Fractions computer assignment #2
First discussion: Open the NLVM Comparing Fractions tool:
http://nlvm.usu.edu/en/nav/frames_asid_159_g_3_t_1.html

1. Example. What two fractions did the computer give you? **2/4 and 4/6** Do the denominators of the fractions have a common factor? **Yes, 2 is a factor of both 4 and 6**	Use the computer tool to find equivalent fractions that have a common denominator (by clicking the up/down buttons under each fraction). Write the fractions you found here: **6/12 and 8/12**	Find another pair of equivalent fractions that have a different (larger) common denominator. Write the fractions you found here. **12/24 and 16/24**
a. Click New Fractions until you find two fractions that *do* have a common denominator. Write them here:	Use the computer tool to find equivalent fractions that have a common denominator (by clicking the up/down buttons under each fraction). Write them here:	Find another pair of equivalent fractions that have a different (larger) common denominator. Write the fractions you found here.
b. Click New Fractions until you find two fractions that *do not* have a common denominator. Write them here:	Use the computer tool to find equivalent fractions that have a common denominator. Write them here:	Find another pair of equivalent fractions that have a different (larger) common denominator. Write the fractions you found here.

Write about:

- How does the tool help you visualize what a common denominator is?

- How are the common denominator forms you found the same and different for pairs whose denominators do or do not have a common factor?

Second discussion: Open the Number Line Bars NLVM tool http://nlvm.usu.edu/en/nav/frames_asid_265_g_3_t_1.html Click Clear to delete the on-screen instructions (we will not be dividing fractions today).

Show 3/4 + 2/3 by:

- Make 3/4 by making 3 new bars of size 1/4 (type 1 and 4 into the boxes to the left of the new bar button and click New Bar 3 times)
- Make 2/3 by making 2 new bars of size 1/3
- Put the bars end-to-end along the number line
- Change the step size (click the up/down button next to where it says **step size**) until it shows a common denominator for the fourth and the thirds.

How many twelfths are in each 1/4? (count on the computer picture)

What multiplication will tell you how many fifteenths are in 3/4?

How many twelfths are in each 1/3?

What multiplication will tell you have many twelfths are in 2/3?

Repeat this process for 3/4 + 5/6.

Be ready to discuss:

- How do you visualize the common denominator and equivalent fractions with this computer tool?

- How is addition of the two fractions shown in this process?

- How is multiplication part of this process?