# CS220/MATH320 - Applied Discrete Mathematics

## **Syllabus**

**Instructor:** Ramin Dehghanpoor (Ramin.Dehghanpoor001@umb.edu)

SI: Bella Baidak (Bella.Baidak001@umb.edu) (You will ask all of your questions in Piazza)

TA: Diana Alisevich (<u>Diana.Alisevich001@umb.edu</u>)

## **Course Description and Objectives:**

An introduction to the mathematical structures and concepts used in computing: sets, mathematical induction, ordered sets, Boolean algebras, predicate calculus, trees, relations and lattice theory.

## **Prerequisites:**

- \_ CS110 (Introduction to Computing)
- \_ MATH140 (or one term of Calculus) / MATH260 (Linear Algebra)

## **Textbook:**

Discrete Mathematics and Its Applications 8th Edition, Kenneth H. Rosen

## **Assignments and Grading:**

The following grading scheme is subject to change (I will do my absolute best to not change it and if I do, I'll let you know):

- \_ Homework assignments: 30% of your final grade.
- \_ Midterm exam: 30% of your final grade
- \_ Final exam: 40% of your final grade. You must also pass the final exam (at least with a grade of 40) to pass the course.

You must have a documented reason to schedule a makeup exam.

## Homepage:

The course home page is <a href="https://www.cs.umb.edu/~ramin/cs220/">https://www.cs.umb.edu/~ramin/cs220/</a>. The site will be updated regularly. It is your responsibility to keep up.

## **Communications:**

Please make sure to check your UMB email regularly for announcements. Piazza will be used for Q/A and Gradescope will be used for homework.

## **Final Grade:**

Your final grade will be calculated using the following table. The minimum standard for passing the course is a percentage score of 40%. You also must pass the final exam (score at least 40% in the final exam). Keeping this in mind, your grade for the course will be calculated using the following table. Assume your final percentage score for the course is P:

90 < P	A
85 < P <= 90	A-
80 < P <= 85	B+
75 < P <= 80	В
70 < P <= 75	B-
65 < P <= 70	C+
60 < P <= 65	С
55 < P <= 60	C-
50 < P <= 55	D+
45 < P <= 50	D
40 < P <= 45	D-
P <= 40	F

#### **Accommodations:**

Section 504 of the Americans with Disabilities Act of 1990 offers guidelines for curriculum modifications and adaptations for students with documented disabilities. If applicable, students may obtain adaptation recommendations from the Ross Center for Disability services, M-1-401, (617-287-7430). The student must present these recommendations and discuss them with each professor within a reasonable period, preferably by the end of Drop/Add period.

## **Student Conduct:**

Students are required to adhere to the University Policy on Academic Standards and Cheating, to the University Statement on Plagiarism and the Documentation of Written Work, and to the Code of Student Conduct as delineated in the catalog of Undergraduate Programs, pp. 44-45, and 48-52. The Code is available online at: www.umb.edu/student services/student rights/code conduct.html