

COURSE DESCRIPTION			
University:	University of Prešov in Prešov		
Faculty:	Faculty of Humanities and Natural Sciences		
Code:	Title: Visualization and Cartography with QGIS		
2GAG/EnVACQ/20			
Field of study: 4.1.35. Geography			
Study programme: Geography and Applied Geoinformatics			
Guarantee: prof. Ing. Jozef Vilček, PhD.		Lecturers: Mgr. Jana Michalková, PhD.	
Semester:	Forms of teaching:	Number of credits:	
Summer	Seminars		
	Recommended number of hours: 13		
	Per week: 0/1 Total per study: 0/13		
Prerequisites:-			
Assessment: exam			
Course assessment:			
Final assessment: exam			
Objective:			
The aim of this course is to explore the wide range of data visualization and cartographic options available in the most popular and used a free and open source geographic information system (GIS) called QGIS. QGIS has seen remarkable growth in it's cartographic and visualization capacities in recent years. During the course the students will learn many techniques unique to QGIS 3 such as use of inverted polygon shapeburst fills, blending modes, live layer effects, virtual layers and geometry generator symbol layers. The students will receive a solid overview about layer styling, labeling and advanced map layout (including atlases). They will be able to move their current map creation skills to the next level.			
Course content:			
Introduction to Open GIS. What is new in QGIS 3. Advanced layer styling. Inverted polygon shapeburst fills. Blending modes. Live layer effects. Virtual layers. Geometry generator symbol layers. Advanced labeling. Advanced map layout creation. Atlas generator. Tips and tricks.			
Literature:			
MENKE, K., SMITH Jr., R., et al.: Mastering QGIS – Second Edition. Packt Publishing Limited, 2016.			
GRASER, A.: Learning QGIS – Third Edition. Packt Publishing Limited, 2016.			
NETELER, M., MITASOVA, H.: Open Source GIS: A GRASS GIS Approach. Second Edition. Boston: Kluwer Academic Publisher, 2004.			
LONGLEY, P. A., GOODCHILD, M. F., MAGUIRE, D. J., RHIND, D. W.: Geographic Information Systems and Science. John Wiley a Sons, 2001.			
Language the course is taught in:		Signature of guarantee and date of last edition:	
English		April 2024	