

# MATH 4970 in Spring 2022:

## A revised MATH 2030, Discrete Mathematics

001 | MW 1:00 PM – 2:15 PM | DSC 304 | Spring 2022

Dr. Dora Velcsov & Dr. Jim Rogers

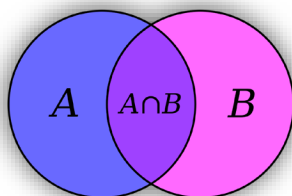
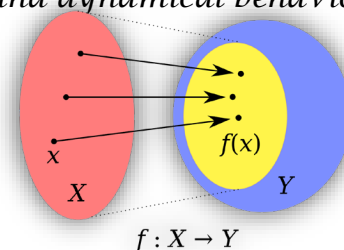
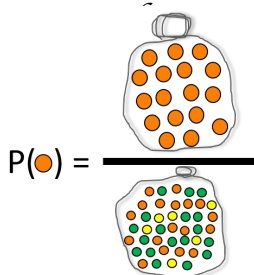
*What is this about in Spring 2022:*  
 The course is offered as a pilot for a revised content of MATH 2030, Discrete Mathematics.

**Description:** The goal is to help you acquire basic mathematical concepts that lead to a discrete mathematics track. It is also an introduction to proof writing in mathematics and can be used as a prerequisite in lieu of MATH 2230.

**Pre-requisites:** MATH 1930, or MATH 1940, or MATH 1950, or permission of instructor.

*What you will learn:*

- Sets, their properties, and how to operate with them.
- How to think logically in mathematics (and not only in mathematics).
- Functions, their properties, and what you can do with them.
- How to transfer your logic into meaningful, well written and spoken mathematical arguments (aka proofs).
- The basics of counting / combinatorics (if you think you can count you might be surprised!)
- Probability concepts so you know how to assess likelihood of events and risk. You may want to rethink your visit to Las Vegas.
- Other topics that lead to understanding complex systems and dynamical behavior



$a = b$
$a^2 = ab$
$a^2 - b^2 = ab - b^2$
$(a + b)(a - b) = b(a - b)$
$a + b = b$
$2b = b$
$2 = 1$

**For More Information:**

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