

VIII. Study Plan

Course Name	Course Number	Hours	Type (Theory/ Lab/ Practice)	Prerequisite Course
1 st year 1 st semester				
Communications Skills	1800012 (equiv. 0700301)	2	Theory	-
Low-Intermediate English	1800002	2	Theory	-
Mathematics for IT	1820113	2	Theory	-
Introduction to Computer Science	1820101	2	Theory	-
Introduction to Computer Science Lab	1820111	1	Lab	-
Fundamentals of Programming	1820102	2	Theory	
Fundamentals of Programming Lab	1820112	1	Lab	
Practical Period I	1820190	5	Practice	-
Total Hours: 17				

1 st year 2 nd semester				
Object Oriented Programming	1820205	2	Theory + Lab	1820102 Fundamentals of Programming
Intermediate English	1800003	2	Theory	1800002 Low-Intermediate English
Linear Algebra for IT	1820142	2	Theory	1820113 Mathematics for IT
Data Structures and Algorithms I	1820203	3	Theory	1820102 Fundamentals of Programming
Data Structures and Algorithms I Lab	1820213	1	Lab	1820102 Fundamentals of Programming
Web-Engineering	1820162	2	Theory + Lab	1820102 Fundamentals of Programming
Practical Period II	1820191	5	Practice	1820190 Practical Period I
Total Hours: 17				
2 nd year 1 st semester				

Upper-Intermediate English	1800004	2	Theory	1800003 Intermediate English
Data Structures and Algorithms II	1820208	2	Theory	1820203 Data Structures and Algorithms I
Data Structures and Algorithms II Lab	1820218	1	Lab	1820203 Data Structures and Algorithms I
Operating Systems	1820210	2	Theory	1820101 Introduction to Computer Science
Operating Systems Lab	1820220	1	Lab	1820101 Introduction to Computer Science
Software Engineering	1820109	2	Theory	1820102 Fundamentals of Programming
Software Engineering Lab	1820119	1	Lab	1820102 Fundamentals of Programming
Project Management	1820211	2	Theory	1820101 Introduction to Computer Science
Practical Period III	1820290	5	Practice	1820191 Practical Period II
Total Hours: 18				

2nd year 2nd semester				
University Requirements I		2	Theory	-
Mathematics for Data Sciences	1820201	2	Theory	1820113 Mathematics for IT
Automata Theory and Compilers	1820216	2	Theory	1820142 Linear Algebra for IT
Database I	1820303	2	Theory	1820109 Software Engineering
Database I Lab	1820333	1	Lab	1820109 Software Engineering
Introduction to Networks	1820281	2	Theory	1820210 Operating Systems
Introduction to Networks Lab	1820282	1	Lab	1820210 Operating Systems
Practical Period IV	1820291	5	Practice	1820290 Practical Period III
Total Hours: 17				

3rd year 1st semester				
Computer Organization & Assembly	1820311	2	Theory	1820102 Fundamentals of Programming
Computer Organization & Assembly Lab	1820341	1	Lab	1820102 Fundamentals of Programming
Distributed and Cloud Computing	1820312	2	Theory	1820281 Introduction to Networks
Distributed and Cloud Computing lab	1820322	1	Lab	1820281 Introduction to Networks
Data Security & Data Privacy	1820313	2	Theory	1820281 Introduction to Networks
Data Security Lab	1820323	1	Lab	1820281 Introduction to Networks
Mobile Computing	1820314	2	Theory	1820162 Web-Engineering
Mobile Computing Lab	1820324	1	Lab	1820162 Web-Engineering
Practical Period V	1820390	5	Practice	1820291 Practical Period IV
Total Hours: 17				

3 rd year 2 nd semester				
Artificial Intelligence	1820321	2	Theory	1820208 Data Structures and Algorithms II
Artificial Intelligence lab	1820331	1	Lab	1820208 Data Structures and Algorithms II
Database II	1820307	2	Theory	1820303 Database I
Database II Lab	1820317	1	Lab	1820303 Database I
Introduction to Research Methods	1820206	1	Theory	1820201 Mathematics for Data Sciences
University Requirements II	180007x	2	Theory	-
Basic of Business Administration	1800001	2	Theory	-
Advanced English	1800010	2	Theory	1800004 Upper-Intermediate English
Practical Period VI	1820391	5	Practice	1820390 Practical Period V
Total Hours: 17				

4 th year 1 st semester				
Human Computer Interaction	1820411	2	Theory	1820102 Fundamentals of Programming
Human Computer Interaction Lab	1820421	1	Lab	1820102 Fundamentals of Programming
Machine Learning & Data Mining	1820412	3	Theory	1820307 Database II
Machine Learning & Data Mining lab	1820422	1	Lab	1820307 Database II
University Requirement III	180007x	2	Theory	-
Intro. to Graduation Project I	1820480	3	Theory	1820206 Introduction to Research Methods
Practical Period. VII = Graduation Project I	1820490	5	Practice	1820391 Practical Period VI
Total Hours: 17				

4 th year 2 th semester				
Advanced Software Engineering	1820461	2	Theory	1820109 Software Engineering
Advanced Software Engineering lab	1820471	1	Lab	1820109 Software Engineering
Entrepreneurship	1800011	2	Theory	-
Special Topics	1820407	3	Theory	It depends on the topic
Elective Course	1820XXX	3	Theory	It depends on the topic
Intro. to Graduation Project II	1820481	3	Theory	1820480 Intro. To Graduation Project I
Practical Period. VIII = Graduation Project II	1820491	5	Practice	1820490 Practical Period VII
Total Hours: 19				

Table 10: Study Plan