1.	Course Title	User interfaces design patterns
2.	Code	F18L2W167
3.	Study program	Software engineering and information systems
4.	Study Program Organizer	Faculty of Computer Science and Engineering
5.	Degree (first, second, third cycle)	first cycle
6.	Academic year / semester 2 / winter / optional	7. ECTS credits 6
8.	Teacher	full professor Suzana Loshkovska, associate professor Ivica Dimitrovski
9.	Course enrollment prerequisites	Објектно-ориентирано програмирање

10.	Course program goals (competencies):
	The purpose of the course is to introduce basic problems of user interfaces and approaches of solving them for different types of user interfaces and user interaction. Upon completion of the course, the student is expected to demonstrate knowledge of the basic principles of effective and efficient user interaction and the principles for their design, and can independently develop interactive applications using programming tools following the learned principles.
11.	Course program content:
	Introduction. User behavior when working with interactive systems, patterns to describe user behavior. Content organization in interactive systems, organizational schemes, structure organization, patterns for organizing and displaying data. Navigation, problems and principles for good navigation. Navigation patterns in interactive systems (navigation models, combining appearance and navigation models, tagging, animated transition). Screen organization, basic concepts (visual hierarchy, visual flow). Techniques for grouping and arranging elements. Gestalt principles. Patterns for organizing screens. Forms and data entry. Principles for designing forms. Types of input data and controls. Patterns for designing forms (relationships between elements, values of elements ...). Actions and commands. Representation and rendering of actions. Commands patterns (display of actions, improvement of action selection, ...). Interaction with data lists. Information architecture. Interaction patterns. Interaction in social media. Principles of communicating with social media, interaction patterns. Interaction in mobile devices, features of the interaction in mobile devices, interaction patterns.
12.	Learning methods:
	Lectures using presentations, interactive lectures, exercises (using equipment and software packages), teamwork, case studies, invited guest lecturers, independent preparation and defense of a project assignment and seminar work.

13.	Total available time	6 ECTS x 30 hours = 180 hours		
14.	Distribution of the available time	30 + 45 + 15 + 15 + 75 = 180 hours		
15.	Teaching activity forms	15.1.	Lectures – theoretical teaching	30 hours
		15.2.	Exercises (laboratory, auditory), seminar papers, teamwork	45 hours
16.	Other activity forms	16.1.	Project Tasks	15 hours
		16.2.	Independent Learning Tasks	15 hours
		16.3.	Home learning	75 hours
17.	Assessment methodology			
	17.1.	Tests		20 points
	17.2.	Seminar paper/project (presentation: written and oral)		0 points
	17.3.	Activity and learning		10 points
	17.4.	Final exam		70 points
18.	Assessment criteria (points/grade)	up to 50 points	5 (five) (F)	
		51 to 60 points	6 (six) (E)	
		61 to 70 points	7 (seven) (D)	
		71 to 80 points	8 (eight) (C)	
		81 to 90 points	9 (nine) (B)	
		91 to 100 points	10 (ten) (A)	
19.	Course completion and final exam requirements	Realized activities 15.1 and 15.2		
20.	Teaching Language	Macedonian and English		
21.	Teaching quality evaluation method	Internal evaluation mechanisms and questionnaires		
22.	Course Material			
	22.1.	Mandatory course material		

No.	Author	Title	Publisher	Year
1	Jenifer Tidwell	Designing Interfaces, (2nd edition)	O'Reilly Media	2010
2	Bill Scott, Theresa Neil	Designing Web: Interfaces Principles and Patterns for Rich Interactions	O'Reilly Media	2009
3	Jesse James Garrett	The Elements of User Experience: User-Centered Design for the Web and Beyond (2nd Edition)	New Riders	2010
4				0

22.2.	Additional course material			
No.	Author	Title	Publisher	Year