# CO-EVOLVE

Promoting the co-evolution of human activities and natural systems for the development of sustainable coastal and maritime tourism

Delta Po Park Veneto Region Authority







# **Authors**

# Marco Gottardi, Roberta De Faveri

Delta Po Park Veneto Region Authority, Via Marconi 6, Ariano nel Polesine (RO), Italy.

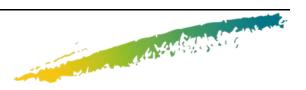
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## 1. Introduction

The aim of this document is to report the activities implemented by Delta Po Park Veneto Region Authority (hereafter Delta Po Park) and specifically on the deliverable foreseen by the Work Package 4 (WP4) under the responsibility of the Project Partner.

The Delta Po Park is in charge to implement the Delta Po Planning Centre (deliverable 4.5.1) and the Prototype of movable lodging (deliverable 4.5.2).

In the specific chapters below, it will be described how the implement has been done so far, considering, especially for deliverable 4.5.1, the completion of the enclosed activities which are deeply part of the establishment of the planning centre.

The Project Partner has been supported by the external assistance of Istituto Delta Ecologia Applicata's consultants (hereafter Istituto Delta).

During the carrying out of WP4 activities, the Delta Po Park took many events and meetings aimed to involve stakeholders and public and private operators of the territory.

# 2. D.4.5.1 Delta Po Planning Centre

The Delta Po Planning Centre has been established with the purpose to give indications at environmental and tourism themes, and to give indications on sustainability tourism measures in order to make the locality and international reference for scientific knowledge in the environmental and tourism fields of the Upper Adriatic basin.

The Planning Centre settled its offices within the headquarter of the Po Delta Park with all the CO-EVOLVE equipment purchased.

#### **Land Cover database**

Within the establishment of the Centre, the Po Delta Park realized the update of the Land Cover database of Veneto Region under the CO-EVOLVE project (Figure 1 and Figure 2). The main objective of this service was to realize an update to 2015 and a legend homogenization, according the methodologies appointed in 2012, of the Land Cover map for the whole Po Delta Regional Park in order to proceed in a steady periodical update of the territory.





The project foreseen the redefinition of the polygon interpretation inherent also the correct attribution of belonging category through photointerpretation of satellite analysis and comparation of scenes from 2 different referring periods.

The service has been done by using satellite images in open source mode which allow the implementation of a classification system based on the analysis of multiple multi-temporal frames able to analyse the phenological behaviour of the annual crop.

The product represents the third edition of the Land Cover Cartography (CCS\_2015) and considers the area of 9 municipalities of Veneto Region placed in the Park territory: Adria, Ariano nel Polesine, Corbola, Loreo, Papozze, Porto Tolle, Porto Viro, Rosolina and Taglio di Po.

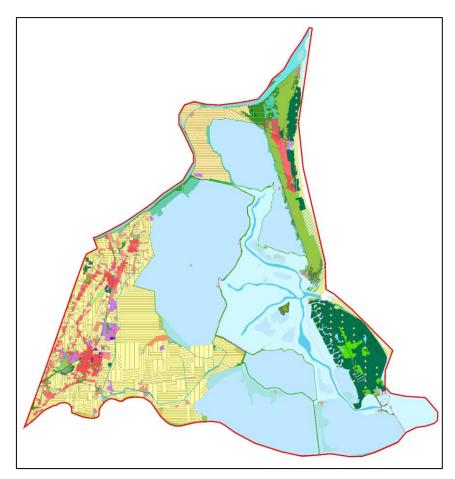


Figure 1 High quality map of pilot area 3A - Rosolina Mare - images provided by Corvallis S.p.A.



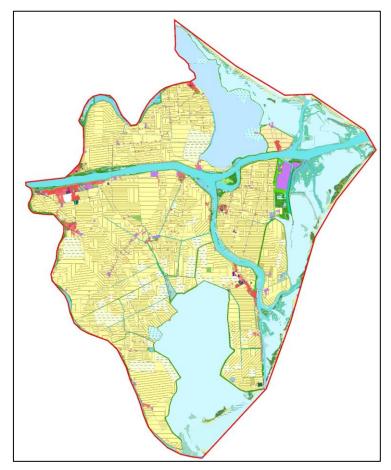


Figure 2 High quality map of pilot area 3B - Polesine Camerini - images provided by Corvallis S.p.A.

# **Catalogue Portal**

In order to share this data and all other databases useful for touristic and technical purpose, Delta Po Park Veneto developed a Catalogue Portal (<a href="http://deltadata.parcodeltapo.org/coevolve/">http://deltadata.parcodeltapo.org/coevolve/</a>) Po Delta Park Veneto chose the main Open Source technologies now available like GeoNode, Geoserver, MapStore. Portal can contain cartographic data, documents that users can search in the catalog using metadata, keyword and so on (Figure 3).

Delta Po Park Veneto is harvesting data from all public entities that have influences in the territory of Delta Po.

The focus is to aggregate all data in a portal where everyone can search, download and use databases. Moreover, Delta Po Park Veneto can preconfigure thematic maps with the Layers that consider useful to share organically (Figure 4 and Figure 5).







Figure 3 Main page of the Catalogue Portal

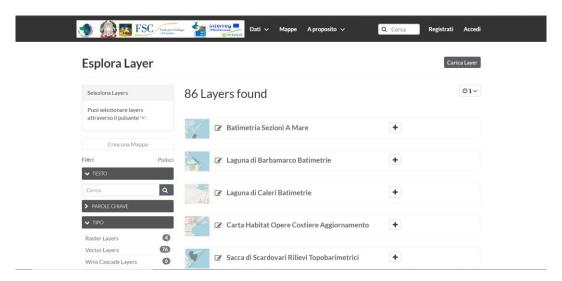


Figure 4 Page for selecting layers



Figure 5 Map with the selected layers





Every citizen can access without login and see not sensible data, instead Technicians and scientific researchers can require a login and password to Delta Po Park for access at the complete database.

In addition of Catalogue, to improve functionality that helps observatory to monitor environmental and touristic dynamics, Delta Po Park Veneto developed an APP that will distribute to users that organization authorize (Figure 6).

These users will send problems that see in the country directly to the organization to help monitoring and safe of the park.

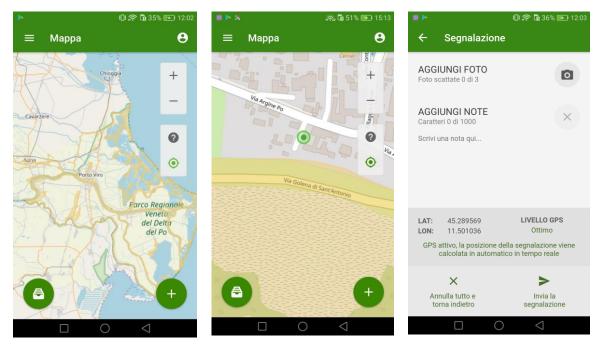


Figure 6 Screenshot from the app to monitor environmental and tourism dynamics

Every report can contain GPS position and photos.

#### 3. D.4.5.2 Prototype of movable lodging

The prototype of movable lodging has been implemented within a tourism village located in the Municipality of Rosolina, specifically in Rosolina Mare (Figure 7).



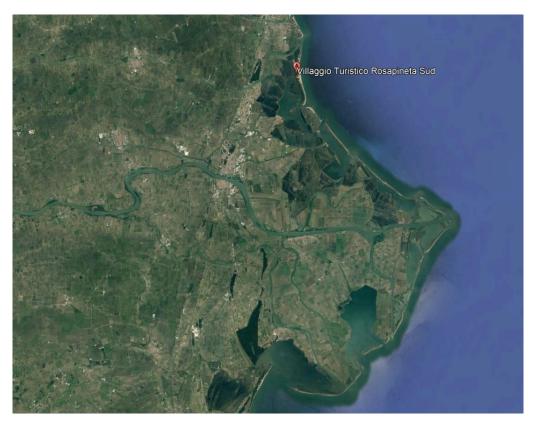


Figure 7 Location of the tourism camping where the prototype will be placed

This prototype has energy and environment characteristics in order to proposed a house unit for tourism purposes and experiment a new tourism offer able to satisfy the equilibrium between economic, surface and environmental needs.

The minimum character of this prototype is its eco-friendly nature, which has been expressed with many shapes and ranges:

- Utilization of recycle materials
- Conformity, as much applicable as possible, with GPP Ministeriale of the 6/12/2012 and Guidelines of Veneto Region for "Green Procurement"
- Quality of thermal and acoustic insulation
- Recycle of the final product
- Landscaping and optimal outdoor area design
- Energy efficiency

# **Basic elements**

- Fully recyclable galvanized steel support structure
- Floor made from recycled material





- Stratigraphy of the external wall that improves the natural comfort conditions of the mobile home environments
- Insulated platform
- External walls with cork insulation
- · Ecological wood or fibre cement cladding
- Fabrics with natural fibres

For any specific characteristics, please refer to the document "Capitolato Tecnico – Area Pilota Rosolina Mare – Comune di Rosolina" (in Italian).

All the plant design is energy efficiency, a water cycle system is implemented.

The prototype use: certified wood from responsible managed forests (appropriate certificating documents from FSC and PEPFC are provided, with a recycle plan of paints and glue); water-base glue or UV and/or paint hardening and glues that do not contain organic solvents; the guarantee of disassembling the product at the end of its useful life, so that its parts and components can be reused, recycled or recovered for energy purposes; fabrics with at least 30% of recycled fibres.

The camping site has been identified after expression of interest and is located in the tourism structure of Rosapineta Sud (Palma srl); the prototype has been developed by Crippa Campeggio SRL, after expression of interest, which exposed the final plans of the house unit the 15 of April at "Fuori Salone" exhibition in Milan (Figure 8 and Figure 9).





Figure 8 Location of the prototype in the camping village

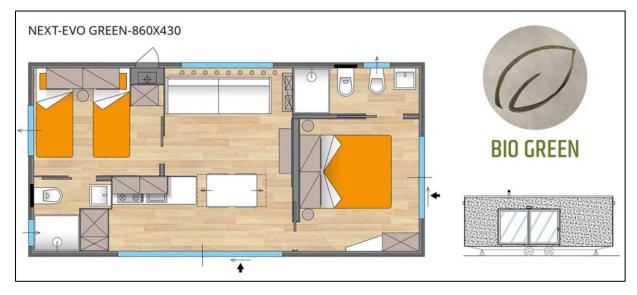


Figure 9 Prototype project plans

During May the house unit has been placed in the camping site and will be fully operative for the summer season, able to collect tourism data that will be utilized for CO-EVOLVE project and other strategies plans carried out by the Po Delta Park.

