

## Merging statistics and geospatial information

## Background of the Action

Geographic Information Systems (GIS) techniques can be used:

- to display statistical indicators together with geographic information, through interactive viewers or maps
- to facilitate the analysis of statistical data (e.g. error detection, spatial patterns, correlations) through overlaying multiple indicators and spatial references
- to create new, specifically defined indicators on the basis of existing statistical and geographical information (e.g. assessing the extent of the maritime impact on coastal regions, evaluating the degree of proximity to primary services as an indicator contributing to alternative ways of measuring GDP, etc.).

In most countries, mapping agencies and statistical offices already cooperate at various degrees, but the further development of common approaches and synergies should be sought. The integration of geographical and statistical information, although not void of major challenges, offers important opportunities to maximize the utility of data collected by statistical offices.

## Objectives of the action

- I) Improving the integration of geo-information into the statistical production process
- 2) Illustrating how linking geo- and statistical information provides additional value and creates new information
- 3) Designing innovative web applications to show the spatial distribution of statistics

## **Expected Results**

The action will result in highly user friendly and intuitive web applications or a process improvement in the statistical production chain as regards the integration of geography and statistics. When working with geostatistics, the project should also take into account the INSPIRE directive data specifications either already adopted or currently under development (depending on the specific data theme). Spatial network services could be developed in line with the corresponding INSPIRE requirements.

The action can provide at least one of the following types of results:

- Studies on the spatial distribution of statistical phenomena and the inherited causes.
- Projects to derive new statistical data by combining existing data and geographical information.
- Improved data management processes whereby geoportals are connected to statistical databases.
- Interactive map applications allowing users to delineate output areas for statistics and to illustrate the spatial dimension of statistics.
- Projects that involve third party providers of official geoinformation such as mapping agencies