

**Sets and Logic**  
**MHF 3202**  
Spring 2023

Instructor: Zachary Hamaker  
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Office Hours: Tuesday 1:00pm – 2:50pm or by appointment

Lecture: Period 5, 11:45 - 12:35 MWF  
AND 32

**Required Text**     *Proof and the Art of Mathematics* by Joel David Hamkins.

**Supplementary Text**     *Book of Proof* by Richard Hammack  
<https://www.people.vcu.edu/~rhammack/BookOfProof/>

**Course Description**     This course is the first introduction to rigorous mathematical proofs. We will use familiar notions of a set, relation and function, and playing games to learn how mathematical statements come to be, how to guess a conjecture, how to prove a conjecture to make it a theorem, or how to find a counterexample to show that our conjecture needs to be corrected.

**Homework**             There will be 10 assignments due on Tuesdays by 11:59pm on dates indicated on Canvas in Assignments. Your work will be corrected directly there for you to see comments and your points will be recorded in Grades. The lowest score will be dropped and you can submit 3 days late once (that is, by Friday 11:59pm) without any reason. Otherwise, late submission will not be accepted unless there is a well documented reason to do so.

**Quizzes**             There will be three quizzes during the usual class meeting time. Quizzes will be closed book with no notes. Make-up quizzes need to be substantiated and will be considered on a case-by-case basis.

**Final Exam**         The final exam date will be at the prescribed date.

**Presentation**       Students will give group presentations based on material introduced during class. Each presentation will last approximately 25 minutes, with each student expected to present for five minutes or so.

**Grading**             Grades will be assigned according to following point values:

| <b>Without Project</b> | <b>Number</b> | <b>Point Value</b> |
|------------------------|---------------|--------------------|
| Homework               | 10            | 20                 |
| Quizzes                | 3             | 50                 |
| Final Exam             | 1             | 100                |
| Presentation           | 1             | 50                 |

The total number of points is 475. The grades will be distributed as follows: A above 93%, A- 90-92%, B+ 87-89%, B 83-86%, B- 80-82%, C+ 77-79%, C 73-76%, C- 70-72%, D+ 67-69%, D 63-66%, D- 60-62 %, E, I, NG, WF 59% and below. Grades will adhere to the UF policy stated at <https://catalog.ufl.edu/ugrad/current/regulations/info/grades.aspx>.

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| <b>Honor code</b>                                    | UF students are bound by The Honor Pledge which states, We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honor and integrity by abiding by the Honor Code. On all work submitted for credit by students at the University of Florida, the following pledge is either required or implied: On my honor, I have neither given nor received unauthorized aid in doing this assignment. The Honor Code specifies a number of behaviors that are in violation of this code and the possible sanctions. Furthermore, you are obligated to report any condition that facilitates academic misconduct to appropriate personnel. If you have any questions or concerns, please consult with the instructor.   |
| <b>Attendance</b>                                    | Attendance will not be monitored. Requirements for class attendance and make-up exams, assignments, and other work in this course are consistent with university policies that can be found at: <a href="https://catalog.ufl.edu/ugrad/current/regulations/info/attendance.aspx">https://catalog.ufl.edu/ugrad/current/regulations/info/attendance.aspx</a> .  |
| <b>Accommodations for students with disabilities</b> | Students with disabilities requesting accommodations should first register with the Disability Resource Center (352-392-8565, <a href="https://www.dso.ufl.edu/drc/">https://www.dso.ufl.edu/drc/</a> ) by providing appropriate documentation. Once registered, students will receive an accommodation letter which must be presented to the instructor when requesting accommodation. Students with disabilities should follow this procedure as early as possible in the semester.  |
| <b>Online Evaluations</b>                            | Students are expected to provide feedback on the quality of instruction in this course by completing online evaluations at <a href="https://evaluations.ufl.edu">https://evaluations.ufl.edu</a> . Evaluations are typically open during the last two or three weeks of the semester, but students will be given specific times when they are open. Summary results of these assessments are available to students at <a href="https://evaluations.ufl.edu/results/">https://evaluations.ufl.edu/results/</a> .  |
| <b>Students with Learning Disabilities</b>           | Students requesting class and exam accommodations must first register with the Dean of Students Office Disability Resource Center (DRC), <a href="http://www.dso.ufl.edu/drc/">www.dso.ufl.edu/drc/</a> . That office will provide a documentation letter via email to your instructor. This must be done as early as possible in the semester, <b>at least one week before the first exam</b> , so there is adequate time to make proper accommodations.  |
| <b>Complaints</b>                                    | The official UF policy for filing a complaint about the course may be found at <a href="https://www.dso.ufl.edu/documents/UF_Complaints_policy.pdf">https://www.dso.ufl.edu/documents/UF_Complaints_policy.pdf</a> .   |
| <b>Health and wellness</b>                           | <p>U Matter, We Care: If you or someone you know is in distress, please contact <a href="mailto:umatter@ufl.edu">umatter@ufl.edu</a>, 352-392-1575, or visit U Matter, We Care website: <a href="https://umatter.ufl.edu/">https://umatter.ufl.edu/</a> to refer or report a concern and a team member will reach out to the student in distress.</p> <p>Counseling and Wellness Center: Visit the Counseling and Wellness Center website at <a href="https://counseling.ufl.edu/">https://counseling.ufl.edu/</a> or call 352-392-1575 for information on crisis services as well as non-crisis services.</p> <p>Student Health Care Center: Call 352-392-1161 for 24/7 information to help you find the care you need, or visit the Student Health Care Center website at <a href="https://shcc.ufl.edu/">https://shcc.ufl.edu/</a>.</p> <p>University Police Department: Visit UF Police Department website at <a href="https://police.ufl.edu/">https://police.ufl.edu/</a> or call 352-392-1111 (or 9-1-1 for emergencies).</p> |