Q001
Question: Which of the following representations is a function?
Correct answer: Graph A
Wrong answer 1: Graph B
Wrong answer 2: Graph C
Wrong answer 3: Graph D
Feedback:

Q002
Question: Which kind of function is represented in the table ?
Correct answer: Quadratic
Wrong answer 1: Linear
Wrong answer 2: Exponential
Wrong answer 3: Hyperbolic
Feedback:

Q003
Question: What kind of function corresponds to the graph?
Correct answer: Exponential
Wrong answer 1: Quadratic
Wrong answer 2: Linear
Wrong answer 3: Hyperbolic
Feedback:

Q004
Question: Which of the following formulas matches with a linear function?
Correct answer: y = ax + b
Wrong answer 1: y = x^2 + b
Wrong answer 2:
Wrong answer 3: y=-4x^2 + b
Feedback:

Q005
Question: Which of the following formulas matches with an increasing linear function?
Correct answer: y = 4x + 3
Wrong answer 1: y = -4x + 3
Wrong answer 2: y = -4x - 3
Wrong answer 3: y = -4x
Feedback: y = 4x + 3 is correct because the sign of the slope (number before the x) is positive

Q006
Question: Which of the following formulas matches with a decreasing linear function?
Correct answer: y = -9x + 1
Wrong answer 1: y = 9x - 1
Wrong answer 2: y = 9x +1
Wrong answer 3: y = 9x
Feedback: y = -9x + 1 is correct because the sign of the slope (number before the x) is negative

Q007
Question: What value goes in the green space ?
Correct answer: 16
Wrong answer 1: 14
Wrong answer 2: 18
Wrong answer 3: None of them
Feedback: Value 16 is correct. The rate of change is constante and equal to 3 (diference between the y-values -2 and -11 divided by the difference between the correspondent x-values 1 and -4). The difference between the x-values 5 and -1 is 6 and because the rate is 3 you know that the difference between their correspondent y-values must be 3 times their difference (3x6=18). To calculate the y-value for x=5 you add 18 to the y-value for x=-1. That is -2+18=16.
Image:

x	-4	-2	-1	5
f(x)	-11		-2	

Q008
Question: A 60-gallon tank is initially full of water and being drained at a constant rate of 9 gallons per minute. Write a formula that models the number of gallons of water in the tank after x minutes.
Correct answer: y=9x+60
Wrong answer 1: y=(1/9)x+60
Wrong answer 2: y=-9x+60
Wrong answer 3: None of them
Feedback: y=9x+60 is correct because the rate of change is 9 and the y-intercept is 60 (at x=0 minutes there was y=60 gallon water).

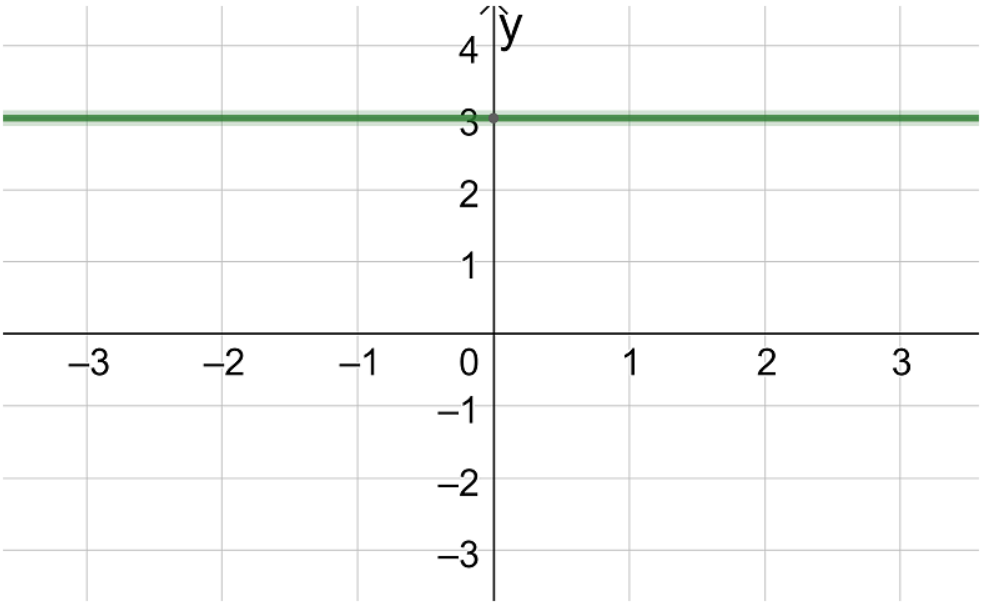
Q009
Question: When x is multiplied by 3
Correct answer: then y will be multiplied by 6. Which of the following graphs represents this statement?
Wrong answer 1: Graph B
Wrong answer 2: Graph C
Wrong answer 3: Graph A
Feedback: Q009_image1

Q010
Question: Given the table. Which is the corresponding formula?
Correct answer: y=6x
Wrong answer 1: y=-6x
Wrong answer 2: y=6
Wrong answer 3: y=6x+1
Feedback: y=6x is correct. The rate of change is constante and equal to 6 (diference between the y-values 30 and 12 divided by the difference between the correspondent x-values 5 and 3).
Image:

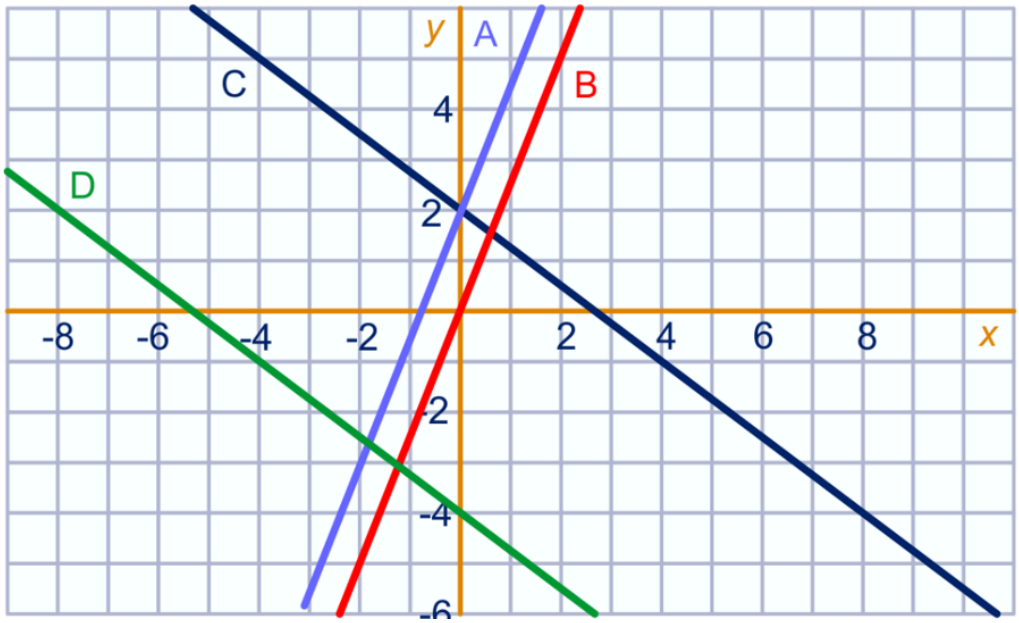
x	-2	3	5
y	-12	18	30

Q011
Question: A good grows evenly (linear). At 12 o'clock there is 10 kg
Correct answer: at 20 o'clock there is 34 kg. What is the quantity at 16 o'clock?
Wrong answer 1: 22kg
Wrong answer 2: 30kg
Wrong answer 3: 14kg
Feedback:

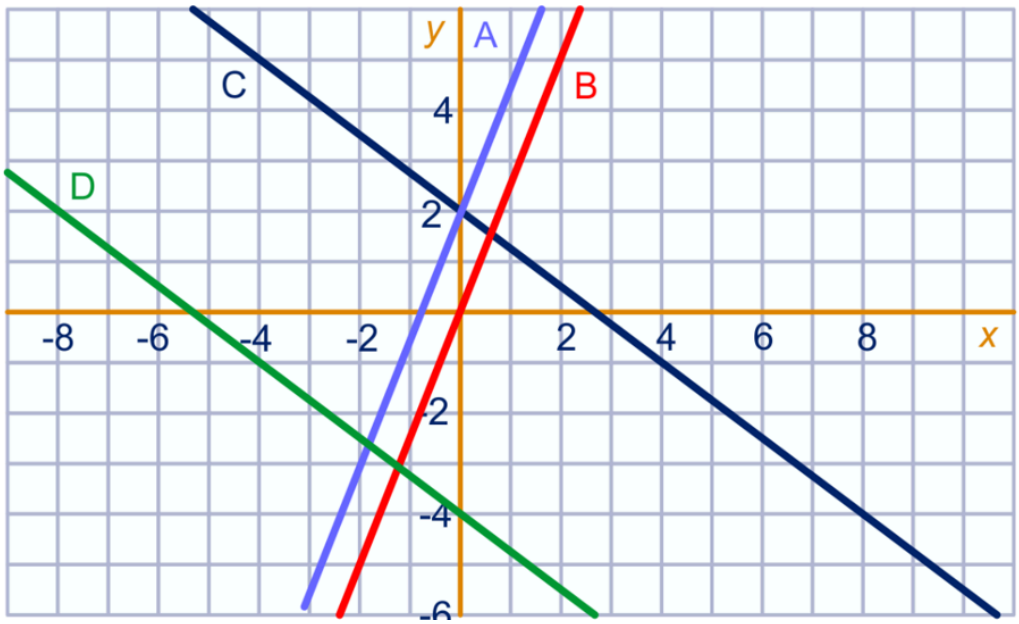
Q012
Question: What is the equation of this line?
Correct answer: y=3
Wrong answer 1: x=3
Wrong answer 2: x=3y
Wrong answer 3: y=3x
Feedback: y=3 is correct. For each x-value the correspondent y-value is 3. In other words the rate of change is constante and equal to zero and the y-intercept is 3.
Image:



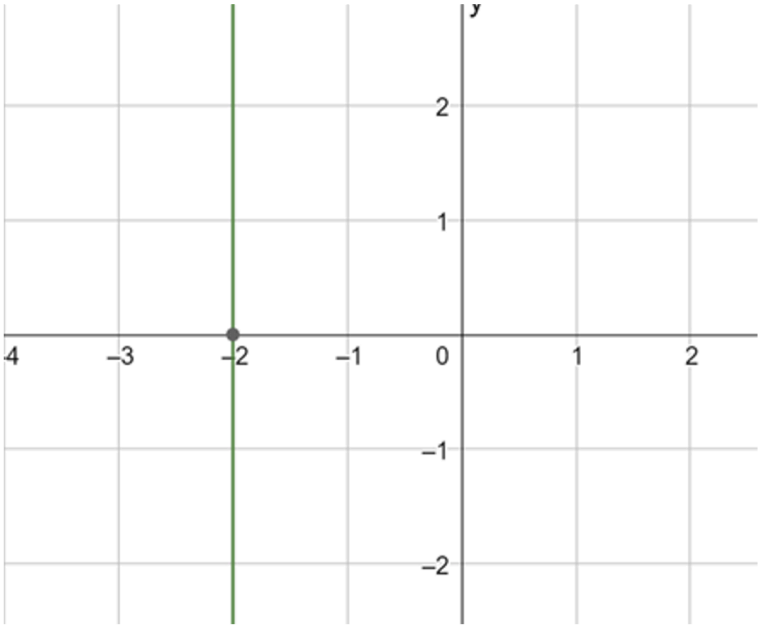
Q013
Question: Drawn are four straight lines. Which formula corresponds to line D?
Correct answer: y= - 0
Wrong answer 1: 75x-4
Wrong answer 2: y= 4 - 0
Wrong answer 3: 75x
Feedback: G2
Image:



Q014
Question: Drawn are four straight lines. Which graph corresponds to the formula y= 2−0
Correct answer: 75x
Wrong answer 1: Line C
Wrong answer 2: Line B
Wrong answer 3: Line A
Feedback: Q013_image1
Image:



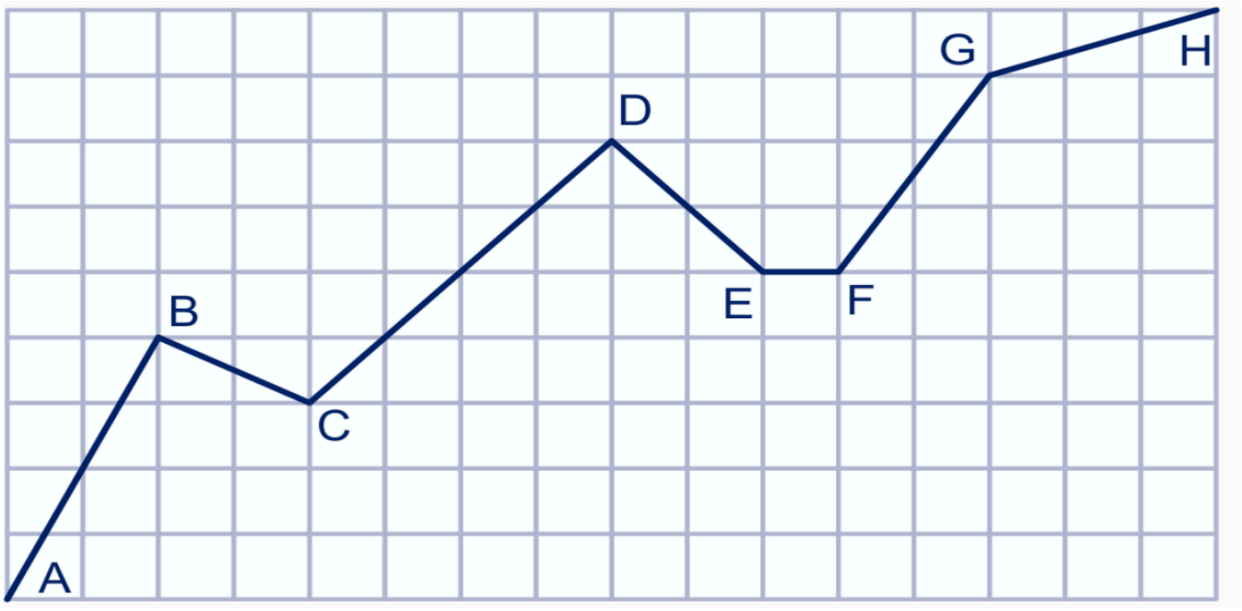
Q015
Question: What is the equation of this line?
Correct answer: x= -2
Wrong answer 1: x= -2y
Wrong answer 2: x= -2y
Wrong answer 3: y= -2
Feedback: x= -2 is correct because the line is vertical and goes through the point (-2
Image:



Q016
Question: Given the formulas y=ax and y=ax+5 for a certain number a. How do their slopes compare to each other?
Correct answer: They have the same steep
Wrong answer 1: they have the same steep but different magnitude
Wrong answer 2: they have different steep and equal magnitude
Wrong answer 3: They have different steep and magnitude
Feedback: They have the same slope because both formulas have 'a' before the x.

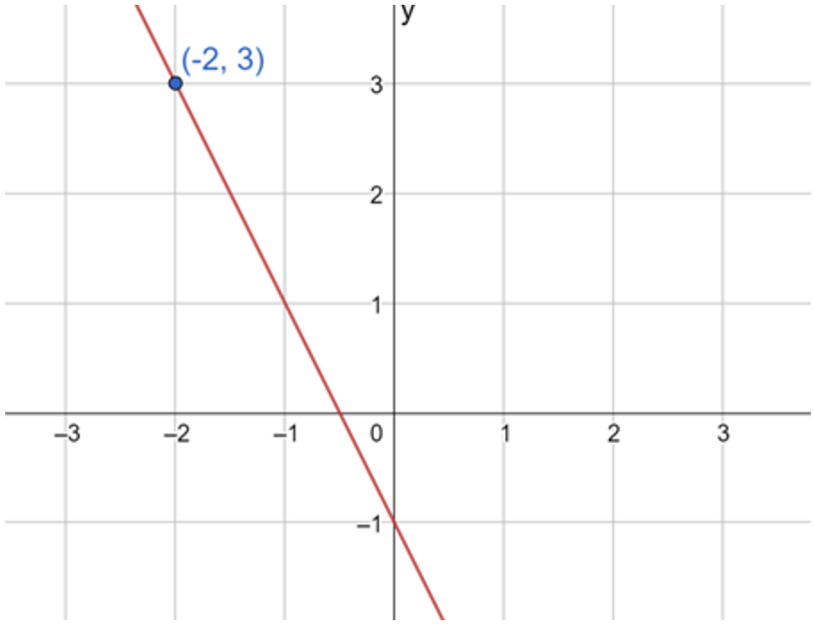
Q017
Question: Given the formulas y=ax and y=ax+3 for a certain number a. What do you know about the rate of change?
Correct answer: It is the same
Wrong answer 1: it is different
Wrong answer 2: it is not possible to know
Wrong answer 3: I don't know
Feedback: It is the same because both formulas have 'a' as slope.

Q018
Question: See the road from A to H. What is the slope of the line segment CD?
Correct answer: equal to 1
Wrong answer 1: less than 1
Wrong answer 2: greater than 1
Wrong answer 3: I don't know
Feedback: equal to 1 is correct. The slope is equal to the diference between the y-values divided by the difference between the correspondent x-values (for instance 4:4=1)
Image:

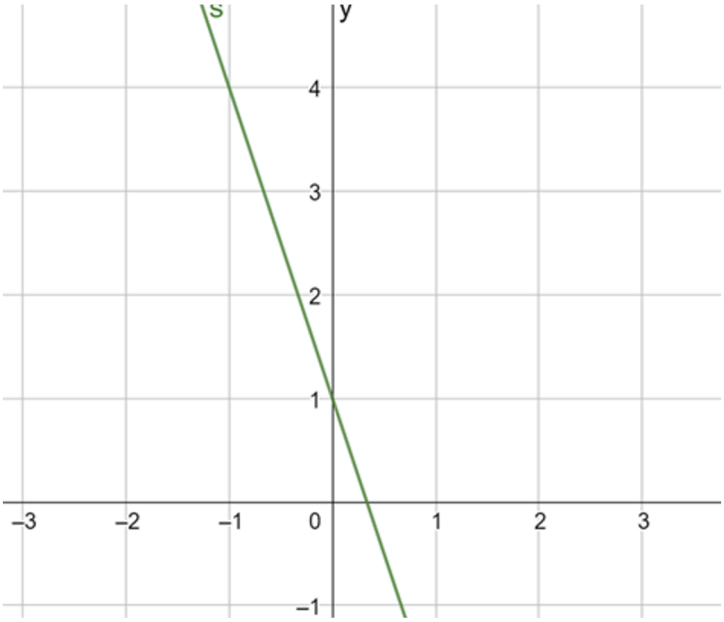


Q019
Question: Which of the following rules
Correct answer: F
Wrong answer 1: G or H is not a function?
Wrong answer 2: H links a person to her/his grandfather
Wrong answer 3: G links a person to her/his mother.
Feedback: x

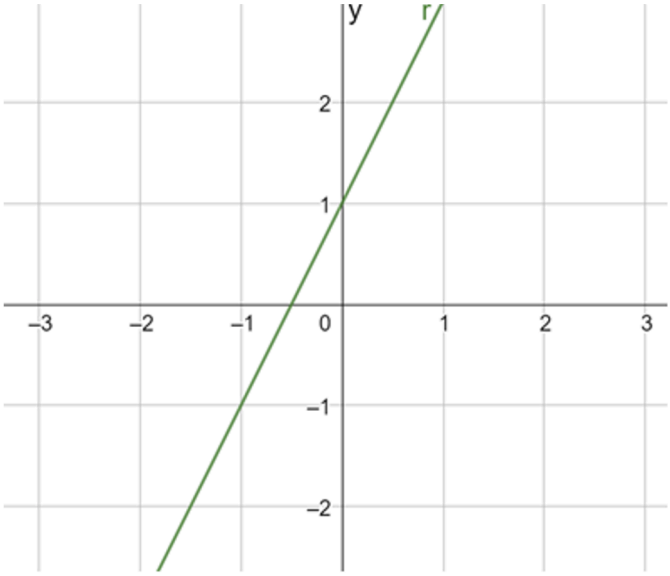
Q020
Question: Using the given point
Correct answer: which equation is NOT the equation of this straight line?
Wrong answer 1: y -1 = -2x
Wrong answer 2: 2y = -4x –
Wrong answer 3: y +1 = -2x
Feedback: G4
Image:



Q021
Question: What is the equation of the line that is parallel to line s?
Correct answer: "y= -3x-2 "
Wrong answer 1: " y= -4x+1 "
Wrong answer 2: y=3x+1
Wrong answer 3: y=1/3 x-2
Feedback: y= -3x-2 is correct because its slope is equal (slope is -3)
Image:



Q022
Question: What is the equation of the line that is perpendicular to line r?
Correct answer: y= -0
Wrong answer 1: 5x+1
Wrong answer 2: y=-2x+1
Wrong answer 3: y=2x-2
Feedback: G4
Image:



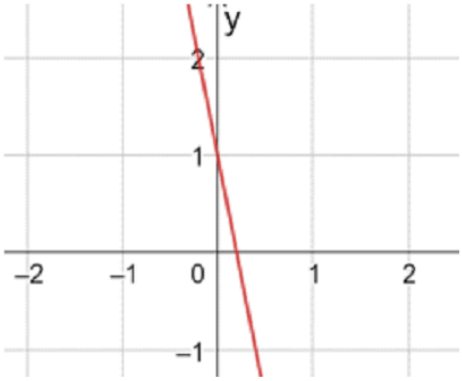
Q023
Question: Which lines are parallel? A: y = 2x + 3. B: y = 2x – 5. C: y = -2x +
Correct answer: A & B
Wrong answer 1: B & C
Wrong answer 2: A & C
Wrong answer 3: A & B & C
Feedback: A & B have equal slope 2

Q024
Question: "What is the equation of the line: perpendicular to the line y = ½x - 7 and passing through the point (3
Correct answer: -4)?"
Wrong answer 1: y = -2x + 2
Wrong answer 2: y = ½x −
Wrong answer 3: y = 2x −
Feedback:

Q025
Question: "What is the equation of the line: parallel to the line y = -¼x + 5 and passing through the point (2
Correct answer: -1)"
Wrong answer 1: y = -¼x ⍰
Wrong answer 2: y = ¼x −
Wrong answer 3: y = 4x −
Feedback:

Q026
Question: Which function’s graph is the steepes
Correct answer: Function 1
Wrong answer 1: Function 2
Wrong answer 2: Function 3
Wrong answer 3: Function 4
Feedback: Function 1 is correct because the slope has the highest magnitude (or value)
Image:

Function 1



Function 2

x	y
-2	5
-1	2
0	-1
1	-4

Function 3

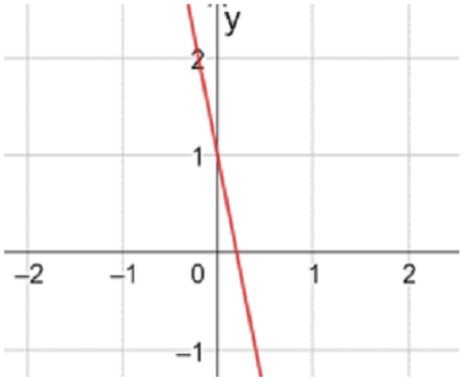
$y = 5x + 6$

Function 4

The slope is 1 and the y-intercept is -3

Q027
Question: Which functions have graphs with slopes greater than -4?
Correct answer: functions 2; 3 and 4
Wrong answer 1: functions 1; 2 and 3
Wrong answer 2: function 1; 2 and 4
Wrong answer 3: Function 1; 3 and 4
Feedback: functions 2; 3 and 4 is the correct option
Image:

Function 1



Function 2

x	y
-2	5
-1	2
0	-1
1	-4

Function 3

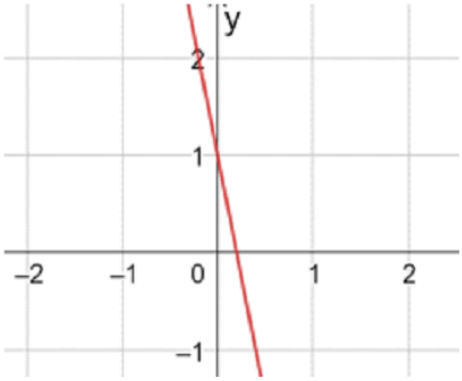
$y = 5x + 6$

Function 4

The slope is 1 and the y-intercept is -3

Q028
Question: Which function has the graph with a y-intercept farthest from 0?
Correct answer: Function 3
Wrong answer 1: Function 1
Wrong answer 2: Function 2
Wrong answer 3: Function 4
Feedback: Function 3 is correct
Image:

Function 1



Function 2

x	y
-2	5
-1	2
0	-1
1	-4

Function 3

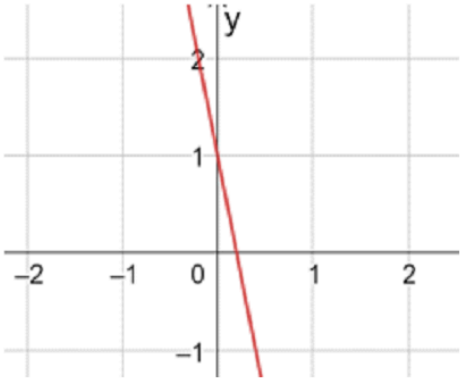
$y = 5x + 6$

Function 4

The slope is 1 and the y-intercept is -3

Q029
Question: Which function's graph is the steepes
Correct answer: Function 1
Wrong answer 1: Function 2
Wrong answer 2: Function 3
Wrong answer 3: Function 4
Feedback: Function 1 is correct because the slope has the highest magnitude (or value)
Image:

Function 1



Function 2

x	y
-2	5
-1	2
0	-1
1	-4

Function 3

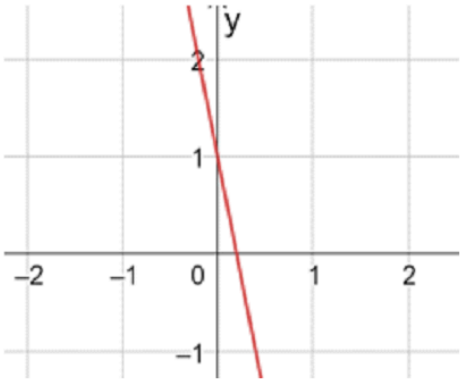
$y = 2x + 6$

Function 4

The slope is 1 and the y-intercept is -3

Q030
Question: Which functions have graphs with slopes smaller than or equal to 1?
Correct answer: functions 1; 2 and 4
Wrong answer 1: Functions 1; 3 and 4
Wrong answer 2: function 1; 2 and 3
Wrong answer 3: functions 2; 3 and 4
Feedback: functions 1; 2 and 4 is the correct option
Image:

Function 1



Function 2

x	y
-2	5
-1	2
0	-1
1	-4

Function 3

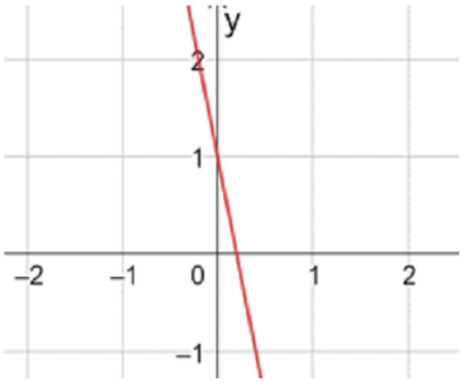
$y = 2x + 6$

Function 4

The slope is 1 and the y-intercept is -3

Q031
Question: Which function has the graph with a y-intercept farthest from 0?
Correct answer: Function 3
Wrong answer 1: Function 1
Wrong answer 2: Function 2
Wrong answer 3: Function 4
Feedback: Function 3 is correct
Image:

Function 1



Function 2

x	y
-2	5
-1	2
0	-1
1	-4

Function 3

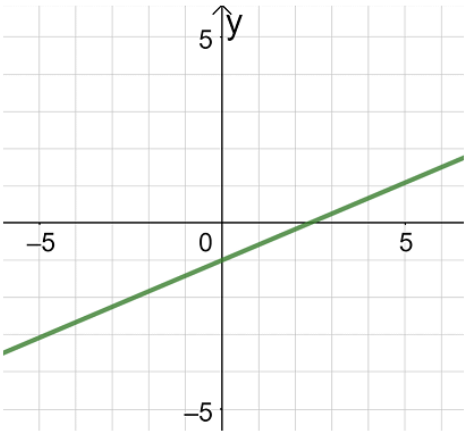
$y = 2x + 6$

Function 4

The slope is 1 and the y-intercept is -3

Q032
Question: Which function's graph is the steepes
Correct answer: Function 2
Wrong answer 1: Function 1
Wrong answer 2: Function 3
Wrong answer 3: Function 4
Feedback: Function 2 is correct because the slope has the highest magnitude (or value)
Image:

Function 1



Function 2

x	y
-2	1
-1	-1
0	-3
1	-5

Function 3

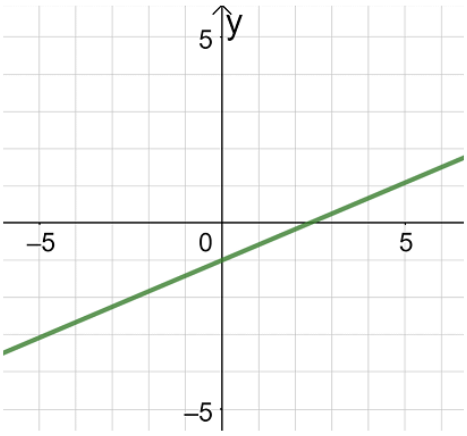
$$y = x + 5$$

Function 4

The slope is -1 and the y-intercept is 3

Q033
Question: Which functions have graphs with slopes smaller than 1?
Correct answer: functions 1; 2 and 4
Wrong answer 1: Functions 1; 3 and 4
Wrong answer 2: function 1; 2 and 3
Wrong answer 3: functions 2; 3 and 4
Feedback: functions 1; 2 and 4 is the correct option
Image:

Function 1



Function 2

x	y
-2	1
-1	-1
0	-3
1	-5

Function 3

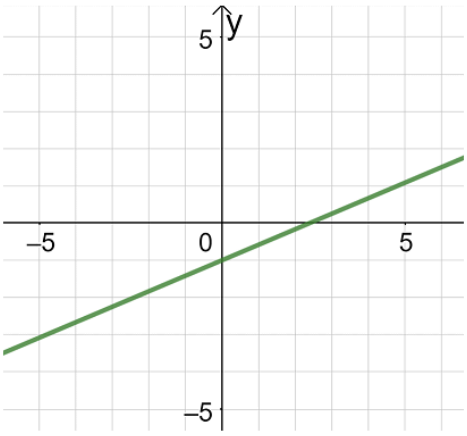
$y = x + 5$

Function 4

The slope is -1 and the y-intercept is 3

Q034
Question: Which function has the graph with a y-intercept farthest from 0?
Correct answer: Function 3
Wrong answer 1: Function 1
Wrong answer 2: Function 2
Wrong answer 3: Function 4
Feedback: Function 3 is correct
Image:

Function 1



Function 2

x	y
-2	1
-1	-1
0	-3
1	-5

Function 3

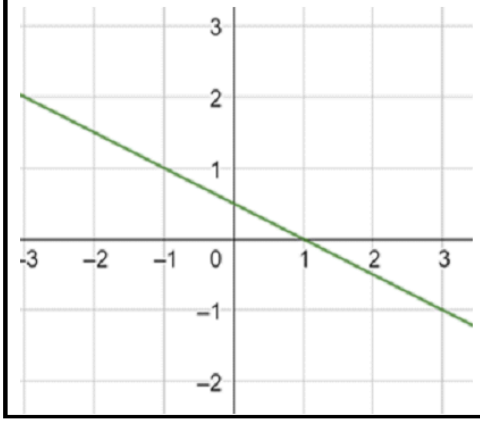
$$y = x + 5$$

Function 4

The slope is -1 and the y-intercept is 3

Q035
Question: Which function's graph is the steepes
Correct answer: Function 2
Wrong answer 1: Function 1
Wrong answer 2: Function 3
Wrong answer 3: Function 4
Feedback: Function 2 is correct because the slope has the highest magnitude (or value)
Image:

Function 1



Function 2

x	y
-2	-9
-1	-5
0	-1
1	3

Function 3

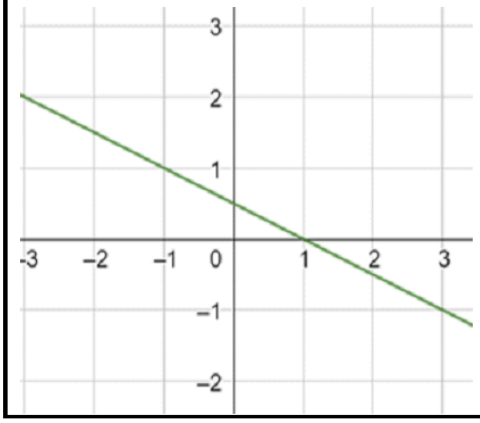
$y = 3x - 3$

Function 4

The slope is 2 and the y-intercept is -1

Q036
Question: Which functions have graphs with slopes greater than or equal to 2
Correct answer: functions 2; 3 and 4
Wrong answer 1: Functions 1; 3 and 4
Wrong answer 2: function 1; 2 and 3
Wrong answer 3: function 1; 2 and 4
Feedback: functions 2; 3 and 4 is the correct option
Image:

Function 1



Function 2

x	y
-2	-9
-1	-5
0	-1
1	3

Function 3

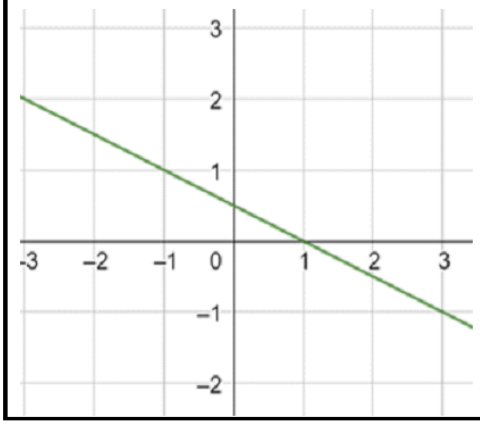
$y = 3x - 3$

Function 4

The slope is 2 and the y-intercept is -1

Q037
Question: Which function has the graph with a y-intercept farthest from 0
Correct answer: Function 3
Wrong answer 1: Function 1
Wrong answer 2: Function 2
Wrong answer 3: Function 4
Feedback: Function 3 is correct
Image:

Function 1



Function 2

x	y
-2	-9
-1	-5
0	-1
1	3

Function 3

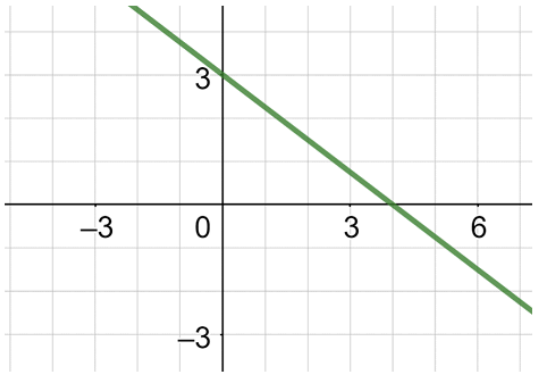
$y = 3x - 3$

Function 4

The slope is 2 and the y-intercept is -1

Q038
Question: Which function's graph is the steepes
Correct answer: Function 4
Wrong answer 1: Function 1
Wrong answer 2: Function 2
Wrong answer 3: Function 3
Feedback: Function 4 is correct because the slope has the highest magnitude (or value)
Image:

Function 1



Function 2

x	y
-2	-8
-1	-7
0	-6
1	-5

Function 3

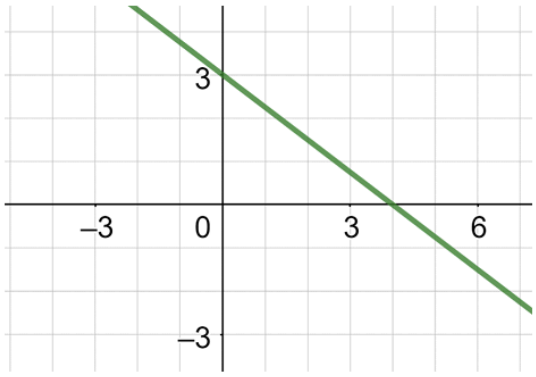
$y = 0{,}5x + 2$

Function 4

The slope is -2 and the y-intercept is 4

Q039
Question: Which functions have graphs with slopes smaller than 1
Correct answer: Functions 1; 3 and 4
Wrong answer 1: function 1; 2 and 4
Wrong answer 2: function 1; 2 and 3
Wrong answer 3: function 2; 3 and 4
Feedback: Functions 1; 3 and 4 is the correct option
Image:

Function 1



Function 2

x	y
-2	-8
-1	-7
0	-6
1	-5

Function 3

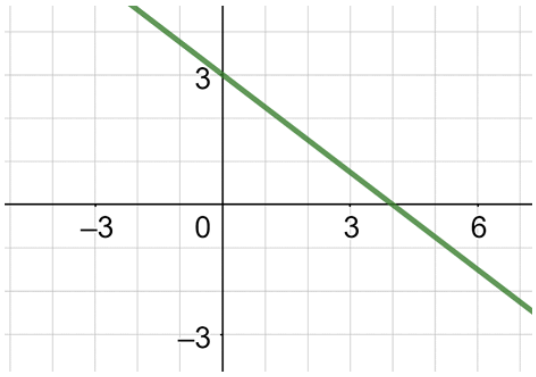
$y = 0{,}5x + 2$

Function 4

The slope is -2 and the y-intercept is 4

Q040
Question: Which function has the graph with a y-intercept farthest from 0
Correct answer: Function 2
Wrong answer 1: Function 1
Wrong answer 2: Function 3
Wrong answer 3: Function 4
Feedback: Function 2 is correct
Image:

Function 1



Function 2

x	y
-2	-8
-1	-7
0	-6
1	-5

Function 3

$y = 0{,}5x + 2$

Function 4

The slope is -2 and the y-intercept is 4

Q041
Question: What is the missing value in the table?
Correct answer: 3
Wrong answer 1: 4
Wrong answer 2: 5
Wrong answer 3: 6
Feedback: Value 3 is correct. The rate of change is constante and equal to 2 (diference between the y-values 1 and -1 divided by the difference between the correspondent x-values -1 and -2). To calculate the y-value for x=0 you add the rate 2 to the y-value for x=-1. That is 1+2=3.
Image:

x	-2	-1	0	1	2
y	-1	1		5	7

Q042
Question: What is the missing value in the table?
Correct answer: -1
Wrong answer 1: -2
Wrong answer 2: 0
Wrong answer 3: 1
Feedback: Value -1 is correct. The rate of change is constante and equal to 3 (diference between the y-values -4 and -7 divided by the difference between the correspondent x-values -1 and -2). To calculate the y-value for x=0 you add 3 to the y-value for x=-1. That is -4+3=-1.

Q043
Question: How are the lines of the equations y=3x-8 and 2y-6x+16=0 related to each other?
Correct answer: The same line
Wrong answer 1: Parallel lines
Wrong answer 2: Perpendicular lines
Wrong answer 3: Lines that are neither parallel nor perpendicular
Feedback: The lines are the same. The equation 2y-6x+16=0 can be written as 2y=6x-16. Divide both sides by 2 and you get y=3x-8

Q044
Question: Which lines are parallel: A: 5x=y-1 B: y=5x –1 C: 20x-4y
Correct answer: They are all parallel
Wrong answer 1: A &B
Wrong answer 2: B & C
Wrong answer 3: A & C
Feedback: They are all parallel because they have equal slope: 5

Q045
Question: What is the equation of the line that is perpendicular to the line 5x-3y+30 and passes through the point (-2; 7)
Correct answer: 5y+3x=29
Wrong answer 1: 3y+5x=25
Wrong answer 2: 5y-3x=41
Wrong answer 3: 5y-3x=-31
Feedback: 5y+3x=29 is correct

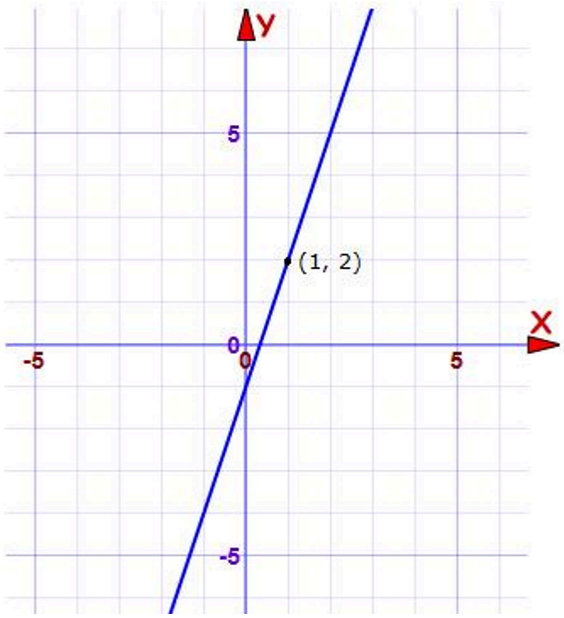
Q046
Question: What is the x-coordinate of the intersection point for the lines 2x+5y=21 and x+y=3?
Correct answer: -2
Wrong answer 1: -5
Wrong answer 2: 2
Wrong answer 3: 5
Feedback: Option -2 is correct

Q047
Question: What is the y-coordinate of the intersection point for the lines 7x+2y=3 and x-3y=30?
Correct answer: -9
Wrong answer 1: -3
Wrong answer 2: 3
Wrong answer 3: 9
Feedback: Option -9 is correct

Q048
Question: If 2x-3y=24 and 3x+4y=2; what is the value of x-y?
Correct answer: 10
Wrong answer 1: 2
Wrong answer 2: 22
Wrong answer 3: 26
Feedback: 10 is correct

Q049
Question: If a+b=5 and 3a+2b=20; then what is 3a+b equal to?
Correct answer: 25
Wrong answer 1: 10
Wrong answer 2: 15
Wrong answer 3: 20
Feedback: 25 is correct. There are several strategies possible.

Q050
Question: Using the given point; what is the equation of this straight line?
Correct answer: y - 2 = 3(x - 1)
Wrong answer 1: y = 3x –
Wrong answer 2: y - 2 = 1/3(x - 1)
Wrong answer 3: y - 1 = 3(x - 2)
Feedback: y - 2 = 3(x - 1) is correct
Image:



Q051
Question: Which of the following graphs represents a linear function?
Correct answer: Graph C
Wrong answer 1: Graph A
Wrong answer 2: Graph B
Wrong answer 3: Graph D
Feedback: Graph C is correct

Q052
Question: Which of the following tables represents a linear function?
Correct answer: D
Wrong answer 1: A
Wrong answer 2: B
Wrong answer 3: C
Feedback: Table D is correct because the rate of change is constante (difference between the y-values divided by the difference between the correspondent x-values)
Image:

x	*y*
1	5
2	10
3	5

A

x	*y*
1	3
2	6
3	12

B

x	*y*
1	1
2	4
3	9

C

x	*y*
1	7
2	9
3	11

D

Q053
Question: Which of these lines has slope -5?
Correct answer: c
Wrong answer 1: a
Wrong answer 2: b
Wrong answer 3: d
Feedback: graph (c) is correct because the sign of slope is negative (decreasing graph) and greater magnitude (the graph is more steep)

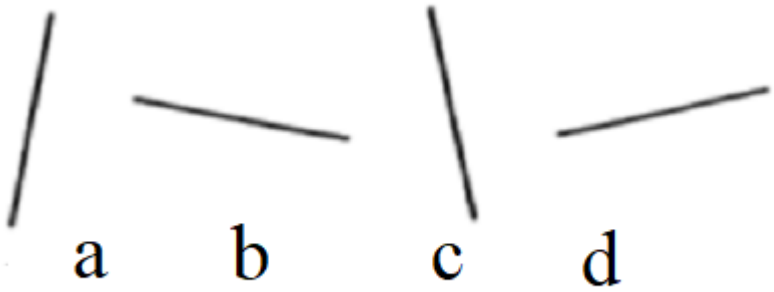
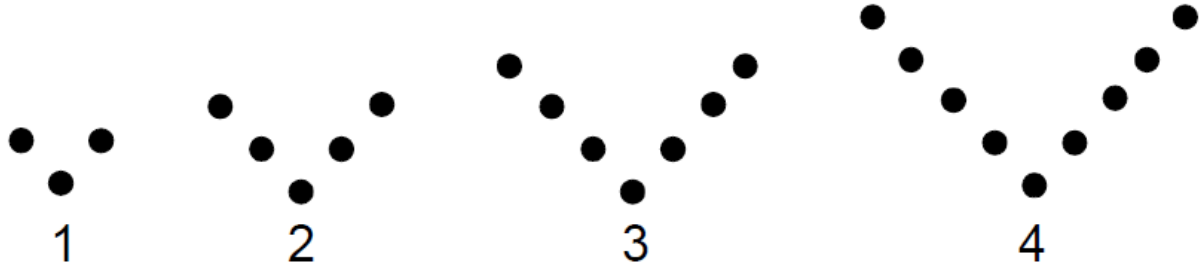
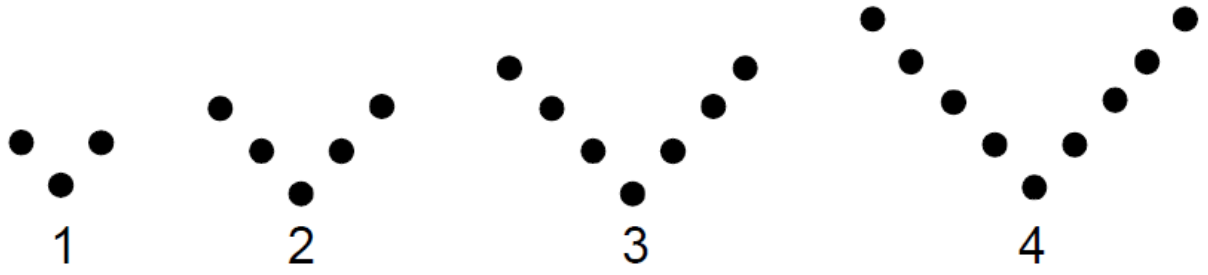


Image:

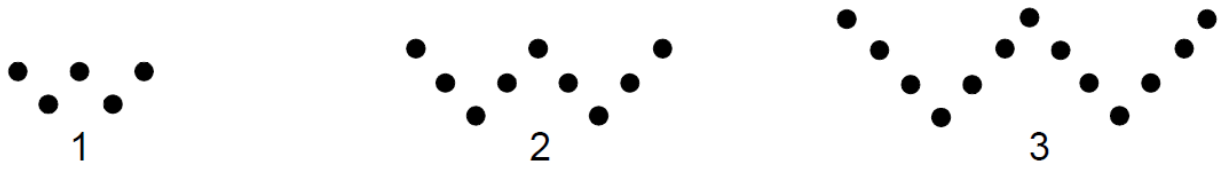
Q054
Question: "The figure shows the first four V-patterns. Each pattern has a number. Which number has a V-pattern with 17 dots?"
Correct answer: 8
Wrong answer 1: 6
Wrong answer 2: 7
Wrong answer 3: There is no V-pattern with 17 dots
Feedback: It must be 8. The constante rate of change is 2 (you add always 2 dots to each new pattern). Pattern 1 has 3 dots; pattern 2 has 5 dots;…and pattern 8 has 17 dot
Image:



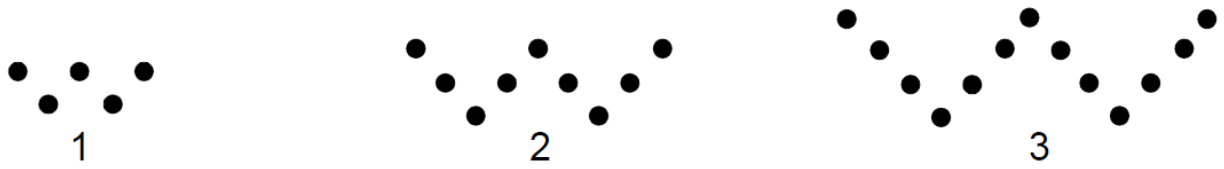
Q055
Question: "The figure shows the first four V-patterns. Each pattern has a number. How many dots has the V-pattern with number 85?"
Correct answer: 171
Wrong answer 1: 169
Wrong answer 2: 170
Wrong answer 3: 168
Feedback: The answer is 171. The constant rate of change is 2 and the y-intercept is 1 (for pattern zero there 1 dot). The whole pattern is given by the formula y=2x+1. For x=85 than is y=171
Image:



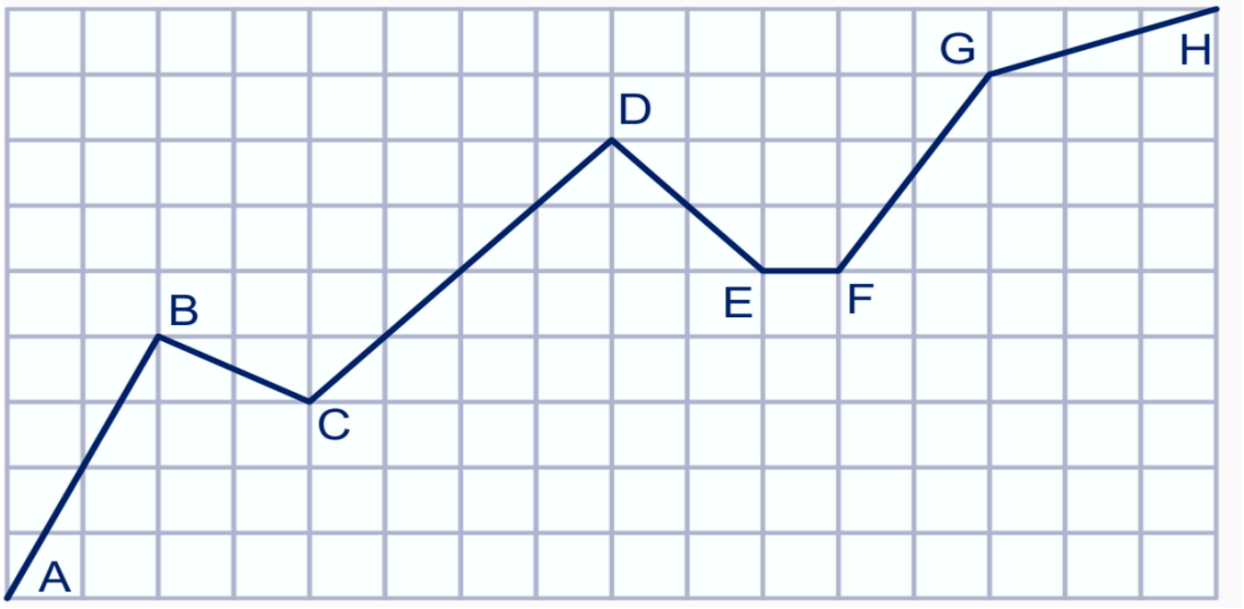
Q056
Question: "The figure shows the first three W-patterns. Each pattern has a number. Which number has a W-pattern with 21 dots?"
Correct answer: 5
Wrong answer 1: 4
Wrong answer 2: 6
Wrong answer 3: There is no W-pattern with 21 dots
Feedback: It must be 5. The constante rate of change is 4 (you add always 4 dots to each new pattern). Pattern 1 has 5 dots; pattern 2 has 9 dots;…and pattern 5 has 21 dot
Image:



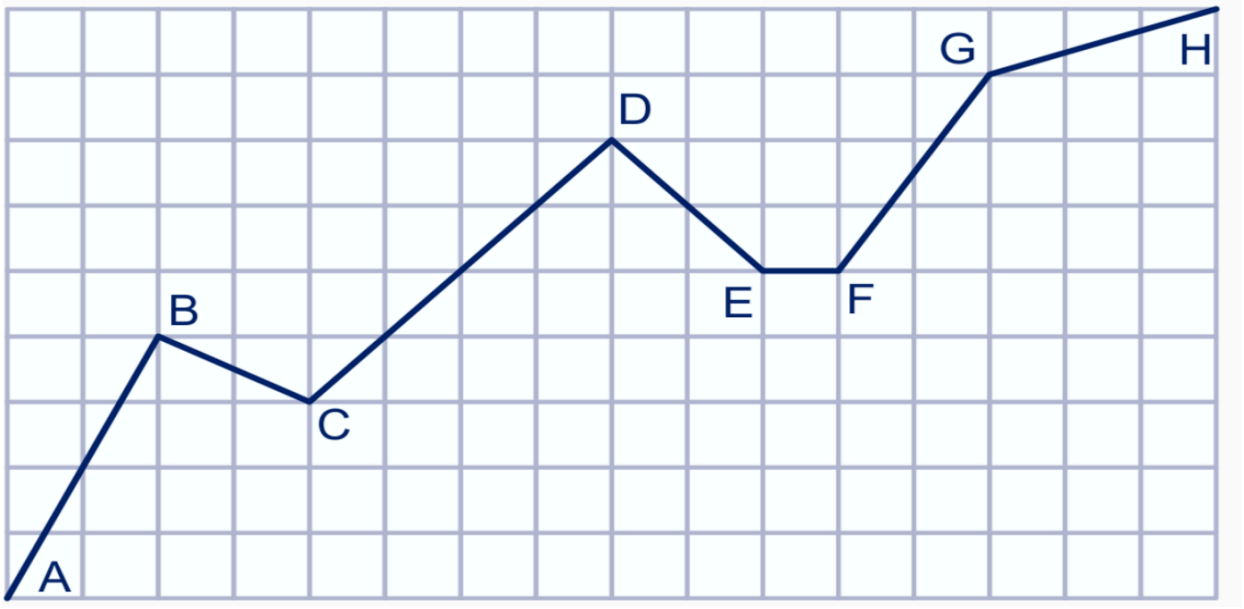
Q057
Question: "The figure shows the first three W-patterns. Each pattern has a number. How many dots has the W-pattern with number 25?"
Correct answer: 101
Wrong answer 1: 99
Wrong answer 2: 100
Wrong answer 3: 102
Feedback: The answer is 101. The constant rate of change is 4 and the y-intercept is 1 (for pattern zero there 1 dot). The whole pattern is given by the formula y=4x+1. For x=25 than is y=101
Image:



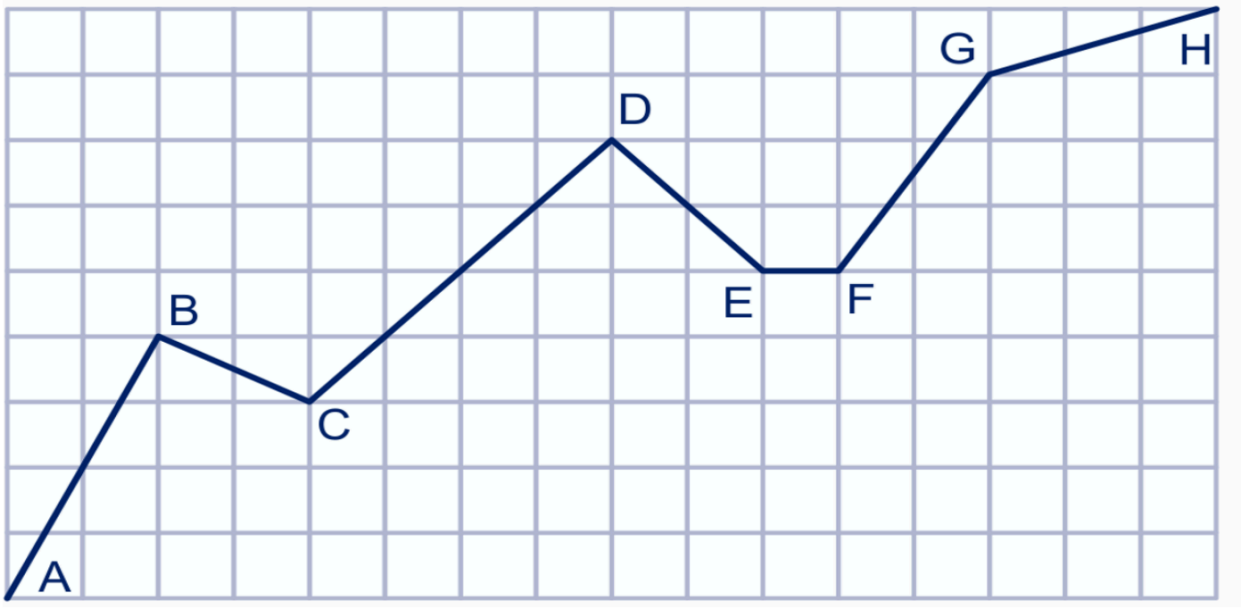
Q058
Question: See the road from A to H. What is the slope of the line segment AB?
Correct answer: 2
Wrong answer 1: 4
Wrong answer 2: 0.5
Wrong answer 3: 1
Feedback: 2 is the correct answer because the difference between the y-values divided by the difference between the correspondent x-values is 2.
Image:



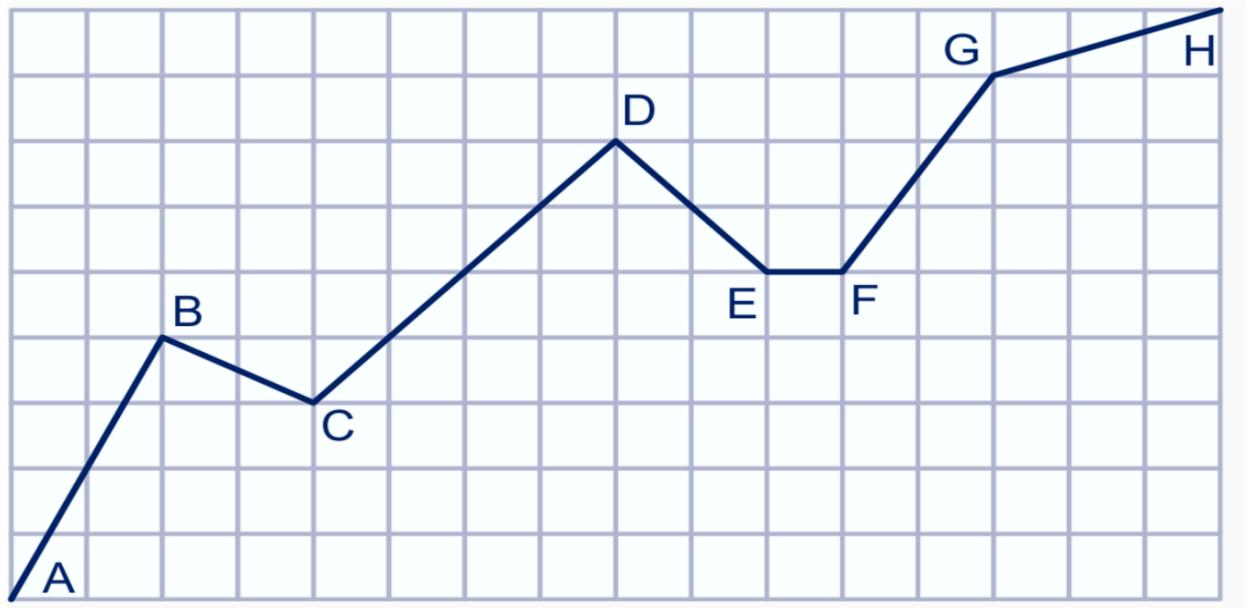
Q059
Question: See the road from A to H. What is the slope of the line segment BC?
Correct answer: -0.5
Wrong answer 1: -2
Wrong answer 2: -1
Wrong answer 3: -3
Feedback: the correct answer is -0.5 because the difference between the y-values divided by the difference between the correspondent x-values is -0.5.
Image:



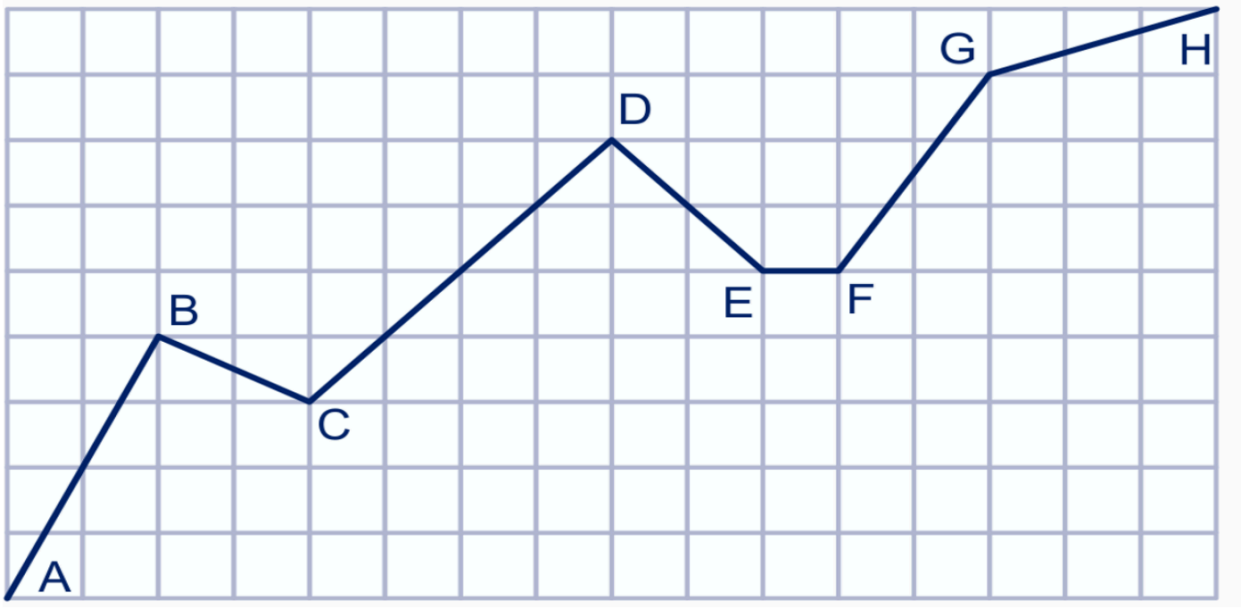
Q060
Question: See the road from A to H. What is the slope of the line segment DE?
Correct answer: -1
Wrong answer 1: -2
Wrong answer 2: 2
Wrong answer 3: 1
Feedback: the correct answer is -1 because the difference between the y-values divided by the difference between the correspondent x-values is -1.
Image:



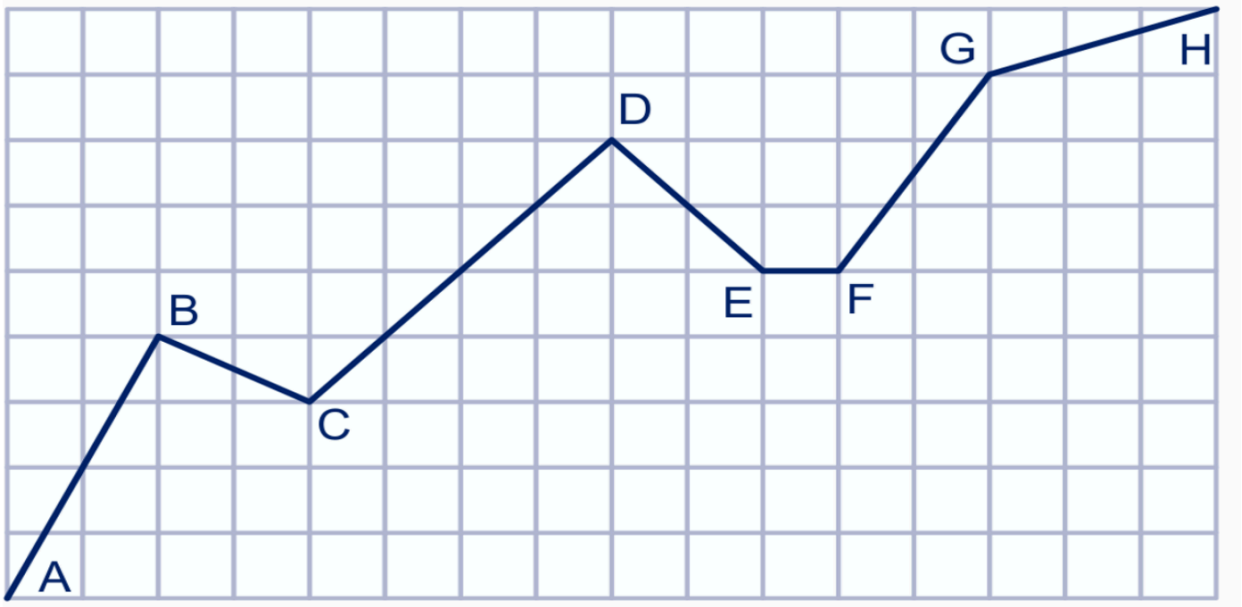
Q061
Question: See the road from A to H. What is the slope of the line segment EF?
Correct answer: 0
Wrong answer 1: 1
Wrong answer 2: -1
Wrong answer 3: EF doesn't have a slope
Feedback: 0 is the correct answer because the line is horozontal
Image:



Q062
Question: See the road from A to H. What is the slope of the line segment FG?
Correct answer: 1.5
Wrong answer 1: 2
Wrong answer 2: 3
Wrong answer 3: 2/3
Feedback: 1.5 is the correct answer because the difference between the y-values divided by the difference between the correspondent x-values is 1.5.
Image:

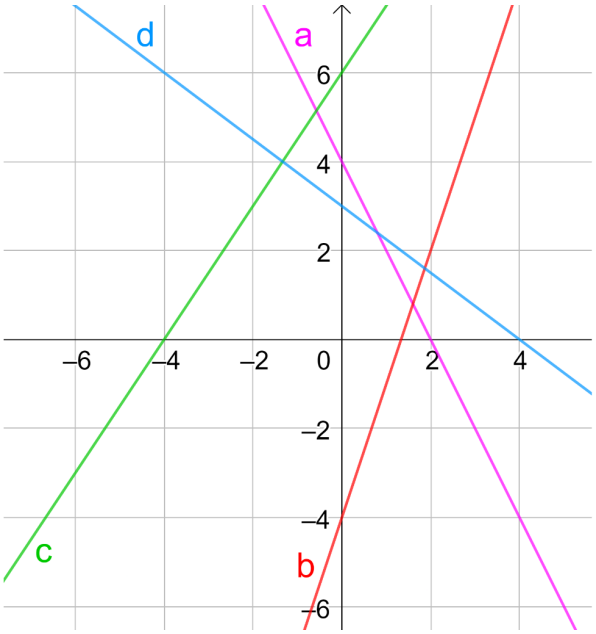


Q063
Question: See the road from A to H. What is the slope of the line segment GH?
Correct answer: 1/3
Wrong answer 1: 3
Wrong answer 2: 4
Wrong answer 3: 0.5
Feedback: 1/3 is the correct answer because the difference between the y-values divided by the difference between the correspondent x-values is 1/3
Image:

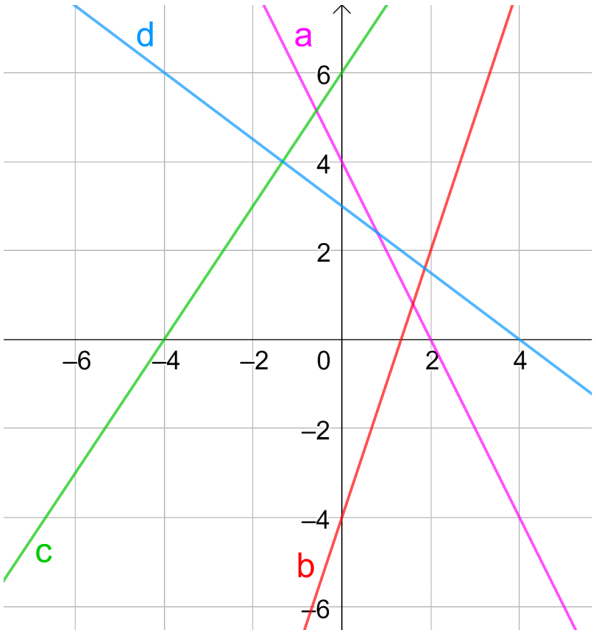


Q064
Question: "Given the equation y = x + 4. Which student is right?"
Correct answer: Julia: this line goes through the axis at (0;4).
Wrong answer 1: Peter: this line goes through the axis at (4;0).
Wrong answer 2: Paul: this line has slope 4.
Wrong answer 3: None of the students is right.
Feedback: the correct option is from Julia

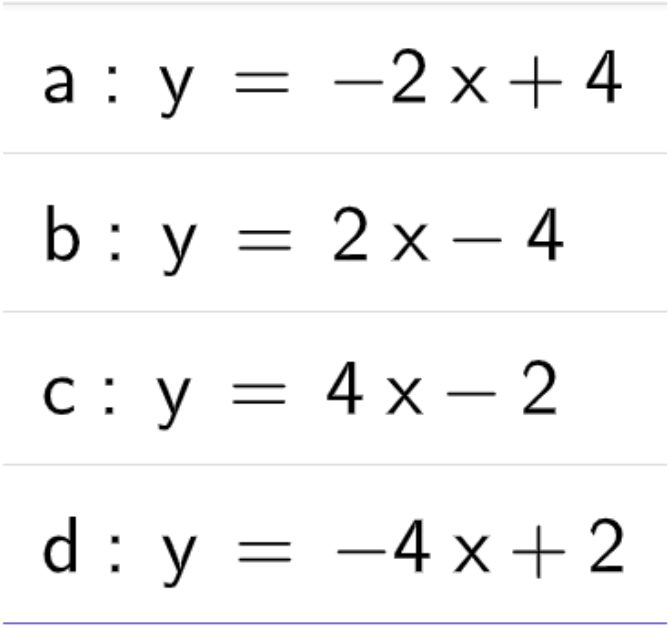
Q065
Question: Which line has y-intercept 4?
Correct answer: a
Wrong answer 1: b
Wrong answer 2: c
Wrong answer 3: d
Feedback: a is correct because the line crosses the y-axis by 4
Image:



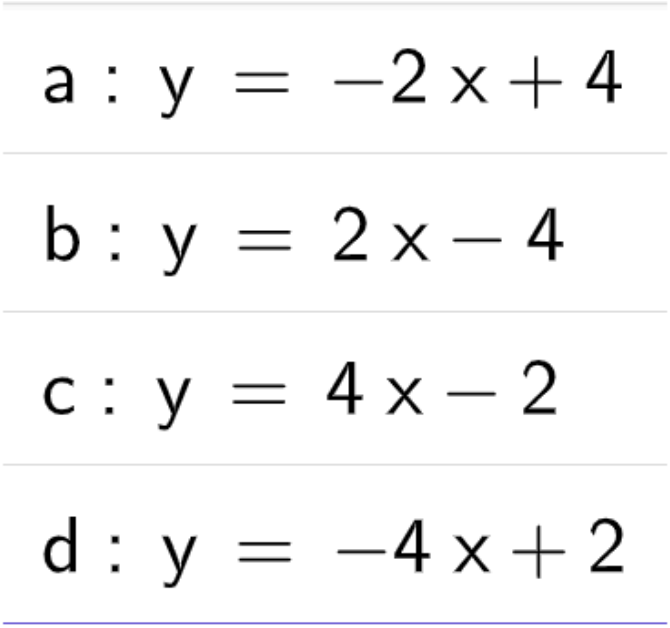
Q066
Question: Which line goes through point (0;-4)?
Correct answer: b
Wrong answer 1: a
Wrong answer 2: c
Wrong answer 3: d
Feedback: b is correct because the line crosses the x-axis by zero and the y-axis by -4
Image:



Q067
Question: Which line has y-intercept 4?
Correct answer: a
Wrong answer 1: b
Wrong answer 2: c
Wrong answer 3: d
Feedback: a is correct because if the x-value is zero the y-value is 4 (y-intercept)
Image:



Q068
Question: Which line goes through point (0;-4)?
Correct answer: b
Wrong answer 1: a
Wrong answer 2: c
Wrong answer 3: d
Feedback: b is correct because if the x-value is zero the y-value is - 4
Image:



Q069
Question: Which line has y-intercept 4?
Correct answer: table C
Wrong answer 1: table A
Wrong answer 2: table B
Wrong answer 3: table D
Feedback: table C is correct because for x=0 the y-value is 4
Image:

table A

1	2	3	4	5
−6	−4	−2	0	4

table C

1	2	3	4	5
2	0	−2	−4	−6

table B

−5	−4	−3	−2	−1
−2	0	2	4	6

table D

−5	−4	−3	−2	−1
6	4	2	0	−2

Q070
Question: Which line goes through point (0;-4)?
Correct answer: d
Wrong answer 1: a
Wrong answer 2: b
Wrong answer 3: c
Feedback: d is correct because for x=0 the y-value is -4
Image:

table A

1	2	3	4	5
−6	−4	−2	0	4

table B

−5	−4	−3	−2	−1
−2	0	2	4	6

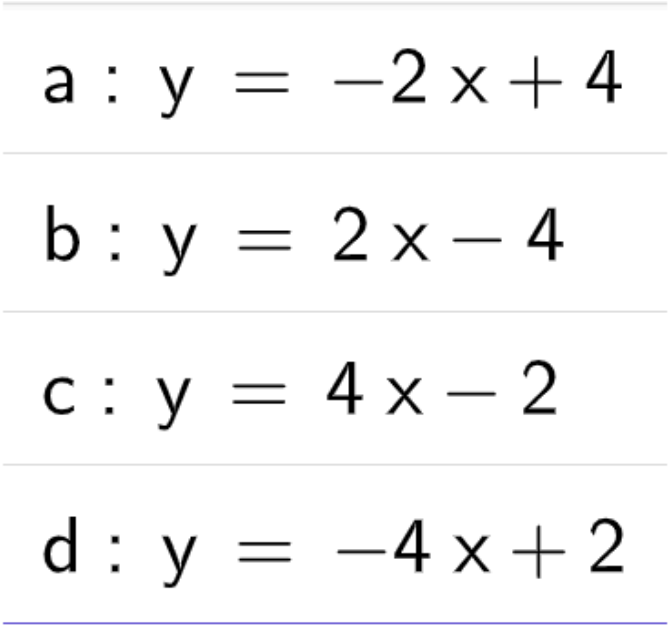
table C

1	2	3	4	5
2	0	−2	−4	−6

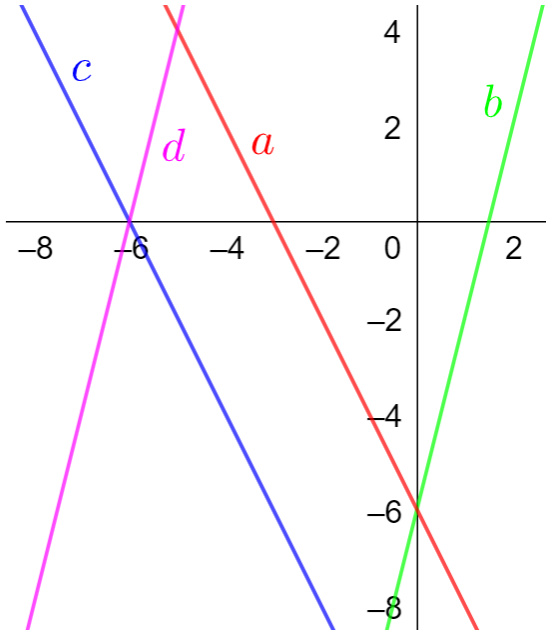
table D

−5	−4	−3	−2	−1
6	4	2	0	−2

Q071
Question: Which line has the highest y-intercept?
Correct answer: a
Wrong answer 1: b
Wrong answer 2: c
Wrong answer 3: d
Feedback: option a is correct because 4 is higher than -4; -2 and 2 (which are the other y-intercepts)
Image:



Q072
Question: Which of the graphs corresponds to the table?
Correct answer: b
Wrong answer 1: a
Wrong answer 2: c
Wrong answer 3: d
Feedback: b is correct because the line has positive slope and the y-intercept is -6.
Image:



0	6	12	18	24
−6	18	42	66	90

Q073
Question: Which of the tables corresponds to the graph ?
Correct answer: table B
Wrong answer 1: table A
Wrong answer 2: table C
Wrong answer 3: table D
Feedback: table d is correct
Image:

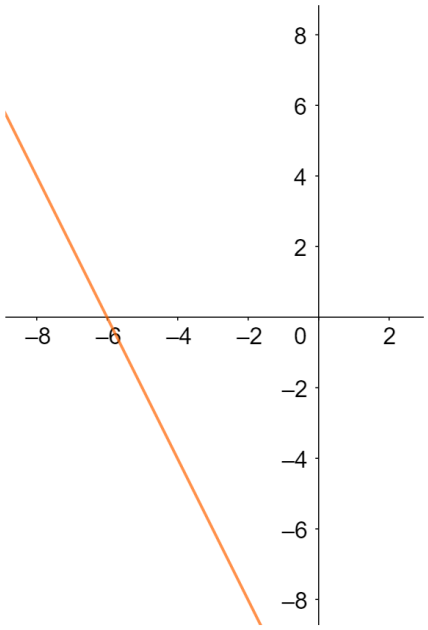


table A

0	6	12	18	24
24	48	72	96	120

table B

0	6	12	18	24
−12	−24	−36	−48	−60

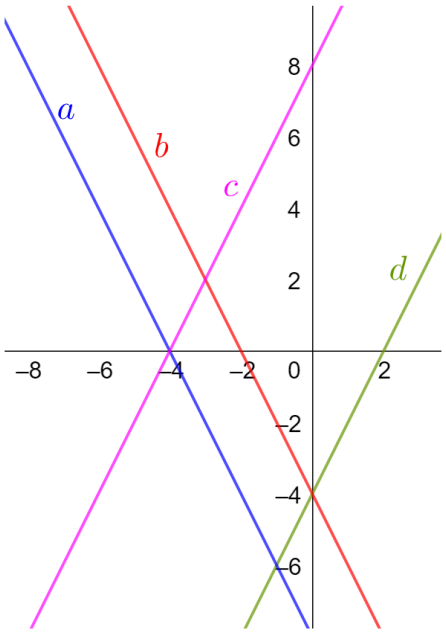
table C

0	6	12	18	24
−6	18	42	66	90

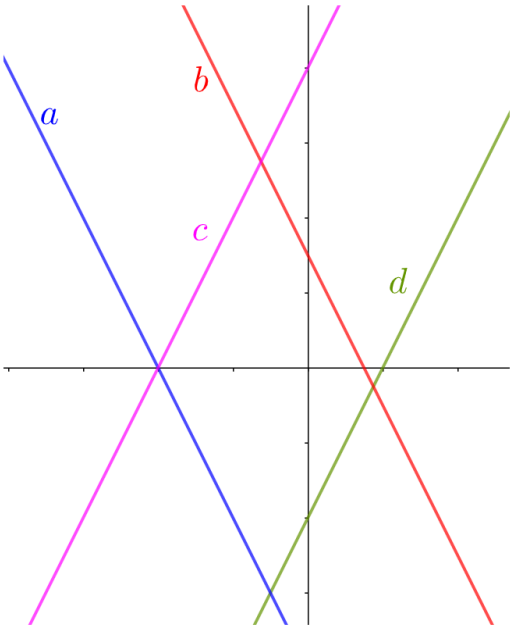
table D

0	6	12	18	24
−6	−18	−30	−42	−54

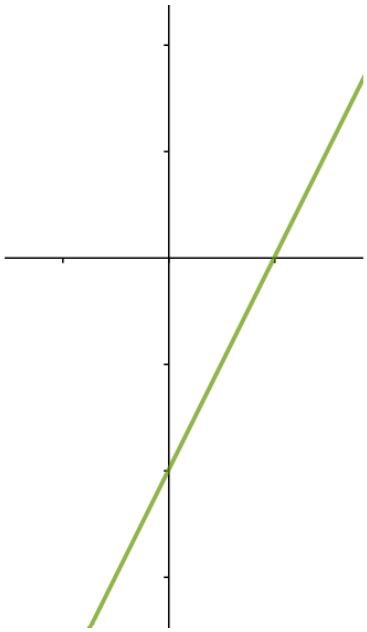
Q074
Question: Which line has slope 2 and y-intercept -4?
Correct answer: d
Wrong answer 1: a
Wrong answer 2: b
Wrong answer 3: c
Feedback: d is correct because for each step in the positive x-direction the y-values increases with two units. And the line crosses the y-axis by -4
Image:



Q075
Question: Which line has slope -2 and goes through (1;1)?
Correct answer: b
Wrong answer 1: a
Wrong answer 2: c
Wrong answer 3: d
Feedback: b is correct because it is the only line with both positive slope and positive y-intercept
Image:



Q076
Question: "Given the graph. Which student is right?"
Correct answer: None of the students is right.
Wrong answer 1: Ebbe: the y-intercept is positive.
Wrong answer 2: Nils: the line passes through (-1;1).
Wrong answer 3: Ines: the slope is negative.
Feedback: None of the students is right is the correct answer because: the y-intercept is negative (not positive); the line goes trhrough (-2;1) and not (-1; 1); the slope is positive (not negative).
Image:



Q077
Question: Which table corresponds to a decreasing linear function with y-intercept -4?
Correct answer: Table D
Wrong answer 1: Table A
Wrong answer 2: Table B
Wrong answer 3: Table C
Feedback: Table D is correct because if x=0 in Table D than is y=-4
Image:

table A

1	2	3	4	5
−6	−4	−2	0	4

table B

−5	−4	−3	−2	−1
−2	0	2	4	6

table C

1	2	3	4	5
2	0	−2	−4	−6

table D

−5	−4	−3	−2	−1
6	4	2	0	−2

Q078
Question: "Given the table. Which student is right?"
Correct answer: Marloes: this linear function has slope -2.
Wrong answer 1: Paul: this linear function passes through (10;-10).
Wrong answer 2: Ines: this linear function has y-intercept 4.
Wrong answer 3: None of the students is right.
Feedback: Marloes is right because the difference between the y-values (for example 4-8=-4) divided by the difference between the correspondent x-values is -2.

0	2	4	6	8
8	4	0	−4	−8

Image:

Q079
Question: Which table corresponds to the formula y=-2(x-4)
Correct answer: Table D
Wrong answer 1: Table A
Wrong answer 2: Table B
Wrong answer 3: Table C
Feedback: Table D is correct. There are several ways to find the answer. For instance: y=-2(x-4) therefore y=-2x+8; which means that for x=0 the value of y is 8.
Image:

table A

0	2	4	6	8
−8	−4	0	4	8

table B

0	2	4	6	8
4	0	−4	−8	−12

table C

0	2	4	6	8
4	8	12	16	20

table D

0	2	4	6	8
8	4	0	−4	−8