Table of Contents

- Introduction
- · State of Play
 - Coordination
 - Functioning and coordination of the infrastructure
 - Usage of the infrastructure for spatial information
 - Data Sharing Arrangements
 - Costs and Benefits
- · Key Facts and Figures.
 - Monitoring Indicators

Introduction

The INSPIRE Directive sets the minimum conditions for interoperable sharing and exchange of spatial data across Europe as part of a larger European Interoperability Framework and the e-Government Action Plan that contributes to the Digital Single Market Agenda. Article 21 of INSPIRE Directive defines the basic principles for monitoring and reporting. More detailed implementing rules regarding INSPIRE monitoring and reporting have been adopted as Commission Implementing Decision (EU) 2019/1372 on the 19th August 2019.

This country fiche highlights the progress in the various areas of INSPIRE implementation. It includes information on monitoring 2022 acquired in December 2022 and Member States update.

State Of Play

A high-level view on the governance, use and impact of the INSPIRE Directive in Italy. More detailed information is available on the INSPIRE knowledge base.

Coordination

National Contact Point

Name of Public Authority: Ministero della Transizione Ecologica

Contact Email: Click to email

National INSPIRE Website: https://www.isprambiente.gov.it

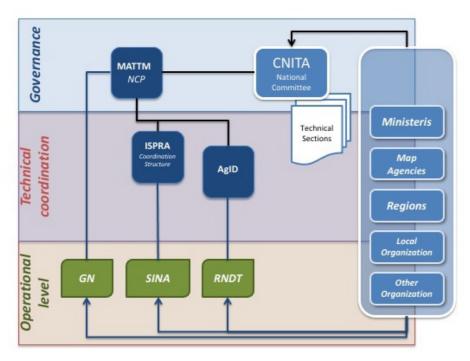
http://www.pcn.minambiente.it/mattm/inspire/

MIG Contacts: Contact Person: Teresa Federico

Email: Federico.Teresa@minambiente.it Contact Person: Alessandra De Cesare Email: DeCesare.Alessandra@minambiente.it

MIG T Contacts: Contact Person: Carlo Cipolloni

Email: carlo.cipolloni@isprambiente.it Contact Person: Michele Munafò Email: michele.munafo@isprambiente.it



Coordination Structure & Progress:

National Contact point

Name of public authority	Ministero dell'Ambiente e della Sicurezza Energetica
Mailing address	Via Cristoforo Colombo, 44 – 00147 Roma
Telephone number	
Fax number	
E-mail	NCP.Inspire@mase.gov.it
Website address	https://www.mase.gov.it/
Contact person	Alessandra De Cesare
Telephone number	
E-mail	
Contact person substitute	Teresa Federico
Telephone number	
E-mail	

Coordination Structure

According to adopted coordination strategy (January 2016) there are three levels in the governance structure (figure above):

- **Top**: governmental level, including the NCP (Ministry of Environment and Energy Security) and the consulting and supporting body created in May 2016 (CNITA), website: https://www.mase.gov.it/; website: CNITA;
- **Middle**: technical coordination level, including the coordination structure (ISPRA, the Italian Institute for Environmental Protection and Research) and the national body for the Digital Agenda (AGID);
- **Bottom**: operational level, including the National Geoportal (GN), the National Environmental Information System (SINA) and the national geographic metadata catalogue (RNDT);

In May 2016 Italy has set up a body in charge of linking all the public administrations providing spatial data, this body called "Consulta Nazionale per l'Informazione Territoriale e Ambientale" (CNITA) was already envisaged in 2010 in the law transposing the INSPIRE Directive, but never established so far; the figure below shown the coordination structure picture in Italy.

• The coordination structure supporting the INSPIRE Implementation and Italian NCP is ISPRA - Via Vitaliano Brancati, 48 - 00144 Roma, Tel. +39 06-5007-1, email: inspire@isprambiente.it; website: https://www.isprambiente.gov.it.

Progress

- During 2020, the coordination structure (ISPRA) in conjunction with the manager of the national metadata catalogue
 (RNDT) published guidelines to support administrations to enrich more the compilation of metadata and the correct
 configuration of network services. Furthermore, in compliance with the new metadata guidelines, AgID as the managing
 body of the RNDT has updated the catalogue with its national profile, so that it is in line with the technical guides of
 metadata 2.0, publishing a new updated national guideline on metadata and metadata catalogues
 (https://geodati.gov.it/geoportale/manuale-rndt).
- In continuity with what was done, also in 2021, ISPRA and AgID organized training and support seminars for PAs for the compilation and improvement of the quality of metadata and network services connected to the datasets. A specific action to assign in the monitoring only the metadata of the datasets that have a value for the purposes of the Directive and that were effectively aligned with the regulations in force was carried out by the coordination structure by filtering the national metadata. This action has allowed an improvement in national performance without reducing the quality of the geographic information provided and in particular, while recording a significant decrease in the number of dataset metadata, the number of compliant network services has increased.
- In parallel, ISPRA as the coordination structure of INSPIRE and reference for e-Reporting towards the European Environmental Agency has launched a process of comparison, through workshops, with regional agencies and national authorities in order to bring the two activities together. This action, launched at the end of 2020, lasted throughout 2021 and 2022, allowing at national level an increase in the priority datasets to support the data flows of environmental directives.
- In 2021 the competences of the previous Ministry of the Environment merged into the new Ministry of Ecological
 Transition which also includes some of the key competences in the ecological transition process, including the energy
 sector. A deep re organization of the Ministry was therefore initiated which assigned competences relating the INSPIRE
 theme, aimed at strengthening and promoting the CNITA's activity. In 2022, following the appointment of the new
 government, the Ministry changed its name again placing greater emphasis on energy aspects, becoming the Ministry of
 the Environment and Energy Security.
- The actions related to the compliance of metadata to the latest TGs and the accessibility of spatial data sets through the network services have been included in the national Three-Year Plan for ICT in the Public Administration. In addition, the coordination and integration of spatial data and open data has been consolidated through the interoperability of the two national catalogues (RNDT mentioned above and the national open data portal https://dati.gov.it); consequently, the open spatial data are discoverable in both catalogues.
- In 2021, and continuing into 2022, many regional nodes on the stimulus produced by the webinars organized by AgID and ISPRA, they have made a further effort to improve the accessibility of metadata, data and services, in compliance with INSPIRE. Some regions have reviewed a large amount of metadata and services, such as the Lombardy Region more than 270 objects including data, maps and services on which a specific action has been made for reclassification, through appropriate keywords, to identify the priority datasets. In addition, a thorough review was carried out in order to finalize a complete conversion to the CC-BY 4.0 license for all available open data.

Functioning and coordination of the infrastructure

The coordination of the infrastructure takes place through the Cooperation Board (section 1 of the CNITA) which is chaired by ISPRA and where common policies on the use of data are adopted; at the same time the board applies a coordinated orchestration of the components of the National Infrastructure for Territorial Information and Environmental Monitoring (INITMA).

- The main access point to information about the CNITA and the INITMA components takes place through the National Geoportal (http://www.pcn.minambiente.it/mattm/).
- A strategic action of convergence between open data and geospatial data has been launched in order to reduce duplication.
- CNITA drew up a specific governance plan at the end of 2022, supporting as a country the action to improve its metadata
 and services and produced an operational action plan (POA) for each element necessary for the full implementation of the
 INSPIRE Directive, as well as for the promotion of geographic information in general. One of the actions envisaged by the
 POA is to accompany public administrations by anticipating specific training and information webinars on a quarterly
 basis, as well as preliminary monitoring actions with the same frequency in order to evaluate the evolutionary trend of the
 country.

Usage of the infrastructure for spatial information

Information on the use of geospatial data at national and regional level is fragmented but indicates a growing trend in interoperability between public administrations.

- Training actions were activated to strengthen the activity to harmonize data and to access network services and their use.
- The metadata statistics are presented in the monitoring report, but also in detail in the RNDT portal (https://geodati.gov.it/geoportale/) from the difference between the two it can be understood how the improvement and filtering action has led to monitoring only of the datasets and network services that produce accessible and useful data for national and European policies. The presence of over 19,000 documented datasets and about 2300 network services in the national report allows to document a rich documentation often of historical geographical information provided available in static or paper formats (i.g. pdf, jpg).
- In 2022 a new support activity was carried out in order to further improve metadata compliance and increase accessibility
 of datasets through network services. This activity has been agreed with all Public Administrations (data and services
 holders) within the CNITA.
- In 2022 ISPRA created, using part of the data and services published in the infrastructure, to create applications for the dissemination of environmental information.
- Each region has its own access portals both to open data and to territorial data with their own access and use statistics.

Data sharing arrangements

The analysis carried out over the previous years has highlighted two main barriers to the exchange of data between public administrations, referred to below.

- One of the obstacles to full compliance with INSPIRE is identified in the current legislative landscape which in many cases predates the INSPIRE Directive and therefore applies limitations to data sharing.
- Especially local administrations have difficulty in financing the right skills / infrastructures that would allow harmonization towards INSPIRE formats that would feed the national data infrastructure with local data "ready for use".

In order, therefore, to support greater data exchange, the CNITA and the Ministry of the Environment and Energy Security have ensured support for the Open Data Directive 1024/2019/EU..

Moreover, in 2022, following the national transposition of the Open Data Directive (Directive (UE) 2019/1024), a Guidelines document has been prepared for the implementation of the provisions established in the transposition Decree, also in order to clarify the relationship between the two legal instruments. The Guidelines aim at supporting public administrations and other subjects in the process of open data and reuse of public sector information through specific requirements and recommendations. Specifically, these indications concern formats, publication, metadata profiles, licences and pricing, re-use requests and search tools, all aspects regulated by the Directive and the national Decree. The document also includes indications on organisational aspects and data quality. Moreover, the Guidelines also define a specific licensing framework (aligned to the arrangements on licenses set out in the implementing HVD Regulation) also affecting spatial data under INSPIRE legislation. Finally, the Guidelines include some sections dedicated to spatial data and, specifically, to so-called High-Value datasets (HVD). The document foresees a specific guidance for providing further specific requirements and recommendations for the HVD providers in order to ensure HVD be conformant to the arrangements set out in the implementing Regulation. Those arrangements will concern the coordination at national level and the measures and initiatives for monitoring the level of re-use of HVD.

Indeed, within the National Recovery and Resilience Plan financed by the Next Generation EU programme, the Ministry of the Environment and Energy Security has launched an investment for the creation of an advanced and integrated monitoring and forecasting system which intends to implement:

- preventive measures for the maintenance of the territory and infrastructures against hydrogeological risk
- interventions aimed at preventing fires and the illegal transfer of waste,
- $\circ\,$ optimization of the use of resources and management of emergencies.

For this action, the board of the CNITA represented an important meeting which made it possible to gather all the needs of the participating Administrations. Actions to be implemented by 2026 to increase data sharing were jointly planned.

Costs and benefits

The 2019 Country Report contains information on the costs of building the infrastructure in terms of man-months, and broken down for the different actors (Ministry of the Environment, ISPRA), but the estimate is based approximately on what has been implemented by the Italian organizations who manage the components of INITMA.

On the benefits:

- among the qualitative benefits outlined, the rationalization of economic investments and operating costs, thanks to the elimination of duplications.
- The widest use of public data thanks to the sharing, standardization and harmonization of data required by INSPIRE.
- Greater development of applications aimed at citizens and public utility services.

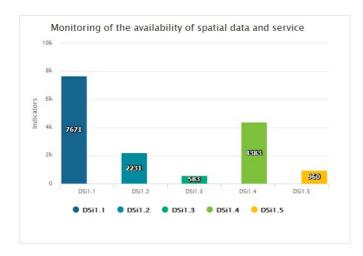


Indicators in support of Commission Decision (EU) 2019/1372 implementing Directive 2007/2/EC (INSPIRE) as regards to monitoring and reporting

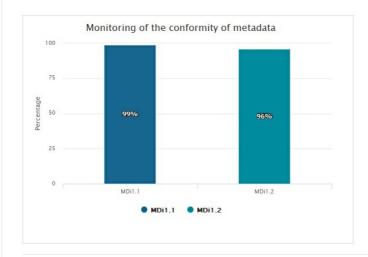
Graphs generated with data taken from: https://inspire-geoportal.ec.europa.eu/mr2022_details.html?country=it

The date of harvest metadata: 2022-12-20, 00:05:28

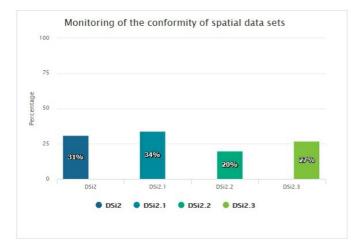
Endpoint: 1bae6e77-8e8e-480c-be6b-d9f47f31371b



Indicator	Definition
maioatoi	Dominion .
DSi1.1	The number of spatial data sets for which metadata exist
DSi1.2	The number of spatial data services for which metadata exist
• DSi1.3	The number of spatial data sets for which the metadata contains one ormore keywords from a register provided by the Commission indicating that the spatial data set is used for reporting under the environmental legislation
● DSi1.4	The number of spatial data sets for which the metadata contains a keyword from a register provided by the Commission indicating that the spatial data set covers regional territory
● DSi1.5	The number of spatial data sets for which the metadata contains a keyword from a register provided by the Commission indicating that the spatial data set covers national territory

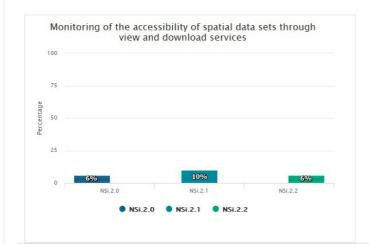


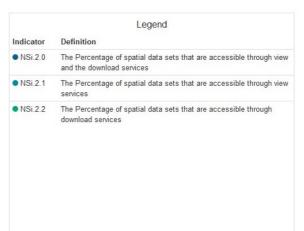


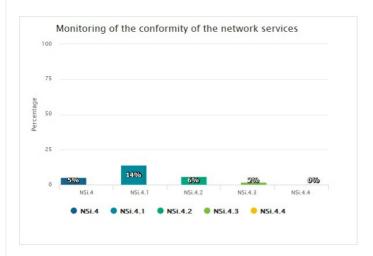


Indicator	Definition
● DSi2	Percentage of spatial data sets that are in conformity with Commission Regulation (EU) No 1089/2010 as regards interoperability of spatial data sets
● DSi2.1	Percentage of spatial data sets, corresponding to the themes listed in Annex I,that are in conformity with Commission Regulation (EU) No 1089/2010 as regards interoperability of spatial data sets
● DSi2.2	Percentage of spatial data sets, corresponding to the themes listed in Annex II, that are in conformity with Commission Regulation (EU) No 1089/2010as regards interoperability of spatial data sets
• DSi2.3	Percentage of spatial data sets, corresponding to the themes listed in Annex III, that are in conformity with Commission Regulation (EU) No 1089/2010 as regards interoperability of spatial data sets

Lagand







Legend		
Indicator	Definition	
NSi.4	Percentage of the network services that are in conformity with Commission Regulation (EC) No 976/2009 as regards the Network Services	
● NSi.4.1	Percentage of the discovery services that are in conformity with Commission Regulation (EC) No 976/2009 as regards the Network Services	
● NSi.4.2	Percentage of the view services that are in conformity with Commission Regulation (EC) No 976/2009 as regards the Network Services	
● NSi.4.3	Percentage of the download services that are in conformity with Commission Regulation (EC) No 976/2009 as regards the Network Services	
NSi.4.4	Percentage of the transformation services that are in conformity with Commission Regulation (EC) No 976/2009 as regards the Network Services	