

Equations - apple level

Plot in the coordinates in Geogebra and draw the graph

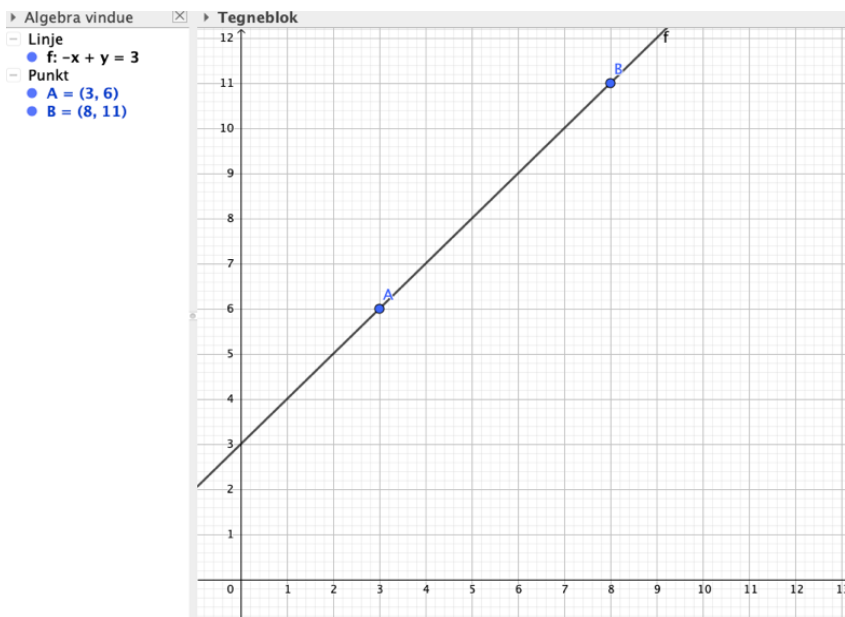
- 1) (3 ; 6) and (8 ; 11)
- 2) (2 ; 5) and (4 ; 9)
- 3) (2 ; 3) and (4 ; 7)
- 4) (14 ; 23) and (37 ; 49)
- 5) (-25 ; 11) and (16 ; -7)
- 6) (2 ; 2) and (6 ; 4)

If possible also try and find the formula for the equation using the basic formula:

$$y = ax + b$$

a = how much the graph rises/falls -

b = where the graph crosses the y-axis

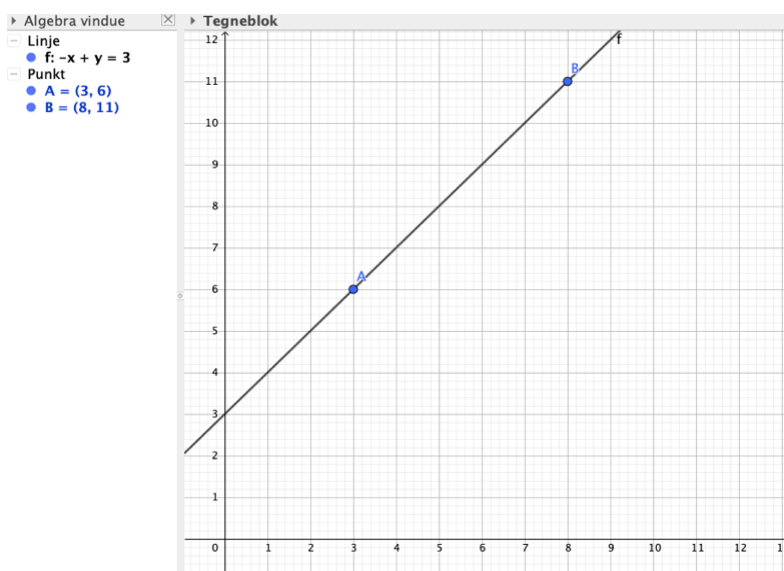


Equations - banana level

Plot in the coordinates in Geogebra and draw the graph

- 1) (3 ; 6) and (8 ; 11)
- 2) (2 ; 5) and (4 ; 9)
- 3) (2 ; 3) and (4 ; 7)
- 4) (14 ; 23) and (37 ; 49)
- 5) (-25 ; 11) and (16 ; -7)
- 6) (2 ; 2) and (6 ; 4)

You have to find the formula for the graph - you may find it by solving the equation written at the left side of the Geogebra-page or you may find the formula by reading the information of Geogebra



Equations - cherry level

Find the formula for the graph using the two points for each graph

- 1) (3 ; 6) and (8 ; 11)
- 2) (2 ; 5) and (4 ; 9)
- 3) (2 ; 3) and (4 ; 7)
- 4) (14 ; 23) and (37 ; 49)
- 5) (-25 ; 11) and (16 ; -7)
- 6) (2 ; 2) and (6 ; 4)

$$a = \frac{y_2 - y_1}{x_2 - x_1}$$

$$b = y_1 - a * x_1$$

(3 ; 6) and (8 ; 11)

$$a = \frac{11-6}{8-3} \Leftrightarrow a = \frac{5}{5} \Leftrightarrow a = 1$$

$$b = 6 - 1 * 3 \Leftrightarrow b = 6 - 3 \Leftrightarrow b = 3$$

$$f(x) = 1x + 3$$

