

EUROMONT: Training on landscape modelling and stakeholder consultation in European mountain areas

**SOCRATES Intensive Course, Spanish Pyrenees,
29 May to 11 June 2007**



Aims: Based on a detailed ecological and environmental-economic inventory from the Ebro Valley to the Pyrenees, the ecological impact of land-use changes will be analysed and indicators for sustainable development in rural areas will be elaborated

General co-ordinator:

Prof. Dr. Alexander Cernusca (Institute of Ecology, University of Innsbruck).
Sternwartestrasse 15, A-6020 Innsbruck, Austria

Field visit in EbroValley organised by:

Dr. David Badia (U. Zaragoza)
Dr. Daniel Gómez (IPE-CSIC)
Dr. Federico Fillat (IPE-CSIC)

Conducted by: Dr. Alexander Cernusca, Dr. Maya Cernusca, Dr. Neil Bayfield,
Dr. David Badia, Dr. Daniel Gómez, Dr. Federico Fillat

Tuesday 29

17:00 – 19:30 Delegación CSIC-Barcelona

Welcome Address and Introduction

Prof. Dr. **Alexander Cernusca**. University of Innsbruck

Agricultural Systems of the Ebro Valley

Dr. **Carlos Cantero**, University of Lleida

Wednesday 30

10:00 – 14:00 Delegación CSIC-Barcelona

Aims and tasks of the IP course EUROMONT

Prof. Dr. **Alexander Cernusca**. University of Innsbruck

Introduction on Consultative Ecology

Dr. **Neil Bayfield**. Centre for Ecology and Hydrology, Scotland

Scaling up Ecosystem services to Landscape Level

Prof. Dr. **Alexander Cernusca**. University of Innsbruck

Renewable Energy

Dr. **Neil Bayfield**. Centre for Ecology and Hydrology, Scotland

Thursday 31

10:00 – 14:00 Delegación CSIC-Barcelona

Workshop on selecting sustainability indicators.

Dr. **Neil Bayfield**. Centre for Ecology and Hydrology, Scotland

Friday 01

8:00 Departure from Barcelona

10:30 - 12:30 (Palau Montcada; Fraga)

General introduction to the Ebro Valley characteristic

Dr. **David Badía** (University of Zaragoza) and Dr. **Federico Fillat** (IPE-CSIC)

Agronomic, socio-economic and environmental impacts on water management in the Ebro Valley. Dr. **Enrique Playán** (Experimental Station of Aula Dei, CSIC)

13:00 Lunch and lodgement in Hotel Casanova (Fraga)

16:00 -20:00 Ecology and management of the area in the confluence of Ebro, Cinca and Segre rivers (Aiguabarreig).

Fluvial visit through Ebro river. Subjects: land restoration after coal mining extraction; reintroduction of fluvial birds by means of artificial islands.

D. **Kevin Hackett** (Aiguabarreig Biological Station, ABS)

Dr. **David Badía** (University of Zaragoza).

Terrestrial visit through mountains. Subjects: plant and soil recovery after wildfire; eurosiberian vegetation in arid lands; water quality and lands use.

Dr. **Anchel Belmonte** (Faculty of Geology, Univ. of Zaragoza)

D. **Fernando Solsona** (NGO VoluntaRíos, Aragón)

21:00 Dinner in Hotel Casanova (Fraga)

Saturday 02

Field visit and lectures in ZEPAS (Zones of special protection of birds) of Monegros Desert. Coordinated by Dr. **David Badía**

08:30 – 11:30 Field visit to Las Menorcas ZEPA (Candasnos and Fraga)

Avifauna of arid areas in the Ebro Valley: ecological interest and ecotourism (bird watching)

D. **Alberto Bueno** (Forest Ranger of the Government of Aragon and ecotourism guide)

11:30 – 13:30 Field visit to Saline lakes (Bujaraloz) and new irrigated agricultural areas

Discussion on the conflicts between environmental protection and development of new irrigated zone in Monegros

Dr. **David Badía** (University of Zaragoza)

13:30 Lunch in Rte. La Parrilla de Monegros (Bujaraloz)

15:30 – 17.30 Field visit through juniper woodland in Monegros Desert

Biogeographical singularity of the steppe and juniper wood

D. **Javier Blasco** (University of Zaragoza)

17:30 Trip to San Martín de la Virgen del Moncayo (arrival time planned: 19:00)

20:30 Dinner and lodgement in Hotel Gomar (San Martín del Moncayo)

Sunday 03

09:00 – 18:00 Field visit and in field explanations in the Moncayo Natural Park coordinated by Dr. **Daniel Gómez** and Dr. **Federico Fillat** (Pyrenean Institute of Ecology, IPE, CSIC).

Field excursion from Talamantes to Peñas de Herrera (6 h approximately)
Topics to be discussed: *Ecological features and recognition of mediterranean landscape and landscapes; endemic flora of cliffs and screes. Human influence on landscapes. Livestock utilization and consequences of current abandonment; shrub encroachment.*

19:00 – 20:00 Lecture on

“Plant biodiversity conservation in Moncayo Natural Park: aims and methods”
Dña. **Teresa Gil** (Biologist; PhD in IPE-CSIC)

Monday 04

09:00 – 16:00 Field visit in the west side of Moncayo Natural Park coordinated by Drs. **Daniel Gómez** and **Federico Fillat** (IPE-CSIC).

Excursion to a Mediterranean forest of *Quercus pyrenaica* and Sub-Atlantic vegetation of *Fagus sylvatica* (4 h walk) in the west part of Moncayo Natural Park

Management guideline of Moncayo Natural Park. Potentialities and constraints
Mr. **Raul Ayala** (Manager of natural values in Moncayo N.P)

Tuesday 05

Trip to the Pyrenees crossing the Ebro Valley from South to North. Coordinated by Dr. **Daniel Gómez** and Dr. **Federico Fillat** (IPE, CSIC)

10:00 Depart from San Martin

11:00 – 14:00. Field visit to the Natural Park of Bardenas Reales

Ecological singularity of Bardenas Reales sub arid territory

Dr. **Javier Peralta** (Public University of Navarra) and D..**Alejandro Urmeneta** (Natural Park of Bardenas Reales Navarra)

17:00 – 18:00 Visit the Loarre's castle and explanations about History of Aragon Kingdom and about Sub-Mediterranean vegetation and landscape origin

20:00 – 20:30 Arrival at Hecho and Hotel accommodation

Wednesday 06

09:00 – 16:00 Field visit to “Protected Landscape of Oroel-San Juan de a Peña”.

Main topic: Hunting management in protected areas and as an economical resource (conducted by Dr. **Juan Herrero**, Dept. of Ecology; Univ. Alcalá de Henares).

17:00 -19:00. Workshop “selecting different development plans for the Formigal Ski Station”. Dr. Neil Bayfield

Thursday 07

09:00 Depart from Hecho Excursion in the Pyrenees crossing the border between Spain and France. Hecho-Peyrenere by car (1h 30) and Peyrenere-Oza on foot (6 h).

10:30 – 18:00. Field visit with general explanations on the main ecological and economic differences between French and Spanish Pyrenees. Dr. **Federico Fillat** and Dr. **Daniel Gómez**)

Production of cheese in the French summer pastures. Explanations and demonstration by the shepherd of the Cabanne d'Escouret

The bear (Ursus arctos) introduction on the Pyrenees: a general overview and perspectives. Dr. **Claude Berducou** (Expert iPyrenean faune, ENSAT, Toulouse, France) *Pastoral organization of the Anso and Hecho Valleys.*

Pastoral organization of the Ansó and Hecho Valleys. Dr. **Federico Fillat**

19:30 – 20:30 Lecture on

Research on sexual selection and population dynamic: objectives and methods
Dr. **Patrick Fitze** (National Museum of Natural Sciences- CSIC)

Friday 08

9:00 -16:00 Visits to Tena Valley.

Different approaches on development strategies: Glaciers Centre, the Ecological Agriculture issues and the Formigal skiing resort.

Visit to Glaciers Centre of Senegüé (Sabiñanigo): D. **Carlos Marco**, professional guide

Agro-ecological familiar farm in Oros Alto (Biescas). D. **Luis Cazcarro** and D. **Javier Cazcarro**, farmers.

Presentation of the recent ski improvements and perspectives in Formigal skii resort.

D. **Antonio Gericó**, Director of the ski resort and D. **Jordi Castellano**, *Folia* consulting

Field explanation on the landscape transformation. D. **Mariano Polanco** Ecologistas en Acción ONG.

Saturday 09

10:00 – 13:30 Visit to Hecho surroundings

(Historical colonization and current farming systems in the Hecho Valley)

16:00- 19:00 Whorkshop on selection on sustainable indicators (Dr. N. Bayfield, Xavi Carbonell and Mar Fabregas)

Sunday 10th

08:00- 20:00 Field visit to Ordesa National Park (Dr. **R. García-González**, IPE-CSIC), Dr. **Daniel Gómez** IPE-CSIC) and D. **Guillermo Bueno** IPE-CSIC),

21:00 h Farewell dinner

Monday 11st

5:00 Departure to Barcelona airport

Lecturers:

D. Raúl Ayala (SODEMASA)
Dr. Anchel Belmonte (Universidad de Zaragoza)
Dr. Claude Berducou (ENSAT, Toulouse)
D. Javier Blasco (Naturalista)
D. Alberto Bueno (Gobierno de Aragón)
D. Guillermo Bueno (IPE-CSIC)
Dr. Carlos Cantero (Un. Lleida)
D. Xavier Carbonell (Arc Mediación)
D. Jordi Castellano (Folia Consultores, Madrid)
D. Javier Cazcarro (Explo. Familiar de Agr. Ecológica, Orós Alto)
D. Luis Cazcarro (Explo. Familiar de Agr. Ecológica, Orós Alto)
Dña. Mar Fábregas (Arc Mediación)
Dr. Patrick Fitze (Museo Nacional de Ciencias Naturales, CSIC)
Dr. Ricardo García-González (IPE-CSIC)
Dña. Teresa Gil (Gestión Ambiental, Viveros y Rep. Navarra)
D. Kevin Hackett (Estació Biológica del Aiguabarreig)
Dr. Juan Herrero (Un. Alcalá de Henares)
D. Carlos Marco (Centro de Interpretación de los Glaciares, Senegüé)
Dr. Javier Peralta (Un. Pública Navarra)
Dr. Enrique Playán (Aula Dei-CSIC)
D. Mariano Polanco (Green NGO Ecologistas en Acción)
D. Fernando Solsona (VoluntaRios, Aragón. ONG)
D. Alejandro Urmeneta (P. Natural Bardenas Reales de Navarra)

Supported by: Ayuntamiento de Fraga, Ayuntamiento del Valle de Hecho, Parque Nacional de Ordesa y Monte Perdido, Parque Natural del Moncayo, Parque Natural de Bardenas Reales, Estación de Esquí Formigal



Ayuntamiento del Valle de Hecho



Centre for Ecology & Hydrology
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