

INSPIRE Thematic Clusters

- building communities to support INSPIRE implementation

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EC&EEA INSPIRE CT Team

INSPIRE-GWF Conference, Lisbon 25-29.5.2015



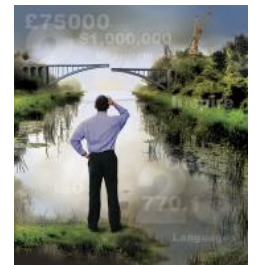
The screenshot shows the INSPIRE Thematic Clusters website interface. At the top, there is a blue header with the INSPIRE logo and the text "INSPIRE Thematic Clusters". Below the header is a navigation menu with links for "News", "Events", "Pages", "Dashboard", "Clusters", and "More". A search bar is located on the right side of the header. Below the header, there is a "Add widgets" button. The main content area is divided into several sections: "About the INSPIRE Thematic Clusters Platform" (with a grid of images), "Tag cloud", "INSPIRE on Twitter", "INSPIRE Website", "INSPIRE GeoPortal", "INTERACTIVE Data Specifications", "INSPIRE Conference 2015", and "News". At the bottom, there are sections for "Thematic Clusters names and themes" and "Cross group discussions".

www.jrc.ec.europa.eu

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Supporting legislation

Content

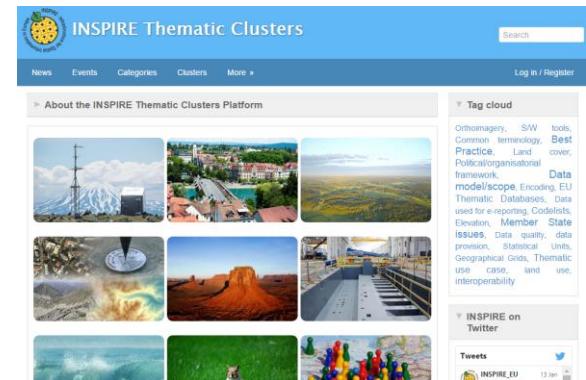
- INSPIRE Thematic clusters – State of Play
- INSPIRE Interactive Data specifications Toolkit
- Workflow for proposing additions/changes to Technical Guidelines



INSPIRE Thematic Clusters Platform

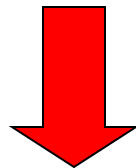
- EC initiative, linked to the INSPIRE Maintenance and Implementation Framework, with the **objective** of **supporting INSPIRE implementation in the Member States.**
- **Officially launched on 11.12. 2014** as the INSPIRE Thematic user community **collaborative platform**

<https://themes.jrc.ec.europa.eu/>



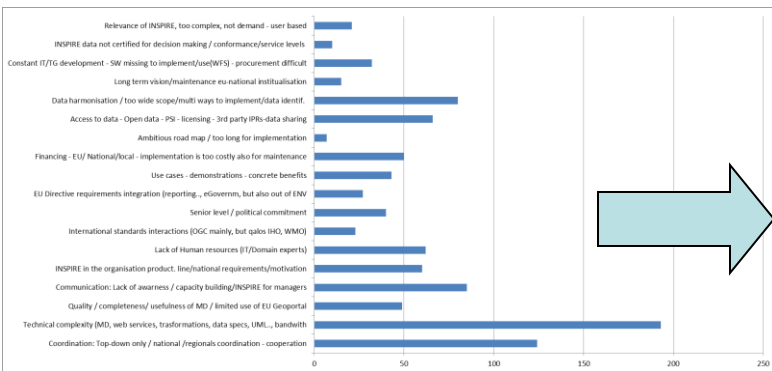
Why INSPIRE Thematic Clusters Platform

- Many INSPIRE implementation issues are **theme-specific - need for harmonised approach.**
- No agreed way for implementers in MS to **share their experience – continuation of the INSPIRE Thematic WGs.**
- No coherent **overview of the status** of the implementation for the different INSPIRE data themes – **best practices.**
- **Reflection** of the outcomes of the **INSPIRE MID-Term Evaluation Public Survey.**



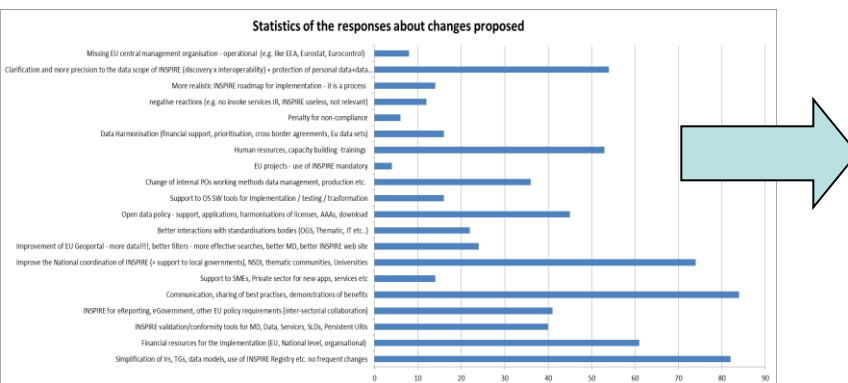
INSPIRE mid-term evaluation public survey

challenges encountered



1. **Technical complexity;**
2. **Coordination at all levels;**
3. **Data harmonisation, multiple ways to implement / interpret concepts;**
4. **Use cases, demonstrations, real benefits.**

changes proposed



1. **Communication, sharing of best practices, demonstration of benefits;**
3. **Improve coordination at all levels, thematic communities, universities**

Link: http://inspire.ec.europa.eu/reports/consultations/INSPIRE_Public_Consultation_Report_final.pdf

Exchange of implementation experiences in thematic domains

Proposed actions:

- **To build communities of INSPIRE implementers** in the EU as well as in MSs around **clusters of themes**
- To create an **on-line platform** (e.g. a re-designed INSPIRE forum) for **sharing experiences and for discussing implementation issues and approaches.**

INSPIRE Thematic clusters platform

Consist of **9 Thematic clusters = Groups of INSPIRE data themes each is** led by selected facilitator (domain experts with INSPIRE knowledge + established network of contacts)

- Statistical & Human Health Cluster – ***Miroslaw Migacz***
- Marine & Atmosphere Cluster – ***Keiran Millard***
- Earth Science Cluster – ***Tim Duffy***
- Land Cover & Land Use Cluster – ***Lena Hallin-Pihlatie***
- Elevation, Orthoimagery, Reference System & Geographical Grid – ***Jordi Escriu***
- Environmental Monitoring & Observations Cluster – ***Alessandro Sarretta***
- Biodiversity & Management Areas Cluster – ***Brian Mac Sharry***
- Facilities, Utilities & Public Services Cluster – ***Angel Lopez Alos***
- Topographic & Cadastral Data Cluster – ***Anja Hopfstock***

<https://themes.jrc.ec.europa.eu>



INSPIRE Thematic clusters platform

Connecting communities



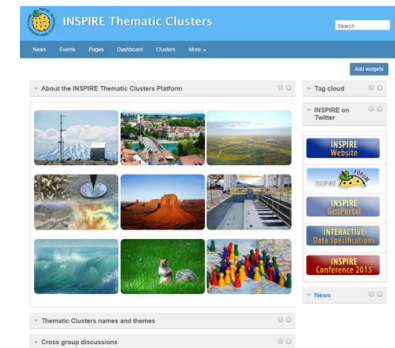
The platform is open to all 😊

- For active participation (discussions, adding new topics, best practice etc.) - **ECAS registration** needed + joining relevant groups / sub-groups.

Thematic clusters platform statistics

20.5.2015

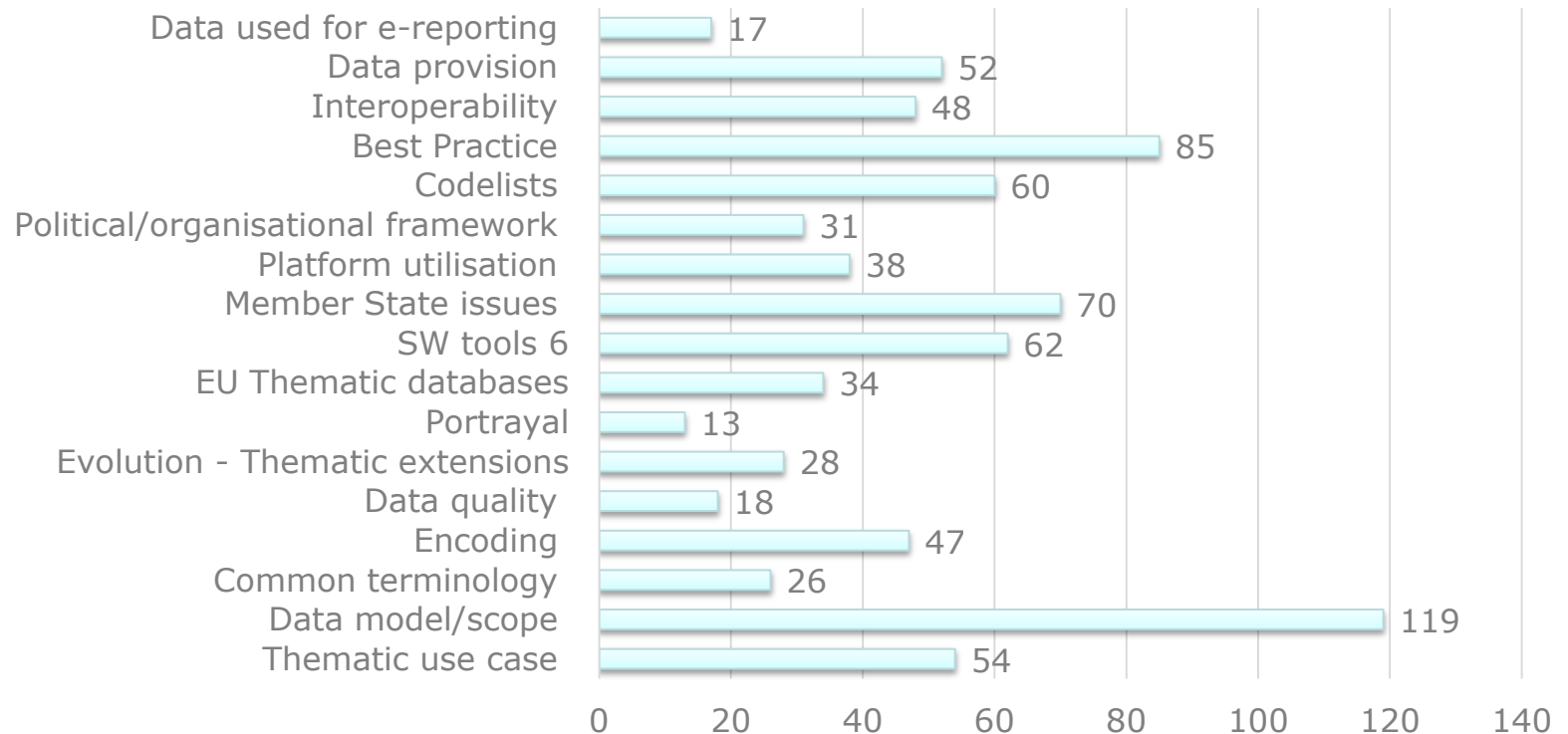
- 450 registered members
- 50 groups (groups + sub-groups)
- 234 discussion topics
- 467 responses
- 50 files uploaded
- 33 News items



Thematic clusters platform statistics

20.5.2015

Nr. of assigned content items (docs., responses, discussion topics etc.)



Thematic clusters platform

Selected on-going discussion topics



Environmental Monitoring and Observations Cluster



- **SOS V2.0 Offerings**
<https://themes.jrc.ec.europa.eu/discussion/view/29928/sos-v20-offerings>

Statistical and Human Health Cluster



- **Harmonizing population grid data into the INSPIRE data model**
(<https://themes.jrc.ec.europa.eu/discussion/view/2166/harmonizing-population-grid-data-into-the-inspire-data-model>)

Biodiversity and Management Areas Cluster



- **PS data model regarding designations**
<https://themes.jrc.ec.europa.eu/discussion/view/11598/ps-data-model-regarding-designations>

Topographic and Cadastral Reference Data



- **Update of the INSPIRE Network Model**
 - Linear referencing (using length for network referencing)
 - Road link positions on road sequences(<https://themes.jrc.ec.europa.eu/discussion/view/13413/update-of-the-inspire-network-model>)

Thematic clusters platform

Selected on-going discussion topics

Land Cover and Land Use Cluster



- **Is the Land Cover Class code list to be used or not?**
(<https://themes.jrc.ec.europa.eu/discussion/view/27660/is-the-land-cover-class-code-list-to-be-used-or-not>)

Elevation, Orthoimagery, Reference Systems, Geographical Grids



- **How to encode EL & OI coverages?**
(<https://themes.jrc.ec.europa.eu/discussion/view/2843/encoding-of-elevation-and-orthoimagery-coverages>)

Earth Science Cluster



- **Layer naming**
<https://themes.jrc.ec.europa.eu/discussion/view/13952/layer-naming>

Facilities, Utilities and Public Services Cluster



- **INSPIRE in the context of PRTR/IED (Industrial Emissions Directive)** (<https://themes.jrc.ec.europa.eu/discussion/view/22502/inspire-in-the-context-of-prtried-industrial-emissions-directive>)

Marine and Atmosphere Cluster



- **OF Data specification – Use of Codelists**
<https://themes.jrc.ec.europa.eu/discussion/view/24996/of-data-specification-use-of-codelists>



Thematic clusters facilitators - tasks

Initial phase (12.2014 – 05.2015)


- Task 1:** Aggregation and publishing of information about the state of the implementation in a thematic domain / cluster
- Task 2:** Facilitate communication / exchange of implementation progress, priorities and roadmaps
- Task 3:** Platform content maintenance and administration
- Task 4:** Active promotion of the on-line collaboration platform



INSPIRE **Interactive** Data Specification Toolkit

INSPIRE **Interactive** Data Specification Toolkit v1.0

The INSPIRE **Interactive** Data Specification Toolkit offers INSPIRE data providers two applications to support them in the implementation of the INSPIRE data specifications.




Interactive
workflow

The application

Find your scope


helps you to find those INSPIRE spatial object types and their properties that are relevant to your dataset(s).



Direct
Search


Benefits

Understanding which of your data properties need to be transformed & Comparing your data with wider community standards to identify potentials gaps and/or thematic extensions



Interactive
workflow

Interactive workflow starts with an intuitive selection of INSPIRE data theme(s) followed by the selection of relevant application schema(s). The next step is about selecting concrete spatial objects based on their definitions. This object pre-selection is confirmed in the following step. The final list of all selected objects including their properties (attributes) as well as all associated objects can be than saved/printed in a PDF/DOCX structured document.





Direct
Search

Direct Search allows you to iteratively search for an INSPIRE object(s) using a text string. The search engine looks in the labels, definitions and descriptions of all existing/defined INSPIRE spatial objects, application schemas and data themes. The collection of selected object can also be than saved/printed in a PDF/DOCX structured document.

Data Specifications application


The application **Data Specifications** facilitates the reading of INSPIRE Data Specification – Technical Guidelines documents by enabling to study only selected parts of the INSPIRE technical documentation. Furthermore, the selected parts can be compared with the same parts (e.g. Use case descriptions) from up to 3 data themes.







Try it yourself!

<http://inspire-regadmin.jrc.ec.europa.eu/dataspecification>





ARE³NA



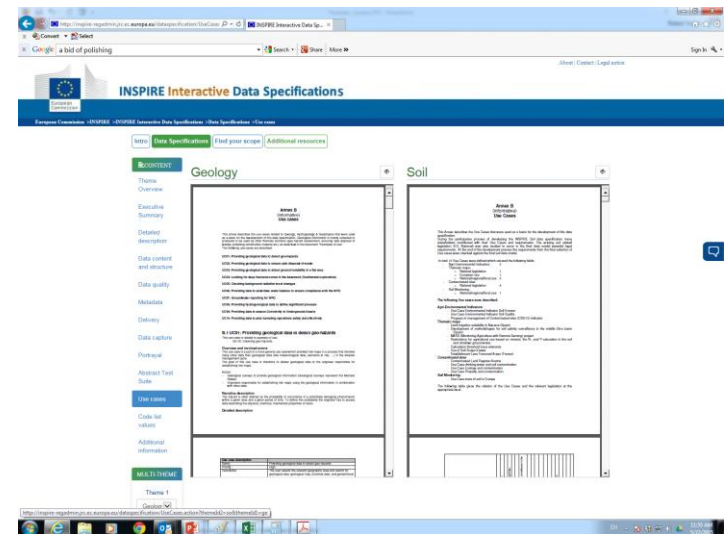
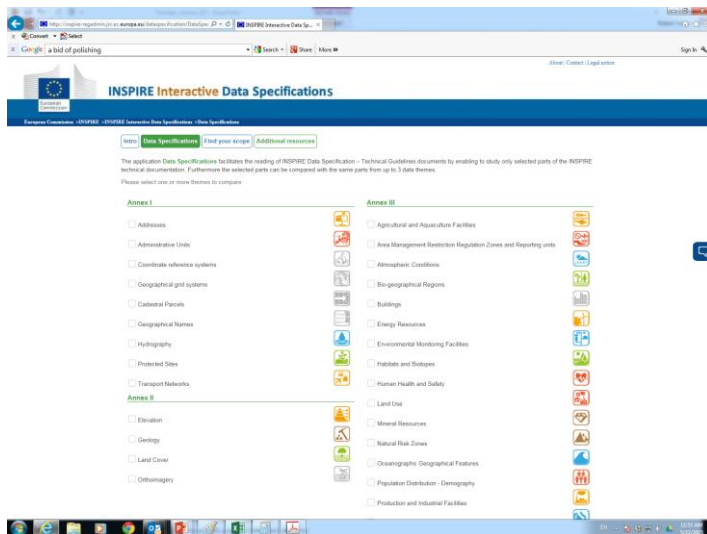
Contact us:
dataspecification-info@jrc.ec.europa.eu

<http://inspire-regadmin.jrc.ec.europa.eu/dataspecification/>

INSPIRE Interactive Data Specification Toolkit

Data specification application: tool for helping reading and comparing INSPIRE data specification-Technical Guidelines documents

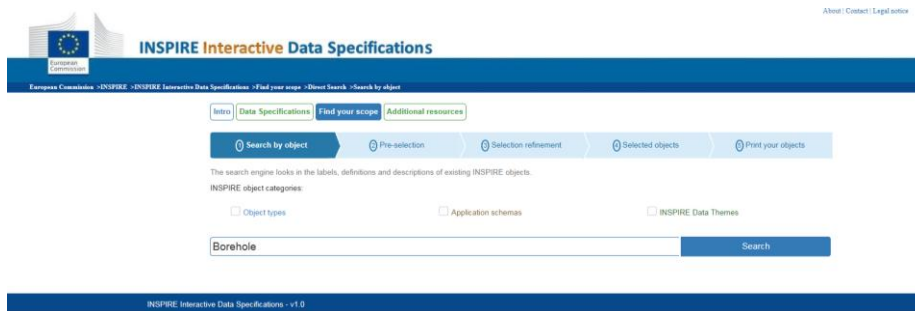
1. Select INSPIRE data theme(s) (up to three)
2. Select a TG section and study, compare etc. (e.g. Use cases)



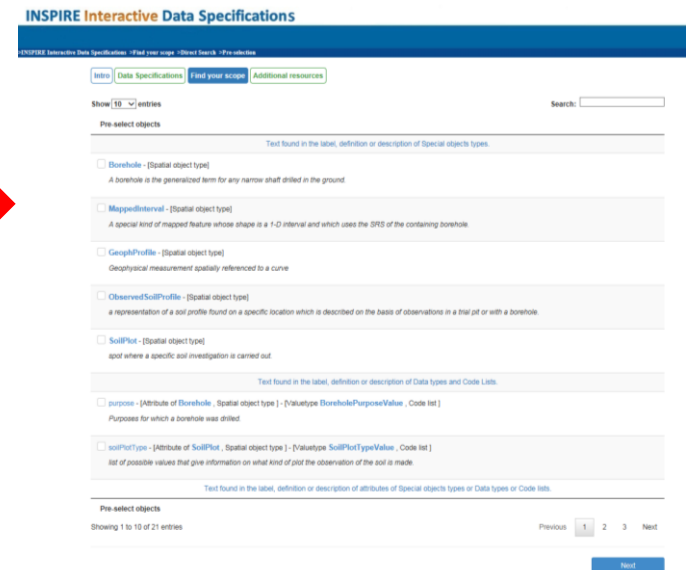
INSPIRE Interactive Data Specification Toolkit

Find your scope application: tool for helping finding those INSPIRE spatial object types and their properties that are relevant for you.

1. Direct search tool:



1. Search by object



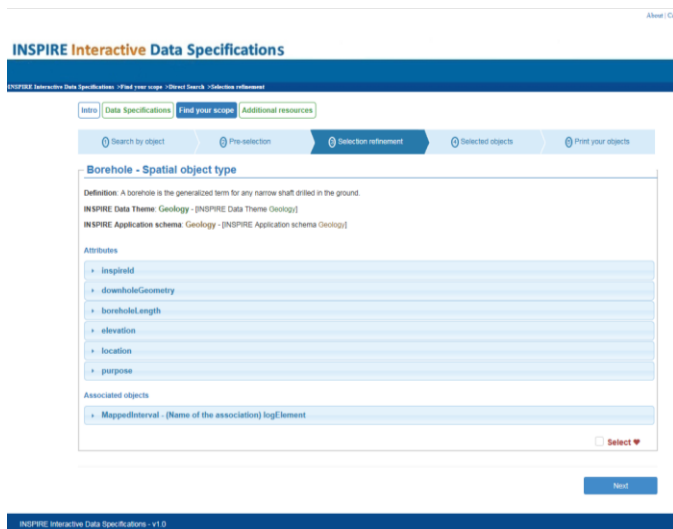
2. Objects pre-selection

Direct search



INSPIRE Interactive Data Specification Toolkit

Find your scope application: tool for helping finding those INSPIRE spatial object types and their properties that are relevant for you.



INSPIRE Interactive Data Specifications

INSPIRE Interactive Data Specifications - Find your scope - Object Search - Selection refinement

Intro | Data Specifications | **Find your scope** | Additional resources

0 Search by object | 1 Pre-selection | **2 Selection refinement** | 3 Selected objects | 4 Print your objects

Borehole - Spatial object type

Definition: A borehole is the generalized term for any narrow shaft drilled in the ground.

INSPIRE Data Theme: Geology - [INSPIRE Data Theme Geology]


INSPIRE Application schema: Geology - [INSPIRE Application schema Geology]

Attributes

- inspireId
- downholeGeometry
- boreholeLength
- elevation
- location
- purpose

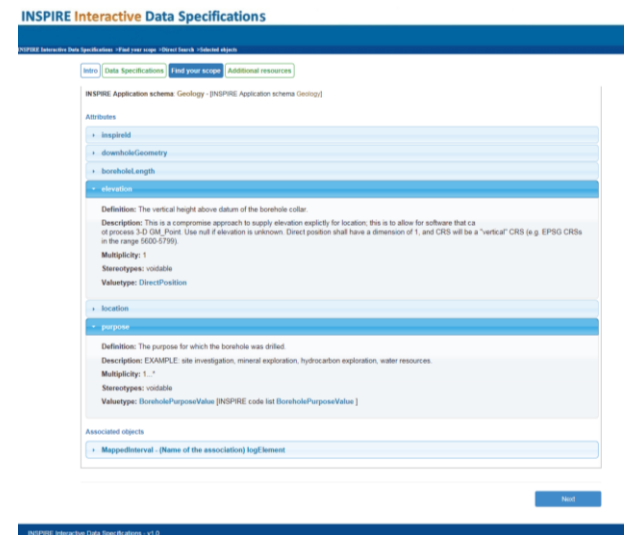
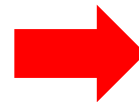
Associated objects

- MappedInterval - (Name of the association) logElement

Select 

Next

INSPIRE Interactive Data Specifications - v1.0



INSPIRE Interactive Data Specifications

INSPIRE Interactive Data Specifications - Find your scope - Object Search - Selected objects

Intro | Data Specifications | **Find your scope** | Additional resources

INSPIRE Application schema: Geology - [INSPIRE Application schema Geology]

Attributes

- inspireId
- downholeGeometry
- boreholeLength
- elevation**
- location
- purpose

Definition: The vertical height above datum of the borehole collar.

Description: This is a compromise approach to supply elevation explicitly for location, this is to allow for software that cannot process 3-D GML Point. Use null if elevation is unknown. Direct position shall have a dimension of 1, and CRS will be a "vertical" CRS (e.g. EPSG CRSs in the range 5400-5799).

Multiplicity: 1

Stereotypes: voidable

Valuetype: DirectPosition

- location
- purpose**

Definition: The purpose for which the borehole was drilled.

Description: EXAMPLE: site investigation, mineral exploration, hydrocarbon exploration, water resources.

Multiplicity: 1..*

Stereotypes: voidable

Valuetype: BoreholePurposeValue [INSPIRE code list BoreholePurposeValue]

Associated objects

- MappedInterval - (Name of the association) logElement

Next

INSPIRE Interactive Data Specifications - v1.0

3. Objects selection refinement

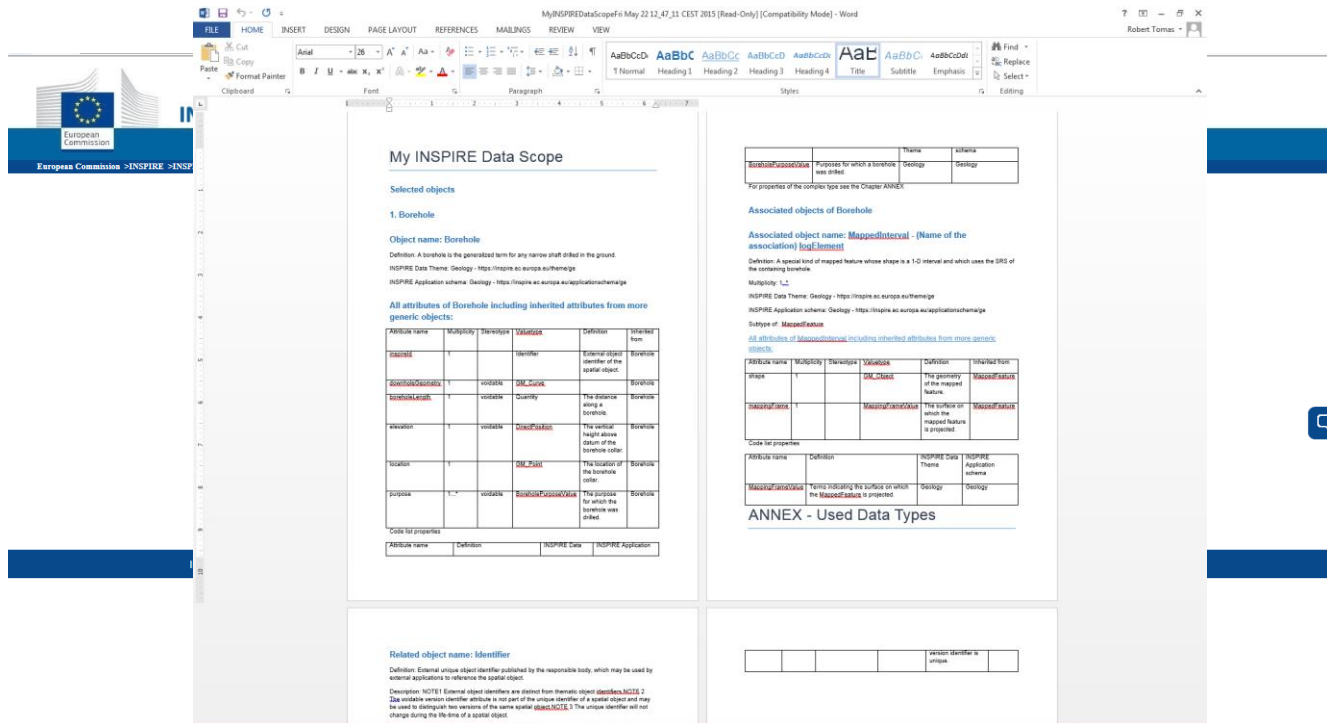
4. Selected objects

Direct search



INSPIRE Interactive Data Specification Toolkit

Find your scope application: tool for helping finding those INSPIRE spatial object types and their properties that are relevant for you.



The screenshot shows a Microsoft Word document titled "My INSPIRE Data Scope" with the following content:

Selected objects

1. Borehole

Object name: Borehole

Definition: A borehole is the generalized term for any narrow shaft drilled in the ground.

INSPIRE Data Theme: Geology - <https://inspire.ec.europa.eu/applications/theme/ge>

INSPIRE Application scheme: Geology - <https://inspire.ec.europa.eu/applications/scheme/ge>

All attributes of Borehole including inherited attributes from more generic objects:

Attribute name	Multiplicity	Theme type	Value type	Definition	Inherited from
id	1	Identifier	External object identifier of the spatial object.	Borehole	Borehole
geometry	1	Geometry	2D_Geometry	Borehole	Borehole
depth	1	Quantity	Distance	The distance along a borehole.	Borehole
height	1	Quantity	Distance	The vertical height above datum of the borehole collar.	Borehole
location	1	Geometry	2D_Geometry	The location of the borehole collar.	Borehole
purpose	1..*	Enumerated	BoreholePurposeCode	The purpose for which the borehole was drilled.	Borehole

Code list properties

Attribute name	Definition	INSPIRE Data Theme	INSPIRE Application scheme
id		Geology	Geology

Associated objects of Borehole

Associated object name: MappedInterval - (Name of the associated) [logElement](#)

Definition: A special kind of mapped feature whose shape is a 1-D interval and which uses the IRI of the containing borehole.

Multiplicity: 1..1

INSPIRE Data Theme: Geology - <https://inspire.ec.europa.eu/applications/theme/ge>

INSPIRE Application scheme: Geology - <https://inspire.ec.europa.eu/applications/scheme/ge>

Subtype of: MappedFeature

[All attributes of MappedInterval including inherited attributes from more generic objects:](#)

Attribute name	Multiplicity	Theme type	Value type	Definition	Inherited from
shape	1	Geometry	1D_Geometry	The geometry of the mapped feature.	MappedFeature
mappedFeature	1	Enumerated	MappedFeatureCode	The purpose for which the mapped feature is projected.	MappedFeature

Code list properties

Attribute name	Definition	INSPIRE Data Theme	INSPIRE Application scheme
mappedFeature	Terms describing the purpose on which the MappedFeature is projected.	Geology	Geology

ANNEX - Used Data Types

Related object name: Identifier

Definition: External unique object identifier published by the responsible body, which may be used by external applications to reference the spatial object.

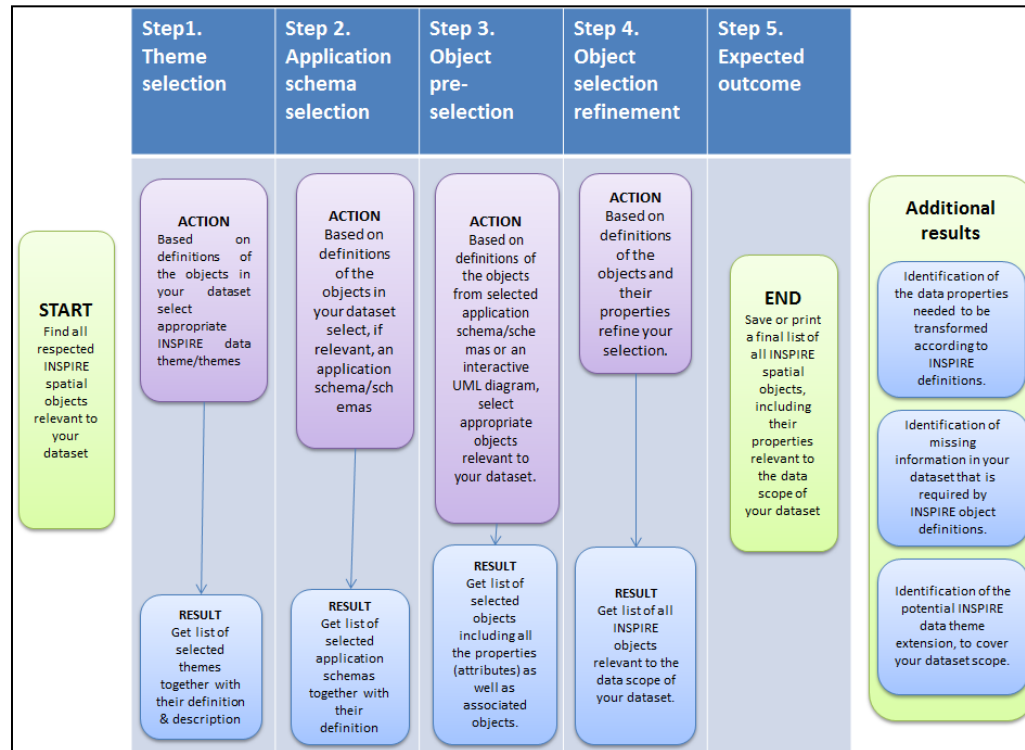
Description: NOTFI External object identifiers are derived from thematic object identifiers (NOTFI 2). The variable version identifier attribute is not part of the unique identifier of a spatial object and may be used to distinguish two versions of the same spatial object (NOTFI 2). The unique identifier will not change during the life time of a spatial object.

Direct search

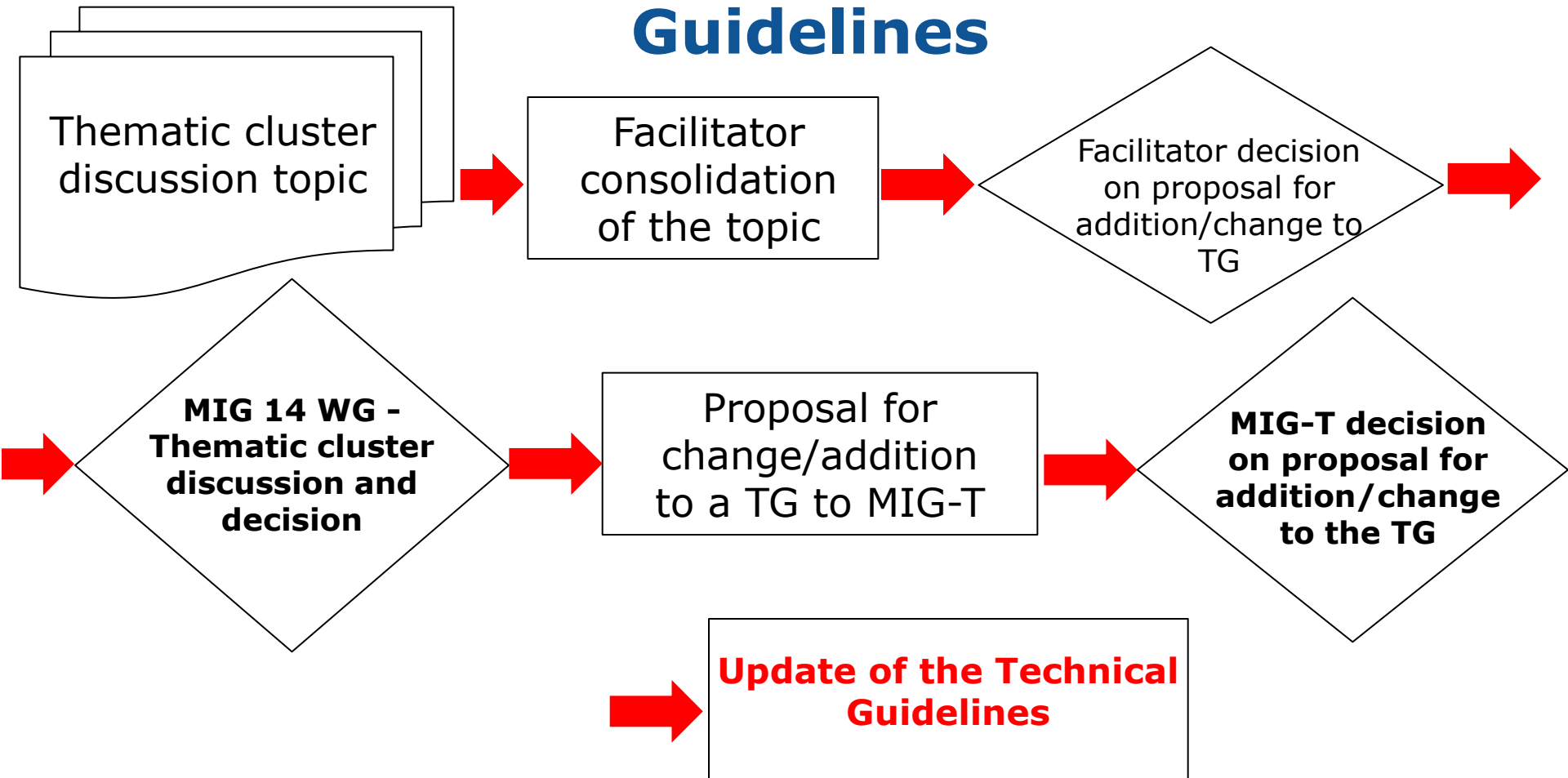


INSPIRE Interactive Data Specification Toolkit

Find your scope: **Interactive workflow tool**



Workflow for proposals for thematic additions/changes to the Technical Guidelines



In summary



Engaging INSPIRE thematic communities is to:

1. To keep up the “momentum” – participatory, open process from the development of the IRs, TGs also for **the INSPIRE implementation phase**
2. To mobilize thematic communities **to share best practices** about implementing / utilizing INSPIRE in their domains.

To help INSPIRE to deliver “our” objectives



Want to know more?

😊**Join the platform**😊

Come to visit us at the INSPIRE stand

Lunch talks at the exhibition area:

- **Tue: 14-15:INSPIRE Forum 2.0–knowledge base, Are3na**

- **Wed: 14-15:Thematic clusters presentations:**

Topo & Cadastral, Elevation & Orthoimagery, Land use & cover, Env. monitoring & Management areas, Statistical & Human Health

- **Thu:12.30-13.30:Thematic clusters presentation:**

Biodiversity, Facilities & Utilities, Earth Science, Marine & Atmosphere

Dedicated Thematic clusters workshops:

- Thursday: 9.00 – 12.30 – Land Cover & Land Use

- Thursday: 13.30 – 15.00 – Topographic & Cadastral Data

- Friday: 9.00 – 10.30 – INSPIRE Measurement data

Mini-drone!! We value your inputs...



Your feedback

We need your feedback!

Please:

1. Write any comments/ideas about INSPIRE on the other side of this card
2. Take it to the INSPIRE Stand
3. Talk to us about it
4. Tweet about us using #INSPIRE_card

All feedback with contact details through these cards and online will be entered into a free prize draw to win a mini-drone!



Name:


Organisation:

Email:

Thank you for your attention.

robert.tomas@jrc.ec.europa.eu

Questions?



The screenshot shows the INSPIRE Thematic Clusters website interface. At the top, there is a blue header with the INSPIRE logo (a globe with a leaf) and the text "INSPIRE Thematic Clusters". Below the header is a navigation menu with links for "News", "Events", "Pages", "Dashboard", "Clusters", and "More". A search bar is located on the right side of the header. Below the header is a main content area with a grid of widgets. The first widget is titled "About the INSPIRE Thematic Clusters Platform" and contains a 3x3 grid of images: a satellite dish, a town, a landscape, a globe, a desert, a factory, a map, a cat, and a group of people. To the right of the main content area is a sidebar with a "Tag cloud" widget and an "INSPIRE on Twitter" widget. Below the sidebar is a "News" widget. At the bottom of the main content area, there are two more widgets: "Thematic Clusters names and themes" and "Cross group discussions".