

Course Information

General

This course counts for 3 credits. Students outside computer science should consult the instructor beforehand.

Lecture meeting times

Tuesdays and Thursdays, 11:00–12:15, in Centennial 1041 (Larrañaga Engineering Auditorium).

Teaching staff

Instructor: Darko Stefanovic: office hours Tuesdays and Thursdays 12:15–1:00 (FEC 2020), and Wednesdays 1:00–2:00 (online).

Teaching assistant: Jeb Kilfoyle: office hours Wednesdays 3:00–5:00 and Saturdays 2:00–3:00.

Teaching assistant: Aksel Ozer: office hours Mondays 2:00–3:00, Fridays 1:00–3:00, and Sundays 6:00–8:00.

Course format

The course will consist of lectures, written homework assignments, programming assignments, and written exams. There will be 6–8 written homework assignments to consolidate lecture material. There will be 2–3 programming assignments. There will be two midterm exams and a final exam (covering the entire course). All work in this course will be carried out individually.

Textbook

Thomas H. Cormen, Charles E. Leiserson, Ronald L. Rivest and Clifford Stein, *Introduction to Algorithms*, 4th Edition, 2022, MIT Press.

Course topics

The course covers introductory topics in algorithm design, such as:

1. Asymptotic complexity notation
2. Recurrence relations

3. Array sorting
4. Heaps
5. Binary search trees
6. Balanced binary search trees
7. Graph data structures
8. Graph traversal

Grading

You are expected to attend class regularly, read the assigned reading before class, and participate in class discussion. The grade will be determined as follows: written assignments 40%; programming assignments 10%; each midterm exam 15%; final exam 20%. Final letter grades will be assigned according to this table:

A+	98–100
A	85–98
B	68–85
C	51–68
D	34–51
F	0–34

Assignment late hand-in policy

Late assignments will be penalized $3n^3\%$, where n is the number of days late.

Software

The course will have a page in Canvas, the newly adopted “learning management system” at UNM, for essential announcements. In addition, we will use other, specialized tools.

UNM statement of compliance with ADA

Every instructor should include an official statement in their course syllabus. The suggested syllabus statement should include the following text:

“In accordance with University Policy 2310 and the Americans with Disabilities Act (ADA), academic accommodations may be made for any student who notifies the instructor of the need for an accommodation. It is imperative that you take the initiative to bring such needs to the instructor’s attention, as I am not legally permitted to inquire. Students who may require assistance in emergency evacuations should contact the instructor as to the most appropriate procedures to follow. Contact Accessibility Resource Center at 277-3506 for additional information.

If you need an accommodation based on how course requirement[s] interact with the impact of a disability, you should contact me to arrange an appointment as soon as possible. At the appointment we can discuss the course format and requirements, anticipate the need for adjustments and explore potential accommodations. I rely on the Disability Services Office for assistance in developing strategies and verifying accommodation needs. If you have not previously contacted them I encourage you to do so.”