# CZECH UNIVERSITY OF LIFE SCIENCES PRAGUE

Department of Applied Geoinformatics and Spatial Planning

Faculty of Environmental Sciences

# **DIPLOMA THESIS ASSIGNMENT**

Josep Carreras Artigas

Land and Water Management

Thesis title

**Osor's Brook Watershed Strategic Plan** 

# **Objectives of thesis**

To perform a geographic analysis of the study area and determine key directions of sustainability improvement.

# Methodology

First, all the relevant available spatial as well as nonspatial data will be collected. Then, the spatial data will be analyzed using GIS. From all data collected, major strengths and weaknesses of the area will be identified using a SWOT analysis. Finally, suggestions for improvements leading to greater sustainability of the area will be made.

### The proposed extent of the thesis

100-120 pages

#### Keywords

Strategic plan, Hydrological system, Water pollution, Ecosystem, GIS, Geographical analysis, Guilleries massif

#### **Recommended information sources**

Chapman D. (1996): Water Quality Assessments – A Guide to Use of Biota, Sediments and Water in Environmental Monitoring. Cambridge University Press.

McKinney D.C., Cai X. (2002): Linking GIS and water resources management models: an object-oriented method. Environmental Modelling & Software 17, p. 413 – 425.

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The Diploma Thesis Supervisor Ing. Vojtěch Barták

Electronic approval: 20. 4. 2015

**Ing. Petra Šímová, Ph.D.** Head of department Electronic approval: 21. 4. 2015 prof. Ing. Petr Sklenička, CSc. Dean

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