Name _____ Date _____

Find Fraction Differences

- Use fraction circle pieces to show both fractions in the subtraction problems below.
- Estimate the answer. Show your estimate on the number line in the second column.
- Use the single-color method to do the subtraction problem with circle pieces.
- Make a sketch to show how you subtracted as shown in the example.
- Write two number sentences for each problem.

Problem	Estimate and Fraction Difference	Number Sentences
Example $\frac{3}{5} - \frac{1}{10}$		$\frac{3}{5} - \frac{1}{10} = \frac{1}{2}$ $\frac{6}{10} - \frac{1}{10} = \frac{5}{10}$
1. $\frac{1}{2} - \frac{1}{8}$		
2. $\frac{2}{3} - \frac{1}{6}$		

Subtract Fractions SAB · Grade 5 · Unit 2 · Lesson 11 105

Student Activity Book - Page 105

Student Activity Book

Find Fraction Differences (SAB pp. 105–106) Questions 1–6

For Questions 1–6, estimates on number lines and number sentences will vary. Possible responses given.

Problem	Estimate and Fraction Difference	Number Sentences
1. $\frac{1}{2} - \frac{1}{8}$		$\frac{1}{2} - \frac{1}{8} = \frac{3}{8}$ $\frac{4}{2} - \frac{1}{8} = \frac{3}{8}$
2. $\frac{2}{3} - \frac{1}{6}$		$\frac{2}{3} - \frac{1}{6} = \frac{1}{2}$ $\frac{4}{6} - \frac{1}{6} = \frac{3}{6}$ $\frac{2}{3} - \frac{1}{6} = \frac{3}{6}$

Name _____ Date _____

Problem	Estimate and Fraction Difference	Number Sentences
3. $1 - \frac{3}{4}$		
4. $\frac{2}{3} - \frac{1}{4}$		
5. $\frac{7}{10} - \frac{2}{5}$		
6. $\frac{5}{6} - \frac{3}{4}$		

106 SAB · Grade 5 · Unit 2 · Lesson 11 Subtract Fractions

Student Activity Book - Page 106

Problem	Estimate and Fraction Difference	Number Sentences
3. $1 - \frac{3}{4}$		$1 - \frac{3}{4} = \frac{1}{4}$ $\frac{4}{4} - \frac{3}{4} = \frac{1}{4}$
4.* $\frac{2}{3} - \frac{1}{4}$		$\frac{2}{3} - \frac{1}{4} = \frac{5}{12}$ $\frac{8}{12} - \frac{3}{12} = \frac{5}{12}$
5. $\frac{7}{10} - \frac{2}{5}$		$\frac{7}{10} - \frac{2}{5} = \frac{3}{10}$ $\frac{7}{10} - \frac{4}{10} = \frac{3}{10}$
6. $\frac{5}{6} - \frac{3}{4}$		$\frac{5}{6} - \frac{3}{4} = \frac{1}{12}$ $\frac{10}{12} - \frac{9}{12} = \frac{1}{12}$

*Answers and/or discussion are included in the lesson.

Add and Subtract Fractions (SAB pp. 107–108)
Homework
Questions 1–8

Number sentences may vary.

1. Mark; $\frac{5}{6} - \frac{4}{6} = \frac{1}{6}$ or $\frac{5}{6} - \frac{2}{3} = \frac{1}{6}$

2. $\frac{9}{10} - \frac{1}{2} = \frac{4}{10}$ mile or $\frac{9}{10} - \frac{5}{10} = \frac{4}{10}$ mile

3. $\frac{12}{12} - \frac{10}{12} = \frac{2}{12}$ strip

4. $\frac{2}{3} + \frac{2}{9} = \frac{8}{9}$; $\frac{9}{9} - \frac{8}{9} = \frac{1}{9}$ bowl

5. $\frac{1}{3} + \frac{3}{6} = \frac{5}{6}$; $\frac{6}{6} - \frac{5}{6} = \frac{1}{6}$; 10 minutes

6. $\frac{1}{4} + \frac{3}{12} = \frac{6}{12}$; $\frac{1}{2}$ are fifth graders

7. **A.** $\frac{1}{5} + \frac{3}{10} = \frac{5}{10}$; the jar is half full

   B. $\frac{1}{4}$ of a jar more; $\frac{1}{2} + \frac{1}{4} = \frac{3}{4}$ jar

8. Word problems will vary.

Name _____ Date _____

Add and Subtract Fractions

Homework

Solve each word problem. Include a number sentence in your solution.

1. The library held a reading contest. In one night, Mark read $\frac{5}{6}$ of the book *The Magic Pen* and Miguel read $\frac{2}{3}$ of *The Magic Pen*. Who read more of the book? How much more of the book did that student read?

2. Diana wants to buy a book from Buy More Book Store. It is $\frac{9}{10}$ of a mile from her house. By 3:00, she had walked one-half of a mile. How much farther does Diana have to walk?

3. The librarian is making bookmarks for the contest participants. Each strip of paper is one foot long. He wants to make 5-inch bookmarks and waste as little paper as possible. What fraction of each strip will be left after making bookmarks?

4. Sam invites Levi over to his house to read. They share a big bowl of popcorn. Sam eats $\frac{2}{3}$ of the bowl and Levi eats $\frac{2}{9}$ of the bowl. How much of the bowl of popcorn remains?

Subtract Fractions   SAB · Grade 5 · Unit 2 · Lesson 11   107

Student Activity Book - **Page 107**

Name _____ Date _____

5. Michael's goal is to read for 60 minutes. He reads for $\frac{1}{3}$ hour and then takes a break. Then he reads for $\frac{3}{6}$ of an hour and takes another break to add up his minutes. How many more minutes does Michael need to read?

6. The library is filled with contestants from the third, fourth, and fifth grades. $\frac{1}{4}$ of the contestants are third graders and $\frac{3}{10}$ of the contestants are fourth graders. What part of the contestants are fifth graders?

7. The librarian adds a marble to a jar for every book read. The jar was $\frac{1}{5}$ full yesterday. Today, he adds $\frac{3}{10}$ of a jar more to the marbles.

   A. What fraction of the jar is full?

   B. The students are awarded an extra 15 minutes of silent reading when the jar is $\frac{3}{4}$ full. How much more of the jar needs to be filled to get the reward?

8. Write your own subtraction word problem about a library reading contest. Show how to solve it.

108 SAB · Grade 5 · Unit 2 · Lesson 11   Subtract Fractions

Student Activity Book - **Page 108**