



3rd
Basic

4th
Advanced

Helping With Math

USA
GRADES

Number Lines

Suitable for students
aged 7-9



This pack is suitable for learners aged 7-9 years old or 3rd and 4th graders (USA). The content covers fact files and relevant basic and advanced activities involving number lines.

Hi there! I'm a foodie and I'm very excited for the food festival but before that, let's study about number lines!



What is a number line?

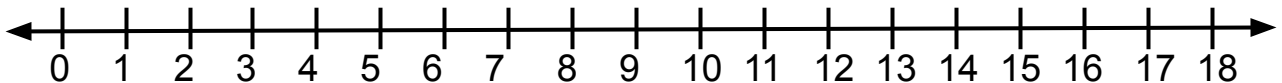
- A **number line** is a line that represents numbers that are arranged in ascending order, meaning, least to greatest. This line also extends from the middle, going to the left and to the right.



NUMBER LINE

- A number line is a representation of numbers that are arranged from least to greatest.
- These numbers can be integers, fractions, decimals, they can also be negative or positive.
- A number line may stretch out since number lines have \leftarrow and \rightarrow on its both ends, meaning that we can extend it on both ways.

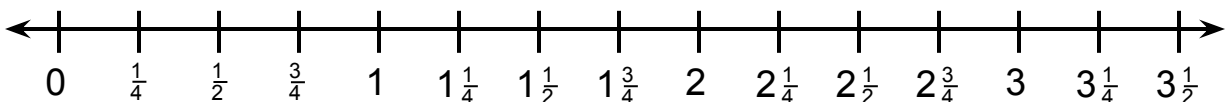
Example of a Number Line:



As you can see, the numbers were arranged in increasing order. Let's have another example of a number line showing fractions.



Example of a Number Line of Fractions:



Now let's learn on how to make a number line. Let's have an example and a step by step procedure on how to make a correct number line with mixed fractions, proper fractions, and whole numbers. :)



HOW TO MAKE A NUMBER LINE



Make a number line for number for numbers starting from 0 to 4 including the quarters and the halves.

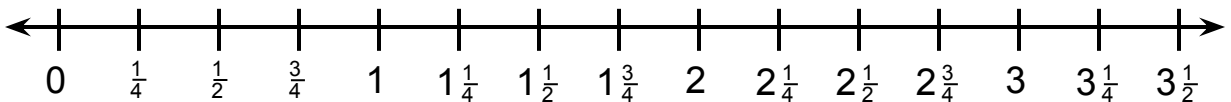
1. Arrange the numbers from 0 to $3\frac{1}{2}$ in ascending order.

Answer: 0, $\frac{1}{4}$, $\frac{1}{2}$, $\frac{3}{4}$, 1, $1\frac{1}{4}$, $1\frac{1}{2}$, $1\frac{3}{4}$, 2, $2\frac{1}{4}$, $2\frac{1}{2}$, $2\frac{3}{4}$, 3, $3\frac{1}{4}$, $3\frac{1}{2}$.

2. Proceed with doing a number line. Because it says that you should make a number line from 0 to 4, 0 should be at the start of your number line, on the arrow, and the number 4 should be at the last vertical line of the number line.

Note: If the problem is stated like the thought of this: Make a number line from 0 to 50, with all numbers divisible by 5. You should start with 0 then add 5 to every number so the numbers will all be divisible by 5.

Your number line should look like this if you follow the steps:



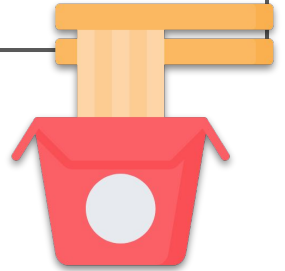
Making a number line is easy, right? You just have to follow the steps and analyze the questions and problems that you're answering. Are you ready for some exercises? Let's go!



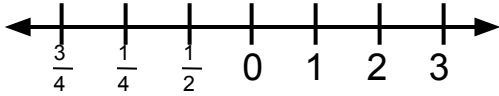
LET'S PRACTICE!



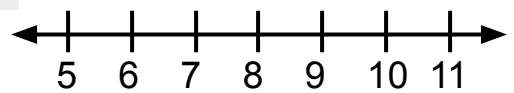
Can you encircle all the number lines with the correct order of numbers?



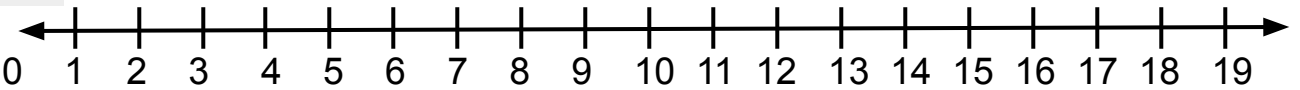
1.)



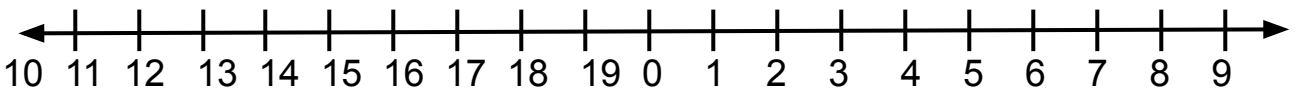
2.)



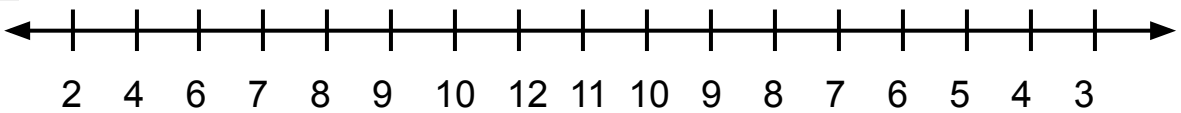
3.)



4.)



5.)



6.)

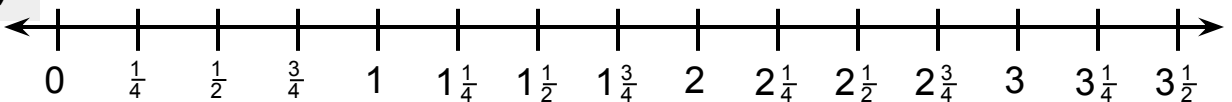


TABLE OF ACTIVITIES

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| 5 | French Fries Galore | |
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| 7 | Sweets Factory | |
| 8 | Chocolateeee-y! | |
| 9 | Bake and Cake Shop | |
| 10 | Food Festival | |

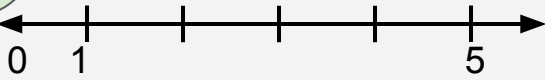


PIZZA FRENZY

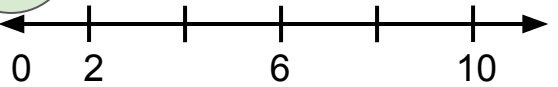
G3
Basic

Are you a pizza lover? Write the correct number that is missing in each number line below so you can eat these pizzas.

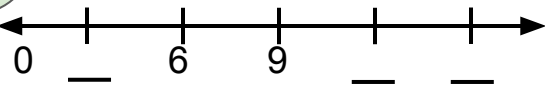
1



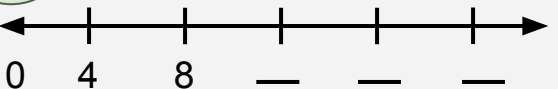
2



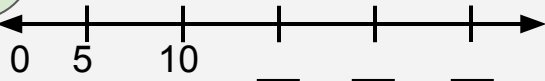
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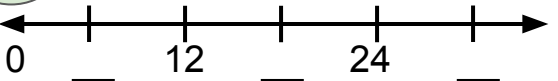
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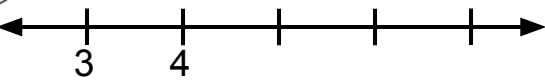
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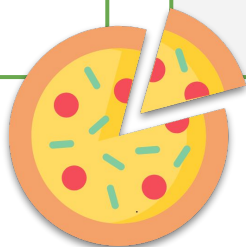
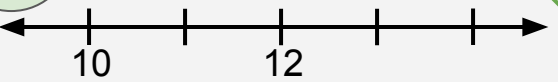
6



7



8



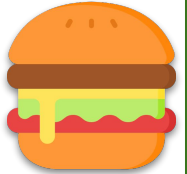
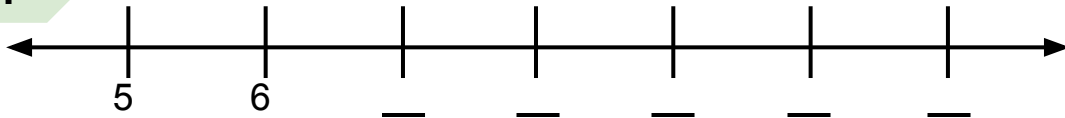
BURGER MANIA

G3

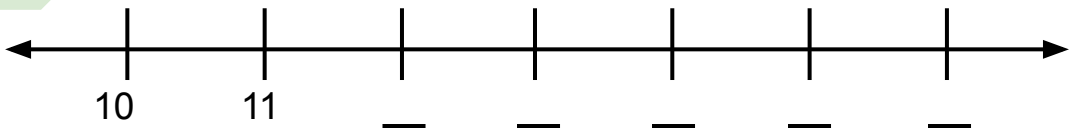
Basic

Fill in the missing numbers in the number line so you can assemble the burger properly. Write your answers on the lines.

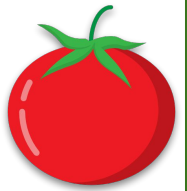
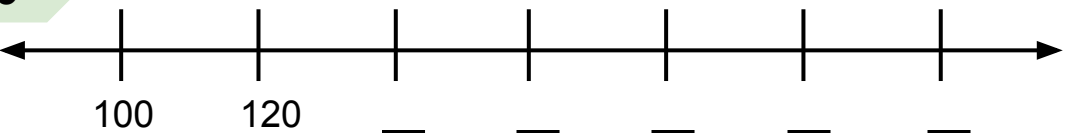
1



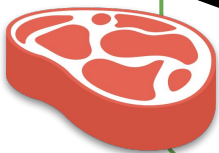
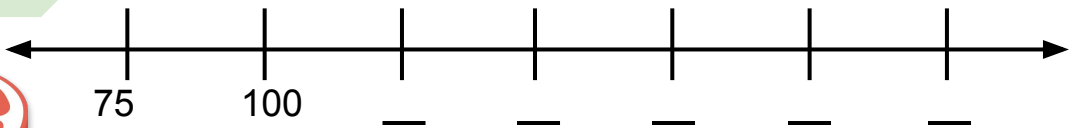
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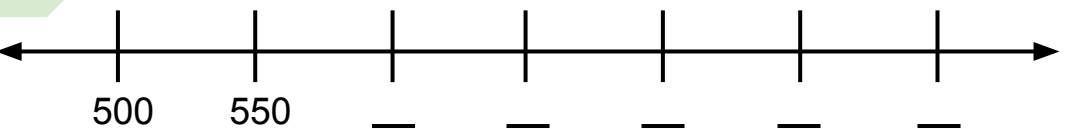
3



4



5



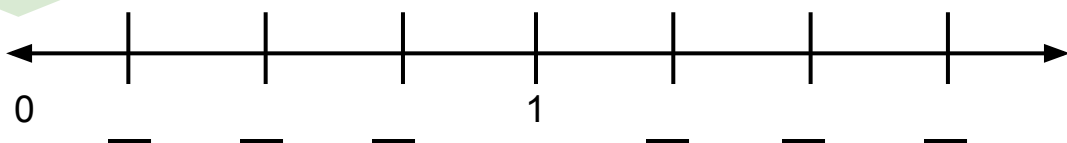
FAST FOOD IN THE CITY

G3

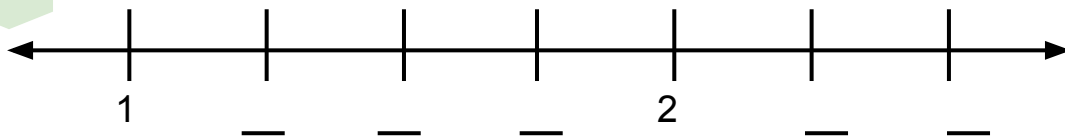
Basic

Are you a fan of fast food? Write the fractions ($\frac{1}{4}$, $\frac{1}{2}$, $\frac{3}{4}$) or the mixed numbers ($1\frac{1}{4}$, $1\frac{1}{2}$, $1\frac{3}{4}$) that are missing in each number line.

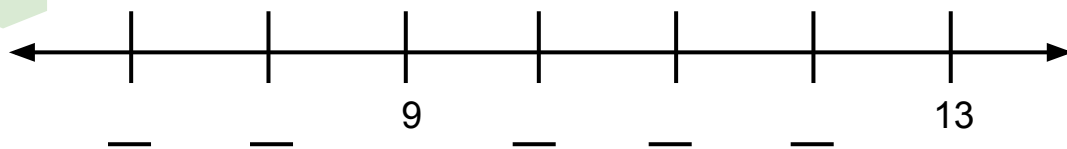
1



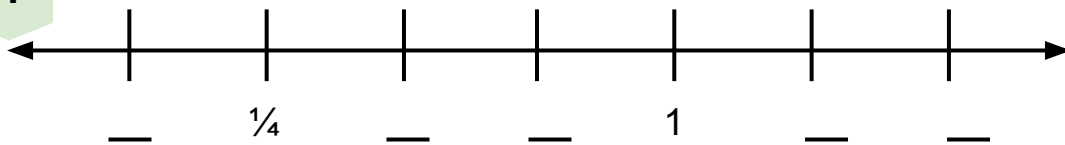
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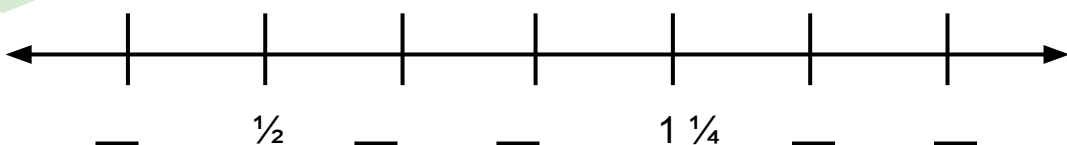
3



4



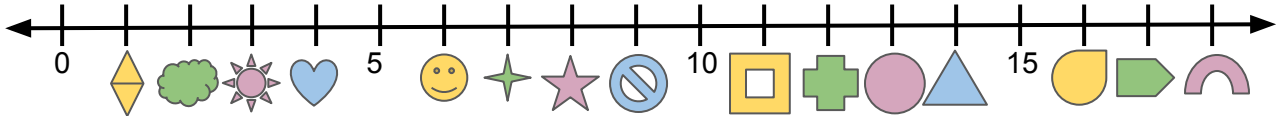
5



MARSHMALLOW FEVER

G3
Basic

These marshmallows will be yours if you pick the correct shape for each number/fraction. Write the shape on the lines after each number.



1. 9 _____

2. 18 _____

3. 1 _____

4. 6 _____

5. 11 _____

6. 17 _____

7. 2 _____

8. 7 _____

9. 8 _____

10. 12 _____

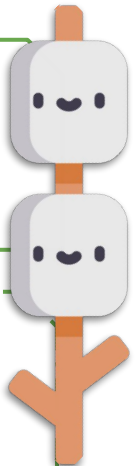
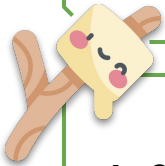
11. 14 _____

12. 3 _____

13. 13 _____

14. 16 _____

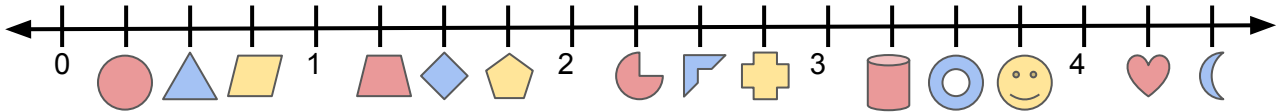
15. 4 _____



FRENCH FRIES GALORE

G3
Basic

Get these french fries goodies by picking the correct shape for each fraction. Write the shape on the lines after each number.



1. $1 \frac{3}{4}$ _____

2. $2 \frac{3}{4}$ _____

3. $3 \frac{3}{4}$ _____

4. $\frac{1}{4}$ _____

5. $1 \frac{1}{4}$ _____

6. $1 \frac{1}{2}$ _____

7. $2 \frac{1}{2}$ _____

8. $4 \frac{1}{2}$ _____

9. $3 \frac{1}{2}$ _____

10. $\frac{1}{2}$ _____

11. $2 \frac{1}{4}$ _____

12. $3 \frac{1}{4}$ _____



13. $4 \frac{1}{4}$ _____

14. $\frac{3}{4}$ _____

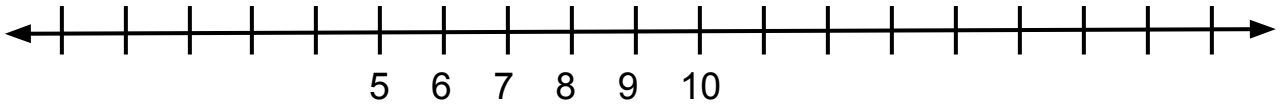


HOTDOG CORNER

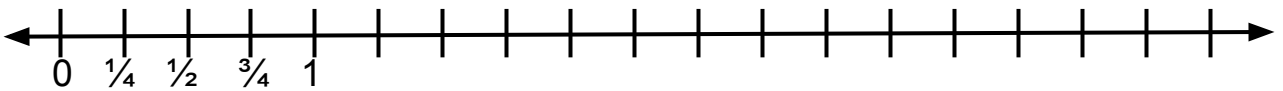
G4
Advanced

To have free hotdogs for you and your friends, label the numbers that are missing in the number line. Write your answers on the space provided.

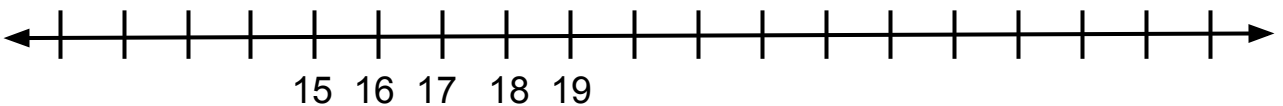
1



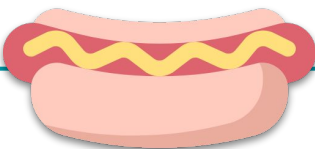
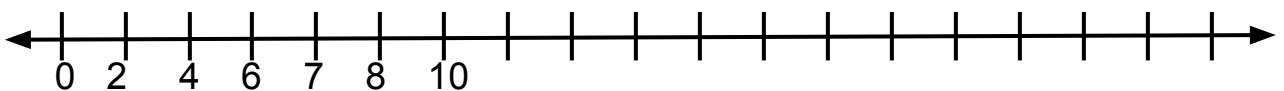
2



3



4

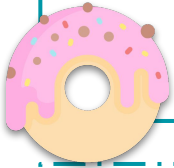


SWEETS FACTORY

G4
Advanced

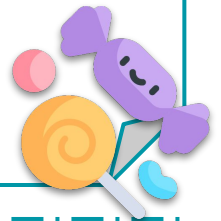
Answer the following questions regarding number lines to taste the sweet candies and chocolates in the sweets factory. Write your answers on the space provided.

1. In creating a number line, should the numbers be arranged in ascending order or descending order?



2. In a number line, how many units or numbers is 0 and 5 apart from each other?

3. By using a number line, can you tell if $\frac{3}{4}$ is greater in value than $\frac{1}{2}$?



4. How many units or numbers apart is 0 and 6 in a number line?

5. Are the numbers on the left greater or smaller in value than the numbers on the right in a number line?



CHOCOLATEEE-Y!

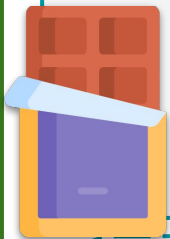
G4
Advanced

To have a taste of the chocolatiest food in the world, give what is needed for the following problems. Write your answers on the space provided.

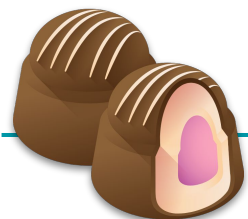
1. Create a number line that starts with 0 and ends with 10.



2. Create a number line that starts with 0 and ends with 20, which are all divisible by 2.



3. Create a number line that starts with 0 and ends with 30, which are all divisible by 3.



BAKE AND CAKE SHOP

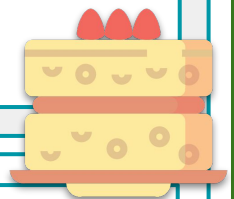
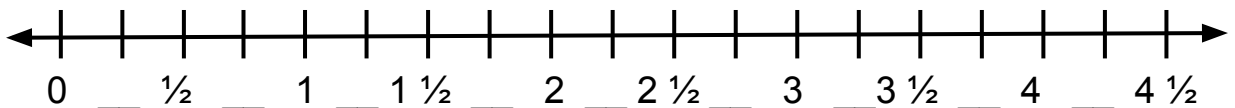
G4
Advanced

To taste the delicious baked products below, solve what is needed for each problem. Write your answers on the space provided.

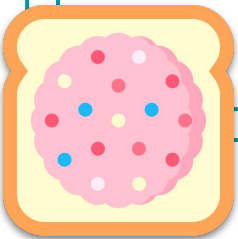
1. Create a number line that starts with 0 and ends with 5. Show the halves between each whole number.



2. Fill out the missing numbers in the number line below.



3. Create a number line that starts with 0 and ends with 100, where all numbers are divisible by 10.



FOOD FESTIVAL

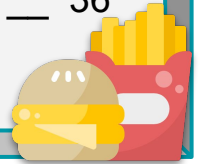
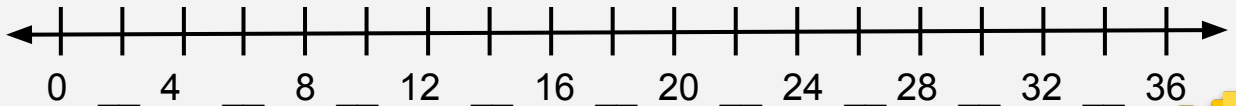
G4
Advanced

Do you like food festivals? Answer all these questions correctly so we can go around and see different kinds of food in this once in a lifetime celebration! Write your answers on the space provided.

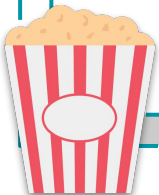
1. Create a number line that starts with 0 and ends with 5. Show the halves and quarters between each whole number.



2. Fill out the missing numbers in the number line below.



3. Create a number line that starts with 0 and ends in 50, which are all divisible by 5.



ANSWER GUIDE

Activity 1

- | | | |
|--------------|---------------|---------------|
| 1. 2, 3, 4 | 4. 12, 16, 20 | 7. 5, 6, 7 |
| 2. 4, 8 | 5. 15, 20, 25 | 8. 11, 13, 14 |
| 3. 3, 12, 15 | 6. 6, 18, 30 | |
















Activity 2

- | | |
|----------------------------|----------------------------|
| 1. 7, 8, 9, 10, 11 | 4. 125, 150, 175, 200, 225 |
| 2. 12, 13, 14, 15, | 5. 600, 650, 700, 750, 800 |
| 3. 140, 160, 180, 200, 220 | |

Activity 3

- | | |
|---|---|
| 1. $\frac{1}{4}$, $\frac{1}{2}$, $\frac{3}{4}$, $1\frac{1}{4}$, $1\frac{1}{2}$, $1\frac{3}{4}$ | 4. 0, $\frac{1}{2}$, $\frac{3}{4}$, $1\frac{1}{4}$, $1\frac{1}{2}$ |
| 2. $1\frac{1}{4}$, $1\frac{1}{2}$, $1\frac{3}{4}$, $2\frac{1}{4}$, $2\frac{1}{2}$ | 5. $\frac{1}{4}$, $\frac{3}{4}$, 1, $1\frac{1}{2}$, $1\frac{3}{4}$ |
| 3. 7, 8, 10, 11, 12 | |

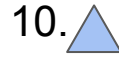
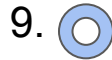
Activity 4

- | | | | |
|--|--|---|--|
| 1.  | 5.  | 9.  | 13.  |
| 2.  | 6.  | 10.  | 14.  |
| 3.  | 7.  | 11.  | 15.  |
| 4.  | 8.  | 12.  | |



ANSWER GUIDE

Activity 5

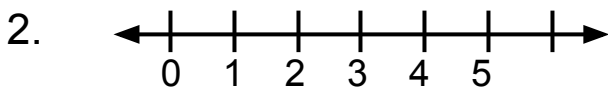


Activity 6

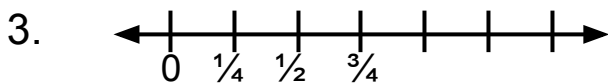
- 0, 1, 2, 3, 4, 11, 12, 13, 14, 15, 16, 17, 18
- $1\frac{1}{4}$, $1\frac{1}{2}$, $1\frac{3}{4}$, 2, $2\frac{1}{4}$, $2\frac{1}{2}$, $2\frac{3}{4}$, 3, $3\frac{1}{4}$, $3\frac{1}{2}$, $3\frac{3}{4}$, 4, $4\frac{1}{4}$
- 11, 12, 13, 14, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29
- 12, 14, 16, 18, 20, 22, 24, 26, 28, 30, 32, 34

Activity 7

- The numbers should be arranged in ascending order.



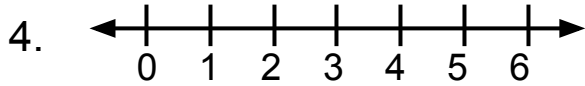
They are 5 units apart from each other.



Yes, $\frac{3}{4}$ is greater than $\frac{1}{2}$ since $\frac{3}{4}$ is in the farthest right of the number line.



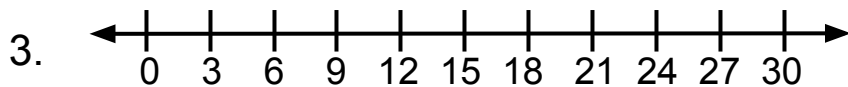
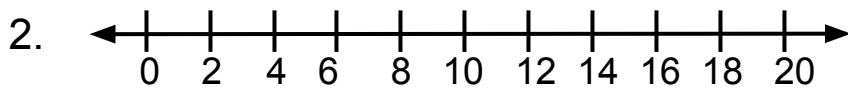
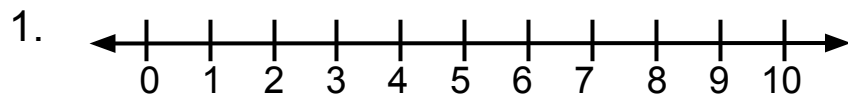
ANSWER GUIDE



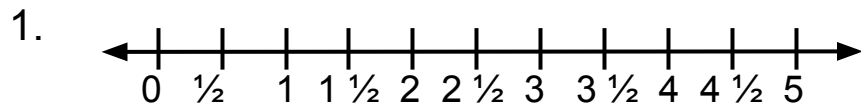
They are 6 numbers/units apart from each other.

5. They are **smaller** in value since they are less than 0 and has negative signs with them.

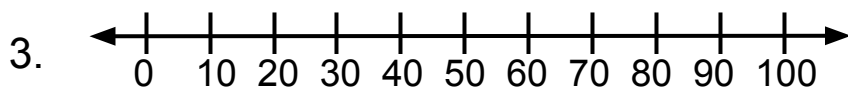
Activity 8



Activity 9

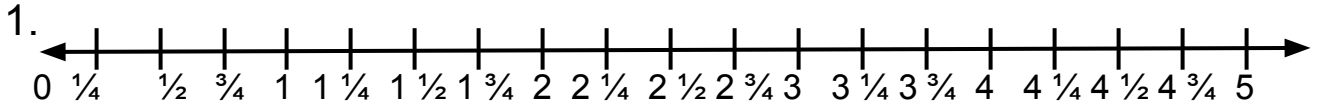


2. $\frac{1}{4}$, $\frac{3}{4}$, $1\frac{1}{4}$, $1\frac{3}{4}$, $2\frac{1}{4}$, $2\frac{3}{4}$, $3\frac{1}{4}$, $3\frac{3}{4}$, $4\frac{1}{4}$

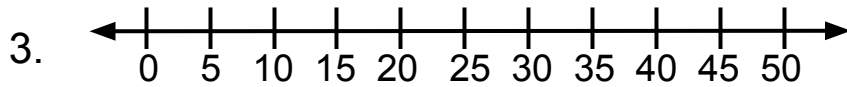


ANSWER GUIDE

Activity 10



2. 2, 6, 10, 14, 18, 22, 26, 30, 34



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