The European Green Belt

A case study from SE Europe

By Jörg Lohmann
(based on project data and schemes from Jelena Marojevic, NGO Green Home)

Vilm, November 2009
Fenno-Scandia
Central Europe
SE Europe
The Green Belt in SEE

Republic of Montenegro (ME)
- ME005 Core area Lake Skadar
- ME006 Core area Vislor sa Zeletinorn
- ME007 Cluster of Biosphere Reserve Tara River
- ME008 Linear corridor River Cijevna

Albania (AL)
- AL002 Core area Skadar lake (Liqueni i Shkodres)
- AL003 Core Area Bojana-Buna Delta
- AL009 Core Area National Park Thethi
“Sharing waters”
Skadar Lake project component

By Jelena Marojevic
Project coordinator, GH

The Course On Sustainability And Action, Skadar lake- field visit, 2009
The Skadar/Shkodra Lake - the largest trans-boundary water body in the Balkan Peninsula
Basic information

- Project title: “Sharing waters”
- Project subtitle: “Healthy river basins and wetlands in the Dinaric Arc”
- A potential Green Belt Project
- Countries: Montenegro and Albania
- Partners: Green Home, WWF-MedPO and Euronatur
- Time frame: March 2007 – March 2010
Background

Located in a karst terrain in the outer part of the south-eastern Dinaric Alps

Shared between Montenegro (2/3) and Albania (1/3)

Montenegrin part is designated as National Park 1983, IBA in 1989 and included in the Ramsar list in 1995

Albanian part is designated as Nature Management Reserve and Ramsar site in 2005

5490 km² of drainage basin

Primary source of water: Moraca River (60%)

Primary outflows of water: Bojana/Buna River (41 km) into Adriatic sea

Surface area: 370 km² - 530 km² depending on the lake water level that varies seasonally from 4.7 to 8.3 m above sea

Complexity of habitats which shelter a high diversity of plants and animals

Lake harbors around 1900 plant species, 54 freshwater mollusks, 54 fish species, 16 amphibians, 28 reptile, 282 bird and 57 mammal species

Rainfalls in few months (spring and autumn) lead to flooding of flatlands on the northern and northeastern shores and greatly increases the number of habitats for the lake organisms providing extensive spawning and feeding areas for fish and aquatic birds

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Project goal

The project aims to foster “integrated river basin management” in the Skadar lake basin (in both Montenegro and Albania), and address the most urgent threats from new infrastructure that might disrupt the natural variability of water levels.
What is IRBM

“Coordinating conservation, management and development of water, land and related resources across sectors within a given river basin, in order to maximize the economic and social benefits derived from water resources, in an equitable manner while preserving and, where necessary, restoring freshwater ecosystems.”
Threats

- Physical Plan and Energy strategy of Montenegro are planning 4 hydroelectric power dams on the River Moraca
- Draft plan-water transfer from Tara to Moraca
- Dams might cause impact on the Skadar Lake water regime
Expected effects on ecosystems

- Upstream impact on the Moraca canyon
- Downstream impact in Moraca River ecosystems
- Impact on the typical water regime of the Skadar Lake could cause negative effect on the wetland ecosystem and communities depending on it.
- Flooding in spring of flatlands on the northern and northeastern shores that cause increasing of habitats for the lake organisms and providing extensive spawning and feeding areas for fish and aquatic birds
Conservation

1. Wetlands on the northern lake shore
2. Characteristic bird fauna (*Pelecanus crispus*, *Phalacrocorax pygmeus*, *Aythya nyroca*)
3. Commercial fish stock
Activities (objectives)

Maintaining the water level variation is a critical aspect of safeguarding Skadar Lake biodiversity

• Involving NGOs and stakeholders on both sides of the lake in decision making process by creating of Environmental Group and planning join activities (Albanian focal point)

• Ensuring that biodiversity concerns and full economic impact are considered when planning for new and operating existing water infrastructures on Moraca and Drim Rivers (Options Assessment on Dams study and Economic valuation study of cultural and environmental values of the lake)

• Building of capacity of civil society in both Albania and Montenegro to engage in discussions and decision regarding management of the lake and its waters
Results

Studies have clearly identified that the dams on Moraca will:

- Impact on important biodiversity values of Moraca river (including emerald network sites) and downstream (Skadar lake);
- Have a strong negative influence on ornithofauna of Moraca river canyon;
- Have a strong negative influence on the endemic fish fauna both of Moraca river and Skadar lake;
- Affect local economy based on fishery in Skadar lake and hence potentially the tourist economy (restaurants)
Birds

Loosing of birding habitats (in canyon and on Skadar lake)

• 130 bird species have been registered in Moraca Canyon, whose 127 species (98%) have a national or international protected species status (42% of total number of protected bird species in Montenegro).
• 24 species are listed in the Annex I Bird Directive,
• 67 Species of European Conservation Concern (SPEC), 23 Emerald species,
• 72 species are listed in the Annex of the Bern Convention,
• 46 are listed in the Annex II of the Bonn Convention,
• 14 species are listed in CITES Convention
• 7 species are listed in the Convention on the Conservation of Migratory Species of Wild Animals (AEWA)
Fish

- Loosing of spawning habitat
- The species that will be most negatively affected are trout species in Moraca river, namely the brown trout (*Salmo trutta*) and marble trout (*Salmo marmoratus*), while in Skadar lake two commercially very important species, bleak (*Alburnus alburnus*) and carp (*Cyprinus carpio*);
- The fishery sector in Skadar lake will decrease and the economy deriving from tourism (restaurants) is expected to decrease in turn.
Recommendations:
Assess the environmental and economic impact of Moraca dams before final decision;
Assess the viability of dams in relation to water flow availability;
Assess the real power potential of Moraca river which suffers of limited water flow seasonally;
Recommendations:

Ensure that areas under protection (Skadar National Park and Emerald Network) will not be negatively impacted;

Adopt environmental standards for construction and operation of dams as recommended by the World Commission on Dams guideline and conduct SEA / EIA according to EU legislation,
THANK YOU for the attention!