

# The Lunar Mission Launch Simulator Initial Writeup

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## 1 History

Launching Simulators pose a unique challenge in implementation of physics and real-time monitoring of:

1. Current Speed
2. Current Altitude
3. Current Drag Coefficient
4. Current Position relative to Earth
5. Current Fuel Content
6. Current Stage
  - (a) When Staging should occur
7. Current End of Launch Sequence
  - (a) When the Capsule is in stable orbit?
  - (b) When all of the Stages are completely finished?
  - (c) When the Capsule is actually in space?

All of these pose particular issues as related to accurately simulating a launch.

## 2 Abstract

Part of the entire