

Fundamentals of Math
Unit 2 Day 3

Title For Your Notebook: Prime Factorization

A **PRIME NUMBER** is a number _____

FACTORS are _____

Find the factors of the following and write in order from least to greatest.

1. 12

2. 24

3. 45

4. 27

U TRY!!

1. 50

2. 32

3. 15

4. 17

5. 80

6. 44

7. 100

8. 7

Prime Factorization is _____.

To find the Prime Factorization, you will use _____.

Find the prime factorization.

1. 21

2. 36

3. 12

U TRY These!

1. 8

2. 28

3. 80

4. 6

5. 32

6. 75

A _____ of a number is a product of that number and any whole number.

The smallest multiple that 2 or more numbers have in common is the _____
_____.

1. 6 and 9

2. 3 and 4

3. 2 and 9

You TRY!!!!

4. 12 and 20

5. 20 and 30

6. 7 and 9

Fundamentals of Math
Unit 2 Day 4

Title For Your Notebook: Simplifying fractions

A **fraction** is in _____ when the top and bottom cannot be any smaller (while still being whole numbers)

How to Simplify Fractions:

Simplify the following fractions:

1. $\frac{6}{8}$

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

3. $\frac{9}{12}$

4. $\frac{12}{18}$

U Try!

1. $\frac{4}{10}$

2. $\frac{6}{12}$

3. $\frac{20}{30}$

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

5. $\frac{15}{20}$

Title for Your Notebook: Comparing Fractions

To compare fractions you determine which fraction is the _____ and which fractions is the _____.

There are two ways to do this:

Method 1:

Method 2:

Let's Try! Compare the fractions:

1. $\frac{2}{5}$ $\frac{4}{5}$
 $\frac{4}{6}$ $\frac{10}{15}$

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

3. $\frac{1}{6}$ $\frac{5}{8}$

4.

U Try!

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

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

3. $\frac{3}{6}$ $\frac{8}{12}$

4. $\frac{5}{6}$ $\frac{2}{15}$

5. $\frac{1}{15}$ $\frac{4}{5}$

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

7. $\frac{2}{4}$ $\frac{4}{8}$

8. $\frac{3}{7}$ $\frac{2}{3}$

Title for Your Notebook: Fraction and Decimal Conversion

Turning a Decimal into a fraction:

_____ it. _____ it. _____ it.

Let's try it!

1. 0.7

2. 0.2

3. 0.4

4. 0.13

5. 0.25

6. 0.52

U Try!

1. 0.25

2. 0.8

3. 0.75

4. 0.6

5. 0.88

6. 0.94

Turning a Fraction into a Decimal:

Remember a fraction is another way to write _____.

So, to turn a fraction into a decimal you divide the _____ by the _____.

Let's Try It!

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

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

3. $\frac{5}{6}$

4. $\frac{6}{10}$

U Try!

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

2. $\frac{4}{9}$

3. $\frac{6}{12}$

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

Fundamentals of Math
Unit 2 Day 7

Title For Your Notebook: Adding and Subtracting Fractions

First of all, what is a fraction? _____.

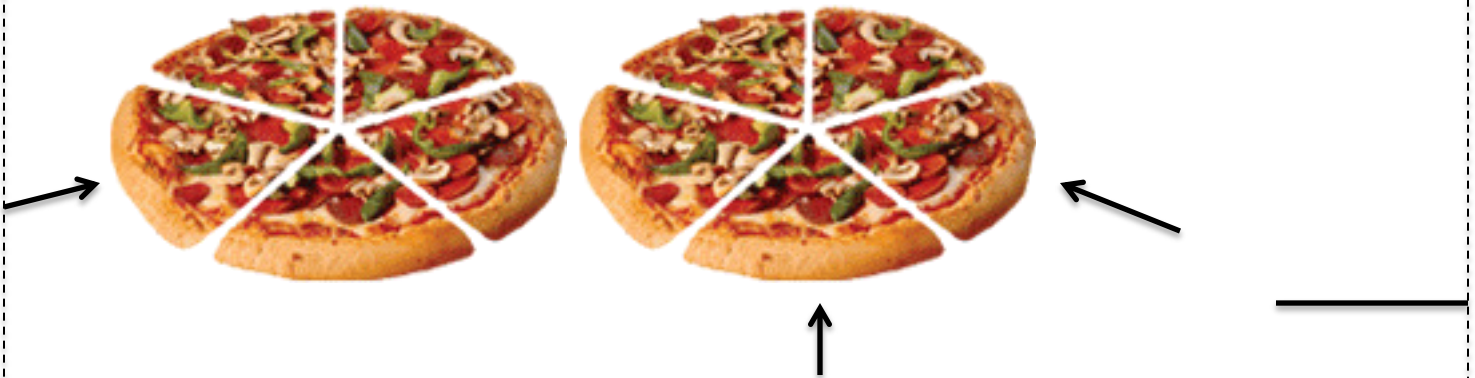
What does it look like?

$$\frac{2}{3}$$

← _____

← _____

Think about a pizza. If a pepperoni pizza is cut into five slices and you eat one, then a cheese pizza is cut into five slices and you eat two, you've eaten $\frac{1}{5}$ and $\frac{2}{5}$ of each pizza. How much pizza have you eaten total?



So, when you add fractions with the same denominator, the only things you add are the

_____!

Let's try!

1) $\frac{9}{7} + \frac{12}{7}$

2) $\frac{1}{6} + \frac{5}{6}$

3) $\frac{1}{3} + \frac{4}{3}$

4) $\frac{1}{2} + \frac{3}{2}$

But what if the denominators aren't the same? We need to find the _____!

Example 1: Add $\frac{3}{5} + \frac{7}{10}$

Step 1) What is the smallest number that both 5 and 10 multiply into? _____

That will be our new denominator!

Step 2) But wait, you can't just change the denominator without changing the numerator!
What could you multiply 5 by to get 10? _____ Multiply 3 by that same number!

Step 3) Our problem now looks like...

Step 4) Now that our denominators are the same, just add the numerators!

Let's try some more!

1) $\frac{4}{5} + \frac{4}{7}$

2) $\frac{5}{4} + \frac{3}{4}$

3) $\frac{1}{2} + \frac{11}{8}$

4) $\frac{5}{4} + \frac{4}{3}$

You'll use a similar method for subtracting!

Subtracting with Like Denominators

1) $\frac{5}{4} - \frac{3}{4}$

2) $\frac{3}{2} - \frac{1}{2}$

3) $\frac{2}{5} + \frac{4}{5}$

4) $\frac{1}{3} - \frac{1}{3}$

Subtracting with Different Denominators

Use the same process you used with adding, but subtract this time!

Subtract $\frac{9}{5} - \frac{5}{8}$

Step 1) What is the smallest number that both 5 and 8 multiply into? _____

That will be our new denominator!

Step 2) But wait, you can't just change the denominator without changing the numerator!
What could you multiply 5 and 8 by to get 40? _____ Multiply the numerators by those numbers!

Step 3) Our problem now looks like...

Step 4) Now that our denominators are the same, just subtract the numerators!

7) $\frac{5}{3} - \frac{2}{5}$

8) $\frac{7}{4} - \frac{6}{7}$

9) $\frac{7}{6} - \frac{1}{3}$

10) $\frac{4}{3} - \frac{6}{7}$

Title For Your Notebook: Multiplying Fractions and Dividing Fractions
Unit 1, Day 9

Multiplying fractions is even easier than adding and subtracting them!

All you have to do is

Example 1 : Multiply and simplify $\frac{5}{6} \cdot \frac{4}{3}$

Example 2: Multiply and simplify $-\frac{3}{5} \cdot \frac{7}{3}$

Practice!

1) $-\frac{5}{4} \cdot \frac{1}{3}$

2) $\frac{8}{7} \cdot \frac{7}{10}$

3) $\frac{4}{9} \cdot \frac{7}{4}$

4) $-\frac{2}{3} \cdot \frac{5}{4}$

Dividing fractions is a little trickier! In order to divide, we have to use the

_____ - _____ - _____ method! Then, we just multiply!

Example 1: Divide and simplify $\frac{1}{2} \div \frac{8}{7}$

Step 1: Keep – change – flip!

Step 2: Multiply numerators and denominators.

Step 3: Simplify if necessary.

Example 2: Divide and simplify $-\frac{1}{7} \div \frac{9}{4}$

Practice!

11) $\frac{-1}{5} \div \frac{7}{4}$

12) $\frac{-1}{2} \div \frac{5}{4}$

13) $\frac{-3}{2} \div \frac{-10}{7}$

14) $\frac{1}{2} \div \frac{8}{7}$