

Courses ECTS List

Below is the list of courses studied during 4 year Bachelors program. The courses are categorized into Computer science and Mathematical courses with their credit hours listed along with corresponding ECTS values based on the formula:

1 Academic Year = 60 ECTS

$$\text{ECTS}_{\text{Course}} = \text{CP}_{\text{course}} \times (60 \times \text{years of degree}) / (\text{Total credit hours of degree})$$

Given that, my 4 year Bachelors in Computer Science degree has 130 credit hours or 240 ECTS.

Computer Science Courses & ECTS Conversion:

Course Title	Credit Hours	ECTS Equivalent
Programming Fundaments	3	6
Programming Fundaments - Lab	1	2
Intro to Info and Comm technologies	1	2
Object Oriented Programming	3	6
Objected Oriented Programming - Lab	1	2
Data Structures	3	6
Data Structures - Lab	1	2
Theory of Automata	3	6
Advanced Programming	3	6
Operating Systems	3	6
Operating Systems – Lab	1	2
Numerical Computing	3	6
Computer Networks	3	6
Computer Networks – Lab	1	2
Software Design & Analysis	3	6
Artificial Intelligence	3	6
Artificial Intelligence – Lab	1	2
Database Systems	3	6
Database Systems – Lab	1	2
Design Analysis of Algorithms	3	6
Software Engineering	3	6

Web Programming	3	6
Parallel and Distributed Computing	3	6
Professional Practices in IT	3	6
Cloud Computing	3	6
Information Security	3	6
DevOps	3	6
Final Year Project – 1	3	6
Final Year Project - 2	3	6

Total ECTS for Computer/IT courses = **142 ECTS**

Mathematics / Statistics Courses & ECTS Conversion:

Course Title	Credit Hours	ECTS Equivalent
Calculus and Analytical Geometry	3	6
Differential Equations (Call II)	3	6
Linear Algebra	3	6
Probability and Statistics	3	6
Discrete Structures	3	6

Total ECTS for Mathematics/Stats courses = **30 ECTS**

Computer Architecture / Hardware Systems Courses & ECTS Conversion:

Course Title	Credit Hours	ECTS Equivalent
Digital Logic Design	3	6
Digital Logic Design - Lab	1	2
Comp Organization & Assembly Lang	3	6
Comp Organization & Assembly Lang-Lab	1	2

Total ECTS for Computer Architecture courses = **16 ECTS**