

Master of Science (M.S.) in Computer Sciences and Engineering						
Course Group	total ECTS	Course Code	Course name	Course type	ECTS	Pre-requisite
Breadth 1 Theory and Algorithms		CS 502	Computational Complexity	elective	6	
		CS 521	Modern Cryptography	elective	6	
		CS 524	Analysis of Numerical Algorithms	elective	6	
		CS 526	Advanced Algorithms and Data Structures	elective	6	
Breadth 2 Architecture, Systems and Software		CS 504	Advanced Software Engineering	elective	6	
		CS 506	Advanced Operating Systems	elective	6	
		CS 508	Database Management Systems	elective	6	
		CS 509	Advanced Computer Architecture	elective	6	
		CS 510	Data Communications and Computer Networks	elective	6	
Breadth 3 Applications		CS 511	Advanced Artificial Intelligence	elective	6	
		CS 514	Computer Vision	elective	6	
		CS 515	Advanced Computer Graphics	elective	6	
		CS 516	User Interface Design, Implementation and Evaluation	elective	6	
		CS 517	Analysis and Design of Online Communities	elective	6	
		CS 519	Social Network Analysis	elective	6	
		CS 520	Advanced Internet Programming	elective	6	
		CS 525	Advanced Data Mining	elective	6	
		CS 530	High Dynamic Range (HDR) Imaging	elective	6	
		CS 590	Master Thesis	elective	24	
total	60					
Graduate Studies: summary of conditions for successful completion of studies						
Category	ECTS	Note:				
Courses	36	<p>Students are expected to:</p> <ol style="list-style-type: none"> 1. Complete courses, that total 36 ECTS credits 2. Write and defend the completed master's thesis, which totals 24 ECTS credits. <p>With previous approval decision from program coordinator, students may take a maximum of 12 ECTS credits (corresponding to 2 courses) from a pool of undergraduate courses from 400 level. Students are also allowed to apply 12 ECTS (2 courses) from other related, Master or PhD programs, with the approval decision from the program coordinator.</p> <p>Students must successfully complete at least one course in two out of three different breadth areas defined in the table above. Students may also select their coursework from the wider variety of courses offered at PhD level.</p>				
Master Thesis	24					
Total	60					