Department of Mathematics & Statistics College of Arts and Sciences

Bridge to Abstract Mathematics

MGF 3301 - Section 001 - Spring 2020 Syllabus

Syllabus Modification: The instructor reserves the right to modify the syllabus as situations warrant. Students will be notified of any modifications and their implications in advance. However, no modifications are anticipated or expected.

INSTRUCTOR AND CLASS INFORMATION

Instructor: Dr. Annamaria Iezzi

Office: CMC 110

E-mail: aiezzi@usf.edu

Office hours: MW 11am - 12pm or by appointment

Website: http://www.aiezzi.it/. In the teaching tab you will find a link to a webpage dedicated

to this course, that you can visit in addition to Canvas.

Time and location of class: MW 9:30-10:45 am in CMC 108

Course Information

• Co-rerequisites: MAC 2313 or MAC 2283

• Credits: 3

• Textbook: A Transition to Advanced Mathematics, by Smith, Eggen & St. Andre, 8th edition.

Supplementary (optional) text: An Introduction to Writing Mathematical Proofs: Shifting Gears from Calculus to Upper-Level Mathematics Classes, 4th edition (red cover), Thomas Bieske.

• Course description and content: In this course you will learn techniques and logic of the construction of proofs. Topics will be selected from propositional logic, set theory, relations and functions, equivalence relations, Boolean algebra, cardinality, and limits.

We will cover Chapters 1 though 4 of the textbook, with some sections omitted. Some sections may be added from other chapters.

GRADING POLICY

Tests and Exam (total)	75%
Homework	15%
Quizzes and other in-class activities	10%

• Final grades: The university's +/- grading policy will be used in assigning final grades, according to the following table (where x is the final score)

A+	$x \ge 96.5$	
A	$92.5 \le x < 96.5$	
A-	$89.5 \le x < 92.5$	
B+	$86.5 \le x < 89.5$	
В	$82.5 \le x < 86.5$	
В-	$79.5 \le x < 82.5$	
C+	$76.5 \le x < 79.5$	
C	$72.5 \le x < 76.5$	
C-	$69.5 \le x < 72.5$	
D+	$66.5 \le x < 69.5$	
D	$62.5 \le x < 66.5$	
D-	$59.5 \le x < 62.5$	
F	x < 59.5	

• Tests and exam: Three tests and a final cumulative exam will be given during the semester. The lowest of these four scores will be dropped. After dropping the lowest score, each test/exam will count for 25% of the final grade, for a total of 75%.

Final exam: Wednesday May 6, 7:30-9:30 am

Tentative schedule for the three in-class tests:

Test 1: Wednesday February 12, 9:30-10:45 am

Test 2: Wednesday March 11, 9:30-10:45 am

Test 3: Wednesday April 22, 9:30-10:45 am

The final dates for the in-class tests will be announced in class, at least 1 week in advance.

• Homework: You will be assigned homework on a weekly basis, and each week's homework is due the Wednesday of the following week, at the beginning of the class.

Note: You can ask for an extension (until one week after the due date and without penalty) for at most 2 homework assignments during the entire semester. The extension has to be asked before the due date of the assignment, and after 2 extensions no additional extension will be granted.

For example, if HW2 is due on January 22, a student may ask an extension until January 29 without receiving any penalty.

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- Quizzes and other in-class activities: Every Wednesday you have to be prepared for a quiz. There may be other in-class activities that will count, together with quizzes, for 10% of the final grade.
- Extra-credits: There will be extra credits assigned based on participation in class. You can get up to an additional 3% on the final grade, according to the following scale:

3%: 0 unexcused absence

2%: 1 unexcused absences

1%: 2 unexcused absences

 $0\% \geq 3$ unexcused absences

Absences will be counted starting from the second week of class.

- Make up policy: Make-up exams will only be given for excused absences. In general, reasons for excused absences include documented illness, deaths in the immediate family and other documented crises, call to active military duty, court-imposed legal obligations (e.g., jury duty and subpoenas), religious days, special requirements of other courses and university sponsored events (e.g., performances, games/meets, judging trips, field trips), and severe weather conditions. Employment schedules, family reunions, vacations and athletic training/practice schedules of students do not comprise a valid excuse for absences. Also, students must notify their instructors of scheduled absences (for approved reasons as noted above) at the beginning of each academic term. Pointing out specific conflicts with scheduled examinations or other scheduled assignments/activities should be part of this notification. In the event of an emergency unscheduled absence (as described above), students must contact their instructors as soon as possible and provide documentation if required. Extended illnesses may interfere with the satisfactory completion of courses, and in such cases a student should contact his or her college by the deadline to drop a course. After the drop deadline, students may submit an Academic Regulations Committee (ARC) petition with proper documentation to drop a course or withdraw for medical reasons. Students may find additional information through their college ARC representative. An instructor may determine that missing a certain amount of participation-dependent activities (whether excused or not) precludes successful accomplishment of learning outcomes. In such cases the student is advised to withdraw from the course.
- Retaining exams: You should keep all your returned exams until you receive your final grade. You will need these exams to demonstrate that a grade was incorrectly recorded, should that happen.

OTHER COURSE INFORMATION

• Cell phones, laptops, tablets, calculators: Please turn your cell phone and laptop off before you come into class and store them out of sight. If there is some special circumstance for which you may need to be contacted in the middle of the class, please seek permission from the instructor before class. No cellular phones, laptops and calculators are permitted during examinations, unless otherwise specified. Tablets are allowed only for taking notes.

- Attendance Policy: Attendance during the whole class time is required and will determine the percentage of extra credits on the final score, as explained in "Extra credits". It is your responsibility to know what is going on in class. If you fail to take a quiz or a test, you will receive a grade of 0. Make up quizzes/tests/exam will only be scheduled at the discretion of the instructor, given a documented emergency. Students who anticipate the necessity of being absent from class due to the observation of a major religious observance must provide notice of the date(s) to the instructor, in writing, at the beginning of the term. For further information, go to: USF System Policy 10-045.
- Unauthorized Recordings: All unauthorized recordings of class are prohibited. Recordings that accommodate individual student needs must be approved in advance and may be used for personal use during the semester only; redistribution is prohibited.

STANDARD UNIVERSITY POLICIES

Policies about disability access, religious observances, academic grievances, academic integrity and misconduct, academic continuity, food insecurity, and sexual harassment are governed by a central set of policies that apply to all classes at USF. These may be accessed at: https://www.usf.edu/provost/faculty/core-syllabus-policy-statements.aspx

- Incomplete Grade Policy: An "I" grade indicates incomplete coursework and may be awarded to graduate and undergraduate students. (Undergraduate rules apply to non-degree-seeking students.) It may be awarded to an undergraduate student only when a small portion of the student's work is incomplete and only when the student is otherwise earning a passing grade (C or better).
- S-U Grade Policy: Students who want to take this course for a grade of S-U must sign the S-U contract no later than the end of the third week of classes. There will be no exceptions. Courses to satisfy Gordon Rule may not be taken on an S/U basis. Required courses in the major may not be taken on an S/U basis. Courses to satisfy Foundations of Knowledge & Learning (FKL) General Education may not be taken on an S/U basis.
- Students with Disabilities: Students in need of academic accommodations for a disability should consult with the office of Students with Disabilities Services (SVC 1133) to arrange appropriate accommodations. The student must bring a current Memorandum of Accommodations from the SDS office; this is a prerequisite for receiving accommodations. Students are required to give reasonable notice (typically 5 business days) prior to requesting an accommodation. Students may request accommodations at any time throughout the semester. However, as accommodations are not retroactive, any grades earned before a student requests accommodations will typically stand. Note: If you need extra time on exams, you must make arrangements to take your exams with the SDS office. You cannot receive extra time if you choose to take your exams with the course instructor. For further information, go to: USF System Policy 0-108

- Academic Integrity of Students: Academic integrity is the foundation of the University of South Florida System's commitment to the academic honesty and personal integrity of its university community. Academic integrity is grounded in certain fundamental values, which include honesty, respect, and fairness. Broadly defined, academic honesty is the completion of all academic endeavors and claims of scholarly knowledge as representative of one's own efforts. The final decision on an academic integrity violation and related academic sanction at any USF System institution shall affect and be applied to the academic status of the student throughout the USF System, unless otherwise determined by the independently accredited institution. The process for faculty reporting of academic misconduct, as well as the student's options for appeal, are outlined in detail in USF System Regulation 3.027.
- Academic Grievance Procedure: The purpose of these procedures is to provide all undergraduate and graduate students taking courses within the University of South Florida System an opportunity for objective review of facts and events pertinent to the cause of the academic grievance. An "academic grievance" is a claim that a specific academic decision or action that affects that student's academic record or status has violated published policies and procedures, or has been applied to the grievant in a manner different from that used for other students.
- Disruption of the Academic Process: Please do not hold conversations, either with your classmates or your cell phones, during the lecture sessions. (Cell phones must be turned off at all times). For further information, go to: USF System Regulation 3.025.
- Food and Housing Insecurity: We recognize that student facing financial difficulty in securing a stable place to live and/or in affording sufficient groceries may be at risk of these financial issues affecting their performance in classes. Students with these needs are urged to contact Feed-A-Bull (feedabull@usf.edu or their website), or Student Outreach and Support (socat@usf.edu or their website).
- Religious Observances: All students have a right to expect that the University will reasonably accommodate their religious observances, practices and beliefs (USF System Policy 10-045). The USF System, through its faculty, will make every attempt to schedule required classes and examinations in view of customarily observed religious holidays of those religious groups or communities comprising the USF System's constituency. Students are expected to attend classes and take examinations as determined by the USF System. No student shall be compelled to attend class or sit for an examination at a day or time prohibited by his or her religious belief. However, students should review the course requirements and meeting days and times to avoid foreseeable conflicts, as excessive absences in a given term may prevent a student from completing the academic requirements of a specific course. Students are expected to notify their instructors at the beginning of each academic term if they intend to be absent for a class or announced examination, in accordance with this Policy.
- Gender-Based Crimes: USF has a commitment to the safety and well-being of our students. Please be aware that educators must report incidents of sexual harassment and gender-based crimes including sexual assault, stalking, and domestic/relationship violence that come to their attention. I am required to report such incidents in order for the Office of Student Rights and Responsibilities or the Office of Diversity, Inclusion, and Equal Opportunity can investigate the incident or situation as a possible violation of the USF Sexual Misconduct/Sexual Harassment Policy and provide assistance to the student making the disclosure. If you disclose in class or to

me personally, I must report the disclosure and will assist you in accessing available resources. The Center for Victim Advocacy and Violence Prevention, the Counseling Center and Student Health Services are confidential resources where you can talk about such situations and receive assistance without the incident being reported.

- 1) Center for Victim Advocacy and Violence Prevention:
 - (813) 974-5757
 - http://sa.usf.edu/advocacy
- 2) Counseling Center
 - (813) 974-2831
 - http://usf.edu/student-affairs/counseling-center
- 1) Student Health Services
 - (813) 974-2331
 - http://usf.edu/student-affairs/student-health-services
- Statement of Academic Continuity: In the event of an emergency, it may be necessary for USF to suspend normal operations. During this time, USF may opt to continue delivery of instruction through methods that include, but are not limited to: Learning Management System, online conferencing, email messaging, and/or an alternate schedule. It is the responsibility of the student to monitor the Learning Management System for each class for course-specific communication, and the main USF, College, and Department websites, emails, and MoBull messages for important general information (USF System Policy 6-010). For additional guidance on emergency protective actions and hazards that affect the University, please visit www.usf.edu/em

IMPORTANT DATES

- First day of classes: Monday January 13;
- Last day to add/drop courses: Friday January 17;
- Spring Break: Monday March 16, through Saturday March 22;
- Last day to withdraw (no refund and no academic penalty): Saturday March 28;
- Last day of classes: Wednesday April 29;
- Reading Days: Thursday, April 30, and Friday, May 1;
- University Holidays (no classes): Monday January 20 (Martin Luter King Jr. Day);
- Final Exam Week: Saturday May 2 through Thursday May 7.