

## Optional Assignment: Moon Observations

For this assignment, you will have to record moon (or sky) data for 30 total days, with a minimum of 30 moon sightings. Since you won't be able to see the moon each day, some days you will have to record a moon sighting at separate times, at least 1 hour apart on those days. Your 30 sightings may take you more than 30 calendar days, and that's okay.... but it's good to have at least one or two days where you are able to see the moon a few times over several hours.

Data to collect:

Date

Time

Weather - temp/conditions/sky

Moon phase/altitude/direction (or if it's not in the sky, say so)

1-minute sketch of your view

### ***Moon Log Example:***

*Monday, Feb. 2*

*5pm*

*Cold, dry, clear sky, still blue and daytime*

*Full moon is in the East, a bit above horizon*

*(sketch here; 10cm or 3 inches minimum)*

### **How can you tell what direction the moon is?**

If it's high in the sky, you're looking South (since we're in the Northern Hemisphere)

If it's low in the sky, you should be able to tell if it's roughly East or West - think about where the Sun appears to rise or set, ask your parents, or if it's dawn or dusk it should be easy.

### **What if you miss a day?**

No problem. Your 30 days don't need to be consecutive.

### **How should I record it?**

I'll take pretty much anything; you can take photos with your phone and print them or put them in a google document if you're super advanced, or you can sketch the moon on various papers you happen to have and staple them together in order, and anything in between. I'll be just keeping a log on a few pages of notebook paper, and attaching some other pages when I happen to spot the moon when I don't have it with me.

### **Can I just copy my friend's data or copy from online?**

Probably a bad idea. The whole idea of this assignment is to give you a better understanding of the moon's phases and its orbit relative to us. As many of you struggled on test questions involving the moon's phases, you can't just learn it from a book or me telling you... You have to see it yourself. Cheating on this is cheating yourself and shows that you can't be trusted, not to mention I will be applying school penalties for violations to the Academic Integrity Policy - I had to do this to no fewer than 6 students when I last assigned it.

### **How many points is this worth?**

If done well, this is worth 40 points. If not done well, I may elect to have you re-do it or I may give you full credit for fewer points; e.g. 10/10 instead of 40/40.

### **When is this due?**

I'd like this to be turned in by April 1, but if we have another round of really cloudy weather like we did in December, I won't expect people to finish until later. I'm flexible.