



## QGIS

### Syllabus Agenda

#### Description

QGIS is a powerful open-source Geographic Information System (GIS) tool for creating, editing, analyzing and interpreting data in a geographic context. A vast array of QGIS functionality can be tailored to the specific needs of humanitarian organizations despite the difference in operational profiles. Beyond comprehensive geospatial analysis to support informed decisions, QGIS can visualize data in maps, graphs, and charts to transform complex information into appealing and understandable communication and decision-making material.

This course is designed for entry-level users and will provide a comprehensive overview of the skillset required to start producing maps. During the session, you will learn about the foundations of Geographic Information Systems (GIS), how to import and join data, and how to create different types of maps and select the right visualization style to make meaningful and easy-to-read products. The training is envisioned to be an interactive and practical session with space for participants to ask questions and engage with the exercises.

iMMAP is continuously working on the expansion of the technical materials and at the later stages will offer humanitarian stakeholders trainings for a more advanced understanding of GIS, including geospatial data analysis, modeling and performing complex tasks to automate data integration into geospatial databases.

#### Training goal

Develop the practical skills of the participants to develop simple and easy-to-read maps to improve information sharing among humanitarian partners and facilitate the decision-making process.

#### Training objectives

- Develop a general understanding of GIS.
- Learn about the practical use of maps in humanitarian settings;
- Learn how to use QGIS interface and create a map project file;
- Learn how to operate with map layers and their properties;
- Understand the process of map creation and adding different elements to it.

#### Five things you will learn after the training:

- Differentiate different geographical data types
- Develop map templates for your organization
- Different technics to visualize data in a map



- Transforming information to a geospatial dataset
- Exporting maps into different formats

### Pre-requisites

- QGIS Software (Free)
- Laptop

### Length

4 hours

### Language

Ukrainian

### Location

Kyiv

### Training Agenda

|                      |  |
|----------------------|--|
| <b>10.00 - 10.15</b> | Introduction, Objectives and Setup   |
| <b>10.15 - 11.00</b> | Introduction to Geographic Information System (GIS)  |
| <b>11.00 - 11.15</b> | <b>Coffee Break</b>  |
| <b>11.15 - 12.40</b> | <ul style="list-style-type: none"><li>• Overview of QGIS interface and menu options</li><li>• Adding vector layers</li><li>• Using the attribute table</li><li>• Joining data tables to GIS layers</li><li>• Style and symbolize vector layers</li><li>• Labeling layers features</li><li>• Creating, using and saving styles</li><li>• Simple calculation with -Field Calculator-</li></ul> |
| <b>12.40 - 13.00</b> | <b>Coffee Break</b>  |
| <b>13.00 - 14.00</b> | <ul style="list-style-type: none"><li>• Creating and editing vector data</li><li>• Navigating in the map canvas</li><li>• Preparing maps for printing with the Print Composer</li><li>• Data Filtering and Attribute queries</li><li>• Creating a Bubble Map</li></ul>   |
| <b>14.00 - 14.15</b> | Final Q&A and Closing Remarks  |