

April 26th

Thursday

# Practise: Graph Linear Relations by Hand

1. For each relation, state the slope and y-intercept.

a)  $y = -\frac{1}{4}x + 11$

slope: \_\_\_\_\_

y-intercept: \_\_\_\_\_

b)  $y = 5x - 9$

slope: \_\_\_\_\_

y-intercept: \_\_\_\_\_

c)  $y = \frac{4}{5}x$

slope: \_\_\_\_\_

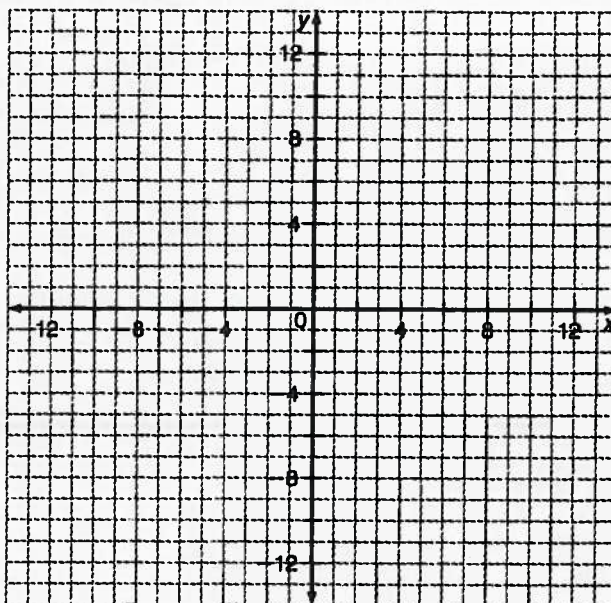
y-intercept: \_\_\_\_\_

d)  $y = -3x + \frac{9}{2}$

slope: \_\_\_\_\_

y-intercept: \_\_\_\_\_

2. Graph each line in question 1.

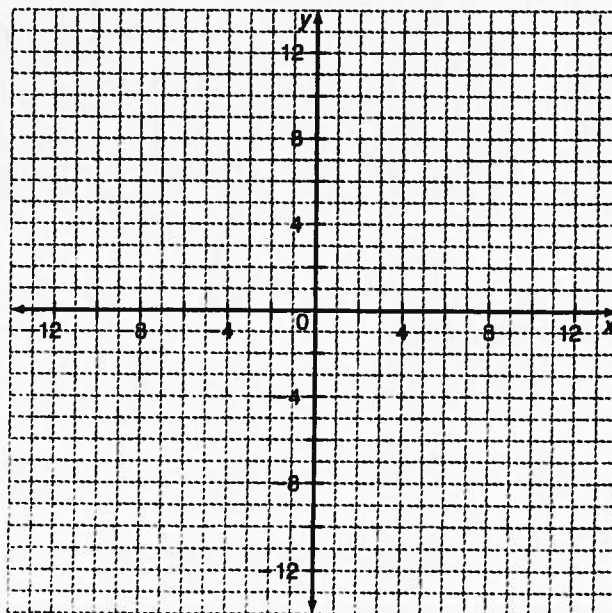


3. Graph each line from the given information.

a) through the points (2, 4) and (6, 9)

b)  $m = \frac{2}{5}$  and  $b = -4$

c)  $m = -\frac{1}{2}$  and through the point (2, 3)

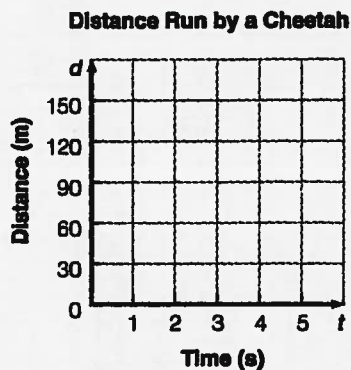


4. A cheetah can run 33 m in one second.

- a) Use this information to create a table of values starting at  $t = 0$  and going to  $t = 4$  s.

Time (s)	0	1	2	3	4
Distance (m)					

- b) Plot the data in the table and draw a line passing through the points.



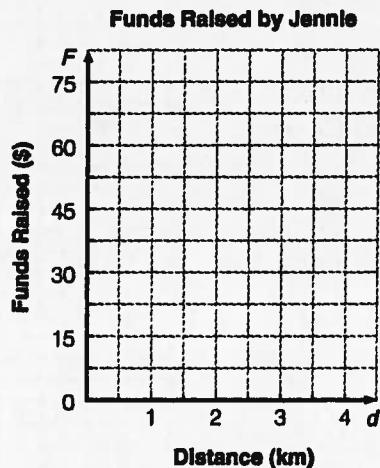
- c) Find the equation of the line you drew in part b). \_\_\_\_\_

5. Jennie plans to enter a walkathon at school, to raise money for a children's charity. Her neighbour sponsored her for \$15.00 per kilometre.

- a) Create a table of values for the 4-km walkathon.

Distance (km)	0	1	2	3	4
Funds Raised (\$)					

- b) Plot the points, then join them with a line.



- c) Find the equation for the line.

The equation for the line is \_\_\_\_\_.