MATH 312-001: Geometry
Syllabus, Spring 2021

Course goals. To develop basic concepts of Euclidean geometry in two and three dimensions, based on methods of analytic geometry.

Prerequisite. Grade *C* or better in MATH 114.

Instructor. Dr. Valeriu Soltan. Email: vsoltan@gmu.edu

Textbook. Analytic Geometry, by G. Fuller and D. Tarwater, Pearson, 7th edition, 1992.

Classes. MW, 12:00 pm–1:15 pm, synchronous, via Blackboard Collaborate Ultra Course Room.

Lecture notes. See course materials for each section at Blackboard Course Content.

Homework. Problems for the homework are given in the course outline (see next page). Although these will not be collected, success in tests and final exam strongly depends on their completing and understanding.

Tests and exam. There will be <u>four tests</u> and the <u>final exam</u>; they will be held through Blackboard Collaborate Ultra Course Room. All tests and the final are open-book and open-notes. Calculators are allowed. The way of submitting solutions will be announced separately and discussed during class.

Grading. Each test and the final exam are 20% worth of the total grade. <u>There is no grade curving, dropping, etc.</u> Equivalence between scores and letters, recommended by GMU, is given in the table below.

A+	A	A-	B+	B	B-	C+	C	C-	D	F
100-97	96-94	93-90	89-87	86-84	83-80	79-77	76-74	73-70	69-60	59-0

Attendance and make-ups. Each student is expected to attend class regularly. <u>No make-ups for tests are allowed unless you provide a serious written excuse</u>. Excused tests should be taken within a timely fashion before the last day of classes.

GMU policies on final exams. The final exam may not be given during the last week of classes. If you need to change the date of your final exam for unusual circumstances or because you have three final exams scheduled in one day, you have to obtain professor's approval at least a week prior to the last day of classes. Retaking quizzes, midterms, and final exam is not permitted.

Absence from the final exam will not be excused except for sickness on the day of the exam <u>confirmed by physician's note</u> or for other causes <u>approved by the student's academic dean or director</u>. If a student missed the final exam due to illness or a family emergency, an <u>incomplete grade</u> (IN) may be assigned provided the student took all three tests with a total score 36 or higher. If absence from the final exam is unexcused, the grade for the course is F.

Academic integrity and university policies. Mason is an Honor Code university. See for other policies at http://universitypolicy.gmu.edu/. Students are responsible for knowing and following established policies.

ODS. If you are a student with disability, please see me and contact the Office of Disability Services. All academic accommodations must be arranged through this office.

Religious holydays. If you observe upcoming religious holidays (see https://ulife.gmu.edu/religious-holiday-calendar/), please inform me one week in advance about a possible overlap with a day of quiz, midterm, or final exam.

COURSE OUTLINE

Class Date	Sections	HW Problems
01/25	1.1	**1.1:** 20, 22, 34, 36.
01/27	1.2	**1.2:** 24, 28, 36, 44, 50.
02/01	1.3	**1.3:** 12, 14, 26, 28, 30.
02/03	1.4	**1.4:** 1, 2, 7, 9, 11.
02/08	2.1	**2.1**: 10, 24, 34, 42.
02/10	**Test 1**	
02/15	2.2	**2.2**: 10, 18, 22, 28, 32.
02/17	2.3	**2.3**: 2, 8, 12, 16.
02/22	2.4	**2.4:** 4, 8, 16, 20.
02/24	2.5	**2.5:** 12, 18, 22, 26, 30.
03/01	2.6	**2.6:** 6, 10, 12, 16, 20, 28.
03/03	**Test 2**	
03/08	2.8	**2.8:** 4, 10, 16, 20.
03/10	3.1	**3.1:** 6, 8, 12, 14, 16, 18, 24, 26.
03/15	3.2	**3.2:** 2, 4, 6, 10, 16, 20, 24, 28, 32.
03/17	3.3	**3.3:** 14, 16, 18, 22, 26, 28, 30, 32, 34, 36.
03/22	3.4	**3.4:** 10, 12, 14, 18, 24, 26, 28.
03/24	**Test 3**	
03/29	4.4	**4.4:** 2, 4, 10, 12, 16, 22.
03/31	9.1	**9.1:** 10, 14, 18, 20, 32, 36, 44.
04/05	10.1	**10.1:** 10, 14, 18, 22, 26.
04/07	10.2	**10.2:** 4, 8, 10, 14, 18, 22.
04/12	10.3	**10.3:** 6, 8, 12, 16.
04/14	**Test 4**	
04/19	10.4	**10.4:** 2, 4, 6, 10, 16.
04/21	10.5	**10.5:** 4, 12, 18, 26, 32.
04/26	10.6	**10.6:** 6, 8, 10, 12, 16, 18, 20, 26.
04/28	Practice	
05/03	**Final Exam**	**10:30 am--1:15 pm**