

# Homework Questions p.104 #13-18

18.  $3x + 5y = 3$

$(1, 0)$       $(-\frac{2}{3}, 1)$       $(-\frac{4}{3}, \frac{7}{5})$   
 $y = \frac{7}{5}$

$$\begin{array}{r} 3 \cdot 1 + 5y = 3 \\ -3 \qquad \qquad -3 \end{array}$$

$$\begin{array}{r} 5y = 0 \\ \underline{5} \\ y = 0 \end{array}$$

$$3(-\frac{2}{3}) + 5y = 3$$

$$\begin{array}{r} -2 + 5y = 3 \\ +2 \qquad \qquad +2 \end{array}$$

$$\begin{array}{r} 5y = 5 \\ \underline{5} \\ y = 1 \end{array}$$

$$y = 1$$

$$3x + 5(\frac{7}{5}) = 3$$

$$\begin{array}{r} 3x + 7 = 3 \\ \qquad \qquad -7 \end{array}$$

$$\begin{array}{r} 3x = -4 \\ \underline{3} \end{array}$$

$$x = -\frac{4}{3}$$

homework assessment  
10.19.10

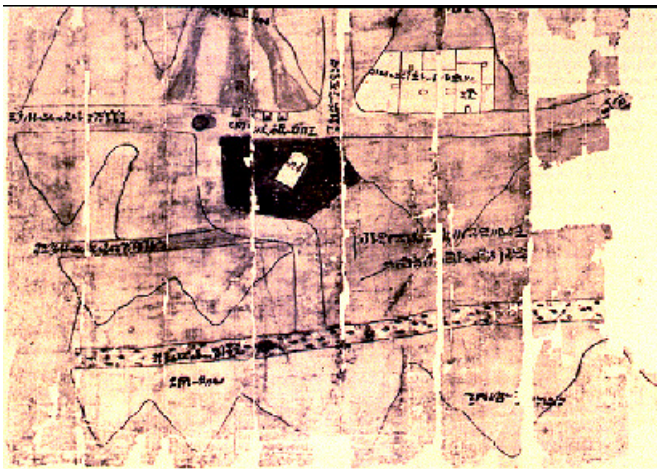
complete the ordered pairs

16.  $x + 6y = -9$

$(0, \underline{\quad}), (\underline{\quad}, 0), (-3, \underline{\quad})$

## History of Mathematics

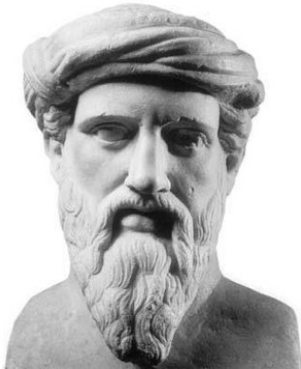
first math was used to count



very early Egyptians  
developed geometry to  
define land ownership

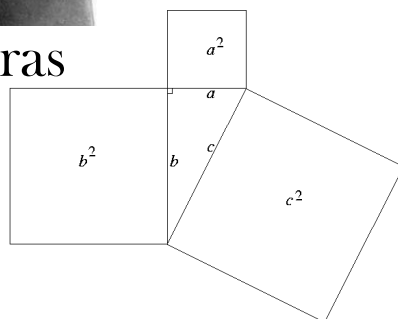
## Two branches of mathematics

### Geometry



pythagoras

c. 500 BC



### Algebra



Muhammad ibn Mūsā al-Khwārizmī

c. 800 BC

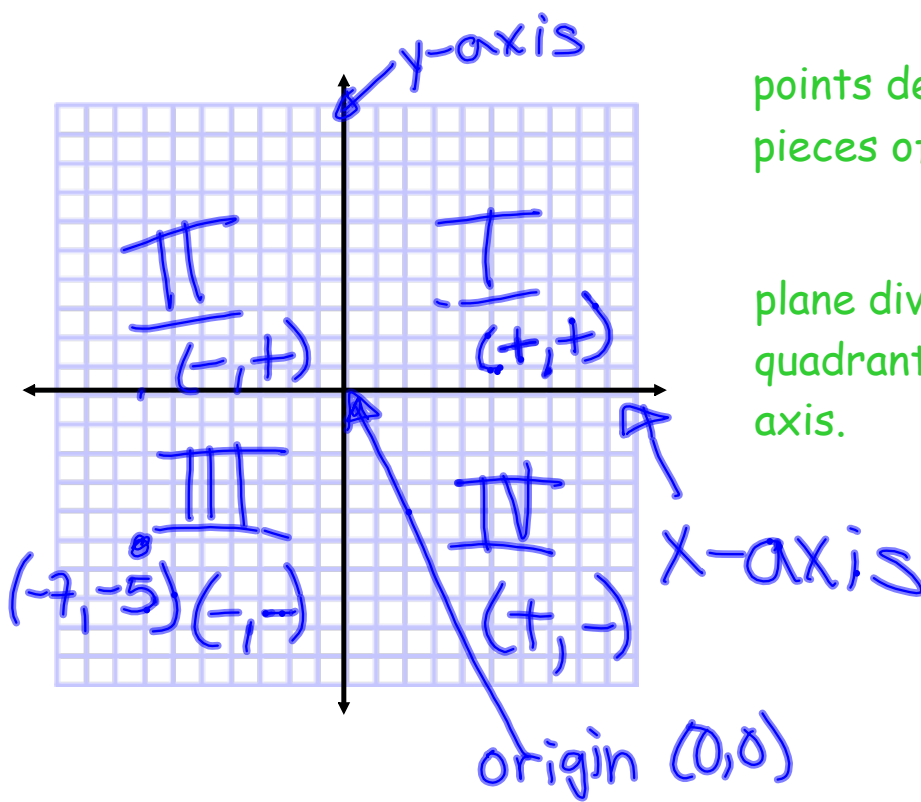
Algebra and Geometry are brought together by  
Rene Descartes in the 1600's



radical idea that shapes are  
made up of infinite number of  
points, that these points can be  
given positions, and the positions  
of these points can be described  
using algebra.

He created the Cartesian plane

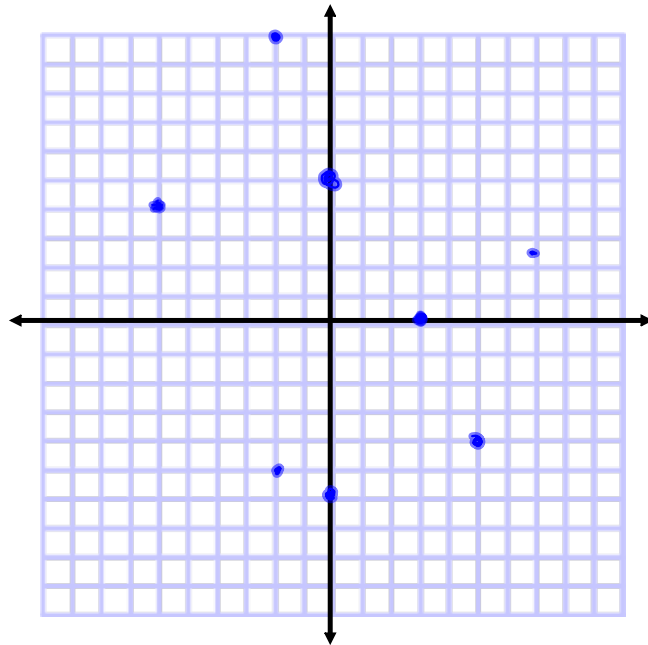
# Cartesian Plane



points described by two pieces of info.

plane divided into 4 quadrants, by the two axis.

## Let's Graph Points!



Homework:  
p.110 #13-16, write the  
coordinates of points A-E  
p.111 #2