Name_____ Date_____ Period_____

LESSON 7-7 · SESSION 1 · PREREQUISITE PRACTICE B · SKILL 1 OF 2

Plot and Connect Points

Builds on Lesson 7-5 Session 1 · 6.NS.C.6c

TODAY'S LESSON	You will plot garden corners like (−4, 6) and (9, −3), then connect them.
YOU NEED TO	Plot a point like (−4, 6): move left 4, then up 6. **You will use it in Practice Form A, problems 2 and 4.**

STEPS TO FOLLOW

use these same steps on every problem

1 Start at (0, 0). Move **left or right** the first number.

2 Move **up or down** the second number. Draw a dot.

3 **Connect** the dots in order, then back to the first.

WATCH ME

the steps in action

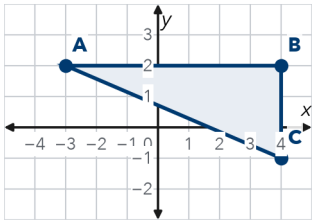
Plot A(−3, 2), B(4, 2) and C(4, −1). Connect them.

Step 1 A: left 3. B: right 4. C: right 4.

Step 2 A: up 2. B: up 2. C: down 1. Draw dots.

Step 3 Connect A to B to C, then back to A.

Answer **A triangle.**



TRY IT WITH HELP

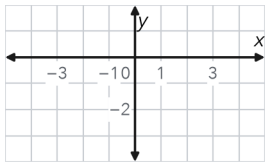
fill in each step

1. Plot P(−4, 1), Q(2, 1) and R(2, −3). Connect them.

Step 1 P: _____ 4. Q: right 2. R: right _____.

Step 2 P: up 1. Q: up _____. R: _____ 3.

Step 3 Connect P to Q to _____, then back to _____.

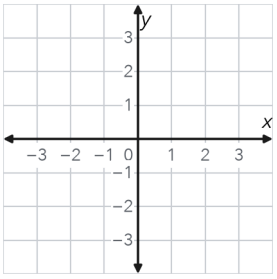


2. Plot J(−1, 4), K(3, 4), L(3, −2) and M(−1, −2). Connect them.

Step 1 J and M: _____ 1. K and L: right _____.

Step 2 J and K: up _____. L and M: _____ 2.

Step 3 Connect J, K, L, M, then back to _____. The shape is a _____.



Use this grid.

YOUR TURN

use the steps on your own

3. Write the two moves from (0, 0) for each point.

a. (−5, 2) _____

b. (3, −6) _____

c. (−1, −4) _____

d. (0, 7) _____

Find Distance on a Grid

Builds on Lesson 7-6 Session 1 · 6.NS.C.8

TODAY'S LESSON	In problem 1, the side from (−3, 4) to (6, 4) is 3 + 6 = 9 units long.
YOU NEED TO	Find the distance between two points that share a coordinate. **You will use it in Practice Form A, problems 1, 2 and 3.**

STEPS TO FOLLOW

use these same steps on every problem

1. **Find** the shared coordinate. Use the other two numbers.
2. **Signs** differ? Add the distances from 0. Same sign? Subtract.
3. **Write** the distance in units.

WATCH ME

the steps in action

Find the distance from (−4, 3) to (5, 3).

Step 1 They share y = 3. Use −4 and 5.

Step 2 Signs differ: 4 + 5 = 9.

Step 3 The distance is 9 units.

Answer **9 units**

TRY IT WITH HELP

fill in each step

4. Find the distance from (−6, 1) to (2, 1).

Step 1 They share _____ = 1. Use −6 and 2.

Step 2 Signs differ: 6 + 2 = _____.

Step 3 The distance is _____ units.

5. Find the distance from (−7, 2) to (−1, 2).

Step 1 They share y = 2. Use _____ and _____.

Step 2 Same sign: 7 − 1 = _____.

Step 3 The distance is _____ units.

YOUR TURN

use the steps on your own

6. Find the distance between the points in units.

a. (−3, 4) to (6, 4) _____

b. (6, 4) to (6, −2) _____

c. (2, 8) to (2, 3) _____

d. (−5, −4) to (−5, 3) _____

e. (−9, 1) to (−2, 1) _____

f. (−4, −3) to (9, −3) _____

READY CHECK

a problem like the one in today's lesson

7. A rectangle's top side joins (−9, 5) and (6, 5). How long is the top side?

A 3 units **B** 15 units **C** 10 units **D** 11 units

CHECK YOURSELF ☐ I can do this on my own ☐ I need a little help ☐ I have a question about #____