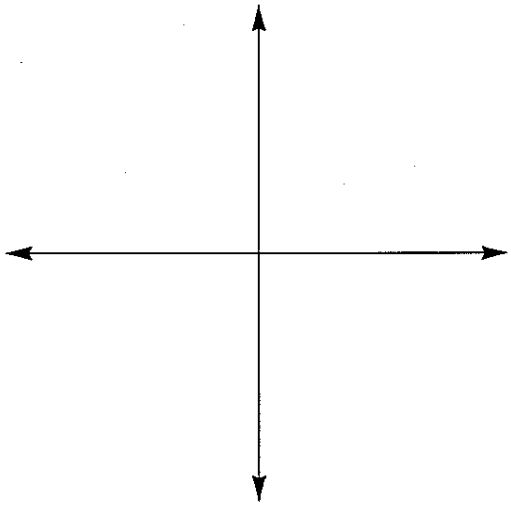
Quiz 5A - Math 130

Name: _____

1. (3 points) Find the equation in x and y corresponding to the parametric equations

$$x = 3\cos t - 1 \qquad \text{and} \qquad y = 2\sin t + 3$$

Sketch the graph, indicating the orientation.



2. (2 points) Convert the polar coordinates $\left(6, \frac{2\pi}{3}\right)$ into rectangular coordinates.

3. (2 points) Change the rectangular equation $y^2 = 6x$ into polar form (Solve your answer for r).

4. (3 points) Graph the polar equation $r = 3 + \sin\theta$. Show your work.