

Course code: QGIS

Course title: Introduction to GIS – the QGIS platform example

Days: 2

Description:

Course intended for:

The training is intended for persons wishing to get familiar with the GIS desktop issues using QGIS as the example.

Course objective:

The training objective is to get the users familiar with theoretic and practical aspects of spatial data management in QGIS software. The training participants will learn to:

- Manage the desktop QGIS application
- Use, develop, analyze and present spatial data using QGIS
- Use in QGIS spatial data services and data gathered in spatial databases

After the training, the participants will be able to use QGIS application on their own in everyday work with spatial data.

Requirements:

It is recommended that the participants should have basic knowledge of geographic information systems, although the training does encompass an introduction to this topic.

Course parameters:

2*8 hours (2*7 net hours) of lectures and workshops (with a visible emphasis on workshops).

The training is conducted using the most recent available QGIS version.

Group size: no more than 10 participants.

Course curriculum:



- 1. Introduction do GIS
- 2. Discussing of QGIS platforms
 - Installation and launching of software
 - Basic Tools and menu
 - QGIS project functioning and systems of coordinates
 - Downloading of raster and vector data
 - Visualization of raster and vector data
 - Basic management of the table of attributes
- 3. Development and edition of vector data
- 4. Tools for management of vector data
 - Analysis tools
 - Research tools
 - Geoprocessing tools
 - Geometry tools
 - Data management tools
- 5. Entering raster data in the system of coordinates (georeference)
- 6. Raster data in QGIS
 - Representation tools
 - Conversion tools
 - Geoprocessing tools
 - Analysis tools
- 7. Transformations of the systems of coordinates



- 8. The plug-in mechanism using examples
- 9. Spatial data services in QGIS
 - WMS
 - WFS
- 10. Spatial data management in databases the example of PostGIS
 - Connecting with database using QGIS
 - Data import to database
 - Loading and edition of data stored in PostGIS