

Mathematics 4

Microlearning Module

QUARTER 2 – Module 13

*Plotting Fractions with Denominators 2, 4, 5
and 10 on the Number Line*



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Microlearning Module (MLM)

Quarter 2 – Module 13: Plotting Fractions with Denominators 2, 4, 5 and 10 on the Number Line

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MICROLEARNING MODULE

Name: _____ Grade & Sec: _____ Score: _____

Subject: Mathematics Quarter: 2 MLM No. 13

Teacher: _____

Competency: Plot Fraction with Denominators 2,4,5 and 10 on the Number Line

A. Look Back!

Directions: Match each improper fraction in Column A to its equivalent mixed number in Column B. Write only the letter of your answer in the blank provided before each number.

Column A

____ 1. $\frac{15}{4}$

____ 2. $\frac{19}{2}$

____ 3. $\frac{25}{6}$

____ 4. $\frac{98}{3}$

____ 5. $\frac{36}{8}$

Column B

a. $4\frac{1}{2}$

b. $32\frac{2}{3}$

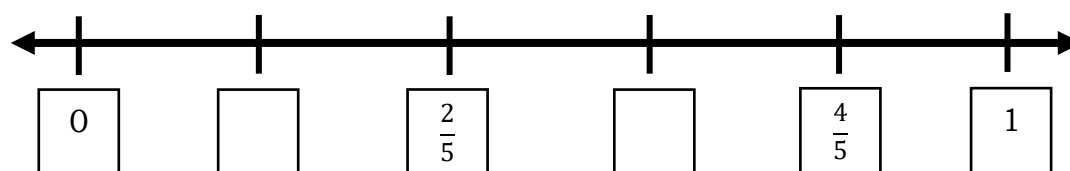
c. $4\frac{1}{6}$

d. $9\frac{1}{2}$

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

B. What's New?

Directions: Write the missing fractions in the number line.



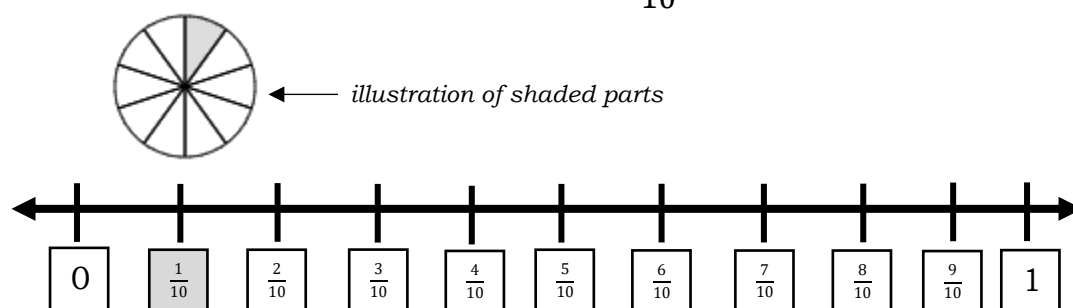
C. What Is It?

Representing fractions on a number line involves plotting fractions like plotting whole numbers. So, fractions on the number line are represented by making equal parts of a whole and the number of those equal parts

would be the same as the number written in the denominator of the fraction.

For example:

To represent $\frac{1}{10}$ on the number line, you have to divide 0 to 1 into 10 equal parts and mark the first part as $\frac{1}{10}$.

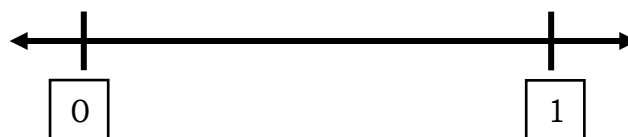


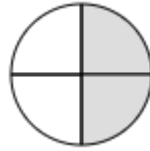
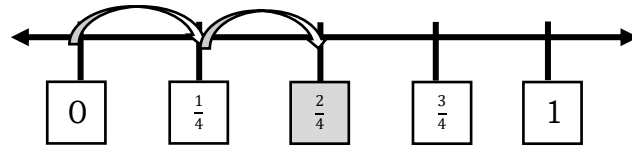
How to Plot Fractions on Number Line?

To plot fractions on the number line, follow these steps:

- Step 1:** Draw a number line of a suitable length.
- Step 2:** If the given fraction is a proper fraction, mark points 0 and 1 on the number line.
- Step 3:** Divide the segment between 0 and 1 into equal parts, matching to the denominator of the fraction.
- Step 4:** Starting from 0, count forward the number of parts shown by the numerator.
- Step 5:** Mark the point on the line.

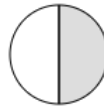
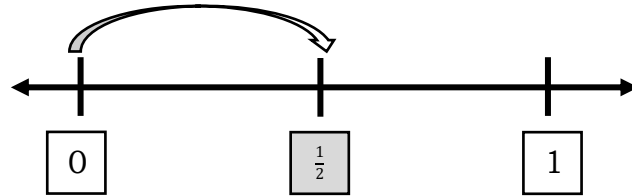
An example of $\frac{2}{4}$ is shown in the illustration below to help you understand how to plot fractions on a number line step-wise.





← illustration of shaded parts

An example of $\frac{1}{2}$ is shown in the illustration below to help you understand how to plot fractions on a number line step-wise.



← illustration of shaded part



LET US SUMMARIZE

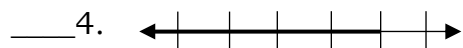
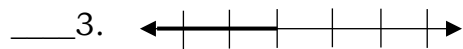
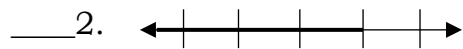
To plot fractions on the number line, follow these steps:

- Step 1: Draw a number line of suitable length.
- Step 2: If the given fraction is a proper fraction, mark points 0 and 1 on the number line.
- Step 3: Divide the segment between 0 and 1 into equal parts, matching to the denominator of the fraction.
- Step 4: Starting from 0, count forward the number of parts shown by the numerator.
- Step 5: Mark the point on the line.

D. Let's Try!

Directions: Match each number line illustration in Column A to its equivalent fraction in Column B. Write only the letter of your answer in the blank provided before each number.

Column A



Column B



E. Let's Evaluate!

Directions: Plot the given fractions in a number line. Place your answer in the box.

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

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

3. $\frac{2}{5}$

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

5. $\frac{7}{10}$

Rubrics:

2 points – The student accurately plotted all fractions, demonstrating a clear understanding of parts of a whole and their relationship to whole numbers.

1 point -The student incorrectly plotted some of the fractions on the number line with inconsistent placement, but he/she accurately plotted the given fraction.

0 point - The student incorrectly plotted the fractions on the number line with inconsistent placement.

F. References

Creag, Herminia C. 2022. *Real-Life Mathematics 4 Second Edition*. Quezon City, Philippines: ABIVA Publishing House, Inc.

Cadano, Maricel H. *Self-Learning Kit Mathematics 4*. Negros Oriental, Philippines: DepEd Schools Division of Negros Oriental

Cue Learn Private Limited. Fractions on Number Line. Retrieved April 28, 2024 from <https://www.cuemath.com/numbers/fractions-on-number-line/>

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REGION XII - DIVISION OF SULTAN KUDARAT

Answer Key (Module 13)

A. Look Back!

1. E
2. D
3. C
4. B
5. A

B. What's New?

1. $\frac{1}{5}$, $\frac{3}{5}$

D. Let's Try!

1. E
2. D
3. C
4. B
5. A

E. Let's Evaluate!

A.

