## Senior Design May 23, 43

## MicroCART Senior Design Team

### Week 22 Report

April 11 - April 18

Faculty Advisor: Philip Jones

#### Members:

Ryan - System architect

Zach - Groundstation lead, co system architect

Reid - Test station sub-team

Ellissa - GUI sub-team

Colton - Git manager, Firmware lead

Carter - Web Master, OptiTrack Lead

Brandon - Project Lead, Test Station lead

#### Links

- Shared Google drive folder
- Order list
- Crazyflie inventory

## Summary of Progress this Week

- Proof of concept for controlling crazyflie with VR controller <a href="Demo\_Video.mp4">Demo\_Video.mp4</a> Colton
- Poster rough draft Ryan

#### **Pending Issues**

BetaFPV joystick hardware updates are not visible in linux even through /dev/input/.
There is likely a handshaking protocol that is handled by the windows driver that doesn't take place so joystick information is not sent to linux. You MIGHT be able to sniff the communication over windows and reverse engineer a driver for linux. (potential future 488 project?) - Colton

### **Individual Contributions**

Team Member	Contributions	Hours	Total Hours
Brandon Cortez	<ul><li>Worked on poster rough draft with group</li><li>Worked on 3D printing documentation for future teams</li></ul>	4	149
Reid Schneyer	Worked on poster rough draft & S3-1 488 demo group	4	134
Colton Glick	<ul> <li>- Helped students debug their code and finish the lab activities</li> <li>- Ran a proof of concept to control the crazyflie with a VR controller (not running through microcart ground station at the moment) <a href="Demo_Video.mp4">Demo_Video.mp4</a></li> </ul>	8	225
Ellissa Peterson			95+_
Ryan Hunt	<ul><li>Worked on poster rough draft</li><li>Introduced 488 team and Dan to our</li><li>CrazyFlie material</li></ul>	7	156
Carter Irlmeier	- Getting website caught up, uploading past material	2	78
Zachary Eisele	-Worked on poster -Worked on controlling multiple quads from one radio with our ground station -Started integrating multiple drone control into and position setpoints in gui.	10	228

#### Comments and Extended Discussion

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# Plans for coming Week

- Contribute to the poster. Help with the lighthouse demo. Colton
- Work on getting the poster finalized. Start on the final paper Ryan