Section 3.3

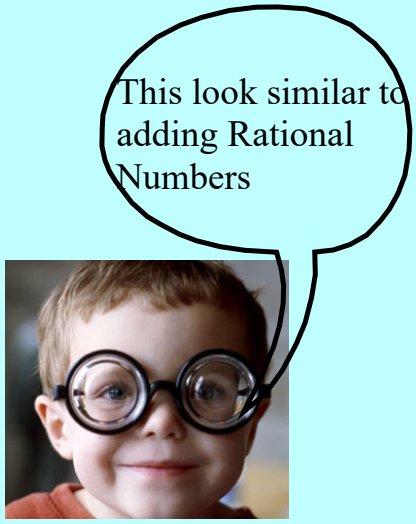
Subtracting Rational Numbers

When subtracting Rational Numbers you must have a ...

Common Denominator

Ex) $\frac{13}{7} - \frac{4}{7} =$

Same Denominators



Your Turn

1) $-2\frac{2}{9} - \left(-3\frac{1}{3}\right)$

$-\frac{20}{9} - \left(-\frac{10}{3}\right)$ ×3

$-\frac{20}{9} + \left(+\frac{30}{9}\right)$ ×3

$\frac{10}{9} = 1\frac{1}{9}$

2) $6\frac{1}{2} - 3\frac{1}{7}$

$\frac{13}{2} - \frac{22}{7}$ ×2 ×7

$\frac{91}{14} - \frac{44}{14}$

$\frac{47}{14} = 3\frac{5}{14}$

Try these out!

Use what you know about multiplying integers & fractions to evaluate the following expressions.

$\left(\frac{7}{-4}\right) \times \frac{9}{2}$

$-\frac{63}{8} = -7\frac{7}{8}$

$9 \times (-3)$

-27

$\frac{9}{2} \times \left(\frac{-3}{10}\right)$

$-\frac{27}{20} = -1\frac{7}{20}$

☆ Don't forget to ALWAYS reduce if possible!

$\frac{48}{15} = 3\frac{3}{15} = 3\frac{1}{5}$

(-1.5) x (-1.8)

$1.5 \times 1.8 = 270$

1.70

or

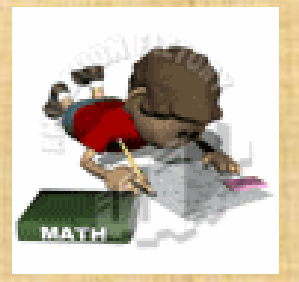
$\left(1\frac{8}{5}\right) \times \left(1\frac{6}{5}\right)^2$

$\frac{16}{5} = 3\frac{1}{5}$

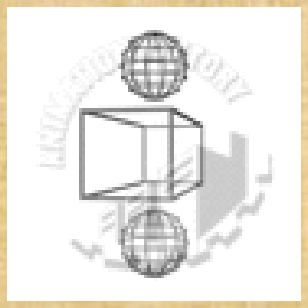
$$\left(\frac{-48}{15}\right)^{4} \times \left(\frac{35}{12}\right)^{1}$$

$$\frac{-28}{3}$$

$$= -9\frac{1}{3}$$



Dividing Fractions



#2

$$\frac{1}{8} \div \frac{-6}{5}$$

$\frac{1}{8} \times \frac{5}{-6}$

$\frac{-5}{48}$ or $\frac{-5}{48}$

or

$-\frac{5}{48}$

$$\frac{11}{3} \div \frac{5}{6}$$

$$\frac{11}{3} \times \frac{6}{5}^{2}$$

$$\frac{22}{5} = 4\frac{2}{5}$$

Geometry, Measurement & Finance 10

Assignment - Reviewing Fractional Operations

Name: _____ Date: _____

INSTRUCTIONS: Perform the indicated operations on the following fractions.

1. $\frac{3}{16}+\frac{5}{8}$

2. $6\frac{1}{2}+5\frac{3}{8}$

3. $2\frac{1}{16}+3\frac{1}{4}$

4. $4\frac{5}{8}-\frac{3}{4}$

5. $\frac{7}{8}+\frac{3}{4}$

6. $3\frac{5}{32}+8\frac{9}{16}$

7. $5\frac{1}{2}+7\frac{5}{16}$

8. $8\frac{1}{2}+7\frac{3}{4}$

9. $1\frac{1}{2}+10\frac{11}{32}$

10. $12\frac{5}{8}+15\frac{1}{4}$

11. $\frac{1}{2}\times 2\frac{3}{4}$

12. $6\frac{5}{8}\div 2$

GMF 10 Name_____

Adding and Subtracting Fractions Date_____

Evaluate each expression.

1) $1\frac{1}{2}-\left(-1\frac{1}{2}\right)$

2) $\left(-1\frac{5}{6}\right)-2\frac{2}{3}$

3) $2\frac{5}{6}-2\frac{2}{3}$

4) $3-\left(-1\frac{3}{4}\right)$

5) $1\frac{7}{8}+\left(-2\frac{1}{4}\right)$

6) $\left(-\frac{5}{3}\right)-\left(-\frac{2}{5}\right)$

7) $\left(-1\frac{1}{4}\right)-\left(-3\frac{1}{4}\right)$

8) $\left(-3\frac{4}{7}\right)-\left(-\frac{1}{2}\right)$

9) $\left(-\frac{5}{3}\right)+3\frac{3}{4}$

10) $\left(-1\frac{4}{5}\right)-\left(-3\frac{1}{6}\right)$

Attachments

Worksheet - Converting Imperial Lengths.docx

Assignment - Measuring in an Imperial System.pdf

Worksheet - Fractions.docx