

Curriculum Bachelor Computing Science 2016-2017 (draft version 15-02-16, subject to change!)

The Computing Science Bachelor's programme (180 ECTS) is outlined in Table 1. The specialization (track) in Business Computing (Table 2) is only available for students who started in 2015–2016 or earlier. All course units have a student workload of 5 ECTS, unless indicated otherwise.

Table 1: **Bachelor programme**

Year	Semester	Course	Course code
1	Ia	Imperative Programming	INBIMP-09
1	Ia	Introduction to Computing Science	INBOI-08
1	Ia	Introduction to Logic (CS & MA)	WPAI14002
1	Ib	Calculus for Computing Science	WPMA14001
1	Ib	Discrete Structures	INBDS-08
1	Ib	Computer Architecture	WBCS14002
1	IIa	Algorithms and Data structures in C	INBADC-09
1	IIa	Introduction to Scientific Computing	WBCS14003
1	IIa	Program Correctness	INBPC-08
1	IIb	Artificial Intelligence 1	KIB.KI103
1	IIb	Linear Algebra & Multivariable Calculus for AI&CS	WPMA14005
1	IIb	Object-Oriented Programming	INBOGP-08
2	Ia	Advanced Object Oriented Programming	INBGOP-09
2	Ia	Functional Programming	INBFP-08
2	Ia	Statistics for AI and CS	WISTAKI-07
2	Ib	Introduction to Information Systems	INBIIS-08
2	Ib	Signals and Systems	KIB.SENS12
2	Ib	Software Analysis and Design	INBSASO-09
2	IIa	Advanced Algorithms and Data Structures	INBGAD-10
2	IIa	Computing Science: Ethical and Professional Issues	WBCS14001
2	IIa	Software Engineering I	INBSE1-08
2	IIb	Languages and Machines	INBTA-08
2	IIb	Parallel Computing	INBPAR-08
2	IIb	Software Engineering II	INBSE2-08
3	Ia and Ib	Minor (30 ECTS, content determined by the student) <i>Optional course units offered by Computing Science that may be used to fill (part of) the minor:</i>	
3	Ia	Information Security	INBSEC-08
3	Ia	Introduction to Intelligent Systems	INBINTS-08
3	Ia	Requirements Engineering and Software Startups	WBCS15001
3	Ib	Compiler Construction	INBVB-08
3	Ib	Software Quality Assurance & Testing	INBSQT-08
3	Ib	Short programming project	WBCS15002
3	IIa	Operating Systems	INBOS-08
3	IIa	Computer Graphics	INBCG-08
3	IIa	Net Computing	INBNC-08
3	IIb	Bachelor's project (15 ECTS)	WBCS13000

Table 2: **Business Computing track**

Only for students who started in 2015-2016 or earlier!

Courses printed in bold indicate the track-specific courses. These are different from the regular Computing Science programme.

Year 1 is identical to the regular Bachelor programme.

Year	Semester	Course	Course code
2	Ia	Advanced Object Oriented Programming	INBGOP-09
2	Ia	Functional Programming	INBFP-08
2	Ia	Statistics for AI and CS	WISTAKI-07
2	Ib	Introduction to Information Systems	KIB.SENS12
2	Ib	Signals and Systems	INBIIS-08
2	Ib	Software Analysis and Design	INBSASO-09
2	IIa	Advanced Algorithms and Data Structures	INBGAD-10
2	IIa	Marketing for E&BE	EBP033A05
2	IIa	Software Engineering I	INBSE1-08
2	IIb	Management of Product Innovation	EBB652B05
2	IIb	Parallel Computing	INBPAR-08
2	IIb	Software Engineering II	INBSE2-08
3	Ia and Ib	Minor (30 ECTS, content determined by the student) <i>Optional course units offered by Computing Science that may be used to fill (part of) the minor:</i>	
3	Ia	<i>Information Security</i>	<i>INBSEC-08</i>
3	Ia	<i>Introduction to Intelligent Systems</i>	<i>INBINTS-08</i>
3	Ia	<i>Requirements Engineering and Software Startups</i>	<i>WBCS15001</i>
3	Ib	<i>Compiler Construction</i>	<i>INBVB-08</i>
3	Ib	<i>Software Quality Assurance & Testing</i>	<i>INBSQT-08</i>
3	Ib	<i>Short programming project</i>	<i>WBCS15002</i>
3	IIa	Operating Systems	INBVB-08
3	IIa	International Business & Supply Chain Marketing	EBB609B05
3	IIa	Net Computing	INBNC-08
3	IIb	Bachelor's project in Business Computing (15 ECTS)	WBCS13000