

Combating water scarcity in Latin America: Good forest management is part of the solution

Around 500 scientists and decision-makers meet in San José, Costa Rica from 12 to 15 June 2013 to discuss forests ecosystem services, and their role in landscape management as well as related research needs in the region.

(San José/Vienna, 12 June 2013) Although Latin America, with 31 per cent of the global freshwater resources, is one of the water richest regions worldwide, the region has suffered from several water crises in the past. Having strong impacts on the Latin American population's health and food security, water scarcity is often assumed to be closely linked with poverty, bad sanitation infrastructure and inequality as well as with extensive droughts – observed in countries such as Argentina, Guatemala, and Mexico – and other weather-related disasters. Furthermore, the problem is expected to grow under climate change. “Forests and trees play an important role in freshwater protection and security, for example, as they help to maintain the water cycle. However Latin America is still facing a crucial rate of deforestation and forest degradation. Regional and global efforts in counteracting water scarcity as well as forest degradation and poverty need to address the relationships between water and forests in order to develop sustainable and appropriate measures”, said Niels Elers Koch, President of the International Union of Forest Research Organizations (IUFRO), on the occasion of the third “IUFRO Latin American Congress” starting today in San José, Costa Rica.



Challenges of water supply for rural development in the humid tropics, Suriname (Photo by IUFRO HQ)

In this regional congress of IUFRO, jointly organized with the Tropical Agricultural Research and Higher Education Center (CATIE), researchers will meet from Wednesday, 12 June to Saturday, 15 June to address the advances and challenges of forest sector development in Latin America and to present research that puts relevant information in the hands of decision makers in the management and policy arenas. With the participation of more than 500 scientists from all over the world, the congress is this year's biggest forest science event in Latin America. The hydrological services of forest ecosystems – as one of many services forests provide – and the relationship between water resources and management practices are a central topic of the Conference among others.

The FAO estimates that Latin America and the Caribbean had about 900 million hectares of forest in 2010. This represents approximately one-quarter of the world's forest resources and half of the planet's tropical forests. Water scarcity is a problem particularly in the outer tropics, i.e. the mountain and southern regions, and it is further driven by climate change. According to the Inter-American Development Bank (IDB), for example, the Andean glaciers – supplying 70 million people with water – have shrunk by 30 per cent over the past three decades and are likely to disappear by 2030.

“In order to safeguard water resources and access in the long run, we need to highlight and optimize the various environmental services provided by watershed landscapes and ecosystems. This is part of the solution of combating water scarcity and has to be done through adequate landscape and watershed management”, said CATIE’s Director General, José Joaquín Campos. For example, water scarcity as a consequence of decreases in precipitation is worsened by the reduced infiltration capacity of degraded sloping environments. Forests and trees can help to keep erosion rates low and to improve the soil’s infiltration capacity. According to Campos, these ecosystem services “play a major role in reducing the vulnerability of Latin American societies that are highly dependent on natural resources”.



*Land rehabilitation under semi-arid conditions, Chile
(Photo by IUFRO HQ)*

The EU funded project “EcoAdapt” (www.ecoadapt.eu), for example, in which IUFRO and CATIE are leading partners, is currently developing adaptation strategies that will strengthen the capacity of local societies to manage ecosystem services – such as fresh water – that are under pressure due to climate change, are actually or potentially generating social tensions and are key for the livelihood of local communities. Respective strategies are worked on in three Latin American model forests in Chile, Argentina and Bolivia and with the participation of all key players and different local stakeholders.

“Ecosystem and landscape management for the provision of a multitude of goods and services from forests including water is highly complex, and respective approaches have to consider research from various fields, e.g. from biophysical, social, economic, and policy science. The third IUFRO Latin American Congress aims at presenting scientific state of knowledge and at identifying measures by bringing together researchers from the different fields. Furthermore, the Conference’s objective is to exchange knowledge gained from the different regions within Latin America as well as to enable an exchange between Latin America and other regions so that we can learn from each other”, said Niels Elers Koch.

Third IUFRO Latin American Congress

Information on the program: http://web.catie.ac.cr/iufrolat/IufroLat_objetiv_ing.htm

Media contact:

Gerda Wolfrum, International Union of Forest Research Organizations (IUFRO),
wolfrum@iufro.org

#####

The **International Union of Forest Research Organizations (IUFRO)** is the only worldwide organization devoted to forest research and related sciences. Its members are research institutions, universities, and individual scientists as well as decision-making authorities and other stakeholders with a focus on forests and trees. www.iufro.org

The **Centro Agronómico Tropical de Investigación y Enseñanza (CATIE)** is a regional center of excellence, working since 1973 to help rural communities in Latin America and the Caribbean achieve higher levels of human development via the competitive and sustainable provision of ecosystem goods and services and the integrated management of agricultural and natural resources. www.catie.ac.cr/