Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Date: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ HR: \_\_\_\_\_\_\_\_\_

**HOMEWORK – Positive & Negative Numbers on the Number Line**

Problems

1. On the number lines below plot the points: -2, 4, and 6.

 a. Graph and label the opposites of each point.





b. Explain how you found the opposite of each point.

2. Carlos uses a number line like the one below to graph the points -4, -2, 3, and 4. He notices that -4 is closer to zero than -2. He is not sure about his diagram.

 a. What do you think Carlos did? Graph it.

 b. Did Carlos make a mistake or not? Explain

3. Choose an integer between -5 and -10. Label it *R* on the number line below and complete the following tasks.

 a. What is the opposite of *R*? Label it *Q*.

 b. State a positive integer greater than *Q.* Label it *T*.

 c. State a negative integer greater than *R*. Label it *S*.

 d. State a negative integer less than *R*. Label it *U*.

 e. State an integer between *R* and *Q*. Label it *V*.



4. Will the opposite of a number always be a negative number? Explain your reasoning.