Dxg397   Devansh Gupta   PS5

The path I created for the closed-loop odometry control is currently in that .cpp file, with the slightly different path coordinates as comments for the open loop control part.

The video "mobot_olc.mp4" shows the robot doing the first open loop control path.

The robot gets to the goal location, but it has to follow a convoluted path that accounts for the non-idealities of the robot.

The video "mobot_steering.mp4" shows the robot with the steering algorithm following the same path but actually getting to each waypoint as intended.

The robot follows the actual path specified in the waypoints.

The video "fast_mobot.mp4" shows the robot with the updated control parameters.

The robot moves slightly faster because I increased the control gain and the maximum speed and turn speed. Unfortunately I couldnt get it to go much faster than that because the robot would swerve unstably and crash on it's path if I tried to make it go too much faster.