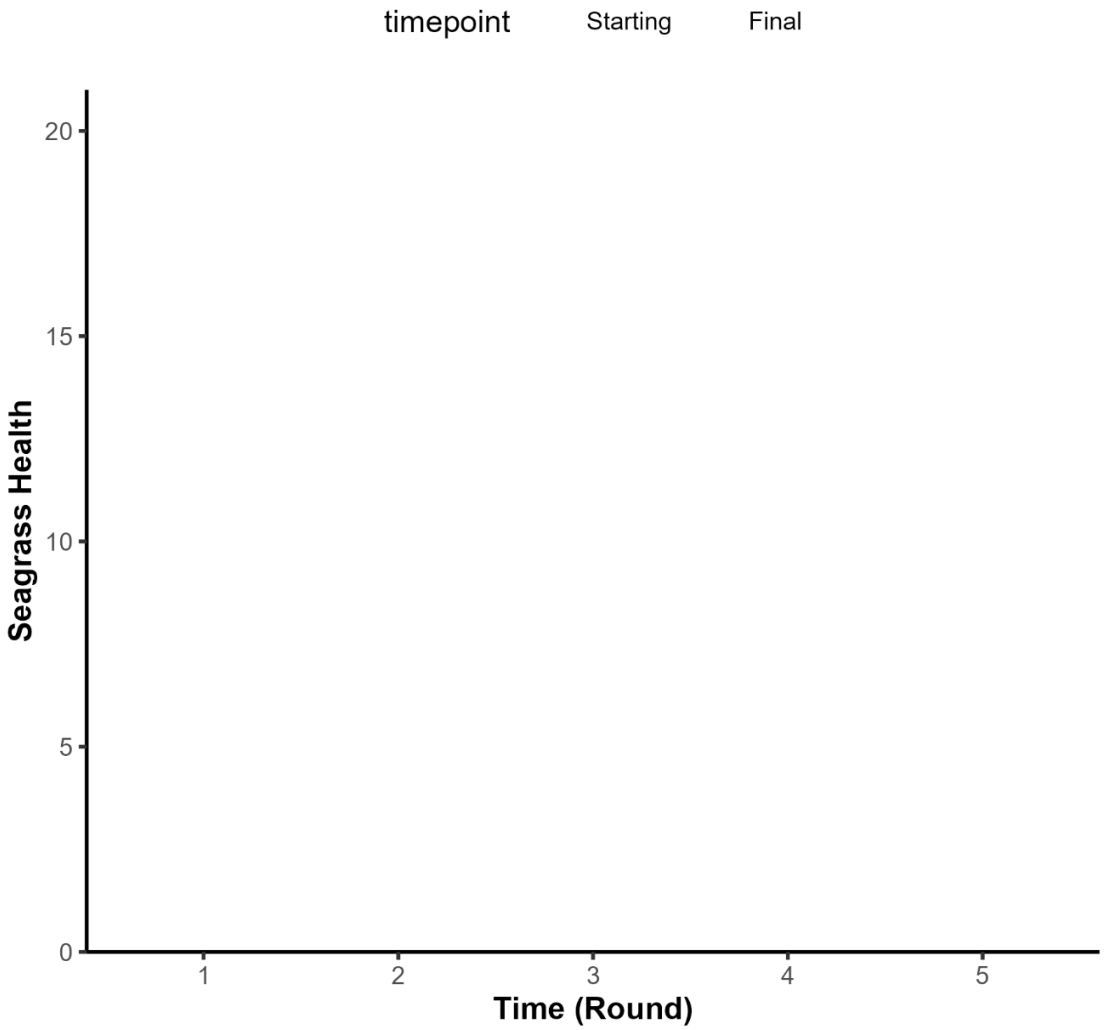
Names:

Graphing Worksheet

Congratulations on completing the data collection phase of your research! Now you get to analyze your results and draw conclusions. These conclusions will help scientists better understand pollution in local, coastal ecosystems. Sharing that knowledge helps policymakers and community members implement evidence-based solutions!

Use your data for starting and final seagrass health from each round to make a double-bar graph of Seagrass Health over Time. Starting health is the very first row of the Data Collection Worksheet. Final health is the very last row of the Data Collection Worksheet.

Title:



Questions:

1) Define a feedback loop and describe what can happen to a seagrass meadow when it enters one.

2) Is your final meadow healthy (≥ 12), unhealthy (7-12), or collapsed (≤ 7)? Keep this answer in mind for questions 3 and 4.

3) *a.* What is the impact of microplastic on the blades? Support your answer using data from the game. *b.* Green sea turtles are found along the coast of Virginia and commonly eat seagrass blades. How might the final state of your meadow affect them? Support your answer using data from the game.

4) *a.* What is the impact of microplastic in the sediment? Support your answer using data from the game. *b.* Skates (commonly called rays) live in seagrass meadows and forage for prey in the sediment. They eat crabs, worms, and other bottom-dwelling animals. How might the final state of your meadow affect them (*hint: biomagnification*)?

5) How did management decisions impact seagrass health? Which were most helpful in maintaining seagrass health? Can you think of any other management decisions that were not presented as options that you have seen in your community?