



Common Core Lesson Planning Steps:

1. Identify **ONE** Common Core Standard that you will be teaching this Spring....make it relevant to what your going to be teaching!
2. Unpack/Understand the depth of the CC Standard using the NC Unpacking Doc as a guide **NC Unpacking Docs are located on the website rethinkmathematics.com under Common Core Resources.*
3. Look in your textbook for lessons and resources that support the standard.
4. Search online using the websites below (or “google” specific standard).

Website Resources:

www.k-5mathteachingresources.com (**activities**)

learnzillion.com (**lessons**)

<https://grade2commoncoremath.wikispaces.hcpss.org>

(unit planning ie learning targets, lessons and activities) *you can switch out the grade numbers for your own grade

<http://sftechk8.weebly.com/math.html> (**various resources**)



Lesson Planning Example:

Essential Learning Goal: Adding and subtracting mixed numbers and fractions with the same denominator.

Focused Common Core Standard(s): 4.NF.3

Previous Understanding: 3.NF.1: Modeling fractions using area models and number lines. **3.NF.2** Understand that a fraction is a number on the number line. **3.NF.3** Explain equivalent fractions, compare fractions by reasoning about their sizes, and express whole numbers as fractions.

Identify Learning Target(s): (Based on the NC Unpacking Doc)

- A.** Understand addition and subtraction of fractions as joining and separating parts referring to the same whole.
- B.** Decompose a fraction into a sum of fractions with the same denominator in more than one way, recording each decomposition by an equation. Justify decompositions, e.g., by using a visual fraction model. Examples: $\frac{3}{8} = \frac{1}{8} + \frac{1}{8} + \frac{1}{8}$; $\frac{3}{8} = \frac{1}{8} + \frac{2}{8}$; $2 \frac{1}{8} = 1 + 1 + \frac{1}{8} = \frac{8}{8} + \frac{8}{8} + \frac{1}{8}$.
- C.** Add and subtract mixed numbers with like denominators, e.g., by replacing each mixed number with an equivalent fraction, and/or by using properties of operations and the relationship between addition and subtraction.
- D.** Solve word problems involving addition and subtraction of fractions referring to the same whole and having like denominators, e.g., by using visual fraction models and equations to represent the problem.

** Grade 4 expectations in this domain are limited to fractions with denominators 2, 3, 4, 5, 6, 8, 10, 12, and 10*



Lesson 1: Show students how mixed numbers and simple fractions can be composed and decomposed in multiple ways using numbers. Add word problems to practice.

Examples: $\frac{3}{8} = \frac{1}{8} + \frac{1}{8} + \frac{1}{8}$; $\frac{3}{8} = \frac{1}{8} + \frac{2}{8}$; $2 \frac{1}{8} = 1 + 1 + \frac{1}{8} = \frac{8}{8} + \frac{8}{8} + \frac{1}{8}$; $1 \frac{1}{4} - \frac{3}{4} = ?$ $\frac{4}{4} + \frac{1}{4} = \frac{5}{4}$; $\frac{5}{4} - \frac{3}{4} = \frac{2}{4}$ or $\frac{1}{2}$

Textbook Resources: Lesson pg 508: Mixed numbers and improper fractions. Reasoning Activity on page 511. Practice problems on pages 512-513.

Supplemental Online Resources: <http://www.k-5mathteachingresources.com/support-files/mixed-numbers-word-problems-same-denominator.pdf>

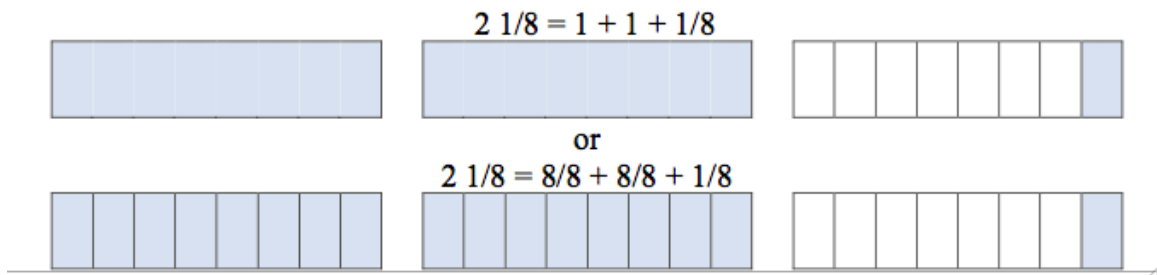
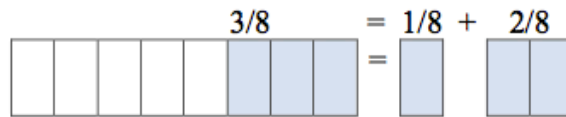
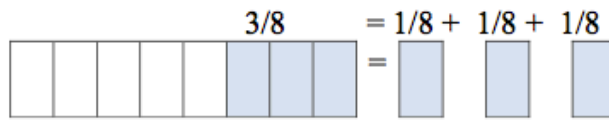
Lesson 2: Add the modeling of how mixed numbers and simple fractions can be composed and decomposed in multiple ways using numbers:

Textbook Resources: Lesson pg 508: Mixed numbers and improper fractions (models). Add word problems to practice. Reasoning Activity on page 511. Practice problems on pages 512-513.

Supplemental Online Activities: <http://www.k-5mathteachingresources.com/support-files/decomposingfractions4nf3b.pdf>

<http://www.k-5mathteachingresources.com/support-files/pizza-share.pdf>

Example:



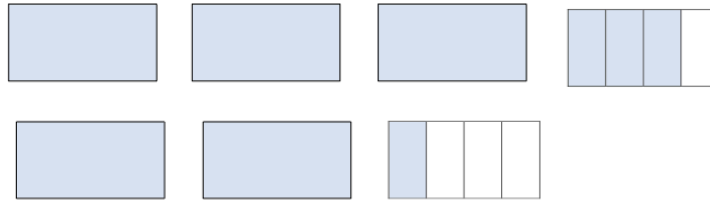
Lesson 3: Add and subtract mixed numbers with like denominators, e.g., by replacing each mixed number with an equivalent fraction, and/or by using properties of operations and the relationship between addition and subtraction.

Textbook Resources: Lesson pg 516 and pg 520: Use the concepts of composing and decomposing and apply to adding and subtracting fractions with like denominators and mixed numbers. Guiding question: *Show me using two models.*

Supplemental Online Activities:

<http://learnzillion.com/lessons/108-add-fractions-with-like-denominators-using-a-number-line>

Example:
While solving the problem, $3\frac{3}{4} + 2\frac{1}{4}$ students could do the following:



Student 1
 $3 + 2 = 5$ and $\frac{3}{4} + \frac{1}{4} = 1$ so $5 + 1 = 6$

Student 2
 $3\frac{3}{4} + 2 = 5\frac{3}{4}$ so $5\frac{3}{4} + \frac{1}{4} = 6$

Student 3
 $3\frac{3}{4} = \frac{15}{4}$ and $2\frac{1}{4} = \frac{9}{4}$ so $\frac{15}{4} + \frac{9}{4} = \frac{24}{4} = 6$

Lesson 4: Solve word problems involving addition and subtraction of fractions referring to the same whole and having like denominators, e.g., by using visual fraction models and equations to represent the problem.

Textbook Resources: Lesson pg 522 and 526 Problem Solving Applications

Supplemental Online Activities:

- d. Solve word problems involving addition and subtraction of fractions referring to the same whole and having like denominators, e.g., by using visual fraction models and equations to represent the problem.

A cake recipe calls for you to use $\frac{3}{4}$ cup of milk, $\frac{1}{4}$ cup of oil, and $\frac{2}{4}$ cup of water. How much li needed to make the cake?

