

Course Unit Descriptor

Study Programme: Civil Engineering			
Course Unit Title: Traffic Infrastructure and Environment			
Course Unit Code: M27			
Name of Lecturer(s): Igor Jokanović			
Type and Level of Studies: Master Academic Degree			
Course Status (compulsory/elective): compulsory			
Semester (winter/summer): winter			
Language of instruction: English			
Mode of course unit delivery (face-to-face/distance learning): face-to-face			
Number of ECTS Allocated: 6			
Prerequisites: N/A			
Course Aims: Acquiring basic knowledge about the interaction of traffic infrastructure and the environment. Getting acquainted with the activities and possible measures of protection and improvement of the environment throughout the life cycle of traffic infrastructure. Training for application of acquired knowledge in practice in the planning, design, construction, operation and maintenance of traffic infrastructure.			
Learning Outcomes: Assessment and analysis of impacts, and proposal of mitigation measures during the life cycle of traffic infrastructure.			
Syllabus: <i>Theory</i> Human-traffic infrastructure-environment; Sustainable development; Transport policy and environmental protection; Life cycle of traffic infrastructure; Interaction of traffic infrastructure and environment; Types of impacts (noise, vibrations, air, water, soil, land use, flora and fauna, microclimate, visual pollution, energy and resources, safety, socio-economic impacts, natural heritage, cultural heritage, risks); Indicators of the environmental condition in the area of traffic infrastructure; Environmental impact analysis; Environmental management system; Economic aspects of environmental management. <i>Practice</i> Analysis of sample EIAs and preparation of seminar paper.			
Required Reading: 1. Beara, G., Planiranje, saobraćaj, ekologija, Arkade print, Beograd, 1993. 2. Environmental Principles and Concepts, OECD, Paris, 1995. 3. Tsunokawa, K., Hoban, K., Roads and the Environment, A Handbook, Technical Paper, No. 376, The World Bank, Washington, D.C., 1997. 4. Veljković, M., Put i životna sredina, Priručnik za izradu analiza uticaja, Urbanistički zavod Republike Srpske, Banja Luka, 2000.			
Weekly Contact Hours: 4		Lectures: 2	
Practical work: 2			
Teaching Methods: lectures, exercises, seminar paper, colloquium, consultations			
Knowledge Assessment (maximum of 100 points):			
Pre-exam obligations	points	Final exam	-
Active class participation	5	written exam	-
Seminar paper	25	oral exam	30
Colloquium	40 (20 + 20)		
Seminar(s)			