## Homework 12\_Geometry (Tuesday)

## GEOMETRY (7.G.1)

Solve problems involving scale drawings of geometric figures, including computing actual lengths and areas from a scale drawing and reproducing a scale drawing at a different scale.

- 1. The scale of a model train is 1 inches to 14.5 feet. One of the cars of the model train is 4 inches long. What is the length, in feet, of the actual train car?
- 2. A classroom has a length of 30 feet and a width of 15 feet. A scale drawing for the room used the scale 1cm = 5 ft. What was the length and width of the drawing?

- 3. Melinda has a map of her city. The map uses a scale of 1 inch = 8 mile.

  Melinda's house is 1 ½ inches away from the library on the map. How far apart would her house and the library be on the map if the scale were 1 inch = 6 miles?
- 4. A scale drawing of a pole is 3 cm by 5 cm. The actual tree has a dimension of 6 feet by 10 feet. What scale was used?

5. A blueprint of Samantha's beach home is being made with a scale of 2 centimeters: 3 meters. What is the scale factor?

| Name:          | Date:     |
|----------------|-----------|
| Ms. Napolitano | Equations |

Topic: Expressions and Equations CCSS: 6.NS.6, 6.EE.5, 6.EE.7, 6.EE.8 and 6.EE.9

## **Homework Day 5**

## THE NUMBER SYSTEM (6.NS.8)

Solve real-world and mathematical problems by graphing points in all four quadrants of the coordinate plane. Include use of coordinates and absolute value to find distances between points with the same first coordinate or the same second coordinate.

- 1. The coordinates of the vertices of a rectangle are (-1,4), (5,4), (5,-3), and (-1,-3). What are the dimensions of the rectangle?
- 2. The point (-3, -3) is reflected across the x-axis. What are the coordinates of the new point?

- 3. The coordinates of point A are (-5,6). The coordinates of point B are (2,6). Find the length of the line segments with end points A and B.
- 4. The coordinates of point C are (0, -2). The coordinates of point D are (0, 9). Find the length of the line segments with end points C and D.

5. Jeffrey's walks to the library every day after school. The library is located at (-5, -3) on the map. Graph and label this point. Each unit on the coordinate plane represents 1 block. What is the distance from Jeffrey's house to the library in blocks?

