CS 378: Autonomous Intelligent Robotics (FRI)

Dr. Todd Hester
Are there any questions?
Logistics

● Progress Reports Due Today
● Wiki Project Updates
● Tuesday
● My job decision
● New research educator
AAAII Spring Symposium

- Designing Intelligent Robots
  - http://people.csail.mit.edu/gdk/dir2/
- Joelle Pineau
  - Intelligent Wheelchairs
  - Using Kinect to determine flow of crowd
  - Learn how people usually navigate in crowds
  - Appropriate distance to stay from people
- Sjriek Alers, Karl Tuyls
  - Telepresence robots
  - Forward facing and bottom facing cameras
  - Automatically follow center of attention
  - Navigation to goals, back to power
AAAI Spring Symposium

- Morgan Quigley
  - Lots of talk about ROS
  - Moving control down to the device firmware
  - Simulations for the DARPA Robotics Challenge

- Manuela Veloso
  - CoBot
  - People tricking the robot on the elevator
  - Multi-robot scheduling
  - Interrupting Autonomy

- Matt Taylor
  - Learning for robot error recovery
  - If robot gets stuck, can we learn/plan to escape
Class Topics

● Github / Version Control
● Human Robot Interaction
● Multi-Robot Coordination
● Motion / Obstacle Avoidance
● Covered?
  ○ ROS
  ○ Motion Control
  ○ Vision
  ○ Localization / SLAM
Today

- Group Updates
- Readings
Group Updates
Readings

- Tell us about what paper you read
- What did they do?
- How did they test it?
- How does it relate to our project?