

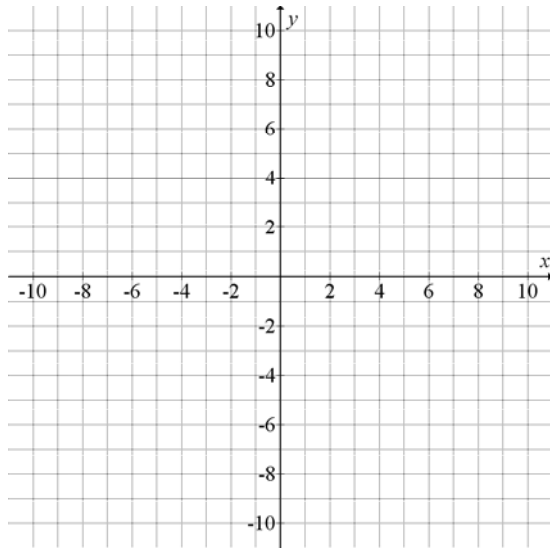
Name _____

Sheet #241: Line,Circe,Parabola

Per/Sec. _____ Date _____

Graphing calculator needed.

1. Consider the equation $y = -x^2 + 5x - 3$.
 - a) Sketch its graph. Label the axes with units and variables.
 - b) Find the y intercept.
 - c) Find the x intercepts with a calculator. Round to 3 decimals.
 - d) Find the x and y coordinates of the vertex (maximum/minimum).
 - e) Solve ALGEBRAICALLY with the quadratic equation.



Simplify.

2. $(7 + 3i) + (12 + 6i)$ 2. _____

3. $(2 + i)(3 + 5i)$ 3. _____

4. $\frac{-7}{2 - 7i}$ 4. _____

Solve using the quadratic formula.

5. $p^2 - p + 5 = 0$ 5. _____

Find the center and radius of the circle.

6. $(x - 4)^2 + (y + 2)^2 = 10$ 6. _____

7. Find the equation of the circle with center $(-2, 3)$ and radius $r = 5$. 7. _____

Write the equation of the line.

8. slope = -4 , contains point $(1, -3)$ 8. _____

9. passes through $(-3, -4)$ and $(5, 12)$ 9. _____