

2019.FS

Module Name: Mobile Engineering	
Module Code	w.BA.XX.2MEng.XX
Module Description	This module imparts the basics of software design, development, and validation. Students are introduced to a framework for creating platform-independent mobile applications using web technologies. Using an example, they will get to know a complete tool chain for creating, testing, and deploying applications. Students are thus enabled to implement ideas quickly and in a way that enables their benefits to be demonstrated and examined. This module is held as a block course on three consecutive days (Monday to Wednesday) following the end-of-module exams. See also the important information under "Comments".
Program and Specialization	Business Information Technology
Legal Framework	Academic Regulations BSc dated 29.01.2009, Appendix to the Academic Regulations for the degree programs in Business Administration, Business Information Technology, and Business Law, first adopted on 12.05.2009
Module Category	Module Type: Compulsory Elective
	Program Phase: Main Study Period
ECTS	3
Organizational Unit	W Institut für Wirtschaftsinformatik Ltg
Module Coordinator	Max Meisterhans (meix)
Deputy Module Coordinator	Peter Heinrich (heip)
Prerequisite Knowledge	Basic principles of information technology and programming, in particular web engineering, software engineering, requirements engineering, and information management.
Contribution to Program Learning Goals (Affected by Module)	<ul style="list-style-type: none"> § Professional Competence § Methodological Competence § Social Competence § Self-Competence
Contribution to Program Learning Objectives	<ul style="list-style-type: none"> Professional Competence <ul style="list-style-type: none"> § Knowing and Understanding Content of Theoretical and Practical Relevance § Apply, Analyze, and Synthesize Content of Theoretical and Practical Relevance § Evaluate Content of Theoretical and Practical Relevance Methodological Competence <ul style="list-style-type: none"> § Problem-Solving & Critical Thinking § Scientific Methodology § Work Methods, Techniques, and Procedures § Information Literacy § Creativity & Innovation Social Competence <ul style="list-style-type: none"> § Written Communication § Oral Communication § Teamwork & Conflict Management § Intercultural Insight & Ability to Change Perspective Self-Competence <ul style="list-style-type: none"> § Self-Management & Self-Reflection § Learning & Change
Module Learning Objectives	<p>Students...</p> <ul style="list-style-type: none"> § know and understand the special features of mobile consumer devices and their usage. § know and understand the characteristics of mobile information systems. § know and understand the features of development environments for mobile systems. § are able to use a development environment to develop mobile apps.
Module Content	<ul style="list-style-type: none"> § Toolchain to develop mobile apps § Framework to create platform-independent apps using web technologies § Development of selected topics
Links to other modules	The content of this module is linked to the following modules:
	w.BA.XX.2InfoM-WIN.XX
	w.BA.XX.2REng.XX
	w.BA.XX.2SWEng.XX
	w.BA.XX.2WEng-WIN.XX

Methods of Instruction	§ Lecture § Interactive Instruction § Application Tasks § Exercises § Problem-Oriented Teaching § Project Work	Social Settings Used: Group Work		
Digital Resources	§ Reader § Practice and Application Exercises (with Key)			
Type of Instruction	Classroom Instruction	Guided Self-Study	Autonomous Self-Study	
Large Class	30 h	-		
Small Class	-	-		
Group Instruction	-	-		
Practical Work	-	-		
Seminar	-	-		
Total	30 h	0 h	60 h	
Performance Assessment				
End-of-module exam	Form	Length (min.)	Weighting	
-	-	-	-	
Permitted Resources	-			
Others				
	Assessment	Length (min.)	Weighting	
Project	Grade	-	75,00%	
Talk/oral presentation	Grade	10	25,00%	
Classroom Attendance Requirement	To pass the module, the attendance of all events/classes is compulsory.			
Language of Instruction/Examination	German			
Compulsory Reading	-			
Recommended Reading	-			
Comments	<p>Important information:</p> <ul style="list-style-type: none"> • This module is held as a block course on three consecutive days (Monday to Wednesday) following the end-of-module exams. • In the semester, an introduction to the topic is provided in one double lesson, and students receive an assignment to prepare them for the block course. • Instead of writing an exam, students work in groups of four (max.) following the block course to develop a mobile application, which they also present. The presentation must take the form of a video which must be submitted by the end of the week in which the block course takes place. Students are advised to ensure that they have enough time that week. • Attendance is compulsory on all course days. 			