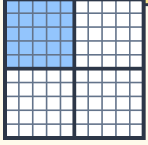


Fractions as Decimals

Write each fraction as hundredths. Then write it as a decimal.

Remember

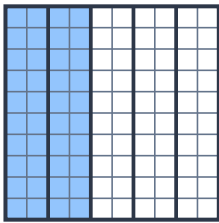


A hundred grid is 1 whole. $\frac{1}{4}$ of it is 25 small squares: $\frac{1}{4} = \frac{25}{100} = 0.25$

Make hundredths: multiply the top and bottom by the same number.

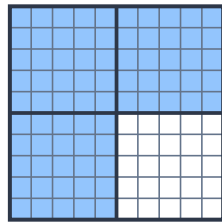
Each grid is cut into equal parts. Write the hundredths, then the decimal.

Example



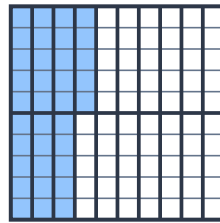
$$\frac{2}{5} = \frac{40}{100} = 0.4$$

1.



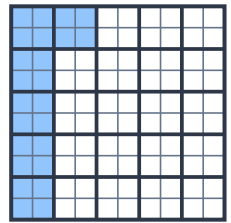
$$\frac{3}{4} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

2.



$$\frac{7}{20} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

3.



$$\frac{6}{25} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

Make hundredths first. Then write each number as a decimal.

Example

$$\frac{3}{5} = \frac{60}{100} = 0.6$$

$$4. \quad \frac{9}{20} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$5. \quad \frac{4}{25} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$6. \quad \frac{9}{50} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$7. \quad \frac{1}{20} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$8. \quad \frac{6}{5} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$9. \quad 2 \frac{3}{20} = 2 \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

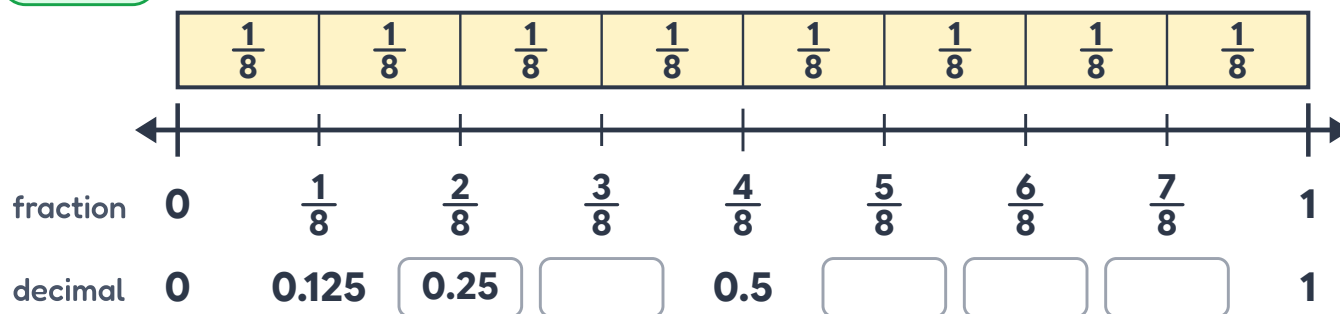
$$10. \quad 1 \frac{7}{25} = 1 \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

Eighths and Thirds

Write eighths and thirds as decimals.

Count by eighths: $\frac{1}{8} = 0.125$. Write the missing decimals.

Example



Write each number as a decimal. Each eighth is 0.125.

Example

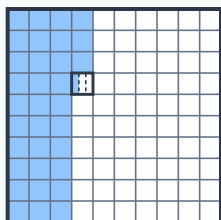
$$1 \frac{5}{8} = 1 + \underline{0.625} = \underline{1.625}$$

1. $\frac{11}{8} = \square \frac{\square}{8} = \underline{\hspace{2cm}}$

2. $2 \frac{3}{8} = 2 + \underline{\hspace{2cm}} = \underline{\hspace{2cm}}$

3. $\frac{15}{8} = \square \frac{\square}{8} = \underline{\hspace{2cm}}$

Thirds: the digits go on and on. Round them to hundredths.



Share 1 whole by 3: each third is 33 squares and $\frac{1}{3}$ of one more.

So $\frac{1}{3} = 0.333\ldots$ The 3s never stop.

Rounded to the nearest hundredth, $\frac{1}{3}$ is about 0.33.

Example

$$\frac{2}{3} = \underline{0.666\ldots}$$

is about 0.67

4. $1 \frac{1}{3} = \underline{\hspace{2cm}}$

is about

5. $\frac{5}{3} = \underline{\hspace{2cm}}$

is about

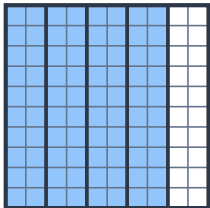
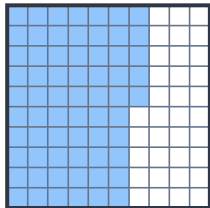
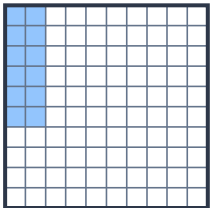
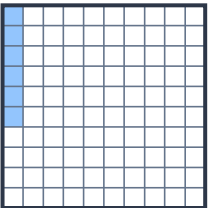
6. $2 \frac{2}{3} = \underline{\hspace{2cm}}$

is about

Decimals as Fractions

Write each decimal as a fraction in simplest form.

Write the shaded part as hundredths. Then simplify.

Example  $0.8 = \frac{80}{100}$ $= \frac{4}{5}$	1.  $0.65 = \frac{\quad}{100}$ $= \frac{\quad}{\quad}$	2.  $0.12 = \frac{\quad}{100}$ $= \frac{\quad}{\quad}$	3.  $0.06 = \frac{\quad}{100}$ $= \frac{\quad}{\quad}$
--	--	---	--

Eighths: use the number line. Write each decimal in simplest form.



Example $0.375 = \frac{3}{8}$

4. $0.875 = \frac{\quad}{\quad}$

5. $0.25 = \frac{\quad}{\quad}$

Write each decimal as a fraction or a mixed number in simplest form.

Example $0.35 = \frac{35}{100} = \frac{7}{20}$	6. $1.75 = \frac{\quad}{\quad}$
7. $0.04 = \frac{\quad}{\quad}$	8. $2.625 = \frac{\quad}{\quad}$
9. $0.22 = \frac{\quad}{\quad}$	10. $2.333... = \frac{\quad}{\quad}$

Equal or Not?

Find fractions and decimals that name the same amount.

Match each fraction to the equal decimal. One decimal is left over.

Example

With pictures



0.375



0.5



0.666...



0.38

0.2

Without pictures

$$\frac{7}{20}$$

0.35

$$1\frac{1}{4}$$

1.4

$$\frac{9}{10}$$

0.12

$$\frac{3}{25}$$

1.25

0.9

Are they equal? Circle yes or no.

Example

$$\frac{3}{4} \text{ and } 0.34$$

yes

no

1. $\frac{1}{20}$ and 0.05

yes

no

2. $\frac{1}{3}$ and 0.3

yes

no

3. $\frac{2}{3}$ and 0.666...

yes

no

4. $1\frac{3}{5}$ and 1.6

yes

no

5. $\frac{1}{8}$ and 0.18

yes

no

Write each point as a decimal and as a fraction in simplest form.



Example

A = 0.15 = $\frac{3}{20}$ B = _____ = $\frac{\square}{\square}$ C = _____ = $\frac{\square}{\square}$

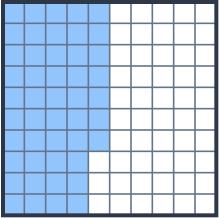


D = _____ = $\frac{\square}{\square}$ E = _____ = $\square \frac{\square}{\square}$ F = _____ = $\square \frac{\square}{\square}$

Percents

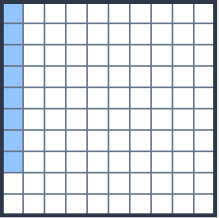
Percent means out of 100: $35\% = 35/100 = 0.35$.

Shade the blank grids. Write each percent as a fraction and a decimal.



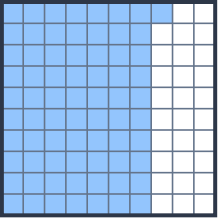
Example

47%
 $= \frac{47}{100}$
 $= 0.47$



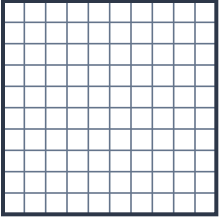
1.

$\underline{\hspace{1cm}}\%$
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



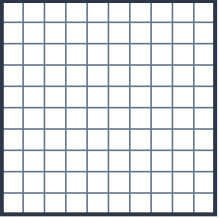
2.

$\underline{\hspace{1cm}}\%$
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



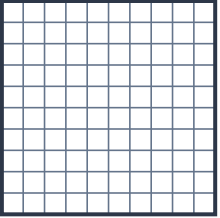
3.

50%
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



4.

24%
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



5.

100%
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$

Each bar is 1 whole, or 100%. What percent is shaded?

Example



$\frac{1}{4} = \frac{25}{100} = 25\%$

6.



$\frac{3}{5} = \frac{\boxed{\hspace{1cm}}}{100} = \underline{\hspace{1cm}}$

7.



$\frac{9}{20} = \frac{\boxed{\hspace{1cm}}}{100} = \underline{\hspace{1cm}}$

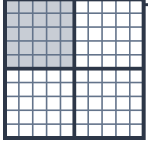
Fill in the table.

	Percent	Fraction in simplest form	Decimal
Example	10%	$\frac{1}{10}$	0.1
8.	_____	$\frac{1}{5}$	_____
9.	_____	_____	0.75

Fractions as Decimals

Write each fraction as hundredths. Then write it as a decimal.

Remember

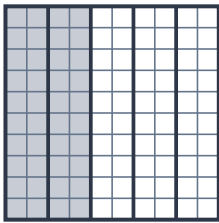


A hundred grid is 1 whole. $\frac{1}{4}$ of it is 25 small squares: $\frac{1}{4} = \frac{25}{100} = 0.25$

Make hundredths: multiply the top and bottom by the same number.

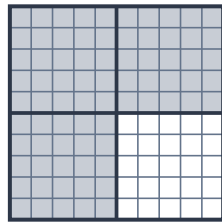
Each grid is cut into equal parts. Write the hundredths, then the decimal.

Example



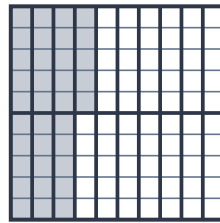
$$\frac{2}{5} = \frac{40}{100} = 0.4$$

1.



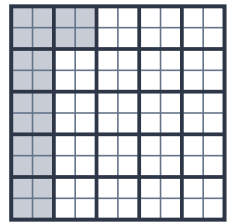
$$\frac{3}{4} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

2.



$$\frac{7}{10} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

3.



$$\frac{6}{25} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

Make hundredths first. Then write each number as a decimal.

Example

$$\frac{3}{5} = \frac{60}{100} = 0.6$$

$$4. \quad \frac{9}{20} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$5. \quad \frac{4}{25} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$6. \quad \frac{9}{50} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$7. \quad \frac{1}{20} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$8. \quad \frac{6}{5} = \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

$$9. \quad 2 \frac{3}{20} = 2 \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

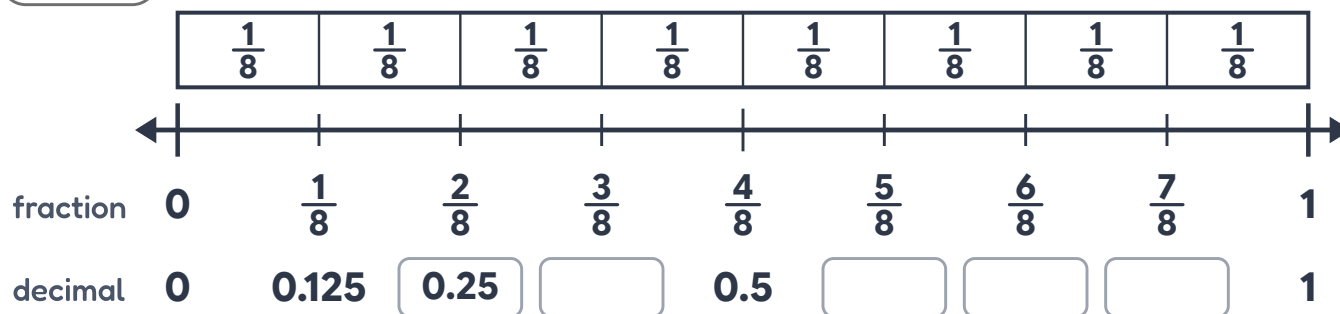
$$10. \quad 1 \frac{7}{25} = 1 \frac{\boxed{}}{100} = \underline{\hspace{1cm}}$$

Eighths and Thirds

Write eighths and thirds as decimals.

Count by eighths: $\frac{1}{8} = 0.125$. Write the missing decimals.

Example



Write each number as a decimal. Each eighth is 0.125.

Example

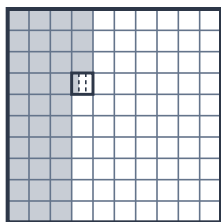
$$1 \frac{5}{8} = 1 + \underline{0.625} = \underline{1.625}$$

1. $\frac{11}{8} = \square \frac{\square}{8} = \underline{\hspace{2cm}}$

2. $2 \frac{3}{8} = 2 + \underline{\hspace{2cm}} = \underline{\hspace{2cm}}$

3. $\frac{15}{8} = \square \frac{\square}{8} = \underline{\hspace{2cm}}$

Thirds: the digits go on and on. Round them to hundredths.



Share 1 whole by 3: each third is 33 squares and $\frac{1}{3}$ of one more.

So $\frac{1}{3} = 0.333\dots$ The 3s never stop.

Rounded to the nearest hundredth, $\frac{1}{3}$ is about 0.33.

Example

$$\frac{2}{3} = \underline{0.666\dots}$$

is about 0.67

4. $1 \frac{1}{3} = \underline{\hspace{2cm}}$
is about

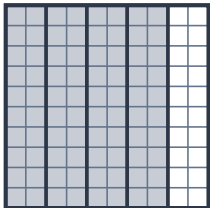
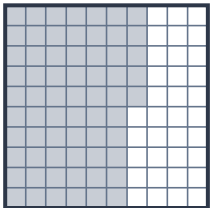
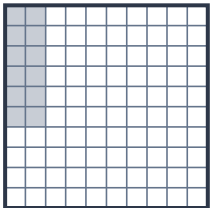
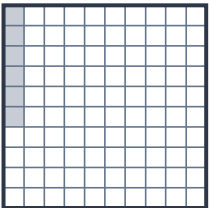
5. $\frac{5}{3} = \underline{\hspace{2cm}}$
is about

6. $2 \frac{2}{3} = \underline{\hspace{2cm}}$
is about

Decimals as Fractions

Write each decimal as a fraction in simplest form.

Write the shaded part as hundredths. Then simplify.

Example  $0.8 = \frac{80}{100}$ $= \frac{4}{5}$	1.  $0.65 = \frac{\quad}{100}$ $= \frac{\quad}{\quad}$	2.  $0.12 = \frac{\quad}{100}$ $= \frac{\quad}{\quad}$	3.  $0.06 = \frac{\quad}{100}$ $= \frac{\quad}{\quad}$
--	---	--	---

Eighths: use the number line. Write each decimal in simplest form.

		
Example $0.375 = \frac{3}{8}$	4. $0.875 = \frac{\quad}{\quad}$	5. $0.25 = \frac{\quad}{\quad}$

Write each decimal as a fraction or a mixed number in simplest form.

Example $0.35 = \frac{35}{100} = \frac{7}{20}$	6. $1.75 = \square \frac{\quad}{\quad}$
7. $0.04 = \frac{\quad}{\quad}$	8. $2.625 = \square \frac{\quad}{\quad}$
9. $0.22 = \frac{\quad}{\quad}$	10. $2.333... = \square \frac{\quad}{\quad}$

Equal or Not?

Find fractions and decimals that name the same amount.

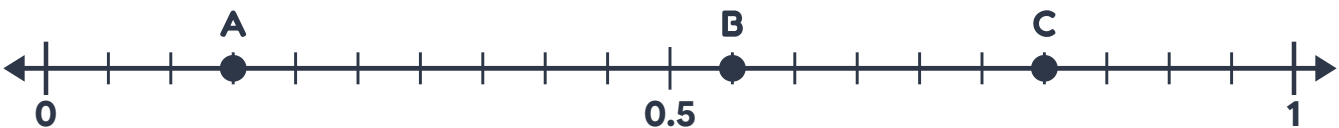
Match each fraction to the equal decimal. One decimal is left over.

Example	With pictures	Without pictures
	• 0.375	• 0.35
	• 0.5	• 1.4
	• 0.666...	• 0.12
	• 0.38	• 1.25
	• 0.2	• 0.9

Are they equal? Circle yes or no.

Example $\frac{3}{4}$ and 0.34	yes	no
1. $\frac{1}{20}$ and 0.05	yes	no
2. $\frac{1}{3}$ and 0.3	yes	no
3. $\frac{2}{3}$ and 0.666...	yes	no
4. $1\frac{3}{5}$ and 1.6	yes	no
5. $\frac{1}{8}$ and 0.18	yes	no

Write each point as a decimal and as a fraction in simplest form.



Example: A = 0.15 = $\frac{3}{20}$ B = 0.5 = $\frac{10}{20}$ C = 0.75 = $\frac{15}{20}$

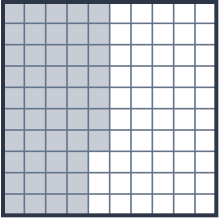


D = 0.25 = $\frac{5}{20}$ E = 0.75 = $\frac{15}{20}$ F = 0.9 = $\frac{18}{20}$

Percents

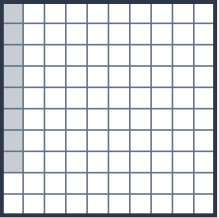
Percent means out of 100: $35\% = 35/100 = 0.35$.

Shade the blank grids. Write each percent as a fraction and a decimal.



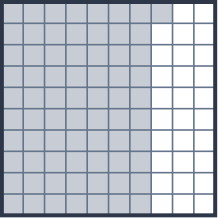
Example

47%
 $= \frac{47}{100}$
 $= 0.47$



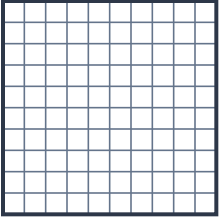
1.

$\underline{\hspace{1cm}}\%$
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



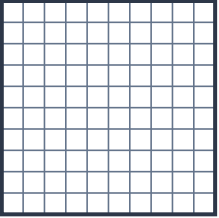
2.

$\underline{\hspace{1cm}}\%$
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



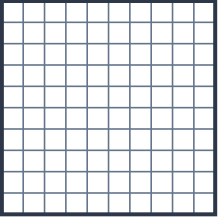
3.

50%
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



4.

24%
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$



5.

100%
 $= \frac{\boxed{\hspace{1cm}}}{100}$
 $= \underline{\hspace{1cm}}$

Each bar is 1 whole, or 100%. What percent is shaded?

Example



$\frac{1}{4} = \frac{25}{100} = 25\%$

6.



$\frac{3}{5} = \frac{\boxed{\hspace{1cm}}}{100} = \underline{\hspace{1cm}}$

7.



$\frac{9}{20} = \frac{\boxed{\hspace{1cm}}}{100} = \underline{\hspace{1cm}}$

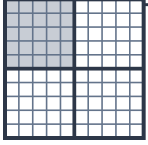
Fill in the table.

	Percent	Fraction in simplest form	Decimal
Example	10%	$\frac{1}{10}$	0.1
8.	_____	$\frac{1}{5}$	_____
9.	_____	_____	0.75

Fractions as Decimals

Write each fraction as hundredths. Then write it as a decimal.

Remember

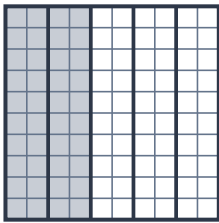


A hundred grid is 1 whole. $\frac{1}{4}$ of it is 25 small squares: $\frac{1}{4} = \frac{25}{100} = 0.25$

Make hundredths: multiply the top and bottom by the same number.

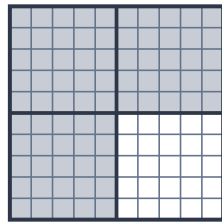
Each grid is cut into equal parts. Write the hundredths, then the decimal.

Example



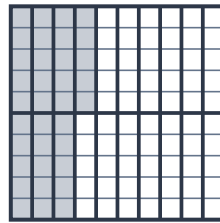
$$\frac{2}{5} = \frac{40}{100} = 0.4$$

1.



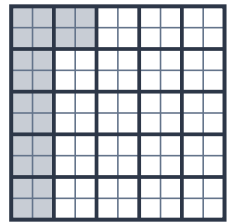
$$\frac{3}{4} = \frac{75}{100} = 0.75$$

2.



$$\frac{7}{20} = \frac{35}{100} = 0.35$$

3.



$$\frac{6}{25} = \frac{24}{100} = 0.24$$

Make hundredths first. Then write each number as a decimal.

Example

$$\frac{3}{5} = \frac{60}{100} = 0.6$$

4. $\frac{9}{20} = \frac{45}{100} = 0.45$

5. $\frac{4}{25} = \frac{16}{100} = 0.16$

6. $\frac{9}{50} = \frac{18}{100} = 0.18$

7. $\frac{1}{20} = \frac{5}{100} = 0.05$

8. $\frac{6}{5} = \frac{120}{100} = 1.2$

9. $2 \frac{3}{20} = 2 \frac{15}{100} = 2.15$

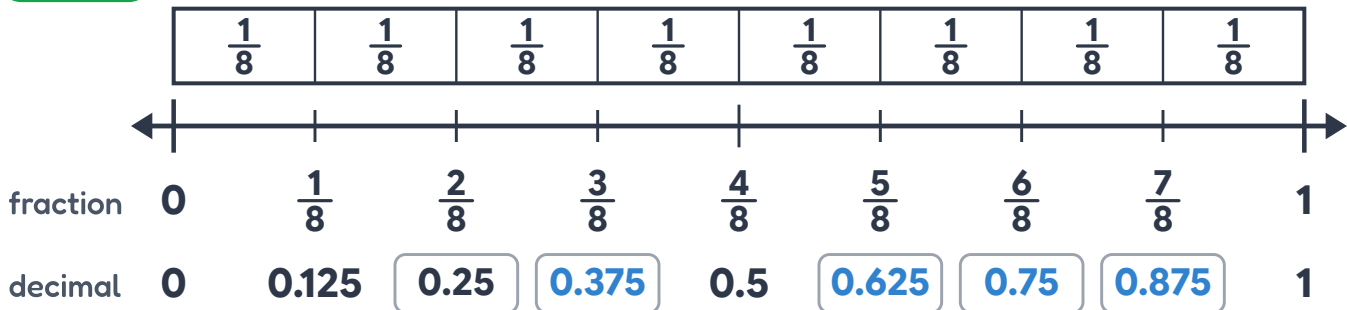
10. $1 \frac{7}{25} = 1 \frac{28}{100} = 1.28$

Eighths and Thirds

Write eighths and thirds as decimals.

Count by eighths: $\frac{1}{8} = 0.125$. Write the missing decimals.

Example



Write each number as a decimal. Each eighth is 0.125.

Example

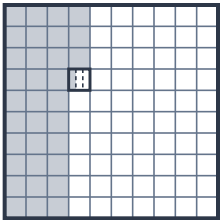
$$1 \frac{5}{8} = 1 + 0.625 = 1.625$$

$$1. \quad \frac{11}{8} = 1 \frac{3}{8} = 1.375$$

$$2. \quad 2 \frac{3}{8} = 2 + 0.375 = 2.375$$

$$3. \quad \frac{15}{8} = 1 \frac{7}{8} = 1.875$$

Thirds: the digits go on and on. Round them to hundredths.



Share 1 whole by 3: each third is 33 squares and $\frac{1}{3}$ of one more.

So $\frac{1}{3} = 0.333...$ The 3s never stop.

Rounded to the nearest hundredth, $\frac{1}{3}$ is about 0.33.

Example

$$\frac{2}{3} = 0.666...$$

is about 0.67

4.

$$1 \frac{1}{3} = 1.333...$$

is about 1.33

5.

$$\frac{5}{3} = 1.666...$$

is about 1.67

6.

$$2 \frac{2}{3} = 2.666...$$

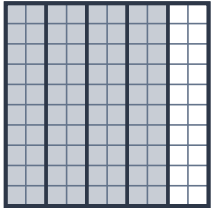
is about 2.67

Decimals as Fractions

Write each decimal as a fraction in simplest form.

Write the shaded part as hundredths. Then simplify.

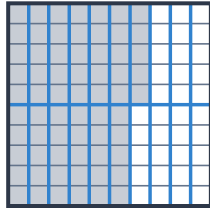
Example



$$0.8 = \frac{80}{100}$$

$$= \frac{4}{5}$$

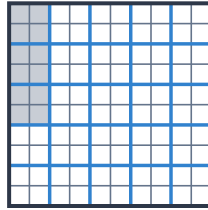
1.



$$0.65 = \frac{65}{100}$$

$$= \frac{13}{20}$$

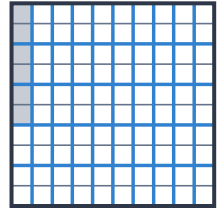
2.



$$0.12 = \frac{12}{100}$$

$$= \frac{3}{25}$$

3.



$$0.06 = \frac{6}{100}$$

$$= \frac{3}{50}$$

Eighths: use the number line. Write each decimal in simplest form.



Example

$$0.375 = \frac{3}{8}$$

4. $0.875 = \frac{7}{8}$

5. $0.25 = \frac{1}{4}$

Write each decimal as a fraction or a mixed number in simplest form.

Example

$$0.35 = \frac{35}{100} = \frac{7}{20}$$

6. $1.75 = 1 \frac{3}{4}$

7. $0.04 = \frac{1}{25}$

8. $2.625 = 2 \frac{5}{8}$

9. $0.22 = \frac{11}{50}$

10. $2.333... = 2 \frac{1}{3}$

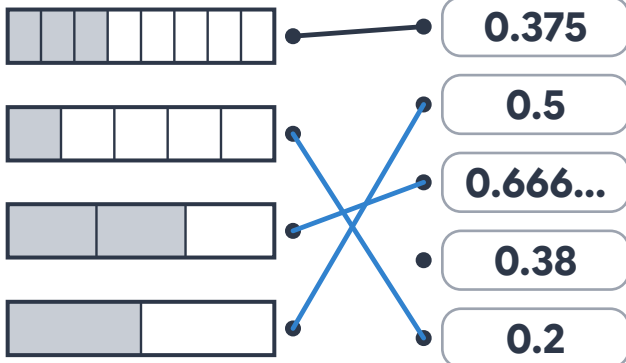
Equal or Not?

Find fractions and decimals that name the same amount.

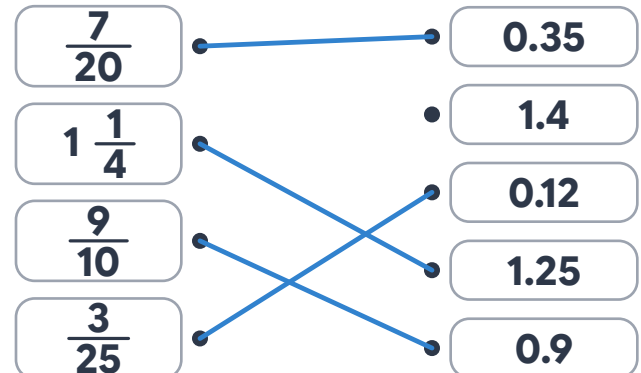
Match each fraction to the equal decimal. One decimal is left over.

Example

With pictures



Without pictures



Are they equal? Circle yes or no.

Example

$\frac{3}{4}$ and 0.34 yes ☒ no

1. $\frac{1}{20}$ and 0.05 ☒ yes no

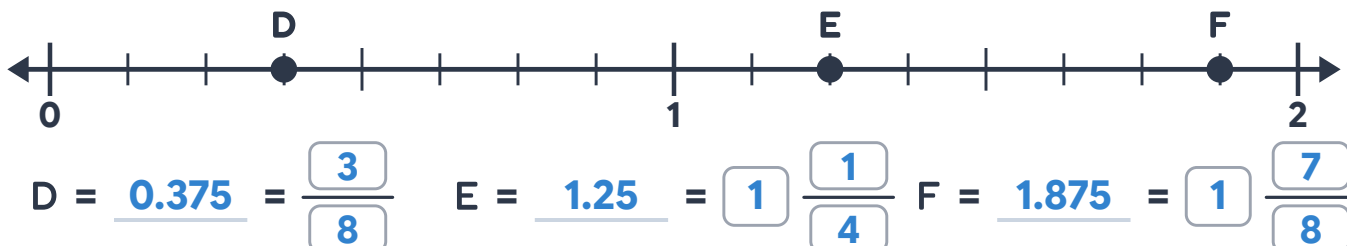
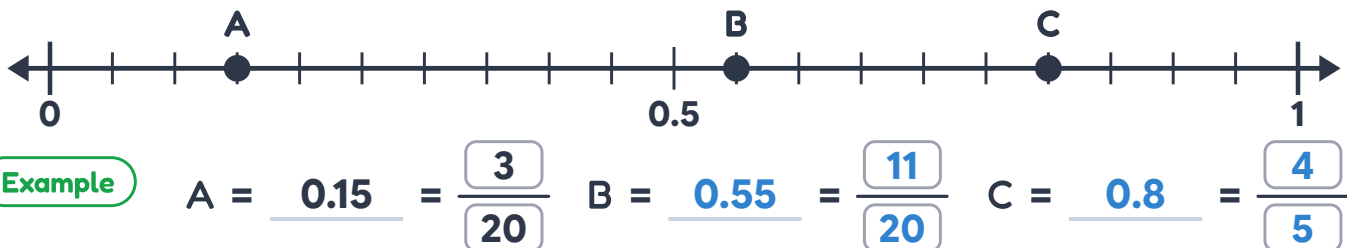
2. $\frac{1}{3}$ and 0.3 yes ☒ no

3. $\frac{2}{3}$ and 0.666... ☒ yes no

4. $1\frac{3}{5}$ and 1.6 ☒ yes no

5. $\frac{1}{8}$ and 0.18 yes ☒ no

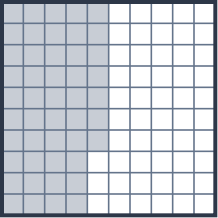
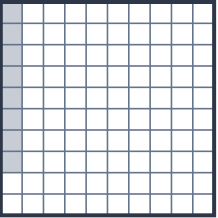
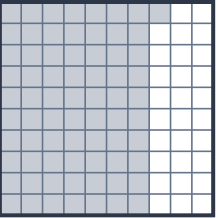
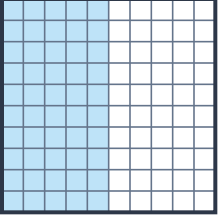
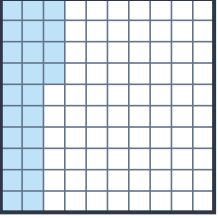
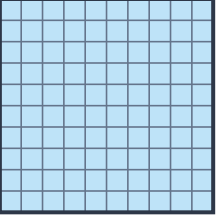
Write each point as a decimal and as a fraction in simplest form.



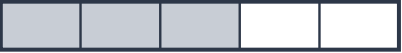
Percents

Percent means out of 100: $35\% = 35/100 = 0.35$.

Shade the blank grids. Write each percent as a fraction and a decimal.

 Example <u>47</u> % $= \frac{\boxed{47}}{100}$ $= \underline{0.47}$	1.  <u>8</u> % $= \frac{\boxed{8}}{100}$ $= \underline{0.08}$	2.  <u>71</u> % $= \frac{\boxed{71}}{100}$ $= \underline{0.71}$
3.  50% $= \frac{\boxed{50}}{100}$ $= \underline{0.5}$	4.  24% $= \frac{\boxed{24}}{100}$ $= \underline{0.24}$	5.  100% $= \frac{\boxed{100}}{100}$ $= \underline{1}$

Each bar is 1 whole, or 100%. What percent is shaded?

Example  $\frac{1}{4} = \frac{\boxed{25}}{100} = \underline{25\%}$	6.  $\frac{3}{5} = \frac{\boxed{60}}{100} = \underline{60\%}$	7.  $\frac{9}{20} = \frac{\boxed{45}}{100} = \underline{45\%}$
---	--	--

Fill in the table.

	Percent	Fraction in simplest form	Decimal
Example	10%	$\frac{1}{10}$	<u>0.1</u>
8.	<u>20%</u>	$\frac{1}{5}$	<u>0.2</u>
9.	<u>75%</u>	$\frac{3}{4}$	0.75