

## Olivia Bello's Midterm Event

A Plan for the Final 70 Points

[Link to this google doc](#)

### 1. Lesson Implementation & Reflection (20 points) Due 4/6/2022

#### Plan

Lesson: [Touchdown! Lunar Lander Engineering Challenge](#)

Implementation Date: March 7th-March 18th

Student Artifacts: Images of student landers, posters, possibly a video of testing landers.

### 2. Choice Option 2: Astronomy/Space Science Unit Plan (40 points) Due 4/20/2022

- What big ideas or major concepts do you hope to address through this unit?
  - **MS-ESS1-3** Analyze and interpret data to determine scale properties of objects in the solar system.
- What resources from this course do you intend to integrate with your unit plan?
  - I liked the lesson idea around getting students comfortable with really small and really large numbers, I might use something like that to launch this unit. Additionally, I would like to use some of the Hubble images to help students with identifying surface level features of various planets. I will also be digging through the JPL lesson bank, there are some incredible resources in there!
- How will using these resources help your students better achieve your goals for the unit?
  - I think that the false color images from Hubble will get my students invested in this unit, it's not something they see everyday! I also believe that the number lesson will help reduce stress amongst students who disengage in science when math gets involved.

#### Rough Draft of Unit Outline

Day 1 - Introduction to Numbers Lesson variation

Day 2-3 - [Size and Scale activity from JPL](#)

Day 4-6 - Students research a planet and make travel brochures focusing specifically on the weather, surface features, and distance from the sun.

Day 7 - presentations/gallery walk celebrating student data interpretation and research while also getting stamps in a planet passport

Other thoughts/ connections - Potential connection to Manhattan-henge? Art connection through JPL [cosmic art lessons](#) in partnership with the school art teacher or local artist.

### 3. Final Presentation-using an activity (10 points) Due ?

- [NASA Earth Observatory - Sea Surface Temperatures Map.](#)
  - Could be used when teaching:
    - Climate Change

- Weather - predicting hurricanes
- Resilient Parks Project - Using resilient infrastructure along shorelines in NYC as a result of rising SST

Is this an option? OR should I choose a lesson plan provided by NASA? Or should I be presenting on my Lunar Lander Lesson. (I have many ideas, just need a nudge in the right direction!)