

Name

Date



GRADIENT OF A LINEAR EQUATION SHEET 2

- Take the two points (x_1, y_1) and (x_2, y_2) .
- Find the gradient using the equation $m = (y_2 - y_1) / (x_2 - x_1)$.
- Give your answer as a whole number or as a fraction in simplest form.

1) Points (2, 6) and (7, 21)

2) Points (0, 3) and (3, 21)

3) Points (2, 3) and (6, -1)

4) Points (0, 7) and (5, -3)

5) Points (-1, 4) and (3, 12)

6) Points (2, 4) and (7, 29)

7) Points (-2, 3) and (4, 6)

8) Points (-1, 11) and (5, -19)

9) Points (0, 4) and (3, -17)

10) Points (8, -2) and (2, 1)

11) Points (-2, -11) and (9, 33)

12) Points (-6, 29) and (5, -4)



GRADIENT OF A LINEAR EQUATION SHEET 2 ANSWERS

- 1) Points (2, 6) and (7, 21)
 $m = (21 - 6)/(7 - 2) = 15/5 = 3$
The gradient is 3
- 2) Points (0, 3) and (3, 21)
 $m = (21 - 3)/(3 - 0) = 18/3 = 6$
The gradient is 6
- 3) Points (2, 3) and (6, -1)
 $m = (-1 - 3)/(6 - 2) = -4/4 = -1$
The gradient is -1
- 4) Points (0, 7) and (5, -3)
 $m = (-3 - 7)/(5 - 0) = -10/5 = -2$
The gradient is -2
- 5) Points (-1, 4) and (3, 12)
 $m = (12 - 4)/(3 - (-1)) = 8/4 = 2$
The gradient is 2
- 6) Points (2, 4) and (7, 29)
 $m = (29 - 4)/(7 - 2) = 25/5 = 5$
The gradient is 5
- 7) Points (-2, 3) and (4, 6)
 $m = (6 - 3)/(4 - (-2)) = 3/6 = \frac{1}{2}$
The gradient is $\frac{1}{2}$
- 8) Points (-1, 11) and (5, -19)
 $m = (-19 - 11)/(5 - (-1)) = -30/6 = -5$
The gradient is -5
- 9) Points (0, 4) and (3, -17)
 $m = (-17 - 4)/(3 - 0) = -21/3 = -7$
The gradient is -7
- 10) Points (8, -2) and (2, 1)
 $m = (1 - (-2))/(2 - 8) = 3/-6 = -\frac{1}{2}$
The gradient is $-\frac{1}{2}$
- 11) Points (-2, -11) and (9, 33)
 $m = (33 - (-11))/(9 - (-2)) = 44/11 = 4$
The gradient is 4
- 12) Points (-6, 29) and (5, -4)
 $m = (-4 - 29)/(5 - (-6)) = -33/11 = -3$
The gradient is -3