

Content

Course Code	Course Name	Semester	Theory	Practice	Lab	Credit	ECTS
INF402	Introduction to the Internet of Things	7	2	0	2	3	3
Prerequisites							
Admission Requirements							
Language of Instruction	French						
Course Type	Compulsory						
Course Level	Bachelor Degree						
Objective	1. Managing and analyzing data produced by IoT systems 2. architecture of embedded processors and how to design and build them 3. design and optimization of wireless communication systems using machine learning techniques 4. modern cryptography applications 5. signal processing and computer vision						
Content	Fundamentals of Embedded IoT Systems Embedded Computing Methods IoT Networks Research Methods and Project Preparation IoT Device Management Secure Hardware and Embedded Devices Embedded Processors Sensor Fusion Technique IoT Applications in Industry Sensor Based Health Applications Smart Agriculture Applications Applied Internet of Things - Internet of Vehicles and Applications Embedded Machine Learning Algorithms						
References							

Theory Topics

Week	Weekly Contents
1	Fundamentals of Embedded IoT Systems
2	Embedded Computing Methods
3	IoT Networks
4	Research Methods and Project Preparation
5	IoT Device Management
6	Secure Hardware and Embedded Devices
7	Embedded Processors
8	Design
9	Sensor Fusion Technique
10	IoT Applications in Industry
11	Sensor Based Health Applications
12	Smart Agriculture Applications
13	Applied Internet of Things - Internet of Vehicles and Applications
14	Embedded Machine Learning Algorithms