



MODULE DESCRIPTION

Module title	Module code
Bachelor Thesis	

Lecturer(s)	Department where the module is delivered
Coordinator: assoc. prof. dr. Kristina Lapin Other lecturers: supervisors of course works	Faculty of Mathematics and Informatics Vilnius University

Cycle	Type of the module
First	Compulsory

Mode of delivery	Semester or period when the module is delivered	Language of instruction
Face-to-face	8 semester	Lithuanian

Prerequisites
Prerequisites: Coursework.

Number of credits allocated	Student's workload	Contact hours	Self-study hours
15	390	14	376

Purpose of the module: programme competences to be developed		
<p>Purpose of the module – to develop the abilities to apply knowledge acquired during studies and to self-uptake of new knowledge of relevant software engineering and applications areas, to carry out independent research or applied work, to formulate consistent and reasoned results and conclusions, using correct language in writing and verbally, within the requirements and in the accordance with the academic ethics; to develop a scientific, critical and creative thinking competencies.</p> <p>Generic competences:</p> <ul style="list-style-type: none"> • Communication and collaboration (<i>GK1</i>). • Life-long learning (<i>GK2</i>). <p>Specific competences:</p> <ul style="list-style-type: none"> • Knowledge and skills of underlying conceptual basis (<i>SK4</i>). • Software development knowledge and skills (<i>SK5</i>). • Technological and methodological knowledge and skills, professional competence (<i>SK6</i>). 		
Learning outcomes of the module: students will be able to	Teaching and learning methods	Assessment methods
Undertake independently literature searches and analysis, and to use data bases and other sources of information.	Consulting, information retrieval, study of literature, preparation and presentation of Bachelor thesis	Bachelor thesis, its presentation and defence, answers to the questions verbally
Acquire independently new knowledge, methodologies, and tools in the area of Bachelor thesis.		
Plan, design and conduct experiments and other appropriate practical investigations, as well as to analyse and interpret data.		
Formulate acceptable and effective problem solutions using appropriate current techniques and models.		
Evaluate the results of studies, determine their reliability and document well them.		
Communicate the results and conclusions consistently, providing the rationale underpinning these, using correct language, in written and oral form within the requirements defined and in accordance with the academic ethics.		

Content: breakdown of the topics	Contact hours						Self-study work: time and assignments		
	Lectures	Tutorials	Seminars	Practice	Laboratory work (LW)	Tutorial during LW	Contact hours	Self-study hours	Assignments
Bachelor thesis in Software Engineering		12					12	366	To analyse the topic, to offer design solutions, to perform other tasks defined for the particular assignment, prepare the project work.
Bachelor thesis presentation and defence.							2	10	To prepare the presentation and be prepared to defend project work.
Total		12					14	376	

Assessment strategy	Weight %	Deadline	Assessment criteria
Bachelor thesis and its defence.	100	During exam session	Defence is allowed when the extended outline of bachelor's thesis is approved by the faculty's Study Office, the thesis is delivered on time and with a supervisor's permission. The thesis must meet the requirements of <i>Regulations of Software Engineering Bachelor Thesis Preparation</i> defined by Software Engineering Study Programme Committee. Thesis is assessed by the Final Thesis Defence Commission. The defence procedure and evaluation criteria are specified in <i>Final Thesis Preparation, Defence and Storage Rules</i> .

Author	Publishing year	Title	Number or volume	Publisher or URL
Required reading				
Vilnius University	2002	Final thesis preparation, defence and storage rules (in Lithuanian).		VU Informacinis biuletenis, 2005-06-23, Nr. 11(340)
VU MIF Software Engineering study committee	2020	Regulations of Software Engineering Bachelor Thesis Preparation (in Lithuanian)		MIF website > Studies > For Bachelors > Software Engineering
VU MIF Software Engineering study committee	2020	A structure of the Software engineering bachelor thesis (in Lithuanian)		MIF website > Studies > For Bachelors > Software Engineering
		<i>Literature on Bachelor thesis topic agreed with the supervisor</i>		
Recommended reading				
VU Faculty of Communication	2012	Guidelines for written works guidance. Educational guidance (in Lithuanian)		http://www.kf.vu.lt/dokumentai/Studiju%20dokumentai/VUKF_meto_diniai_nurodymai_2012-02-13.pdf

M. Berndtsson, J. Hansson, B. Olsson, B. Lundell	2008	Thesis Projects: A Guide for Students in Computer Science and Information Systems	2nd ed.	Cambridge [N.Y.] : Cambridge University Press,
P. S. Jorgensen, L. Rienecker	2003	How to write research work (in Lithuanian)		Aidai, Vilnius
K. Kardelis	2002	Research methodology and methods (in Lithuanian)		Judex, Vilnius