

Unit 7: Linear Equations Day 1

Math 9 Principles

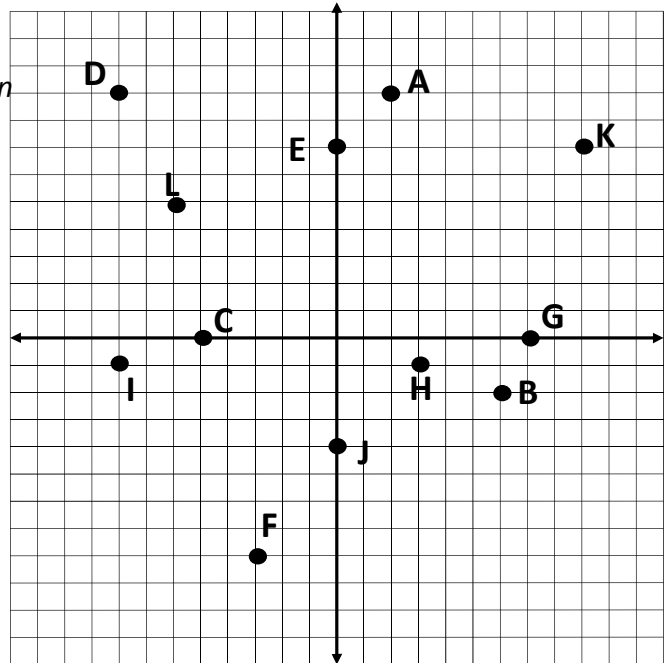
7-1 I can identify locations on the coordinate plane, calculate length, and measure slope between two points algebraically and graphically.

A) State whether each point given is in Quadrant I, Quadrant II, Quadrant III, Quadrant IV, the x-axis or the y-axis.

1. $(-3,5)$ _____	2. $(-4,-2)$ _____	3. $(-5,0)$ _____
4. $(6,-7)$ _____	5. $(0,7)$ _____	6. $(6,3)$ _____
7. $(-1,-8)$ _____	8. $(-9,4)$ _____	9. $(8,-16)$ _____

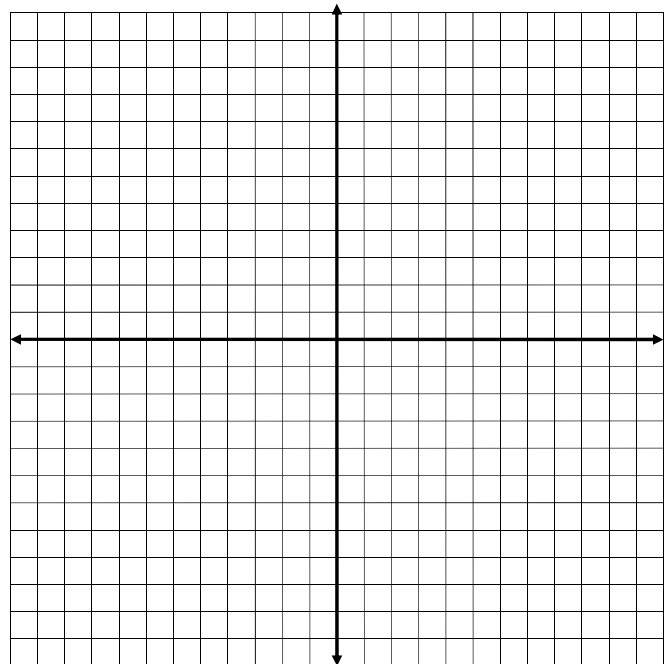
B) Specify the ordered pair at each lettered point shown on the graph.

- | | |
|----------|----------|
| A. _____ | B. _____ |
| C. _____ | D. _____ |
| E. _____ | F. _____ |
| G. _____ | H. _____ |
| I. _____ | J. _____ |
| K. _____ | L. _____ |

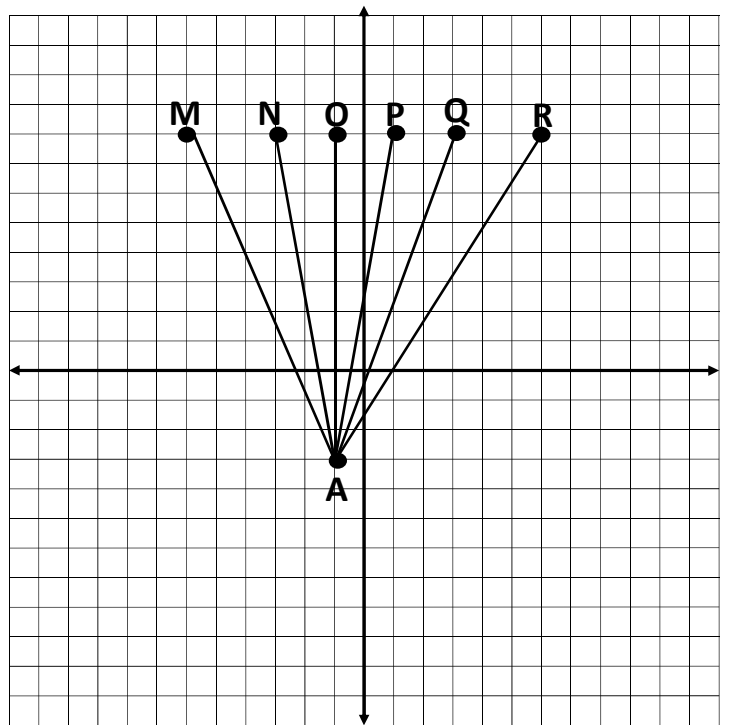
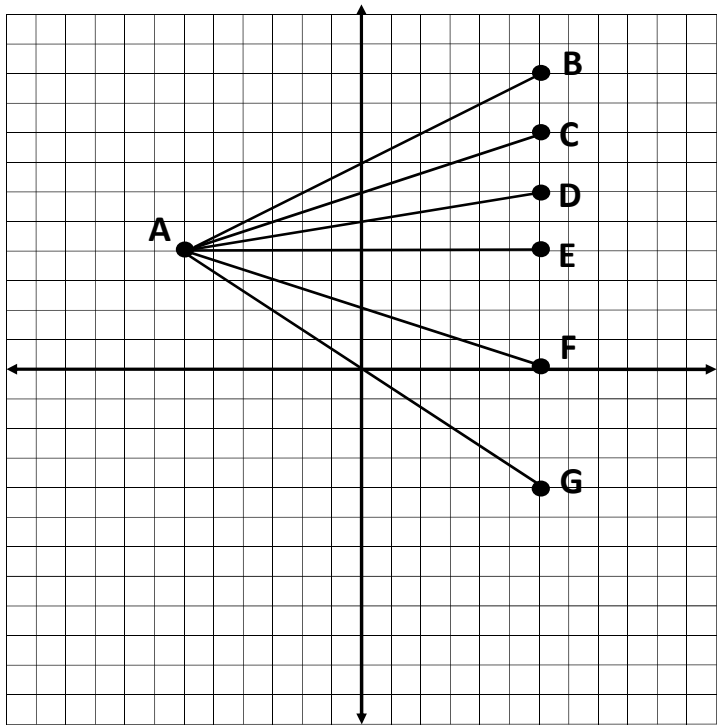


C) Sketch each path between the two given points on the graph on the right and calculate the path's length.

- $(-9,3)$ to $(-4,9)$
- $(-3,8)$ to $(6,2)$
- $(1,3)$ to $(-8,2)$
- $(-7,2)$ to $(5,-8)$
- $(8,7)$ to $(-3,-8)$



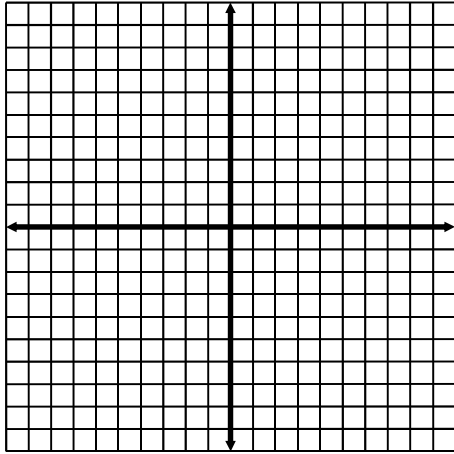
D) Find the slope of each segment in the graph. Express in lowest terms where necessary.



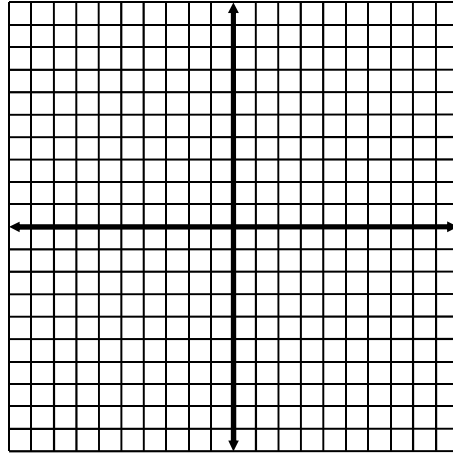
<u>Segment</u>	<u>Slope</u>	<u>Segment</u>	<u>Slope</u>
1) AB	_____	2) MA	_____
3) AC	_____	4) NA	_____
5) AD	_____	6) OA	_____
7) AE	_____	8) PA	_____
9) AF	_____	10) QA	_____
11) AG	_____	12) RA	_____

E) Determine the slope of each line segment given below. Show that you determined each by graphing each segment on the grid provided, and sketching in the rise and run for each segment. Remember to reduce slopes to lowest terms.

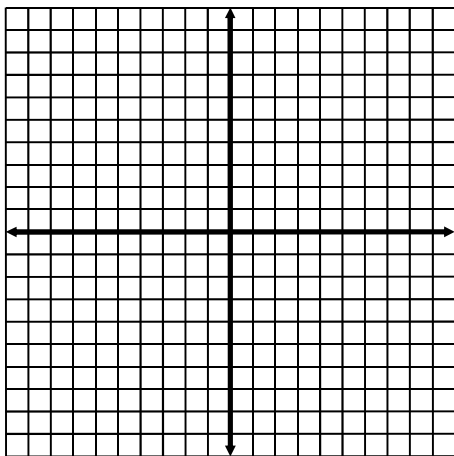
1. $(-2,7)$ to $(6,-4)$



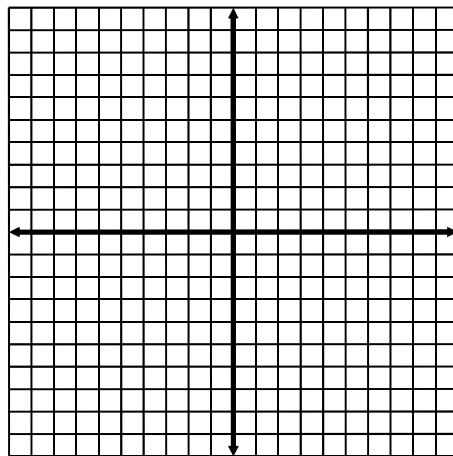
2. $(1,6)$ to $(5,-4)$



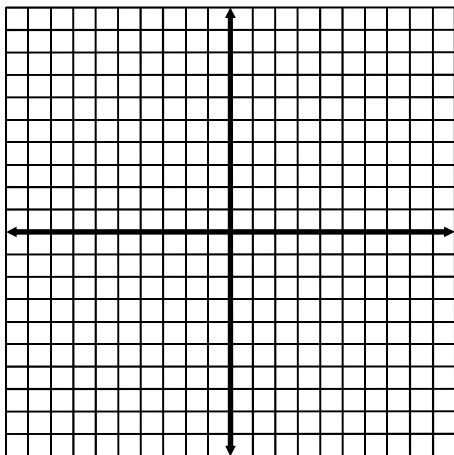
3. $(3,8)$ to $(1,-4)$



4. $(-3,7)$ to $(-3,-7)$



5. $(-4,3)$ to $(8,5)$



6. $(2,-7)$ to $(7,-7)$

