

A WFS profile for the national urban planning website (Geoportail de l'urbanisme)

Urban planning data are produced and diffused by municipalities or state services. French strategy to reach INSPIRE requirements consists in two steps. First, all the data will be digitized by producers by 2020 using national CNIG standard. Then the data gathered on the national urban planning website will be processed in order to fulfil INSPIRE data model. This gathering will be made manually or automatically, through web services. Two types of services are foreseen: OGC WFS and ATOM feed.

Inspire download service technical guidelines based on WFS were not sufficient to reach expected level of interoperability. Another profile has been defined based on OGC WFS standard. This profile is compliant with the Inspire download service direct access conformance class.

Some requirements have been added on the content of GetCapabilities response document: keywords, abstract, profile, metadataUrl. Some constraints have been added at the service level: Two formats have to be supported (GML and SHAPE-ZIP, to be compliant both with OGC WFS standard and the original national CNIG standard), several coordinates systems have to be provided (for France and its overseas territories) in addition to European reference systems to be compliant with national requirements.

Additional requirements have been added to describe more precisely published data. As the national CNIG standard is based on a shapefile implementation, a GML encoding of this standard has been provided (as a GML schema), as well as the list of features types to be provided.

As a huge amount of data is foreseen, it is not an option to harvest data on a regular basis so an update system has been set up. The mechanism is based on the updateSequence attribute of the GetCapabilities document. A filter is then done based on identifiers to find updated objects.

This profile is being implemented so it is regularly amended based on comments/feedbacks. The goal will be to have a profile able to provide the level of interoperability to make the French urban planning infrastructure work. This infrastructure will also be the INSPIRE-compliant infrastructure offering data harmonized at a national level.

This experience could be useful to other member states willing to set up such an infrastructure, even in other domains. Indeed, this approach enforces Inspire technical guidelines as a common starting point on which specific/national requirements can be built on.