*Presentation Agenda*

*Robo-Ops Competition*

*Software Engineering: Team 1*

*December 3rd, 2014*

**Command PC Initialization:**

For operational purposes, the Command Computer will initialize the software. It will connect to the Rover Computer to set up a communication link.

**Rover Initialization:**

For operational purposes, the Rover On-Board Computer will be booted to allow connection between the Command Computer and the Rover. This will be simulated through the use of a second computer due to the lack of an appropriate platform.

**Motor Controls:**

Signals from the external joystick are read by the Command PC. These signals will be sent to the stand-in Rover On-Board Computer and read.

**Articulating Arm Controls:**

Signals from the external joystick are read by the Command PC. These signals will be sent to the stand-in Rover On-Board Computer and read.

**Camera Controls:**

The GUI system on the Command PC is used to switch what camera is being viewed by the user. Two cameras can be viewed simultaneously. The buttons along the left side allow the user to view one of the 8 cameras in the left viewing box. The buttons along the right side allow the user to view one of the 8 cameras in the right viewing box. Due to lack of an appropriate platform, a single camera will be displayed from a laptop.

**Video Stream:**

The Rover PC will send video feedback to the Command PC, and the Command PC will display video feeds.

**Communication between PCs:**

Commands will be sent from the Command PC to Rover PC. This will be displayed throughout the presentation as commands and video data are exchanged between the two devices.