



## Standardization of available forest data: the first step to support wood mobilization in Friuli Venezia Giulia

### Introduction

In Friuli Venezia Giulia, located in the eastern Alps of Italy, approximately 32 % of the region is covered by forests. However, their utilization is much lower than their growth. Sustainable forest management in this region faces challenges due to depopulation in the mountains and various other factors, including inadequate forest roads, a limited number and size of logging and primary processing companies, and excessive fragmentation of land ownership. In fact, the majority of regional forests are privately owned (60 %), with highly fragmented parcels of land, some smaller than 1000 m<sup>2</sup>. Furthermore, it is important to note that a single parcel often has multiple owners, some of whom may not be reachable due to their non-residency in the area.

In this context, PRI.FOR.MAN OG is working towards addressing these issues and implementing a new collaborative approach to managing small forest properties. However, to achieve this goal, standardized information on forest parcels is crucial. Although many pieces of information on forest parcels were already available in Friuli Venezia Giulia, they were scattered across various administrative portals. As a result, even if the information were accessible, it was often not organized in a standardized and uniform format. This poses challenges for forest stakeholders and owners who require consistent and reliable information.

To improve the situation, PRI.FOR.MAN has focused its efforts on centralizing and standardizing the information on forest parcels, making it easily accessible and facilitating collaborative forest management initiatives. For the first time in the region, a geodatabase was created to centralize the forest-related data from different administrative portals into a single, comprehensive database. This allows streamlined access to information and facilitates standardized data management. The collected and standardized geographic layers can be categorized into three types: (1) Basic cartographic layers, including cadastral parcels, the regional technical map at a scale of 1:5000, public roads, and regional orthophotos with a resolution of 10 cm; (2) Forest management layers, including forest categories, existing forest management plans, forest roads, presence of disturbances, and information related to past harvesting areas; (3) Environmental constraints, including an estimation of the protective role exercised by forest vegetation, the location of

biotopes, regional or state parks and reserves, and Natura 2000 sites with specific connections to current regulations (e.g., conservation and development measures) and/or management plans.

PRI.FOR.MAN ensures that the available geographic layers have been verified to resolve any topological errors, standardized, and, if necessary, converted/transformed into the RDN2008/UTM zone 33N reference system (EPSG 6708). The standardized layers were then organized using a systematic approach to structure and categorize the forest data based on relevant parameters such as location, ownership, forest type, and ecological features. Finally, the data were published in the Decision Support System Platform developed within the context of PRI.FOR.MAN.

This platform enables the sharing of forest-related data among stakeholders, including forest owners, management agencies, researchers, and other interested parties. It provides user-friendly access to standardized data within a unified environment. Moreover, the classification of the layers allows users to quickly access the necessary information without getting lost in various administrative portals.

## Lessons learned

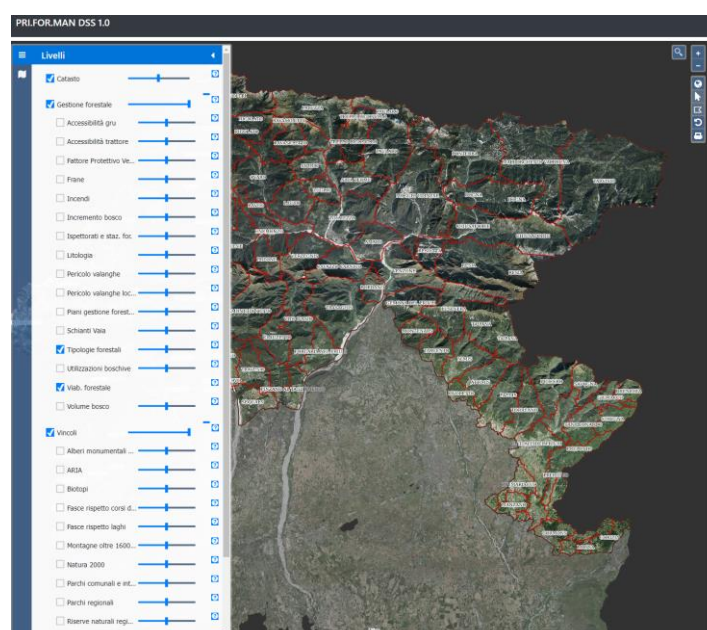
Organizing the geographic data related to the available information from various administrative portals in the Friuli Venezia Giulia region required a significant amount of work in terms of man-hours dedicated to data standardization.

Furthermore, it was not always easy to quickly find the information needed.

Some information was not standardized in databases or in a rational manner, necessitating the process of digitization.

In the organization of the layers within the categorized strata, the input of technicians and end-users was crucial, as it allowed for proper categorization that reflects their specific needs.

*Figure 1. Overview of the digital Decision Support System platform.*



## For further information contact

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## Further information

[https://lookerstudio.google.com/u/0/reporting/2f6c2f81-b78f-446c-ab07-96571d7b6984/page/p\\_w5k3gvls6c](https://lookerstudio.google.com/u/0/reporting/2f6c2f81-b78f-446c-ab07-96571d7b6984/page/p_w5k3gvls6c)



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