

## System Manual

There are six functions in this program, main, reportStatus, updateStatus, introduction, touchdown, and finalAnalysis. The main program asks the user for the name of the output file, the amount of fuel they want to burn, and also calls all of the functions. In the reportStatus function the time, height, velocity, and fuel of the ship. The updateStatus function changes the values of the height, velocity, fuel burned, and burn remaining while the altitude is greater than zero. The introduction function outputs the instructions and replaces the variable target with the replacement variable. The touchdown function updates the height, velocity, amount of fuel burned, and the amount of fuel left while the altitude is less than zero. The finalAnalysis function outputs the results of the landing based on the velocity of the ship.