Progress Review 2

Team F

Status

- We can move or control both the Husky through game controller and Teleop through PC.
- We can perform takeoff, landing, move forward, move backward and flip on the Bebop 2 through ROS on a laptop.
- We have build velodyne driver scratch so that we can visualize online point clouds on Rviz.
- We are able to receive NMEA data from GPS, (from Inventory) interfacing through Arduino.

Husky progress and challenges

- We got another Husky from NREC
- We figured out the issues in the previous Husky from george by parallelly working on both the Husky.
- We are able to run and control both Husky.
- We are getting odometry data of Husky.
- We have started making CAD model for the sensors to be mounted on Husky.
- We are still processing the GPS Data and to finalize which one to use.
- We are also finalizing other components like camera, pc for another husky etc.
- We are planning to move husky with encoders.
- We are planning to process and check accuracy of GPS data and getting that on Husky Node.
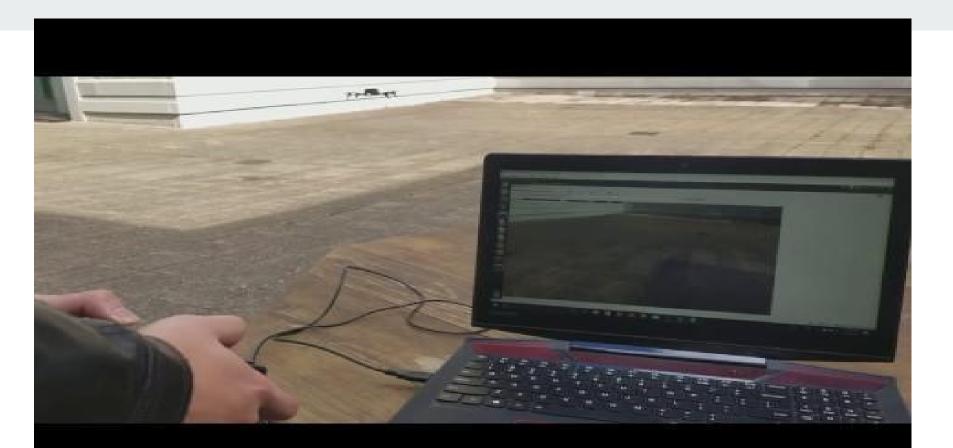
GPS Data

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Bebop2 progress and challenges

- We are able to perform basic tasks like take off, landing, going forward and backward through Bebop2.
- We have tried flips through ROS command.
- We can get odometry data from Bebop2.
- We are looking into GPS accuracy for Bebop2 and wiFi connection range.
- We are planning to fly Bebop2 to the desired location.

PR3 goals

- Move Husky with encoders.
- Power connection for complete system.
- Check GPS data accuracy and getting GPS data on Husky node.
- Control Bebop2 as per given desired location.

Thank You!