Life + Making Good Natura
Making public Goods provision the core business of Natura 2000
LIFE11 ENV/IT/000168

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http://www.lifemgn-serviziecosistemici.eu
LIFE + Environmental Policy and Governance

Project start date: 01/09/2012
Project end date: 15/06/2016

European Commission grant, through the Life+ program, €1,863,441 - 49.95% of the total (overall contribution €3,751,684)

PARTNERS
CURSA - University Consortium for Socioeconomic and Environmental Research
WWFRP
EURAC European Academy of Bolzano
SASSO SIMONE AND SIMONCELLO NATURAL REGIONAL PARK
POLLINO NATIONAL PARK
REGIONE SICILIA DRARFD – Forestry Agency
REGIONE LOMBARDIA
CILENTO AND VALLO DI DIANO NATIONAL PARK
ERSAF LOMBARDIA - Regional Agency for Agriculture and Forestry
MIPAAF - Ministry of Agriculture and Forestry
MATTIM - Ministry of Environment
AIMS OF THE PROJECT:

creating tools for qualitative and quantitative valuation of the ecosystem services in the study sites of the Natura 2000 network in order to develop innovative approaches of environmental governance to preserve agro-forest ecosystems

**Specific objectives**

- Identify and evaluate ES provided by Natura 2000 sites considering the fluxes of ES at different scales
- Create and demonstrate innovative models for financing (and self-financing by rules, regulation and Payments for Ecosystem Services - PES) the application of Natura 2000 management plans and conservation measures as requested by the art. 8 of the Habitat Directive (92/43/CEE)
- Identify innovative models for financing (and self-financing by rules, regulation and Payments for Ecosystem Services (PES)) measures for the next programmed period of the CAP 2014 – 2020 (FEARS, FESR)
- Create and demonstrate models, in cooperation with the management authorities of Natura 2000 sites, for better governance in conservation management (flora and fauna habitat) and for socio-economic development of local communities
- Define and apply participative processes together with local communities and stakeholders to improve the interaction between public governance and private sector
- Apply and improve the different created models to selected study sites to demonstrate their functionality
- Create a web-based tool for Natura 2000 sites to evaluate ES qualitatively and quantitatively by processing spatial datasets
- Produce a handbook with self-financing instruments and strategies.

**FOREST EUROPE “Workshop on Valuation of Forest Ecosystem Services”**

24th – 25th September 2014, Belgrade (Serbia)

Benedetta Concetti, Bruna Comini (ERSAF); Uta Schirpke, Claudio De Marco (EURAC)
**LIFE+ MGN GENERAL PROJECT OVERVIEW**

Preparatory actions (study sites analysis, stakeholders meetings) (A2, A3)

- **Analysis phase** (oct 2012 – dec 2013)
  - B1. Quantification and evaluation of ES fluxes model
  - B2. Management efficiency evaluation model
  - B3. MGN governance model

Modelling phase (jan 2013 – mar 2014)

- B4-B9 Application of the MGN model in the study sites

Application phase (jan 2014 – sept 2015)

- B10. Creation of a WebGIS-based tool for quantification of ES fluxes and management efficiency evaluation
- B11. Creation of a guidelines handbook for the application of the MGN governance model in N2000 sites

Production phase: outputs for transfer to a larger scale (jan 2013 – dec 2015)

- D. Dissemination, transfer of results and outputs at larger scale (users, policy makers)

Actions related to management, monitoring and communication
STUDY SITES

21 pilot sites (7 Regions, 3 biogeographic regions) belonging to the Natura 2000 network
Total area of 90,239 hectares
For each Natura2000 pilot site, the specific actions are:

- Data collection and preparation of spatial datasets compatible with software GIS
- Application of the model to evaluate the ES qualitatively and quantitatively: assessment of the supply and demand for associated ES and identification of different fluxes from "providershed" and "benefitshed", evaluating in monetary terms all costs and benefits
- Application of PES scheme mechanism with emphasis on self financing and financing mechanism and strategies.
- Demonstration actions related to the evaluation of management effectiveness and the administration of Natura 2000 sites together with stakeholders and the management staff.
GIS-BASED ES ANALYSIS
CORINE LANDCOVER

HABITAT
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STAKEHOLDERS-BASED ES ANALYSIS

SITE MANAGEMENT AUTHORITY QUESTIONNAIRES

STAKEHOLDERS MEETINGS
QUALITATIVE AND QUANTITATIVE EVALUATION OF THE PRIORITY ES

Offer assessment – Demand assessment – Monetary evaluation

THE CASE OF TWO STUDY SITES WITHIN THE LOMBARDY FOREST “ALTO GARDA BRESCIANO”

Alto Garda Bresciano (ZPS IT2070402)  Valvestino (SIC IT2070021)

Aesthetic value  Recreation
Raw materials (lumber, fuel wood...)  Groundwater supply
Freshwater supply  Carbon sequestration
Alto Garda Bresciano (ZPS IT2070402)

Aesthetic value

Raw materials (lumber, fuel wood...)

Freshwater supply

DEMAND

OFFER

Hedonic pricing

In progress

MONETARY VALUE

Market pricing

18.175,88 €/year

4.918.433,79 €/year
Valvestino (SIC IT2070021)

Recreation

MONETARY VALUE
Willingness To Pay/Travel Costs

In progress

MONETARY VALUE
Substitute Costs
(Benefit transfer approach)

137,142,220 €

MONETARY VALUE
Social Value
Tol, RSJ (2005)

15,478,836,84 €
(stocking)
+ 293,089,09 €/year
(sequestration)

Groundwater supply

Water consumption data

Demand

OFFER

Key Stakeholders Delphi Survey

Demand

Carbon sequestration

Not quantifiable

Demand

OFFER

Tourist Survey

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QUALITATIVE AND QUANTITATIVE EVALUATION
OF THE SITE MANAGEMENT EFFICIENCY

IMPLEMENTATION OF THE MGN GOVERNANCE MODEL
IN ORDER TO SELECT THE BEST PES OR OTHER TYPES OF SELF-FINANCING TOOL
FOR EACH SITE
WHERE ARE WE AT NOW?

some examples...

<table>
<thead>
<tr>
<th>Provisioning services</th>
<th>Regulating services</th>
<th>Cultural services</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mushrooms</td>
<td>Groundwater supply</td>
<td>Recreation</td>
</tr>
<tr>
<td>Farmers</td>
<td>Hydroelectric company</td>
<td>Railway company</td>
</tr>
<tr>
<td>Freshwater supply</td>
<td>Concerts venue</td>
<td>Hotels</td>
</tr>
<tr>
<td>Water company</td>
<td></td>
<td>Tourists</td>
</tr>
</tbody>
</table>

MAIN STAKEHOLDERS (funding-wise)

MUSHROOM PICKING ZONAL PERMIT
TRADITIONAL DAIRY PRODUCTS (proxy) QUALITY MARK
WATER BILLS QUOTA
(HYDRO)ENERGY BILLS QUOTA
CONCERTS CARBON FOOTPRINT
PROMOTIONAL RAILWAY TICKET
OVERNIGHT STAY TAX QUOTA
NEW ECOTOURISM PRODUCTS

MAIN CHALLENGES SO FAR...
DATA AVAILABILITY/QUALITY
STAKEHOLDERS ENGAGEMENT

+ LOCAL POLICY MAKERS
+ ASSOCIATIONS (facilitators)
What next?

- EASW stakeholders involvement (2014 – 2015)
- PES IMPLEMENTATION
- Dissemination

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Thank you!

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