

[Name of the Certificate]
 "Cyber Informatics"

[Requirements for Acquiring a CI Program Certificate]

Students must earn 30 or more credits from the list below.

	Subject name	Minimum number of credits
Program Courses, Research Concept and Methodology Courses	History and Future Possibility of the Internet	At least 12 credits
	Design and Implementation of System Software	
	Software Development Methodology	
	Multimedia Knowledge Base Design and Implementation	
	Information Security -Theory and Practice	
	Ubiquitous Computing Systems	
	Object-Oriented Analysis	
	Knowledge Discovery Methods	
	Autonomous Decentralized Cooperative Systems	
	Conceptual Framework (CI)	
	Advanced Research (CI)	
	Internet Security Architecture,	
	Topics in Advanced Information Technology Specialist Program 1	
	Topics in Advanced Information Technology Specialist Program 2	
	System Simulation	
	Advanced Parallel Processing	
	Web Intelligence	
	Topics in Computer Operating Systems	
	Advanced Course In Database Systems Design	
	Operation and Management Of Network Systems A	
	Design of Physically Grounded Communication System	
	Special Lecture 1 (Operating Systems)	
	Systems Performance Evaluation	
	Information and Semantics	
	Theory of Computer Software	
	Software Engineering 1	
	Software Engineering 2	
	Software Engineering 3	
	Advanced Course on Natural Language Processing	
	Software Development Engineering	
	Advanced Course on Network Engineering	
	Information Security Management System B	
	Advanced Course on Computer Graphics	
Open Source Systems		
ITSP Internship		
Modern Web Platform Technologies		
Advanced Natural Language Processing		
Human Interface		
Parallel and Distributed Computing Systems		
Advanced Computer Architecture		
Human Computer Interaction Design		
Future Internet Technology : Architecture and Building Blocks		
Open Data and Management Organization		
Environmental Information System Architecture		
Cybersecurity Case Study		
Software Security		
Network Security		
Cryptography and Data Security		
Project Courses, Master Research	< Academic Projects in which the leader is a faculty member of the CI Program. (1) > < Master Seminar in CI Program >	At least 8 credits
Master Thesis	Master Thesis1(1)	2 credits
	Master Thesis2(1)	

[Project Courses Related to the Program]

Novel Computing: AI and Brain Science
Creation of Smart City
Software System
HCI Remixed
Internet Technology
Internet Civilization
Creating Shared Value in Practice
Mathematics for AI