**Math 9 – Analytic Geometry**  Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Homework #5: Parallel and Perpendicular Slopes** Due Date: \_\_\_\_\_\_\_\_\_\_\_\_\_\_ 5T\_\_\_

1. Identify whether each pair of lines is parallel, perpendicular, or neither.

a)  b) 

c)  d) 

2. Given the points , , , and , determine whether  and  are parallel, perpendicular, or neither.

**For the following questions, break down what you need (a slope and a point), and then use the Point-Slope Form, , to get the required equation.**

 3. Determine the Slope-Intercept for of the line parallel to  and passes through the point .

4. Determine the Standard Form of the line perpendicular to  and passes through the point .

5. Determine the Slope-Intercept Form of the line perpendicular to  and having the same y-intercept as .

6. Determine the Standard Form of the line parallel to  and has the same x-intercept as the line .

7. Determine the equation in any form which is perpendicular to  and passes through .

8. Determine the equation in any form which is parallel to  and passes through .