Watched video on Spatial Reasoning for Human-Robot Interaction <http://www.marynel.net/>

* Most excited by Traversability Estimation, A-B Navigation, and Scalability/Benchmarking with graph-based approach
* Have experience with basic machine learning and motion profiling (splines, no vision)
* Currently shopping self-driving cars for more background (esp vision)
* What are ongoing projects in these domains? Anything I could join and contribute to?

A Behavioral Approach to Visual Navigation with Graph Localization Networks (abstract)

* Using graph neural networks for localizing agent without pre-knowledge of terrain
* Cursory read, but looks interesting

Deep Local Trajectory Replanning and Control for Robot Navigation (abstract)

* Traditional global planner with deep local trajectory planner interjected before velocity controller for better results with moving pedestrians
* Precursor to Graph localization approach

Translating Navigation Instructions in Natural Language to a High-Level Plan for Behavioral Robot Navigation (abstract)

* Focused on natural language processing, as instructions often given in varying formats
* Interesting, but I am more interested in trajectory planning work (tentatively)

GONet: A Semi-Supervised Deep Learning Approach for Traversability Estimation (abstract)

* Traversability estimation using fisheye-camera, not LiDAR through anomaly detection

GENERAL POINTS

* Interested in robotics/machine-learning projects, particularly motion planning, execution
* Worked last semester with Dr. Radev, wanted a more personal experience, more hands-on learning, ownership, etc.
* Print resume for background on skills – updated version in Google Drive
* Meeting in AKW 402@ 4:30 PM – come a few minutes early

QUESTIONS

* Assuming conversation is going well, ask about long-term goals, summer, paid position?