

Math 225: Linear Algebra

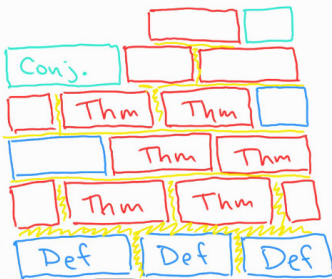
Fall 2024 Instructor: Sam DeHority

Proofs

- ▶ Math 225 is a proof-based course
- ▶ What is a proof?

Conjectures:
things we think
are true, but
have not yet
proved

Proofs: the logical
cement that
holds it all together



Theorems:
facts that are
proved with logic

Definitions:
naming things
we care about

Objectives

- ▶ Computational techniques
- ▶ Conceptual knowledge, understanding and producing proofs
- ▶ Mathematical communication

Resources:

- ▶ Professor office hours
- ▶ TA office hours
- ▶ ULA study group sessions
- ▶ ULA proof writing workshops

Course Structure

- ▶ The two sections of Math 225 will be closely coordinated
 - ▶ Shared homework sets
 - ▶ Shared exams
 - ▶ Shared TAs and ULAs
 - ▶ Closely matched pacing
- ▶ Math 225 and 226 will be paced similarly, so that switching from 226 to 225 is possible

Course Structure

- ▶ Textbook: Linear Algebra by Friedberg, Insel, and Spence
- ▶ MWF lectures
- ▶ Approximately weekly homework sets
- ▶ 2 midterms and a final
- ▶ Grading: Your final grade will be based on the higher of the two following scores
 - ▶ 30% Homework, 20% Midterm 1, 20% Midterm 2, 30% Final Exam
 - ▶ 30% Homework, 20% $\text{MAX}(\text{Midterm 1}, \text{Midterm 2})$, 50% Final Exam

Questions?