Focus on:

1st order ODE's
- Integrating factors
- Exact equations
- separation of variables
- modeling - particularly
  - logistic eqn
  - Newton's law of cooling
- direction fields and equilibrium analysis.

2nd order ODE's
- Characteristic polynomials
  - ↳ real/complex/repeated roots
- finding $Y_p(t)$ for nonhomo
- spring-mass system:
  freq/resonance/beat/damping

3rd and 4th order

☆ **Caution:** this might have changed since I took the class.

Exam 1: 5:00pm - 6:50pm
A-E Scott 101
Can have:
1 double sided page of notes. Can be printed. Nothing else.
Practice exam from last semester is on canvas.