



## CASE STUDY

# Guatemala: Partnership for IWRM in the Naranjo river basin

The lack of laws and regulations, as well as good administration and management, contribute to poor water governance. In the Naranjo river basin, action was taken to implement IWRM after initiatives stemming from individuals with personal conviction of its importance. This has led to the creation of some formal legislation and the process of implementing IWRM. This consequently illustrates the potential important role of individuals in driving policy change.

## **Background**

In the majority of the Guatemalan territory the contamination of rivers, the lack of laws and regulations for the efficient administration of water resources, weak municipality administration, the lack of awareness among civil society in water care and the lack of good resource management at all levels contributes to poor water governance. There is also no incentive for an integrated vision that sees beyond the present and focuses efforts and efficient actions for the human development of its users.

The contamination of water resources has a great impact on the health of women and children, which is especially reflected in the morbidity and mortality of children under the age of five. For example in the case of the San Antonio Sacatepéquez municipality in the department of San Marcos, which belongs to the high areas of the Rio Naranjo basin, 18% of reported illnesses, equivalent to 207 cases, correspond to skin illnesses as a result of child and adult contact with irrigation water.

This case describes the formulation and participative implementation of municipal water policies as a result of individual and collective conviction of the importance of integrated water resources management (IWRM) to attain social and environmental sustainability. Water policy must be jointly addressed by authorities and citizens, parallel efforts have been made in order to establish the guidelines for promoting its implementation. At the citizen level, partnership originated between 2001 and 2002, with the creation of two associations, followed by the creation of another nine between 2003 - 2005.

This added up to a total of eleven associations in eight municipalities. At the municipal level, the Association of Municipalities of the highlands of the Naranjo River was created in 2003.

## **Actions taken**

Since there is no Water Law in place in Guatemala, the members of CADISNA (Communities Associated for the Water, Environment, Integral Development and Infrastructure) through

participation with the Water Municipal Tables, have been influential in the formulation of Municipal Water Policies. As a result, now local laws exist in some of the municipalities, which place value on the exchange of knowledge and consensus-building in dialogues focusing on rights and duties. Therefore, the Municipal Water Policy is a consensual document dealing with management of water resources, and this document is recognized by the municipal authorities, which reinforce its implementation. As result of this process, both citizens and authorities have become actively involved in the design of the policies, as well as in the allocation of resources for their implementation. In order to carry out this process, they are mentored by specialized institutions. Some aspects of this implementation that are brought forth and put into practice by the San Pedro Sacatepéquez and San Marcos Municipal Water Policies are:

- participative formulation of the plan for solid waste management,
- modernization of the water departments and,
- legalization of the municipal water recharge zone at the first San Pedro Sacatepéquez municipality.

The guidelines established in the water policies, makes feasible for the municipal governments to contribute to tripartite investments for the construction of environmental infrastructure (i.e. gravity potable water systems, rainwater collection for domestic and productive use and treatment plants for liquid waste).

## **Outcomes**

Communities associated through water interests -CADISNA- participated in the measurement of water inventories in order to learn about the quality and quantity of Tacaná and Turbalá microbasin water resources from the high area of the Rio Naranjo basin. To this end, the organization coordinated activities with the Ministry of Environment and Natural Resources -MARN- who facilitated trainings for the CADISNA team, who was in turn responsible for taking the inventory. Interviewers and field guides also assisted along with a coordinator and laboratory technician who conducted the bacteria analysis.

Aside from MARN, other organizations were included which assisted in training personnel in laboratory testing. The results obtained from the inventories include the identification of 166 water sources of which 26% lack legal documents for possession. Another percentage which has yet to be quantified is not apt for human consumption. There is no reliable and easily accessible information related to water sources and their legal status.

The municipalities do not have a registry of water sources that supply the water systems, and the lack of records promotes frequent conflicts over water uses. Within the framework of the Municipality Associations, diagnostics have been carried out in order to become familiar with the legal regulations related to the use and conservation of the resource; the results have make evident the weakness of the region and the country on this topic. There is no real consciousness of the problem represented by IWRM and there exists great confusion, understanding it just as domestic water supply.

## **Lessons Learned**

Through training and organized facilitation, communities have a better vision of public action, their rights and particularly of their obligations. Without regard to literacy levels,

they have understood that to see changes, it is important and necessary to participate.

Some of the trained individuals in organized society, are in publicly elected positions. Their internal actions within the associations has strengthened their ability to hold public service posts and undertake actions for the sustainable use of water resources.

The initiation of the process to establish municipal water policies has permitted each municipal government to have an explicit orientation on IWRM and facilitate the collaboration and coordination of governmental and non-governmental institutions.

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GWP Central America

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**Related IWRM Tools**

Policies with Relation to Water Resources

Integrated Urban Water Management Plans

Training Water Professionals

Communities of Practice

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