

Study programmes: Master studies - Informatics				
Course name: R392 - Information Systems				
Lecturers: Saša Malkov and other lecturers at Department of Computer Science				
Status: Optional				
ECTS: 8				
Attendance prerequisites: -				
Course aims: Introducing students to conceptual and practical topics of information systems, IS types, and techniques, methods and methodologies of IS development, including the analysis, design and implementation.				
Course outcome: After completion of the course, the student gained basic theoretical knowledge of information systems and mastered the basic methodologies, techniques and tools for the development of information systems				
Course content:				
<ul style="list-style-type: none"> - The concepts of information systems. Information and IS in contemporary society. Social dimension, functions, structure. - IS Development Methodologies. Types of methodologies. Life cycle, data, processes, people, organization. Structured methodologies and OO methodology. OOAD. RUP. - Information systems development techniques. Process oriented techniques. OO techniques. UML and BPMN diagrams. - Information systems architecture. Service Oriented Architecture (SOA). - Information systems and information security. Privacy of information. Ethical, economic and social consequences of the IS implementation. 				
Literature:				
1. Avison, Fitzgerald, Information Systems Development: Methodologies, Techniques and Tools, 4.ed, McGraw Hill, 2006.				
2. Dennis, Wixom, Roth, Systems Analysis and Design 3.ed., John Wiley & Sons, Inc.				
(The lecturer can choose another relevant current literature)				
Number of hours: 7	Lectures: 2	Tutorials: 3	Laboratory: -	Research: 2
Teaching and learning methods: Frontal lectures, group and individual tutorials and exercises.				
Assessment (maximal 100 points)				
Course assignments	points	Final exam	points	
Lectures	-	Written exam	-	
Exercises / Tutorials	-	Oral exam	-	
Colloquia	25	Written-oral exam	55	
Essay / Project	20 (project)			