

Final examination

ROBOTIC OPERATING SYSTEM

Basheer Allawil | Y190233005 | 08-02-2021

Summary for running the code for mobile robot integrated with three DoF robot manipulator simulated with rviz,gazebo.

- **1-**The package name is **steering_robot**
- 2-The folders inside it will be like the following and it will be the responsible for visualizing, simulating, and controlling the robot manipulator:
 - There will be one file inside urdf folder that file is under the name of **final.urdf** and its containing all materials needed for both **rviz**,and **gazebo**
 - There will be two files inside launch folder one of them for running rviz with name of final_rviz
 The other is for running gazebo with name of final_gazebo
 - One folder with name of yaml that will contain folder of name of arm_controllers.yaml and it will be responsible for arm joint controlling and differential mobile robot wheels rotating.
- 3-I faced a problem with gazebo simulation relating with mobile root orientation. However, I could publish a message from the terminal to change robot position even if its orientation is not at require place.