Warm Up Grade 8
Oct. 22, 2019

(x, y)

1) Find the missing value for the ordered pairs of y = -3x + 2
(show work)

x y

a) (-5, ___)

Given x = -5

$y = -3x + 2$

$= -3(-5) + 2$

$= 15 + 2$

$y = 17$

(-5, 17)

x y

b) (___, -31)

Given y = -31

$y = -3x + 2$

$-31 = -3x + 2$

$-31 \overset{-2}{} = -3x + 2 \overset{-2}{}$

$-33 = -3x$

$\frac{-33}{-3} = \frac{-3x}{-3}$

$11 = x$

(11, -31)

pg363

1. No you can not have negatives since you can not have a negative number of girls and boys.

2. You can only have whole number values, so you don't connect the points.

3. The band g would be on opposite sides, and the graph would be the same

4a) $y = 4x - 1$

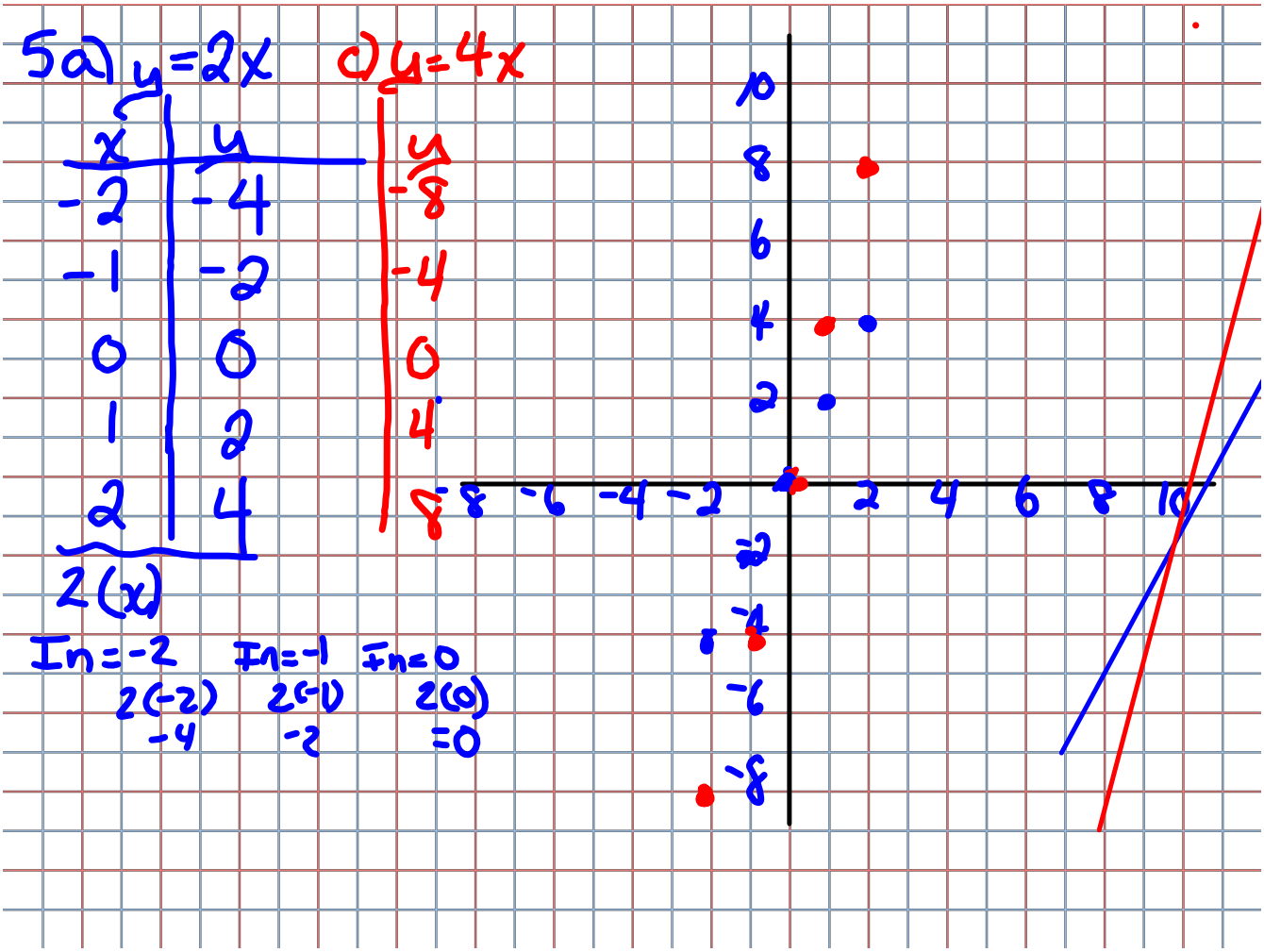
Input x	Output y
0	-1
1	3
2	7
3	11
4	15

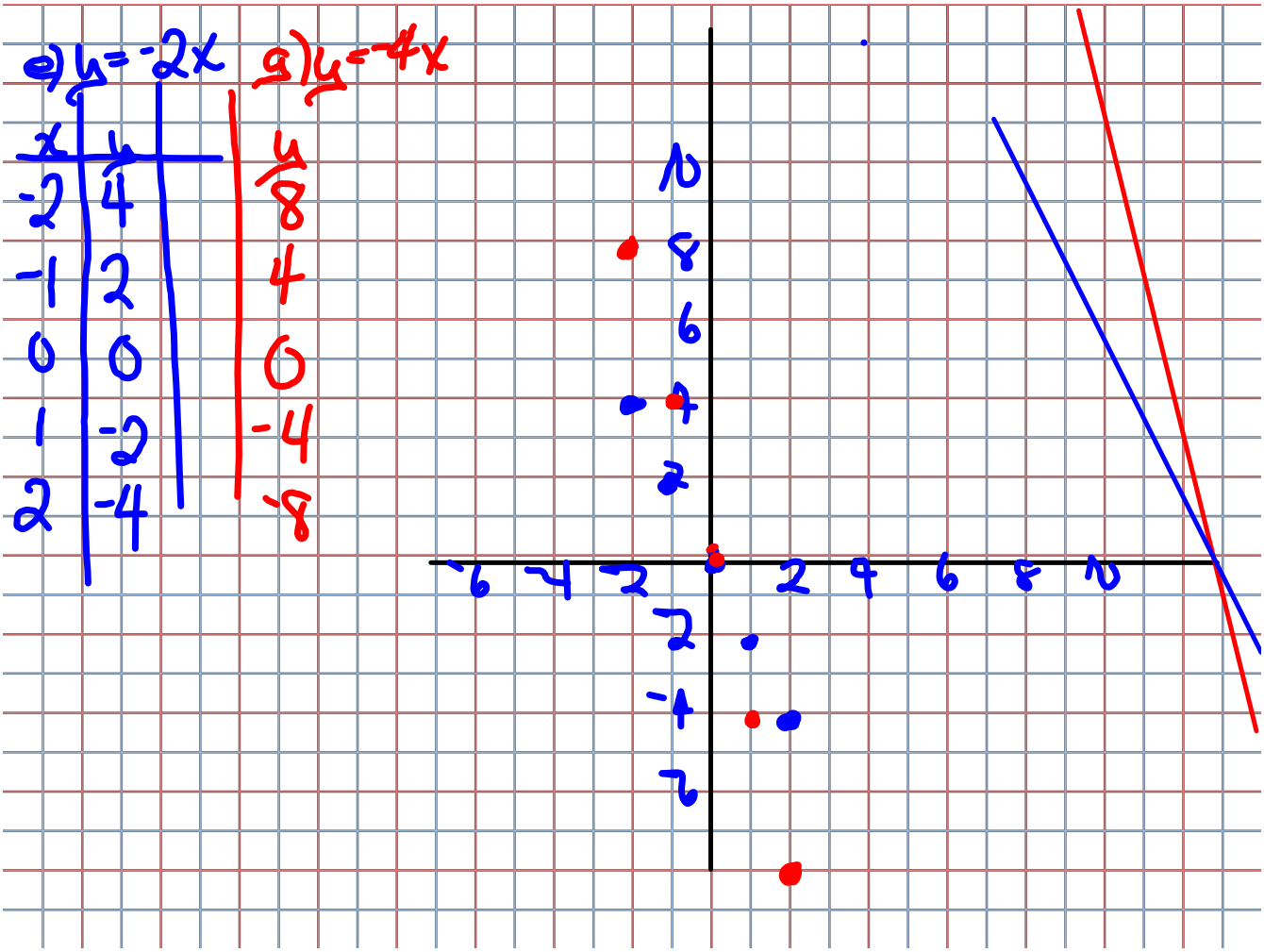
x goes up by 1,
y goes up by 4.

b) $y = -3x + 9$

Input x	Output y
0	9
1	6
2	3
3	0

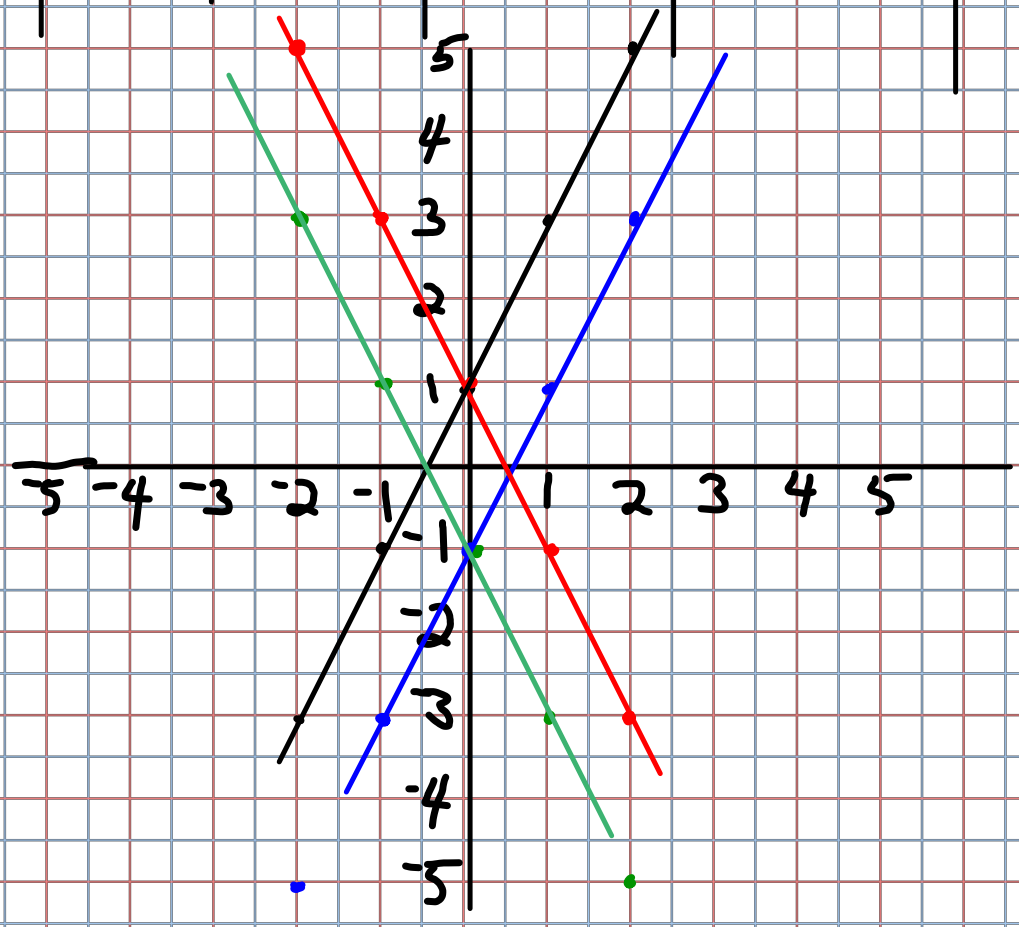
x goes up by 1
y goes down by 3
(or up -3)


5a) y=2x
x | y
-2 | -4
-1 | -2
0 | 0
1 | 2
2 | 4
2(x)
In=-2 In=-1 In=0
2(-2) 2(-1) 2(0)
-4 -2 =0
c) y=4x
y
-8
-4
0
4
8


a) y = -2x
x | y
-2 | 4
-1 | 2
0 | 0
1 | -2
2 | -4
g) y = -4x
y
8
4
0
-4
-8
10
8
6
4
2
-6 -4 -2 2 4 6 8 10
-2
-4
-6

6

x	a) 2x+1	b) 2x−1	c) −2x+1	d) −2x−1
−2	−3	−5	5	3
−1	−1	−3	3	1
0	1	−1	1	−1
1	3	1	−1	−3
2	5	3	−3	−5



7 $y = 8x + 3$

$(2, \_)$

$y = 8 \times 2 + 3$
$= 16 + 3$
$= 19$

$(\_, 27)$

$(3, 27)$
from the graph

$(5, \_)$

$y = 8 \times 5 + 3$
$= 40 + 3$
$= 43$

Input x	Output $8x+3$
0	3
1	11
2	19
3	27
4	35
5	43

up 1 each time

add 8 each time

8. $y = -6x - 5$

$(-3, \_)$

$y = -6x - 3 - 5$
$= 18 - 5$
$= 13$

$(\_, 7)$

$x = 2$ (using graph)

$(2, \_)$

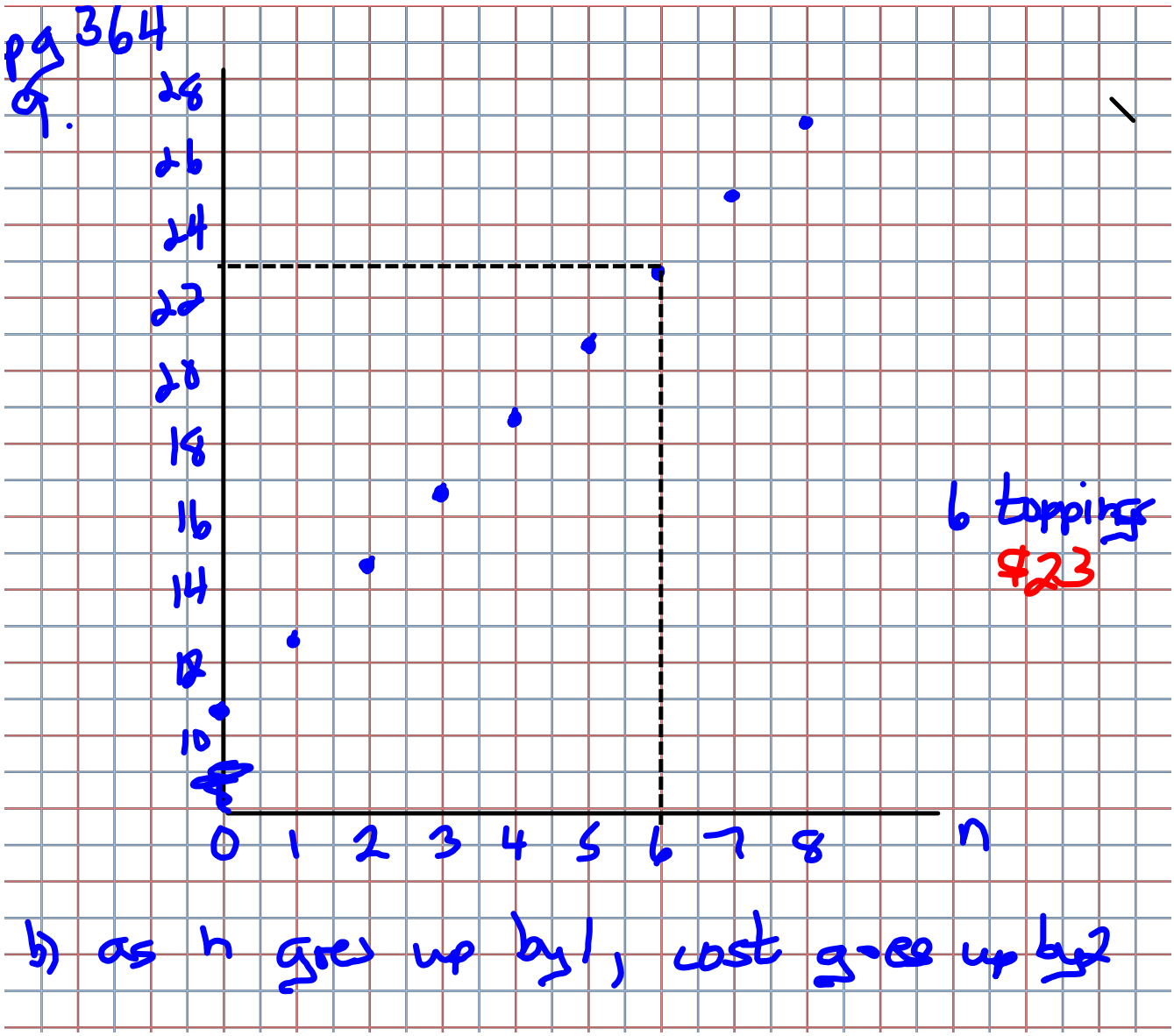
$y = -6x - 5$
$= -6 \times 2 - 5$
$= -12 - 5$
$= -17$

$(\_, -23)$

$(3, -23)$ using graph

could have used a chart

pg 364
q.



b) as n goes up by 1, cost goes up by 2

A grade 8 class is going on a field trip. The bus seats 24 students.
An equation that relates the number of boys on the bus to the number of girls is b = 24 - g, where g represents the number of girls and b represents the number of boys.

a) Create a table of values for the relation.
b) Graph the relation.
c) Describe the relationship between the variables in the graph.

In (g)	Out (b)
0	24
1	23
2	22
3	21
4	20

up 1, down 1

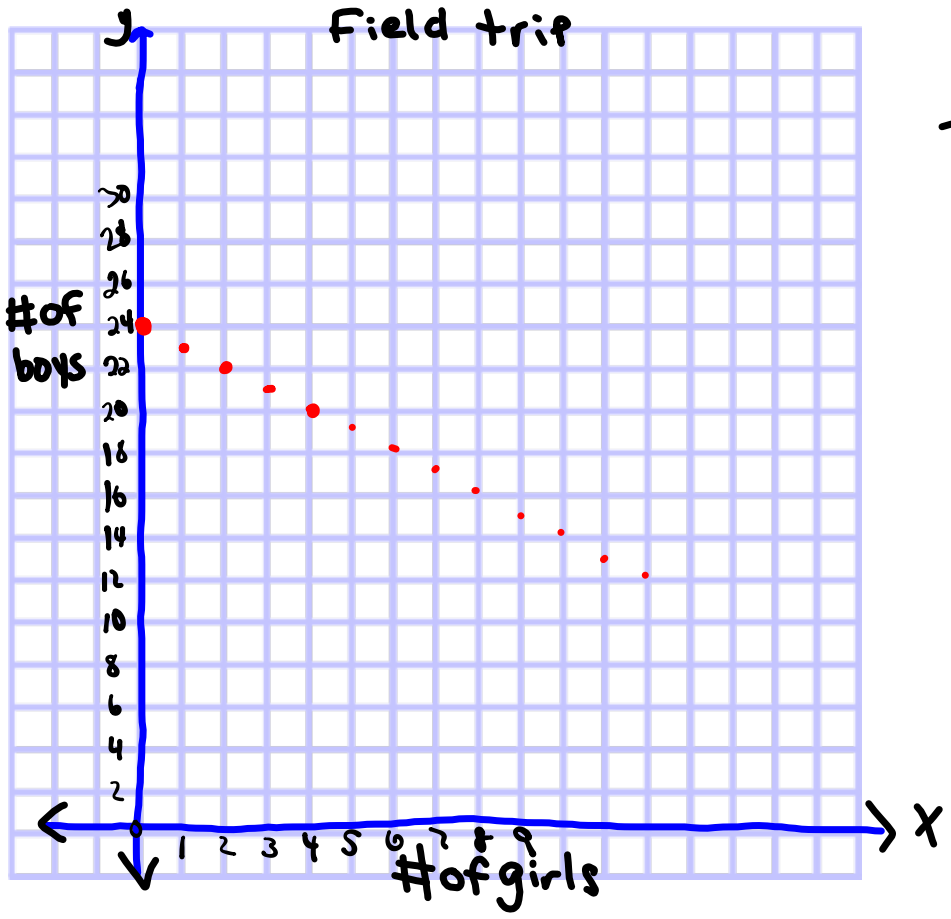
$b = 24 - g$

$g = 0$: $b = 24 - 0 = 24$

$g = 1$: $b = 24 - 1 = 23$

$g = 2$: $b = 24 - 2 = 22$

c) As the # of girls increases by 1, the # of boy decrease by 1.



$\hat{g}$	y b
0	24
1	23
2	22
3	21
4	20

Class/Homework

pg. 364 # 10, #11, #12, #13
pg. 373 # 18, 19, 20
NEED more (#15, #21, #22)

Test Tomorrow on Section 6.6 & 6.7 ???

2 MC
1 Short Response (Word problem with equation given)
Part a to f (Requires to graph)