Transilvania University of Braşov, Romania

Study program: Computers

Faculty	Faculty of Electrical Engineering and Computer Science
Study program	Computers
Study period	4 years (bachelor)
Academic year structure	2 semesters (14 weeks per semester)
Examination sessions (two)	winter session (January/February)
	summer session (June/July)

Courses per years (C= course; S = seminar; L = laboratory; P = project)

1st Year

No. crt.	Course	1st Semester					2nd Semester				
		C	S	L	P	Cred	C	S	L	P	Cred
01	Ethics and Academic Integrity	1	2	-	-	4					
02	Mathematical Analysis	3	2	-	-	5					
03	Linear Algebra, Analytic and Differential Geometry	3	2	-	-	5					
04	Computers Programming and Programming Languages I	2	-	2	1	5					
05	Computer-Aided Graphics	1	-	2	-	4					
06	Applied Informatics I	1	-	2	-	4					
07	English Language I	1	1	-	-	2					
08	Physical Training I	-	1	-	-	1					
09	Special Mathematics						3	2	-	-	5
10	Electrical Engineering						2	3	-	-	5
11	Probability Theory and Mathematical Statistics						2	2	-	-	4
12	Physics						3	1	1	-	5
13	Computer Programming and Programming Languages II						2	-	2	0	5
14	Computer Programming and Programming Languages Project						-	-	-	2	3
15	English Language. II						1	1	-	-	2
16	Physical Training II						-	1	-	-	1

2nd Year

No. crt.	Course	3rd Semester					4th Semester				
		C	S	L	P	Cred	C	S	L	P	Cred
01	Systems Theory	3	2	-	-	6					
02	Electronic Measurements, Sensors and Transducers	1	-	3	-	5					
03	Electronic Devices and Analog Electronics	2	-	2	-	5					
04	Data Structures and Algorithms	2	-	3	-	6					
05	Signal Processing	3	-	2	-	6					
06	English Language III	1	1	-	-	2					
07	Physical Training III	-	1	-	-	1					
08	Digital Electronics						4	-	2	2	6
09	Computer Graphics Fundamentals						2	-	2	-	5
10	Communication Protocols						2	-	2	-	4
11	Algorithm Design						2	-	2	-	5

12	User Interface Design						2	-	2	-	4
	Multimedia Systems										
	Web Programming										
13	English Language IV						1	1	-	-	2
14	Physical Training IV						-	1	-	-	1
15	Domain-Specific Internship						90 hours				4

3th Year

No. crt.	Course	5th Semester					6th Semester				
		C	S	L	P	Cred	C	S	L	P	Cred
01	Microprocessors and Assembly Languages	4	2	2	-	7					
02	Databases	3	-	2	-	6					
03	Artificial Intelligence	3	-	2	-	6					
04	Virtual Instrumentation	2	-	2	-	6					
	Data Acquisition and Processing										
05	Computer-Aided Design of Electronic Modules	2	-	2	-	5					
	Intelligent Systems										
06	Logic and Functional Programming						3	-	2	-	4
07	Formal Languages and Translators						2	-	2	-	4
08	Hardware Description Languages						1	-	2	1	4
09	Computer Organization and Architecture						3	-	2	2	5
10	Operating Systems						2	-	2	-	4
11	Software Development Tools						2	-	2	-	5
	Sensor Networks										
12	Specialized Internship						90 hours				4

4th Year

No. crt.	Course	7 th Semester					8th Semester				
		C	S	L	P	Cred	C	S	L	P	Cred
01	Embedded Systems	3	-	2	1	7					
02	I/O Systems and Peripherals	4	-	2	-	7					
03	Computer Networks	2	-	2	-	5					
04	Computer Architecture and Organization Project	-	-	-	2	3					
05	Image Processing	2	-	2	-	4					
06	Communication Protocols										
07	Software Engineering	2	-	2	-	4					
08	Parallel and Distributed Algorithms										
09	VLSI Design						3	-	2	-	4
10	Testing Computer Systems						2	-	2	-	4
11	Communication Systems						2	-	2	-	4
12	Mobile Computing						2	-	2	-	4
13	Data Security										
14	Human Machine Interface						2	-	2	-	4
15	Scripting Languages										
16	General Economy						2	1	-	-	2
17	Elaboration of Diploma Project						-	-	-	2	4
18	Practical Activity for Diploma Work						60 hours				4