Content

Course Code	Course Name	Semester	Theory	Practice	Lab	Credit	ECTS
INF114	Algorithms and Advanced	2	3	0	2	4	5
	Programming						

Prerequisites	
Admission Requirements	

Language of Instruction	French
Course Type	Compulsory
Course Level	Bachelor Degree
Objective	In this course, the fundamental concepts covered in the first class course "Introduction to Programming" are consolidated. Particularly the topics of pointers, dynamic memory allocation and management, file operations, introduction to algorithm analysis and introduction to data structures are elaborated. In the course practice (laboratory) C programming language and the Linux operating system are used.
Content	 Introduction and Reminders Advanced Variable Types C Preprocessor, Libraries Pointers Dynamic Memory Management Pointers, Arrays and Functions String Operations Introduction to Data Structures Advanced Data Structures Algorithm Analysis
References	 Course slides and notes Reference Books 21st Century C, Ben Klemens, O'Reilly Media, 978-1-449-32714-9, 2013 Understanding and Using C Pointers, Richard Reese, O'Reilly Media, 978-1-449-34418-4, 2013

Theory Topics

Week	Weekly Contents		
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