Name
------

## ALGEBRA 2 JOURNAL Models, Inequalities & Absolute Value

## INSTRUCTIONS: Complete each of the following questions on this sheet of paper. Journals are always due on Review Day.

- 1. (a) When solving an equation containing several fractions, the best thing to do is \_\_\_\_\_\_
  - (b) If you get a result of 4 = 0 when solving an equation, then the appropriate answer is .
  - (c) If you get a result of 5 = 5 when solving an equation, then the appropriate answer is  $\dots$ .
- 2. (a) What should first be done to the compound inequality 3x + 2 > 4x 5 < 2x + 7 before attempting to solve for x?
  - (b) After solving each separate inequality for x, what final step must be performed in any compound inequality in order to determine the final solution?
  - (c) After solving and graphing a compound inequality on a number line, the solutions of an OR problem are located
  - (d) The solutions of an AND problem are located where
- 3. The testing points method for solving an inequality on a number line, the solutions of an OR problem are located
- 4. When testing points, you want the \_\_\_\_\_\_ solutions if the expression is >0, while you want the \_\_\_\_\_ solutions if the expression is < 0.
- 5. The two steps required to solve any equation or inequality containing one absolute value are: 1.\_\_\_\_\_ 2.\_\_\_\_
- 6. (a) When solving inequalities containing an absolute value, the point in the problem when you can determine whether to use AND or OR is *when* 
  - (b) You know whether to use AND or OR by remembering the saying
- 7. (a) Matrix addition/subtraction is possible when \_\_\_\_\_
  - (b) Matrix multiplication is possible when
  - (b) A 7 x 3 matrix is multiplied by a 3 x 4 matrix. The dimensions of the result will be
- 8. (a) When adding or subtracting two numbers involving significant digits, the answer should be rounded to the smallest number of \_\_\_\_\_\_ in the original measurements.
  - (b) When multiplying/dividing two numbers involving significant digits, the answer should be rounded to the smallest number of \_\_\_\_\_\_ in the original measurements.
  - (c) A multiplication calculation involves two measurements and one fixed number. You determine how many digits to round the final answer to by looking at

- 9. (a) A scatter plot has a \_\_\_\_\_\_ correlation if both variables increase or both variables decrease.
  - (b) A scatter plot has a \_\_\_\_\_\_ correlation if one variable decreases while the other variable increase.
- 10. (a) When creating a scatter plot on your calculator, you must create a \_\_\_\_\_\_

\_\_\_\_\_ document to enter the data.

- (c) To change how the graph is scaled you must go to \_\_\_\_\_\_ to make the changes.
- 11. Important Rules, Formulas, Etc.

List the following rules, formulas, or steps. <u>When giving formulas, be sure to indicate what each part</u> of the formula represents.

a) List the steps necessary for solving an inequality by testing points.

b)	List the five rules of significant digits.
	1.

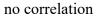
2.

5.

4.

3.

c) Draw a scatter plot showing each of the following.



positive correlation

negative correlation

d) Fill in the following table with the 6 sets of numbers.

Name of Set	Symbol	3 examples	Name of Set	Symbol	3 examples