



UNIVERSITAS GADJAH MADA

Faculty of Mathematics and Natural Sciences

Department of Computer Science and Electronics

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Bachelor in Computer Science

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MODULE HANDBOOK

Module name	Frontend and UI/UX Development						
Module level	Undergraduate						
Code	MII-2505						
Courses (if applicable)	UI/UX and UI/UX Development						
Semester	Odd						
Contact person	I Gede Mujiyatna, S.Kom., M.Kom. Anny Kartika Sari., S.Kom., M.Sc., Ph.D.						
Lecturer							
Language	Bahasa Indonesia (regular class), English (IUP class)						
Relation to curriculum	1. Undergraduate degree program, compulsory, 5th semester. 2. International undergraduate program, compulsory, 5th semester.						
Type of teaching, contact hours	1. Undergraduate degree program: lectures, < 60 students, 2. International undergraduate program: lectures, < 30 students.						
Workload	1. Lectures: 3 x 50 = 150 minutes (2 hours 30 menit) per week. 2. Exercises and Assignments: 3 x 60 = 180 minutes (3 hours) per week. 3. Private study: 3 x 60 = 180 minutes (3 hours) per week.						
Credit points	3 credit points (sks).						
Requirements according to the Examination regulations	A student must have attended at least 75% of the lectures to sit in the exams.						
Recommended prerequisites	Algorithms and Data Structures						
Learning outcomes (course outcomes) and their corresponding PLOs	After completing this module, a student is expected to: CO1 Able to						
		PLO	CO1	CO2	CO3	CO4	CO5
	Program	PLO1			√	√	√
	Learning	PLO2	√	√	√		√
	Outcome	PLO3		√	√	√	√
	(PLO)	PLO4			√	√	
		PLO5			√	√	√
Contents	(a) Front-end architecture and full-stack front-end development (b) Front-end frameworks (c) Document object model (d) Web architecture (HTTP) (e) Web components (f) State management (g) Front-end UX (h) UX and human computer interaction						

	<p>(i) User story and user interface (j) UX design elements and processes (k) UX performance and usability (l) Lab: Layout, interactivity, dynamic web, prototyping, UX project</p>																																																	
Study and examination requirements and forms of examination	<p>The evaluation is done in 3 forms, namely:</p> <ol style="list-style-type: none"> 1. Trial, either midterm or semester test, 2. Two tasks, including individual or group assignments to be completed within a certain timeframe, and team project 3. Two quizzes, held on face-to-face, once before midterm exam and once after midterm exam, with a short answer form. <p>Assessment is done using benchmark assessment, with the aim of measuring the level of student understanding related to the target and class rank.</p>																																																	
Media employed	LCD, blackboard, and websites.																																																	
Assessments and Evaluation	<table border="1"> <thead> <tr> <th>Type</th> <th>Percentage</th> <th>CO1</th> <th>CO2</th> <th>CO3</th> <th>CO4</th> <th>CO5</th> </tr> </thead> <tbody> <tr> <td>Quiz</td> <td>15%</td> <td>√</td> <td>√</td> <td></td> <td></td> <td>√</td> </tr> <tr> <td>Individual Task</td> <td>10%</td> <td></td> <td></td> <td>√</td> <td>√</td> <td>√</td> </tr> <tr> <td>Group Task</td> <td>30%</td> <td></td> <td></td> <td>√</td> <td>√</td> <td></td> </tr> <tr> <td>Midterm Exam</td> <td>20%</td> <td>√</td> <td>√</td> <td>√</td> <td>√</td> <td></td> </tr> <tr> <td>Final Exam</td> <td>25%</td> <td></td> <td></td> <td>√</td> <td>√</td> <td>√</td> </tr> <tr> <td>Total</td> <td>100%</td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </tbody> </table>	Type	Percentage	CO1	CO2	CO3	CO4	CO5	Quiz	15%	√	√			√	Individual Task	10%			√	√	√	Group Task	30%			√	√		Midterm Exam	20%	√	√	√	√		Final Exam	25%			√	√	√	Total	100%					
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Reading List	<p>Lidwell, W., et al., Universal Principles of Design: 100 Ways to Enhance Usability, Influence Perception, Increase Appeal, Make Better Design Decisions, and Teach Through Design Norman, D., The Design of Everyday Things Gothelf, J. & Seiden, J., Lean UX: Designing Great Products with Agile Teams Nolasco, F., Professional Front-end Architecture Strazzullo, F., Frameworkless FrontEnd Development</p>																																																	

Created date : June 28, 2022

Revision date : June 28, 2022