Changjiang Water Resources Commission, and over 20 other sponsors including all riparian provincial governments, stakeholder organizations for the development of the basin, including the European
Union–China River Basin Management Programs, as well as several other important stakeholder organizations for the development of the basin.

The conference title this time was ‘The Yangtze River and Regional Development’. Water’s role as a crosscutter of economic sectors was emphasized; however, it remained quite unclear how the coordination and synchronization of plans and policies across sectors and the various administrational levels from central government to the provincial and local levels really works out in this huge country.

Besides regional development—meaning in this context dominantly economic growth—particularly interesting was the elevated emphasis on the threats to sustainable development due to the deterioration of the aquatic environment. The official goal is to reverse the direction of environmental degradation within the coming decade. The poor environmental situation of China’s rivers, including the Yangtze, has been openly discussed over the years, and the recent emphasis on investment programmes is a promising sign. Many say, though, that there are serious implementation problems in the policies as well as in the technical solutions, such as the operation of wastewater treatment plants and enforcement of industrial wastewater treatment. Elaboration and analysis of such implementation problems, though, were missing from the official presentations.

Ceremony, one would say quite easily, was the focus of first day of the two-day forum, which consisted solely of official presentations. The interventions of ministries, provincial governments, administrational bureaus and international delegations followed one another. Many of them leaned quite strongly on the fresh “Number One Document” of China, the annual top-priority government policy paper which for the first time in the history of China was devoted to the water sector and was released only one month before the Yangtze Forum.

Most interesting for me personally was to try and filter out what was really being said and what was not said. Apparently a major issue and which was systematically left out of the presentations was the alarming growth of social contrasts, and the subsequent economic and social polarization. Not talking about sustainable regional development constitutes an obvious threat to the social stability of the country. The social concerns were missing altogether from the presentations, although the Yangtze basin includes some of

![Figure 1. Administrative regions of the Yangtze River basin.](image-url)
the most prosperous areas of the Asian continent, particularly Shanghai, and also some of
the poorest areas, such as parts of Tibet and Qinghai. Each province along the river
represents a wide gap between the poor and impoverished population, which counts in
number to seven to eight digits in each province, and the upper class which is able and
empowered to accumulate wealth at an incredible pace. No words are said about urban
slums, those who are being displaced due to urban development, the extension of industrial
zones, highway construction, or for some other reasons.

Flood protection, navigation, food security through irrigation, urban infrastructure and
industrialization, and, increasingly, ecological conservation catch the attention of almost
every province throughout the basin. Yet, aspirations and priorities towards the river vary
upstream and downstream.

On the roof of the world, in Qinghai and Tibet, the official rhetoric emphasizes the
benefits due to new hydraulic construction projects, and increased and integrated control
of rivers, and thereby bringing prosperity to the people in these economically less
developed parts of the country. Ecological conservation is also on the agenda. Going
downstream, Yunnan’s main concerns appeared to be, on the one hand, in the low level of
infrastructure to harness the waters for economic purposes and, on the other hand, the
already deteriorating aquatic environment. Sichuan—the rice bowl of central China—
wants to invest heavily in irrigation development and thus further extend its agricultural
production. Recovery from the earthquake of 2008 is still high on the agenda, and so is the
development of disaster preparedness, flood management and rural water supply systems.
Chongqing expressed interest in further developing the reservoirs and thus gain increasing
benefits from those. Of special interest is the Three Gorges Reservoir which Chongqing
promotes strongly as the main beneficiary of improved navigation.

Hubei, located just below the Three Gorges Dam, is unhappy with the present pre-
paredness for floods, and considers its present ability to control those as seriously insuf-
ficient. Hunan, on the other bank of the Yangtze, has its main focus on the management of
Dongting Lake. On the one hand, Hunan would like to restore the unique ecological
functions of the lake, but, on the other hand, it wants to develop flood protection systems
with a similar argumentation to that of Hubei. Anhui is also interested in flood management,
but pays its primary attention on navigation and industrial development.

Downstream, at the estuary, in Shanghai the sustainable development of the river and its
estuary are most highlighted, and systematic monitoring programmes are being proposed.
Changed sediment dynamics of the river due to dam construction and water quality
deterioration bother the city authorities. Jiangsu—the next province upstream—also
shares concerns about the delta, yet it is hungry for economic benefits to its many cities
along the shores of Yangtze, as well as being worried about the flooding river.

All in all, monitoring and open data sharing seems to be one of the major concerns
among both the Chinese and the international attendants of the Forum. Many also talked
about public–private partnerships, yet the involvement of corporations in river basin
management remains important only in the development of urban infrastructure.

The second day of the two-day forum consisted of five parallel workshops that
elaborated their specific topical areas in a more focused manner. The topical areas were
integrated river basin management, river regime control and riverfront utilization,
ecological protection and restoration, climate change, and corporation engagement.

A paradigm that had a dominant role at the forum was integrated river basin
management. This concept was typically used more or less as a synonym for integrated
water resources management (IWRM). Many presentations understand those as the coordinated management of surface and groundwater resources. Yet many others seem to be closer to the mainstream interpretation of IWRM which entails the balanced development of waters so that economic, environmental and social concerns are adequately addressed, with the prevalence of good governance and public participation.

Among these, the Chinese are now managing the economy quite well. With governance they have an array of challenges, which typically remain unelaborated in official contexts such as the Forum. Yet, corruption is mentioned openly these days and elaborated on more than in many other countries. The environment is discussed quite openly and the challenges are being realized at the political and managerial levels. Much investment is being allocated to environmental technologies, infrastructure and implementation of regulatory measures, yet the present level can only be considered as a prelude to what needs to be done. The official goal is to stop the environmental degradation within the coming five to ten years and after that the situation will slowly start to improve. Social concerns are enormous and need a similar step of bringing the situation to light as has already been the case with the environment within the past 10–15 years. Participation of the public and bringing stakeholders to the table await a clear-cut paradigm shift in Chinese conditions.

Within the context of the Yangtze Forum, the European Union–China River Basin Management Programme organized its annual Water Platform Conference. One of the top agenda items was the potential that the European Union Water Framework Directive (WFD) could have on Chinese water management system. Certain compatibility is there; the European goal of reaching a good ecological status of waters by 2027 might have certain similarities with Chinese ones. The uncoupling of economic and social matters from the environmental goals—as is done in the WFD—might also appeal to the Chinese. As the European Union WFD promotes good ecological status, it is in essence a different concept than the IWRM which promotes the sustainability concept of the World Summit on Sustainable Development in Johannesburg, South Africa: finding a balance between social, environmental, and economic welfare under good governance and public participation.

Another dimension to the IWRM discourse in China comes from the ease of interpreting the IWRM as a centralizing concept in which even stronger and unilateral control by the government is promoted, and not as a cooperative arrangement in which participation, the collaboration of institutions from government, non-governmental organizations, enterprises and civil society should be engaged.

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