**Linear Inequalities**

Name \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

When graphing linear inequalities the boundary line is dotted when the inequality sign is \_\_\_\_ or \_\_\_\_.

The boundary line is solid when the inequality sign is \_\_\_\_ or \_\_\_\_.

You shade above the boundary line when y is \_\_\_\_ or \_\_\_\_ the boundary line.

You shade below the boundary line when y is \_\_\_\_ or \_\_\_\_ the boundary line.

If you are unsure as to what section of the graph is above and what section is below the boundary line then you can use a test point. This is when you pick a point somewhere on the coordinate plane and plug it into the inequality. If the inequality makes a true statement, then the side of the boundary line that contains that point gets shaded.

The solution to a system of inequalities is where the shaded section of each inequality overlaps.

Examples:

Graph the solution to the following inequalities

Graph the solution to the following systems of inequalities

Independent Practice

Graph the solution to the following inequalities

Graph the solution to the following systems of inequalities