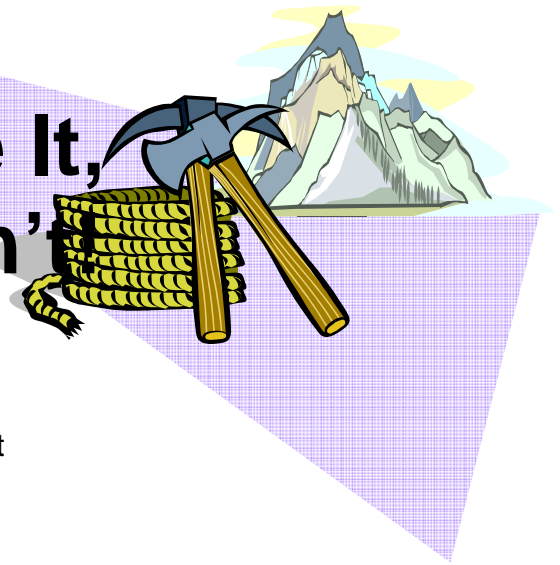


ES – Activity #17

Now You See It, Now You Don't



MATERIALS:

binoculars (optional)
clipboard
colored pencils

moon sheet
pencil
watch

PROCEDURE:

1. Gather all materials and go outside to observation area about 15 minutes before the eclipse is scheduled to begin.
2. At 5 minutes before the eclipse starts observe the moon carefully and draw what you see.
3. Continue to make observations of the moon about every 20 minutes. Make a drawing of how the moon looks at each observation. Be sure to record the time for each observation. Use your colored pencils to color your drawing as accurately as possible.
4. As you make your observations of the eclipse complete the data table below.

DATA: Use Data sheet.

QUESTIONS:

1. When did you see the first definite shadow of the eclipse?
2. What is the difference between the penumbral phase and the umbral phase?
3. At what stage can the eclipse be considered total?
4. Do you think this total eclipse is visible everywhere on Earth? Why or why not?
5. When did the shadow disappear completely from the face of the moon?
6. Did the eclipse take longer or shorter than you originally thought?
7. Why isn't there an eclipse every month at full moon?
8. Why does the moon appear reddish during a total eclipse?

CONCLUSION: Write 3-5 sentences about what you learned from doing this activity.

DATA SHEET:

STAGE	TIME	DRAWING	OBSERVATION
1st Penumbral			
1st Contact			
2nd Contact			
3rd Contact			
4th Contact			
2nd Penumbral			
End of Eclipse			