

# Scientific Summary No 97 related to IUFRO News 10, 2012



## Biodiversity in Forest Ecosystems and Landscapes

By Anna Barbati, IUFRO Deputy Coordinator RG [8.02.00](#) Forest biodiversity

The “Second International Conference on Biodiversity in Forest Ecosystems and Landscapes” took place from 27-31 August in Cork, Ireland, and brought together 148 participants from 33 countries. It built on the success of the first meeting in this series which was held in Kamloops, Canada (<http://www.tru.ca/iufro.html>) in August 2008.

**The aim of the conference series is to:**  
*Share knowledge, discuss new trends, reflect on future directions in biodiversity management for sustainable forestry, and provide a stronger scientific basis for biodiversity management in forest landscapes in the light of climate change.*

**Maintaining biodiversity** is a key goal of global forest policy, which aims to promote forest ecosystem health and resilience in the face of increasing deforestation, habitat fragmentation and climate change.

**Sustainable management of forest ecosystems** is a key component of environmental policy world-wide, and the importance of this resource to social and economic issues/policy is highlighted in the national and EU policy, as well as the Convention on Biological Diversity. Sustainable forest management practices promote biodiversity, and research to underpin policies and practice is a priority.

**Forests provide key services** from fuel and timber, recreational uses, carbon sequestration, nutrient cycling and conservation of rare species, and it is vital that the impacts of increasing pressures are examined.

This conference addressed these key issues by bringing together stakeholders and providing a forum for knowledge exchange. A high standard of peer reviewed papers were presented from across the globe showing research in a range of related areas from managed to natural forests, tropical to temperate biomes, and incorporating a range of taxonomic groups from microbes and fungi, to epiphytes and vascular plants, and invertebrates, mammals and birds.

Key current policy issues such as sustainable forest management criteria and indicators, bio-fuel and climate change were included in conference symposia. Individuals from research organizations, universities and scientists at all levels of academic development, NGOs, decision making authorities, forest land-owners among attended this conference.

The conference highlighted the need for greater integration of approaches at larger scales (landscapes or watersheds) with those at the stand and smaller scales. This can be achieved by a greater understanding of ecological processes and the functional relationships between species.



*Photo provided by Anna Barbati: Delegates on the conference tour to Derryreag upland conifer plantation, local Coillte forest manager Gerard Buckley, speaks to the delegates*

Sustainable forest management can be better achieved through the development of appropriate assessment tools, though the usefulness of biological indicators is typically restricted to relatively narrow taxonomic, geographical or habitat groupings. Moving forward, future research should aim to achieve greater integration of approaches across spatial scales and seek to further explore the link between biodiversity and ecosystem services including those related to the economic and social values of forests. Planners and researchers should also be aware of the threats to forest biodiversity posed by invasive alien species, climate change and social or commercial pressures, and should aim to develop programs of research to better understand these threats and how best to mitigate them.

**Meeting website:** <http://www.ucc.ie/en/iufro2012/>

**Host organization(s) and sponsor(s):**

*University College Cork, Ireland*

**Title sponsors:**

*Irish Department of Agriculture, Food and the Marine*

*Other sponsors: Science Foundation Ireland, Environmental Protection Agency, Failte Ireland, Heritage Council.*

**Find the full report at:**

<http://www.iufro.org/science/divisions/division-8/80000/80200/activities/>