

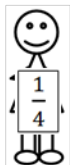
# EQUIVALENT FRACTIONS ON A NUMBER LINE.

## INVESTIGATIONS OVERVIEW PAGE

THIS PAGE IS A SUMMARY OF THE INVESTIGATIONS THAT STUDENTS MAY ENGAGE IN TO DEEPEN THEIR RELATIONAL UNDERSTANDING. INVESTIGATIONS WITH INSTRUCTIONS TO STUDENTS FOLLOW ON SUBSEQUENT PAGES.

- Children draw a number line between zero and 1. They place halves, quarters and eighths on the number line. They identify and explain equivalent fractions using a fraction wall, the relationship between the numerator and denominator, and their common place on the number line. *Reflection: Why are equivalent fractions in the same place on a number line?*
- Children draw a number line between zero and 1. They place thirds, sixths and halves on the number line. They identify and explain equivalent fractions using a fraction wall, the relationship between the numerator and denominator, and their common place on the number line. *Reflection: Why are equivalent fractions in the same place on a number line?*
- Children draw a number line between zero and 1. They place fifths, tenths and halves on the number line. They identify and explain equivalent fractions using a fraction wall, the relationship between the numerator and denominator, and their common place on the number line. *Reflection: Why are equivalent fractions in the same place on a number line?*
- Children draw a number line between zero and 1. They place halves, quarters, eighths, thirds, sixths, twelfths, fifths and tenths on the number line. They identify and explain equivalent fractions using a fraction wall, the relationship between the numerator and denominator, and their common place on the number line. *Reflection: Why are equivalent fractions in the same place on a number line?*
- In pairs, children draw a number line between zero and one. They take turns to place fractions (the attached fraction cards could be used) on the number line, explaining the fraction's placement and any equivalence. *Reflection: Why are equivalent fractions in the same place on a number line?*
- In pairs, children draw a number line between zero and two. They take it in turns to place a fraction (the attached fraction cards could be used) on the number line, explaining the fraction's placement and any equivalence. *Reflection: Why are equivalent fractions in the same place on a number line?*
- In pairs, children draw a number line between one and two. They take it in turns to place a fraction (the attached fraction cards could be used) on the number line, explaining the fraction's placement and any equivalence. *Reflection: Why are equivalent fractions in the same place on a number line?*
- In pairs, children draw a number line. They take turns to make a mark on the number line. Each child identifies a fraction that could be in that place on the number line. They explain how they know these fractions are equivalent using a fraction wall, the relationship between the numerator and denominator, and their common place on the number line? *Reflection: Why are equivalent fractions in the same place on a number line?*

- Designate a place in front of the class to build a human fraction number line starting at zero and ending at 1. Display fractions (the attached fraction cards could be used) one at a time to the class. Select a child to hold the fraction, lining up in front of the class. As the child takes their place on the line in front of the class, they explain their placement, and any fractions their fraction is equivalent to, for example,

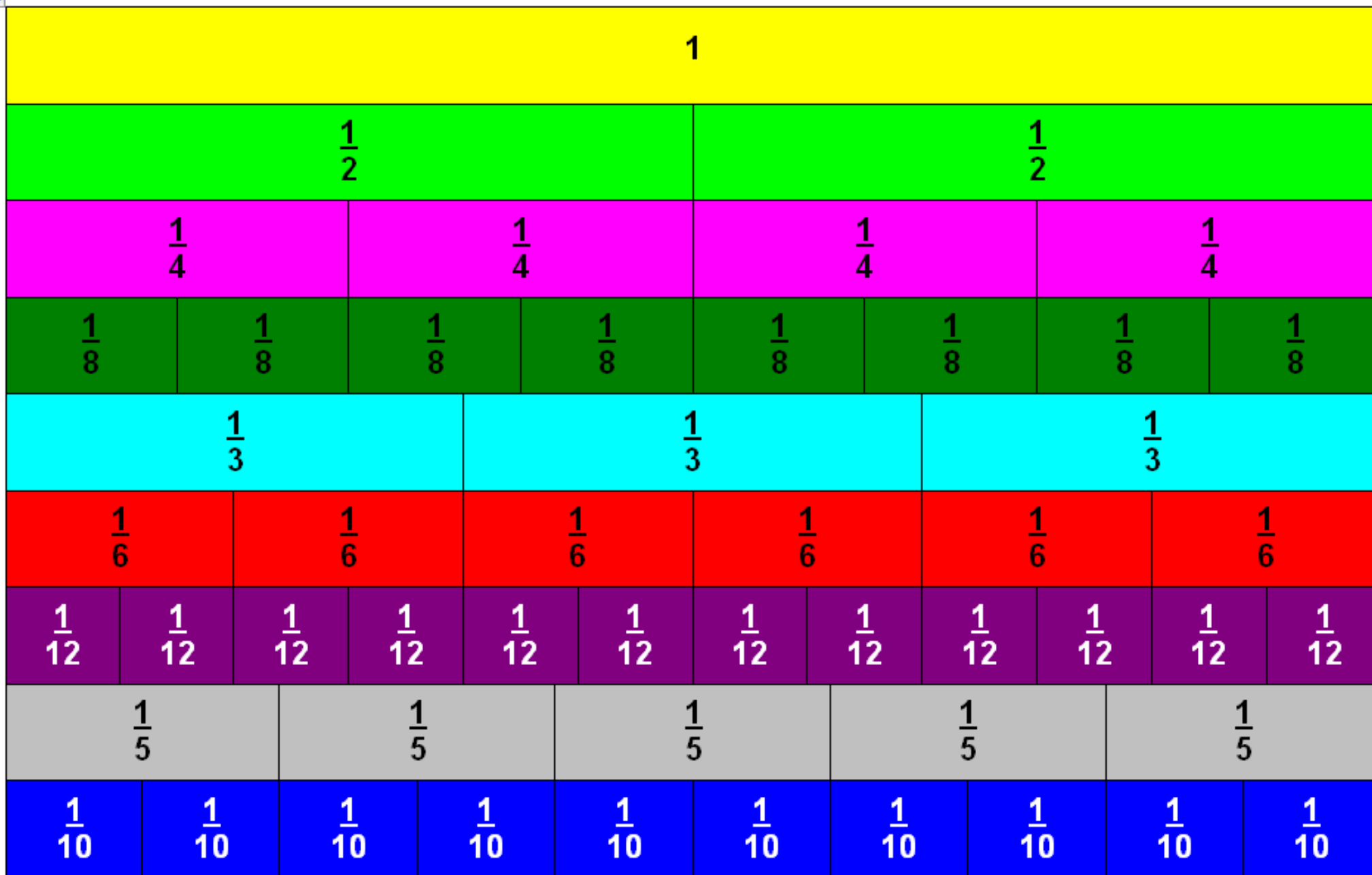


Reflection: Why are equivalent fractions in the same place on a number line?

$\frac{1}{2}$	$\frac{2}{2}$	$\frac{1}{3}$	$\frac{2}{3}$
$\frac{3}{3}$	$\frac{1}{4}$	$\frac{2}{4}$	$\frac{3}{4}$
$\frac{4}{4}$	$\frac{1}{5}$	$\frac{2}{5}$	$\frac{3}{5}$
$\frac{4}{5}$	$\frac{5}{5}$	$\frac{1}{6}$	$\frac{2}{6}$

$\frac{3}{6}$	$\frac{4}{6}$	$\frac{5}{6}$	$\frac{6}{6}$
$\frac{1}{8}$	$\frac{2}{8}$	$\frac{3}{8}$	$\frac{4}{8}$
$\frac{5}{8}$	$\frac{6}{8}$	$\frac{7}{8}$	$\frac{8}{8}$
$\frac{1}{10}$	$\frac{2}{10}$	$\frac{3}{10}$	$\frac{4}{10}$

$\frac{5}{10}$	$\frac{6}{10}$	$\frac{7}{10}$	$\frac{8}{10}$
$\frac{9}{10}$	$\frac{10}{10}$	$\frac{1}{12}$	$\frac{2}{12}$
$\frac{3}{12}$	$\frac{4}{12}$	$\frac{5}{12}$	$\frac{6}{12}$
$\frac{7}{12}$	$\frac{8}{12}$	$\frac{9}{12}$	$\frac{10}{12}$
$\frac{11}{12}$	$\frac{12}{12}$	0	1



## Equivalent Fractions On A Number Line

Draw a number line between zero and 1.

Place halves, quarters and eighths on the number line.

What fractions are in the same place on the number line?

How can you explain how you know these fractions are equivalent using:

- a fraction wall,
- the relationship between the numerator and denominator, and
- their common place on the number line?

Reflection: Why are equivalent fractions in the same place on a number line?

## Equivalent Fractions On A Number Line

Draw a number line between zero and 1.

Place fifths and tenths and halves on the number line.

What fractions are in the same place on the number line?

How can you explain how you know these fractions are equivalent using:

- a fraction wall,
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## Equivalent Fractions On A Number Line

Draw a number line between zero and 1.

Place thirds and sixths and halves on the number line.

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## Equivalent Fractions On A Number Line

Draw a number line between zero and 1.

Place halves, quarters, eighths, thirds, sixths, twelfths, fifths and tenths on the number line.

What fractions are in the same place on the number line?

How can you explain how you know these fractions are equivalent using:

- a fraction wall,
- the relationship between the numerator and denominator, and
- their common place on the number line?

**Reflection:** Why are equivalent fractions in the same place on a number line?

## Equivalent Fractions On A Number Line

Sit with a friend.

Draw a number line between zero and one.

Take turns to place fractions on the number line.

What fractions are in the same place on the number line?

How can you explain how you know these fractions are equivalent using:

- a fraction wall,
- the relationship between the numerator and denominator, and
- their common place on the number line?

**Reflection:** Why are equivalent fractions in the same place on a number line?

## Equivalent Fractions On A Number Line

Sit with a friend.

Draw a number line between zero and two.

Take it in turns to place a fraction on the number line.

What fractions are in the same place on the number line?

How can you explain how you know these fractions are equivalent using:

- a fraction wall,
- the relationship between the numerator and denominator, and
- their common place on the number line?

Reflection: Why are equivalent fractions in the same place on a number line?

## Equivalent Fractions On A Number Line

Sit with a friend.

Draw a number line.

Take turns to make a mark on the number line.

Each child identifies a fraction that could be in that place on the number line.

How can you explain how you know these fractions are equivalent using:

- a fraction wall,
- the relationship between the numerator and denominator, and
- their common place on the number line?

**Reflection:** Why are equivalent fractions in the same place on a number line?