

Expert Seminar
“Rural Sanitation and Watershed Management in
Latin America”






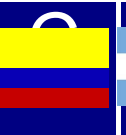


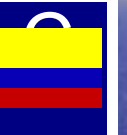
João Pessoa, 30th August to 5th September, 2009

**Improvement of water
quality and waste water
disposal in rural areas**

LATIN AMERICA SITUATION

- ✓ **General: enough water availability;**
- ✓ **Variability in time and space – some conflicts;**
- ✓ **Water, sewage and drainage infrastructure – concentrated in urban areas;**
- ✓ **Water distribution – better than waste water collection and treatment;**
- ✓ **Huge deficiency in waste water treatment;**
- ✓ **Reasonable control on point sources pollution;**
- ✓ **No focus on diffuse sources pollution;**
- ✓ **No efficient water management: management tools not effective implemented;**
- ✓ **Physical scarcity \neq economic scarcity (insufficient funding);**
- ✓ **Weak institutional arrangement and lack of coordination among them, need of more interdisciplinary approaches;**
- ✓ **Availability and transfer of information;**
- ✓ **Weak organization and commitment within the society;**
- ✓ **Need of subsidiary support not enough discussed.**

Drinkingwater, wastewater and waste: general overview

Branch	Scale	Large & medium cities			Small cities			Rural areas		
										
Drink water	Treatment plants	✓	✓	✓	✓	✓	✗	✗	✗	✗
	Distribution net	✓*1	✓	✓	✓	✓	✓	✗	✗	-/+
Waste water	Collector system	✓	✓	✓	✓	✗	✓	✗	✗	✗
	Treatment plants	✗*2	✗*2	✗	✓	✗	✗	✗	✗	✗
Waste	Collector system	✓	✓	✓	✓	✓	✓	✗	✗	✗
	Treatment plants	✗	✓	✗	✗	✗	✗	✗	✗	✗

*1 surround areas have not a distribution system; *2 primary treatment

Highlights

The EU-WFD approach would be used as an incentive and inspiration of a model in Latin America

- ✓ give the opportunity to the local basin committees to participate of the participative river basin management;**
- ✓ MDG as a driver for the implementation of the brown agenda to 2015;**
- ✓ Fostering a development of ideas and actions linking research and community needs on sanitation;**
- ✓ Mainstreaming sanitation and integrated water resources management;**
- ✓ Prioritize the analysis and integration of the peri-urban areas to the rest of the watershed concerning waste water treatment, water supply and drinking water.**

Highlights

Prioritize the conception of river basin and sub-basin development plans

- ✓ **Rural and decentralized wastewater treatment, protection of the source (ecosystem service) and safe water provision schemes should be part of all the watershed management plans**
- ✓ **Combination of techniques for recovering the beneficial functions of natural systems and implementation of alternatives like underground dams and constructed wetlands at local level**

Highlights

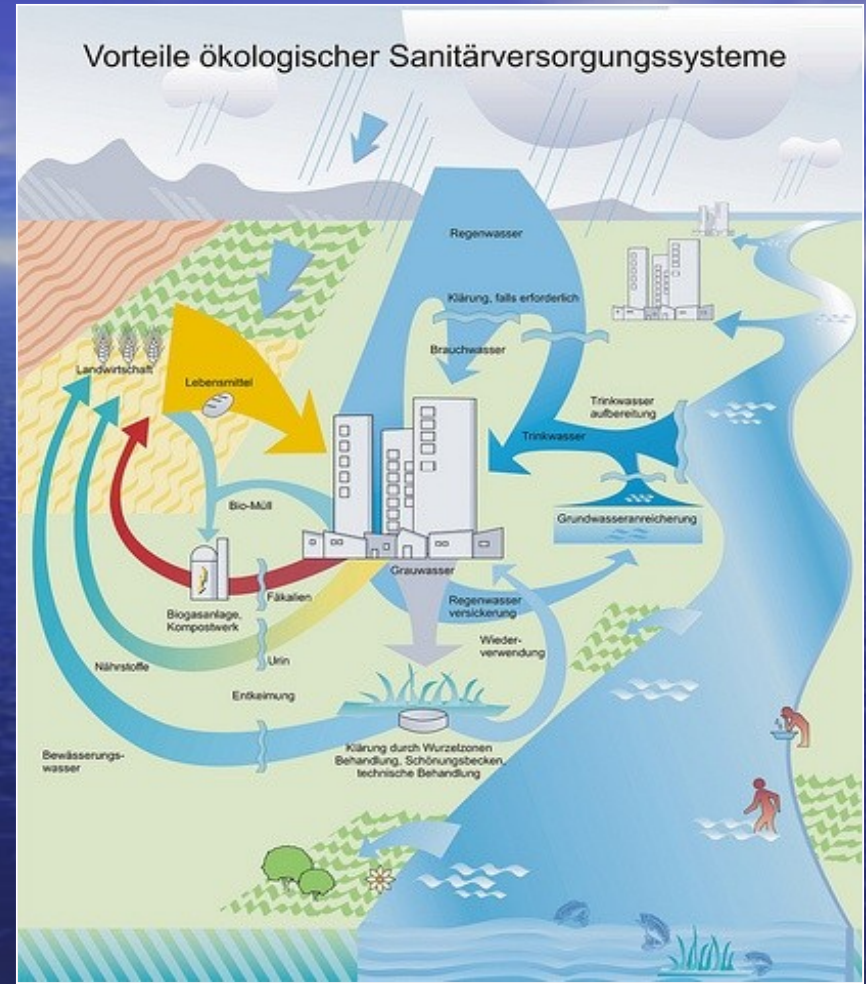
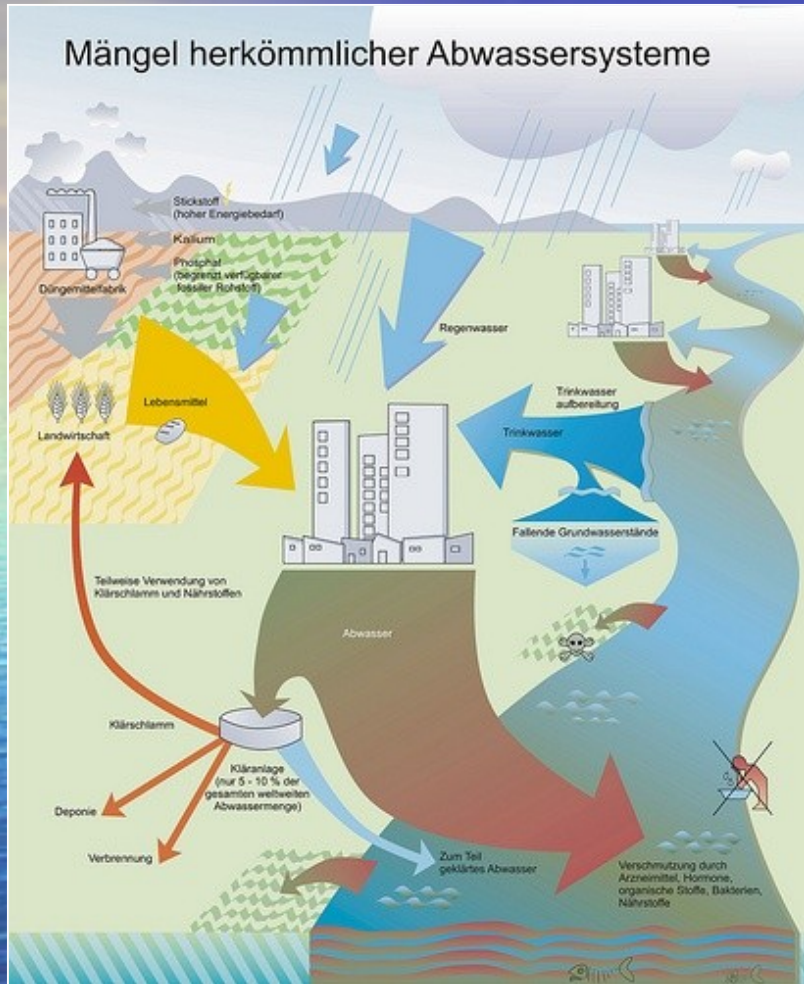
✓ The participatory planning should be considered since the early stages, by making the institutions stronger, and through the assessment of the results of the implementation of the projects and public policies;

✓ The collective and individual cost of the sustainable use and management of water resources needs to be fair:

the most water you consume and pollute, the higher price you pay, in order to stimulate water parsimony and rational use;

✓ Pro-poor public policies.

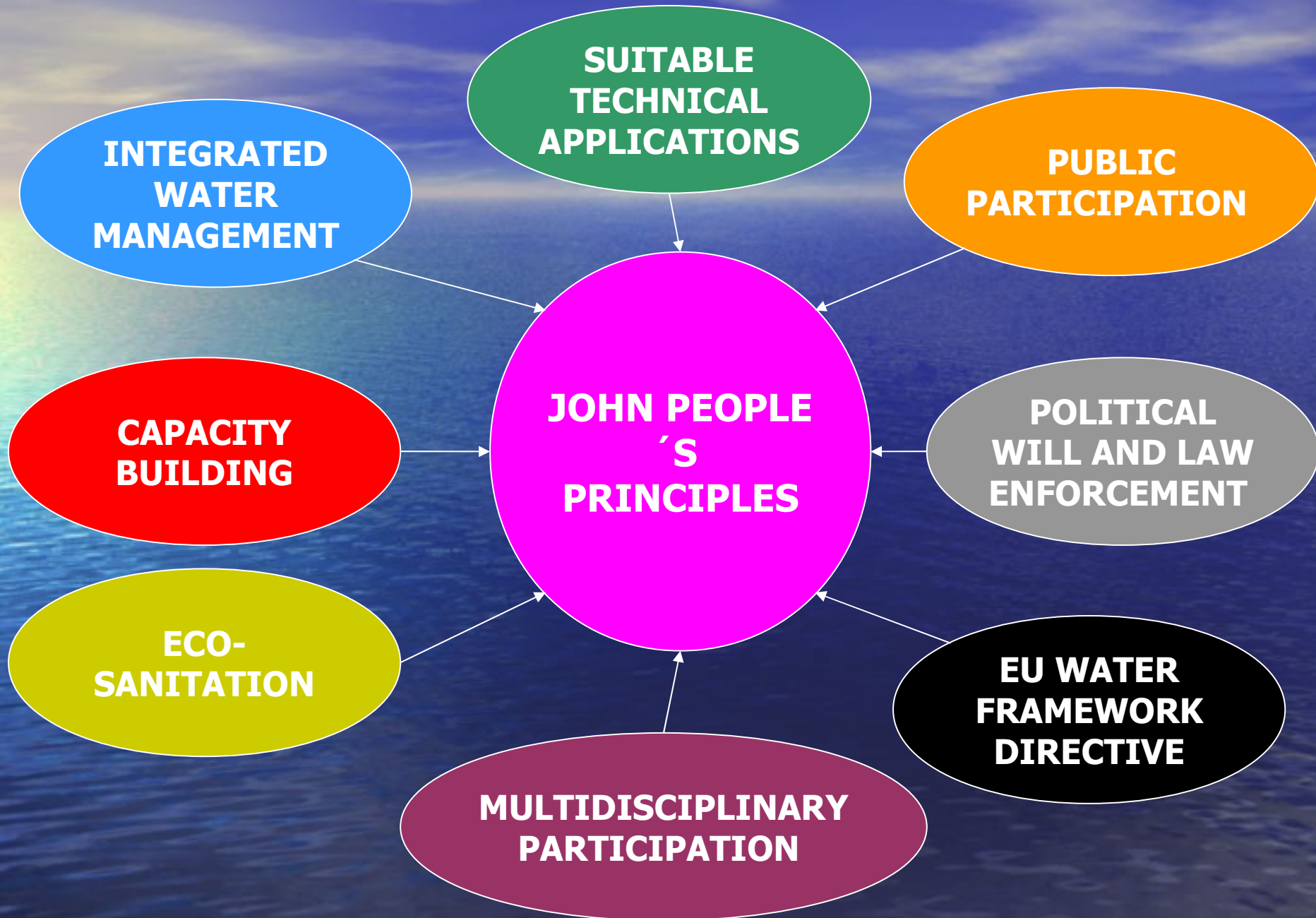
LESSONS LEARNED



Waste water and grey water treatment for reuse

- Proper technologies (cheap, easy, and functional);
- Assuring river basin communities rights.

LESSONS LEARNED: CONCEPTUAL FRAMEWORK



CAPACITY BUILDING

- ✓ **Silvana's approach (cisterns);**
- ✓ **Luciana's effort in strengthening river committees;**
- ✓ **Guarani Aquifer project;**
- ✓ **DAAD seminar;**

POLITICAL WILL AND LAW ENFORCEMENT

- ✓ **Juliana's example of political arrangement;**
- ✓ **Paraíba do Sul Basin charging for water;**
- ✓ **Federal Government incentives to state river basin management plans;**
- ✓ **Luciana's example of creation of Institute of Water;**
- ✓ **Countries willing to implement SAG project;**

SUITABLE TECHNICAL APPLICATIONS

- ✓ **Suitable solutions:**
 - **Sub-surface dams,**
 - **Arsenic removal,**
 - **Cisterns,**
 - **Construction of wetlands,**
 - **Water quality and quantity monitoring,**
 - **Anaerobic treatments.**

PUBLIC PARTICIPATION

- ✓ **Spaces for public participation:**
 - **Brazil: yes**
 - **Argentina: no**
 - **Colombia: no**
 - **Mexico: no**

LESSONS LEARNED

- ✓ **Creating and enhancing independent professional groups which could contribute to:**
 - ✓ **water resources monitoring;**
 - ✓ **prioritize actions in the water sector;**
 - ✓ **the capacity building on communities and municipality levels;**
 - ✓ **work in partnerships with professional groups of universities and institutions in the water sector;**
 - ✓ **better assessment of plans and projects;**
 - ✓ **improve the so called "Terms of Reference"**
 - ✓ **for diagnosis, pilot projects, infrastructure, etc.**

How can we solve the problems of water management and sanitation within these legal and political restraints?

- ✓ **Limitations of monitoring/fiscalization:**
 - ✓ The majority of the federal states in Brazil, and also in the other countries in Latin America, try to combine the basic needs of the population (public water supply, sewage treatment, and waste disposal) to the world expectation in terms of sanitation measures applied to the development countries without concerning the lack of implementation of a serious national plan to establish water monitoring programmes and the fiscalization of them.
- ✓ **Improvement of the infrastructure of the institutions:**
 - ✓ Enhancement of technicians (experts);
 - ✓ Building of a solid commitment among partners and stakeholders;
 - ✓ Improvement of the relationship between civil society and politicians to establish clear goals in planning the water sector for medium and long terms.

photo of the whole group