

# Albosaggia

## Energy and Environment methodology

### KEYWORDS:

- Building culture
- Construction
- Closed loops
- Governance
- Planning Tools
- Ecology
- Energy efficiency
- Indicators
- Mobility
- Technology transfer

### TARGET GROUP:

- Architects
- Builders
- Citizens
- Craftsmen
- Home Owners
- Planners
- Politicians
- Policy Makers

## Results and outcomes (use cases):

This methodology is based on an oriented analysis of the territorial context (the soil usage transformation) and on the mapped consumption of settlements (on the base of climate, technological and shape elements). The second step is represented by an oriented analysis of the resources, seen both as energy saving derived from rationalization and as renewable energy potential based on precise suitable areas for opportunities (wood, water, sun). The resources oriented analysis provides a map of territory-related opportunities,

considering all available resources on the territory with their potential and sustainability (biomass, bio fuels, hydropower, geothermal, solar plants, photovoltaic, etc.). The outputs of the research are a map accompanied by a matrix of opportunities where the potential usage level of the resource is indicated, available to orient the local planning documents; a master plan defining different planning pathways: water, biological, recreational, energy, zero emission and short rotation forestry, hill countries, risk protection energy structures.

### Description:

- The research was born from a specific interest of the Albosaggia Mayor in defining the energy potential of his territory through an analysis aimed to orientate the future planning hypothesis. Co-funded by Lombardy Region, Province of Sondrio, Albosaggia Municipality.
- The result is a diagnosis of ecological territory balance, comparing actual and plan situation, providing settlement energy rationalization within a general master plan.
- The measure is an experimentation (not related to a specific regulation), available to be re-applied to other areas.

### Relevance for inter-municipal planning (AlpBC):

- The measure is an experimentation, available to be re-applied to other mountain areas.
- The methodology merges the territorial needs (the consumption) and potential (the resources), providing a matrix (map) of opportunities with detailed indication of the degree of resource utilization, combining spatial and energy planning in a master plan with oriented solutions.
- The resources are studied identifying vocational areas for renewable energy production, taking into account impacts and effects of the solutions.
- To act the strategies and solutions defined in the research guidelines, an Energy Help Desk will be set up to support users in the Municipality towards sustainable solutions.

### Relevance for policy goals (Alpine Space, Europe and the region):

The resulting master plan defines different planning pathways towards sustainability, following the 'capabilities' of a specific territory: water, biological aspects, recrea-

tional aspects, energy, zero emission and short rotation forestry, hill countries, risk protection energy structures.