

CS112 (LFA) - Spring 2022

February 15, 2022

1 Course Information

- **Instructor:** Dumitru Bogdan (bogdan.dumitru1@unibuc.ro)
- **TA Seminars:** Cheval Horațiu (horatiu.cheval@unibuc.ro)
- **TA Labs:** Ionut Dobos (ionut-daniel.dobos@unibuc.ro)
- **Lectures:** Hybrid
- **Seminars:** On site
- **Labs:** Hybrid
- **Final Exam:** Online
- **Required Textbook:** Introduction to the Theory of Computation, Third Edition by Michael Sipser

2 Lectures

1. Corresponding to Sipser 0.* (Introduction, Math Review)
2. Corresponding to Sipser 1.1 (Finite Automata)
3. Corresponding to Sipser 1.2 (Nondeterminism)
4. Corresponding to Sipser 1.2 (Nondeterminism)
5. Corresponding to Sipser 1.3 (Regular Expressions)
6. Corresponding to Sipser 1.4 (Nonregular Languages)

7. Corresponding to Sipser 2.1 (Context-Free Grammars)
8. Corresponding to Sipser 2.2 (Push Down Automata)
9. Corresponding to Sipser 2.3 (Non-Context-Free Languages)
10. Corresponding to Sipser 3.1 (Turing Machines)
11. Corresponding to Sipser 3.2 (Variants of TMs)
12. Corresponding to Sipser 4.1 (Decidable Languages)
13. Corresponding to Sipser 4.2 (Diagonalization)
14. Corresponding to Sipser 4.2 (The Halting Problem)

3 Grading

The following components will contribute the indicated points to your grade:

1. Lab homework - 30 points
2. Seminar activity - 30 points
3. Final Exam - 90 points

Note 1. To get a 10 you need 100 points, for a 5 you need 50 points.

4 Academic Honesty

Students are allowed to discuss homework problems amongst themselves, but each student must hand in his or her own solution and should not directly copy the work of another student. No collaboration is allowed on exams. Additionally, you should not use any external resource to aid you in completing the homework. For example, it is unacceptable to search for homework answers on Google. If, in the course of studying, you happen to see some material that aids you in solving a homework problem, you should clearly acknowledge the source and how you benefited from it on your homework. Any student caught cheating on the homework or exams will be given a failing grade for the class.