



NARBO Newsletter

(Network of Asian River Basin Organizations)

<http://www.narbo.jp/>



Activities (GENERAL MEETING)

Report on 3rd General Meeting of NARBO

Michio Ota*

1. Date and Venue

Date: February 20-22, 2008

Venue: The Sunan Hotel Solo (Solo/SurakCentral Java Province, Indonesia)

2. Host Organization

(i) Jasa Tirta I Public Corporation;
(ii) Research Center for Water Resources; and (iii) Indonesia NARBO Secretariat



3. Number of the Participants

Approx. one hundred people from present NARBO members and related organizations participated.

4. Program

The 1st day (February 20): Study Visit

Participants are divided into 2 groups. One group visited a reservoir and a weir in Bengawan Solo Basin and the other had a dialogue with water users and stakeholders in the Basin (see the next page for

programs or photographs).

5. Main issues discussed in the General Meeting

(1) NARBO Work Plan 2008-2009

•IWRM Training, Thematic Workshop, Performance Benchmarking Activities and Twinning Program should be continued with improvement and information of the activities should be shared among members through the website and newsletter.

•New activities on IWRM will be launched on the basis of the result of Asia Pacific Water Summit.



Participants

*) Vice-Secretary General of NARBO, Japan Water Agency

Topics of this issue

Activities (GENERAL MEETING) (NARBO SYMPOSIUM) A Comparative Analysis (Sea Level Rise)

- Report on 3rd General Meeting of NARBO
- NARBO Symposium on Catalyzing IWRM investment in Asia-Pacific Region
- The Impact of Sea Level Rise on Developing Countries: A Comparative Analysis

From the Secretariat

- New Member of NARBO Secretariat
- NARBO Secretariat Meeting in Singapore

Program

• The 2nd day (February 21): Workshop on Integrated Water Resources Management (IWRM)

8:00	Opening Program <ul style="list-style-type: none"> • Welcome Remarks (NARBO Chairperson) • Keynote presentation on Japan's Experiences in Water Resources Management (Prof. Tsuneaki Yoshida, University of Tokyo, Japan) • Official Address (Representative of the Minister of Public Works, Indonesia) 	
9:30	Workshop 1: Measuring the Performance of RBOs and River Basins (led by ADB, IWMI) Panelist: PJT II(Indonesia), MASL(Sri Lanka), LLDA(Philippines), RRBO(Viet Nam), MONRE(Thailand), PJT I(Indonesia), NAHRIM(Malaysia), World Bank	Workshop 2: Managing Assets and Risks (led by JWA) Panelist: Kyoto University(Japan), ICHARM(Japan), IRTCES(China), PJT I(Indonesia)
12:20		
13:10	Workshop 3: Exploring New Challenges in IWRM <ol style="list-style-type: none"> (1) Water rights and water allocation (ADB) Panelist: ADBI, PJT II(Indonesia), NWRB(Philippines), MASL(Sri Lanka), MONRE(Thailand), YRCC(China), DoWR(Orissa Sate, India) (2) Facilitating IWRM with civil society and private sector participation (Indonesian NARBO) (3) Restoring the health of rivers (ARRN) (4) Sharing IWRM experience from other regions (INBO) 	
17:00		

• The 3rd day (February 22): General Meeting

8:00	(1) Opening Program <ul style="list-style-type: none"> • Opening address (NARBO Chairperson) • Remarks on Japan's Support for IWRM in Asia (Mr. Shuhei Kazusa, Director General of Department of Water Resources, MLIT, Japan) • Keynote presentation on water and climate change (Dr. Salmah Zakaria, Director General, NAHRIM, Malaysia)
12:00	(2) Report and Plenary Discussion on NARBO activity 2006 - 2007
13:10	(1) Introduction of New NARBO Members (2) Briefing and Plenary Discussion on NARBO Work Plan 2008 - 2009 (3) NARBO Charter Revision (4) NARBO Constitutional Body 2008 - 2009 (5) Wrap-up Session and Plenary Discussion (6) Closing remarks (1)NARBO Vice-Chairperson, 2)Representative of Directorate General of Water Resources, Ministry of Public Works, Indonesia)
17:10	



Address by the Chairperson



Address by the Vice-Chairperson



Report by the Secretary General



Address by Chairperson-designate



Wonogiri Reservoir



Colo Weir



Dialogue with the Stakeholders

(2) NARBO Charter Revision

•It was decided that Secretary General may invite the Chairperson to become NARBO Senior Adviser at the completion of Chairpersons term. The senior adviser can advise the new Chairperson and Secretariat in promoting and enhancing NARBO activities.

•It was decided that the Chairperson may invite a Patron who is expected to represent and promote NARBO and its objectives and activities in the region and world, specifically to leaders, policy makers, media, and the general public.

(3) NARBO Constitutional Body 2008-2009

Chairperson: Dr. Moch Amron (new, Advisor, Ministry of Public Works, Indonesia)

Vice-Chairperson: Mr. K.W. Ivan de

Silva (continued, Director General, Mahaweli Authority of Sri Lanka)

Secretary General: Mr. Yasutaka Hamada (continued, Executive Director, Japan Water Agency)

Dr. M. Basuki Hadimuljono, who has completed the term of 4 years (2 periods), has become NARBO Senior Advisor and continues to assist its activities.

(4) The situation of NARBO members

New members joined in the last 2 years are the following 9 organizations:

- Indus River System Authority (Pakistan, RBO)
- Bang Pakong Prachinburi and Tonlesab River Basin Committee (Thailand, RBO)
- Japan Water Resources Association (Japan, RKP)

- Graduate School of Management, Kyoto University (Japan, RKP)
- Japan River Restoration Network (Japan, RKP)
- National Hydraulic Research Institute of Malaysia (Malaysia, RKP)
- International WaterCentre (Australia, IRKP)
- The International Centre for Water Hazard and Risk Management (Japan, IRKP)
- The International Research and Training Center on Erosion and Sedimentation (China, IRKP)
- Following nine organizations joined NORBO in the last two years, and the total number of NARBO member becomes 65 now (RBO: 22, GOV: 17, RKP: 17, IRKP: 8, DCA: 1).

Note: (I)RKP (Inter-)Regional Knowledge Partner
DCA Development Cooperation Agency



Keynote Presentation by Prof. Yoshida



Panel Discussion in the Workshop



Workshop Room

Activities (NARBO SYMPOSIUM)

NARBO Symposium on Catalyzing IWRM investment in Asia-Pacific Region

Michitaro Nakai*

Introduction

"NARBO Symposium on Catalyzing IWRM investment in Asia-Pacific Region," held on 1 Dec. (Beppu City Social Welfare Center, Beppu City, Oita Prefecture) as the

Open Event for the 1st Asia-Pacific Water Summit (1st APWS, 3-4 Dec., Beppu City, Oita Prefecture), was successfully completed. This symposium, attended by more than 100 audiences from 11 countries, was organized by Japan Water

Agency, Asian Development Bank (ADB) and ADB Institute as NARBO Secretariat, in collaboration with the Ministry of Land, Infrastructure and Transport (MLIT) and the Infrastructure Development Institute of Japan.

Summary of the Symposium

Opening remarks were delivered by 2 persons; one is Dr. Basuki Hadimuljono, NARBO Chairperson, and the other is Mr. Shuhei Kazusa, Director General, Water Resources Department, Land and Water Bureau, MLIT. Followed by 2 persons delivered keynote speeches as follows;

- "Japan's Experiences in Water Resources Management and Some Implications to NARBO Members" ([Keynote 1](#)), by **Dr. Tsuneaki Yoshida**, Professor, University of Tokyo, and
- "Financing IWRM in River Basins - Challenges and Opportunities," ([Keynote 2](#)), by **Wouter Arriens**, Lead Water Specialist, ADB.

After that, panel discussion session was held, led by Dr.

Tsuneaki Yoshida. In the session, 5 presentation on the situation on the problems of water resources in each country by the following speakers;

- Mr. Md. Abdul Hye**, Executive Engineer and Chief Staff Officer (CSO), Bangladesh Water Development Board ([Presentation 1](#)),
- Mr. Tjoek W Subijanto**, President Director of Jasa Tirta I Public Corporation, Indonesia ([Presentation 2](#)),
- Mr. Jorge Marlang Estioko**, Chief Water resources development Officer, the National Water Resources Board, the Philippines ([Presentation 3](#)),
- Ms. Doan Thi Tuyet Nga**, Deputy Chief of Vietnam RBO General Office's Secretariat Board, Vietnam ([Presentation 4](#)),
- Dr. Takeyoshi Sadahiro**, Professor and council for International Affairs Division of Japan Water Agency ([Presentation 5](#)),



Presenters

Finally, plenary discussion was held, and after that, we adopted the [Recommendation](#) on the direction for the future NARBO activity on the basis of the discussion by the audiences.

Distribution to the attendants of the APWS

The adapted recommendation was also distributed for the high-level attendants of the 1st APWS. It is expected to contribute to make NARBO's presence and activities known for more people.



Session in the Workshop

*)NARBO Secretariat (Japan Water Agency)

New Member of NARBO Secretariat

Greetings and messages from new members at JWA NARBO Secretariat welcomed since this April.



Ai Isayama
Civil Engineer, Chief Editor
of NARBO Newsletter

I have joined the NARBO secretariat and International Affairs Division of Japan Water Agency since April 2008. International job is my first experience, and I would like to enjoy this job and do my best.

I joined NARBO secretariat from April 2008 as an administrator. It's a pleasure for me to support the activity of NARBO. To all of the NARBO members, thank you in advance.



Junko Mizuhara
Administrator

Comparative Analysis (SEA LEVEL RISE)

SUMMARY: The Impact of Sea Level Rise on Developing Countries:

Dr. To Van Truong*

The World Bank has recently released a paper on the impact of sea level rise on 84 coastal developing countries with the aim of encouraging immediate planning for adaptation. Scientific evidence for sea level rise due to climate change is now overwhelming and continued growth of greenhouse gas emissions and associated global warming could result in sea level rise of 1 to 3 m in this century. As a worse case scenario, the unexpected rapid breakup of the Greenland and West Antarctic ice sheets might produce a 5 m rise in sea level.

Climate change will have many negative effects, including greater frequency of heat waves, increased intensity of storms, floods and droughts, rising sea levels, a more rapid spread of disease and loss of biodiversity. Sea level rise poses a particular threat to countries with heavy concentrations of population and economic activity in coastal regions.

The three primary contributing factors to sea level rise have been cited as ocean thermal expansion, glacial melt from Greenland and Antarctica (plus a smaller contribution from other ice sheets), and change in terrestrial storage. Until recently, ocean thermal expansion was expected to be the dominating factor, with a predicted 0-1 m rise during the 21st century. However, new data on rates of deglaciation in Greenland and Antarctica suggest greater significance for glacial melt and revision of the upper-bound estimate for sea level rise this century.

The World Bank assessed the consequences of continued sea level rise for 84 developing countries

across 5 regions using 6 indicators: land, population, gross domestic product, urban extent, agricultural extent and wetlands, based on existing populations, socio-economic conditions and patterns of land use. The impacts were calculated for sea level rise scenarios ranging from 1 to 5 m.

It was found that hundreds of millions of people in the developing world are likely to be displaced by sea level rise within this century. The impacts from sea level rise are not uniformly distributed across the regions and countries of the developing world. East Asia, the Middle East and North Africa would experience the largest impacts from sea level rise. The impacts are particularly severe in a limited number of countries, including The Bahamas, Vietnam and Egypt, where the consequences are potentially catastrophic.

Vietnam would be seriously impacted by sea level rise, mostly in the Mekong and Red River Deltas. Large percentages of Vietnam's population and economic activity are located in these two river deltas. 10.8% of Vietnam's population would be impacted by a 1 m sea level rise and 35% with a 5 m rise. The impacts on Vietnam's GDP and urban extent closely follow the impact on its population. Most of Vietnam's wetlands would also be impacted by sea level rise.

For precautionary planning purposes, the World Bank paper recommends that sea level rise in the range of 1-3 m should be regarded as realistic. To date, however, there is little evidence that the international community has seriously considered the implications for population location and infrastructure planning in many developing countries.

Vietnam is experiencing considerable population growth and socio-economic development, particularly in the Mekong and Red River Delta regions. The consequences of sea level rise could be even more catastrophic on the Vietnamese people, economy and environment than predicted by the World Bank. It is, therefore, extremely important for Vietnam to begin taking action immediately.

In developing an action plan, it is important to assess the impacts of sea level rise on future populations, socio-economic conditions and patterns of land use, rather than the current data used by the World Bank. Given the enormity of the problems facing Vietnam and the scarcity of available resources, it is important to allocate attention according to degree of threat. This requires a thorough risk assessment and identification of the most affected areas. It is important to look at prevention. Careful planning of future developments and avoidance of areas likely to be most affected may in fact, prevent problems in the future.

Further, it is necessary to begin planning for adaptation. Under the provision of the United Nations Framework Convention on Climate Change (UNFCCC), the National Adaptation Programmes of Action (NAPAs) are intended to facilitate the identification of priority activities, including adaptation to sea level rise. Vietnam needs to develop a comprehensive NAPA so that plans are in place to deal with the impacts of sea level rise. This includes planning for relocation of the affected population and identifying alternative sources of food and income if agricultural lands are lost.

*)RBO Cuu Long Office, Southern Institute for Water Resources Planning & Management (SIWRP), Viet Nam

From the secretariat

NARBO Secretariat Meeting in Singapore Akira Nishimura*

1. Date: April 4, 2008

2. Venue: Singapore WaterHub
80 Toh Guan Road East, Singapore, 608575

3. Participants

Asian Development Bank (ADB): Mr. Wouter Lincklaen Arriens (Vice-Secretary General), Mr. Dennis Von Custodio

Japan Water Agency (JWA): Dr. Takeyoshi Sadahiro, Mr. Michio Ota (Vice-Secretary General), Mr. Michitaro Nakai, Mr. Akira Nishimura

Asian Development Bank institute (ADBI): Mr. Tadashige Kawasaki

Indonesian NARBO: Dr. Mochammad Amron (Chairperson), Mr. Eddy Djajadiredja, Mr. Tjoek Subijanto



NARBO Secretariat Meeting

4. Proceedings

(1) NARBO Activities in 2008

JWA suggested this year's schedule of NARBO activities and got approval. Especially, the Secretariat shared information on the following items:

- 1) The secretariat continues encouraging the Member Organizations to provide articles of Newsletter and to submit their annual reports.
- 2) As NARBO Promotion, the secretariat will consider participation in Singapore International Water Week (SIWW) on June 23-27.
- 3) As for IWRM Guidelines at Basin Level, the river basin management varies from basin to basin, so it is necessary for the contents of the Guideline to be considered sufficiently.
- 4) The way to implement questionnaire for IWRM Guidelines at Basin Level will be done on NARBO website, if possible, and the result will be introduced at World Water Week in Stockholm on August 17-23.
- 5) On the second day of the Week or "Asia Water Day" (August 18), NARBO will chair a session in cooperation with IWMI.
- 6) The Thematic workshop on Water-Related Disaster and Its Management in Asian Countries will be held in Philippines this summer.
- 7) As for The Thematic Workshop on Climate Change Adaptation, Indonesian NARBO will organize the contents in cooperation with National Hydraulic Research Institute of Malaysia (NAHRIM) and implement this autumn.
- 8) NARBO Performance Benchmarking Service
 - will expand the performance benchmarking and peer review of RBOs
 - will implement performance benchmarking of river basins
 - will coordinate with IWMI on its role for the next phase activities and will collaborate with other organizations for synergy in approach.
- 9) As for Charting Progress and Facilitating Investment for IWRM, ADB is awaiting approval for funding by the Japanese government.

(2) Review of NARBO activities by Members' Feedback Survey

This survey was undertaken in preparation to the 3rd General Meeting of NARBO. Although the number of survey respondents was rather low, the respondents are generally satisfied with NARBO activities. On the other hand, the results also reflect that there is scope to improve NARBO activities. NARBO will improve them under the members' ownership.

*) NARBO secretariat (Japan Water Agency)