

# Computer Engineering, B Sc in Engineering

180 credits

Högskoleingenjör i datateknik

6IDAT

Valid from: 2016 Autumn semester

**Determined by** 

Board of Studies for Computer Science and Media Technology

**Date determined** 2016-01-19

## **Entry requirements**

Degree in Swedish Högskoleingenjör och Teknologie kandidat, 180 hp



### Curriculum

### Semester 2 (Spring 2017)

Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TAIU05	Linear Algebra	6	G1X	4	С
TDIU20	Object Oriented Programming	4	G1X	1	С
TSIU51	Project with Microcontroller	8*	G1X	3	С
TGTU35	Introduction to University Studies	2*	G1X	-	V
Period 2					
TADI03	Discrete Mathematics	4	G1X	2	С
TDDI22	Object Oriented Problem Solving	8	G1X	3	С
TSIU51	Project with Microcontroller	8*	G1X	-	С
TGTU35	Introduction to University Studies	2*	G1X	-	V

#### Semester 3 (Autumn 2017)

Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDDI02	Program Development Project	6*	G1X	1	С
TDDI16	Data Structures and Algorithms	6	G1X	3	С
TSIU03	System Design	8	G2X	4	С
Period 2					
TDDI02	Program Development Project	6*	G1X	1	С
TDDI03	Advanced Computer Architecture	4	G2X	4	С
TEAE01	Industrial Economics, Basic Course	6	G1X	2	С



### Semester 4 (Spring 2018)

Specialisation: Embedded Systems

Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDIU11	Operating Systems	6	G2X	3	С
TDTS04	Computer Networks and Distributed Systems	8	G2X	2	С
TAMS11	Probability and Statistics, first course	6	G2X	1	Е
TEIE88	Computer Law	4	G1X	1	E
TGTU01	Technology and Ethics	6	G1X	1	E
Period 2					
TDDI11	Embedded Software	6	G2X	2	С
TAIU06	Mathematical Statistics	6	G1X	4	E
TDDD12	Database Technology	6	G2X	4	E
TDIU16	Concurrent and Operating Systems Programming	4	G2X	3	E
TEAE13	Civil and Commercial Law	6	G1X	2	E
THIU01	English	4	G1X	1	E
TPTE06	Industrial Placement	6	G1X	-	Е
TSEI11	Circuit Theory and Transform Methods	10	G1X	2	E
TSRT04	Introduction in Matlab	2	G1X	1	E



#### Specialisation: Software Engineering

Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDIU11	Operating Systems	6	G2X	3	С
TDTS04	Computer Networks and Distributed Systems	8	G2X	2	С
TAMS11	Probability and Statistics, first course	6	G2X	1	E
TEIE88	Computer Law	4	G1X	1	E
TGTU01	Technology and Ethics	6	G1X	1	E
Period 2					
TDDD12	Database Technology	6	G2X	4	С
TDIU16	Concurrent and Operating Systems Programming	4	G2X	3	С
TAIU06	Mathematical Statistics	6	G1X	4	E
TDDI11	Embedded Software	6	G2X	2	E
TEAE13	Civil and Commercial Law	6	G1X	2	E
THIU01	English	4	G1X	1	E
TPTE06	Industrial Placement	6	G1X	-	E
TSEI11	Circuit Theory and Transform Methods	10	G1X	2	E
TSRT04	Introduction in Matlab	2	G1X	1	E

### Semester 5 (Autumn 2018)

Specialisation: Embedded Systems



Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDDI41	Introduction to System Administration	8*	G1X	1	С
TADI02	Numerical Algorithms	6	G2X	2	Е
TAIU08	Calculus in Several Variables	6	G1X	3	E
TDDD23	Design and Programming of Computer Games	6	A1X	2	Е
TDDD38	Advanced Programming in C++	6*	A1X	2	E
TSEA29	Microcomputer, Project Laboratory	8*	G2X	3	Е
TSIU61	Automatic Control	6	G1X	2	E
Period 2					
TDDI07	Distributed Embedded Software and Networks	4	G2X	1	С
TDDI41	Introduction to System Administration	8*	G1X	2	С
TSIT01	Computer Security	4	G2X	3	С
TAMS11	Probability and Statistics, first course	6	G2X	4	E
TDDD38	Advanced Programming in C++	6*	A1X	-	Е
TDDD49	Programming in C# and .NET Framework	4	G2X	3	Е
TEIO29	Leadership and Organisation	6	G1X	4	E
TFMT13	Measurement Technology	4	G1X	1	E
TSEA29	Microcomputer, Project Laboratory	8*	G2X	-	E
TSEI01	Analog Electronic Circuits	8	G1X	3	Е

 $Specialisation: Software\ Engineering$ 



Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDDI41	Introduction to System Administration	8*	G1X	1	С
TADI02	Numerical Algorithms	6	G2X	2	E
TAIU08	Calculus in Several Variables	6	G1X	3	E
TDDB84	Design Patterns	6	A1X	4	E
TDDC17	Artificial Intelligence	6	G2X	3	E
TDDD23	Design and Programming of Computer Games	6	A1X	2	Е
TDDD38	Advanced Programming in C++	6*	A1X	2	E
TSEA29	Microcomputer, Project Laboratory	8*	G2X	3	Е
TSIU61	Automatic Control	6	G1X	2	E
Period 2					
TDDI41	Introduction to System Administration	8*	G1X	2	С
TSIT01	Computer Security	4	G2X	3	С
TAMS11	Probability and Statistics, first course	6	G2X	4	Е
TDDD38	Advanced Programming in C++	6*	A1X	-	E
TDDD49	Programming in C# and .NET Framework	4	G2X	3	E
TDDD55	Compilers and Interpreters	4	G2X	1	Е
TEIO29	Leadership and Organisation	6	G1X	4	E
TFMT13	Measurement Technology	4	G1X	1	E
TSEA29	Microcomputer, Project Laboratory	8*	G2X	-	E



#### Semester 6 (Spring 2019)

Specialisation: Embedded Systems

Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDDD50	Green Computing	4	G2X	4	С
TDDI08	Embedded Systems Design	4	G2X	1	С
TDIU14	Introduction to Bachelor Thesis	4	G2X	2	С
TDDD97	Web Programming	6	G2X	3	E
TEIE88	Computer Law	4	G1X	1	Е
TSIU04	Automatic Control, Advanced Course	4	G2X	4	E
Period 2	·				
TQXX11	Degree project - Bachelor's Thesis	16	G2X	-	С

Specialisation: Software Engineering

Course code	Course name	Credits	Level	Timetable module	ECV
Period 1					
TDDD50	Green Computing	4	G2X	4	С
TDDD97	Web Programming	6	G2X	3	С
TDIU14	Introduction to Bachelor Thesis	4	G2X	2	С
TSIU04	Automatic Control, Advanced Course	4	G2X	4	E
Period 2					
TQXX11	Degree project - Bachelor's Thesis	16	G2X	-	С

ECV = Elective / Compulsory / Voluntary



<sup>\*</sup>The course is divided into several semesters and/or periods