Add, subtract, multiply, and divide decimal numbers to hundredths using concrete area models and drawings.

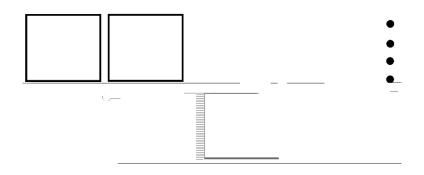
## 4.05 - 1.61

## Break Down:

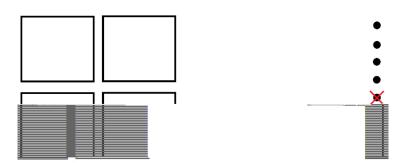
- 1) First, to meet this standard's objective, one should recognize that 4.05 must be able to be represented as a drawing.
- 2) It may be wise to construct a key on chart paper for your students to reference in the early stages. This effort can help them recall what figures will be used to represent wholes, tenths, and hundredths.



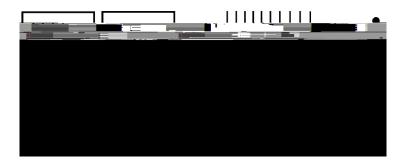
- 3) To represent the wholes in 4.05, draw four flats in the form of four large squares.
  - These four squares can be drawn so that two squares are stacked on the top of the other two squares. They can also be drawn so that they are all stacked one on top of the other or even side by side. How they are stacked can be left up to the student.
- 4) Since there are no tenths in 4.05, a space should be skipped in case one of the wholes must later be broken down into ten tenths for the sake of regrouping.
- 5) To represent the 5 hundredths in 4.05, draw 5 small dots or circles to the far right of the four squares.



- 6) Unlike when adding decimals, the second decimal number does not have to be represented as a drawing in a subtraction problem.
- 7) One can begin by recognizing that one of the hundredths representing 4.05 must be taken away to find the difference of 4.05 and 1.61. This can be illustrated by placing an "X" over one of the circles.



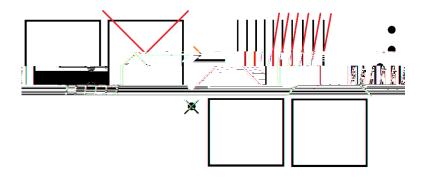
8) Next, 6 tenths need to be taken away from the remaining 4.04. However, this cannot be done as the drawing is presently structured. One of the four wholes must be broken up into ten 10 rods.



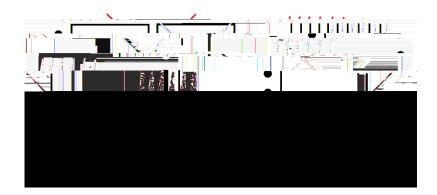
9) Having successfully broken one of the wholes into 10 tenths, place an "X" over the formerly existing whole.



10) Now that 10 tenths are present in the illustration, strike through six of those tenths to represent the action of taking the 6 tenths found in 1.61 away from 4.05.



11) Strike through another whole to represent the action of taking the whole found in 1.61 from the four wholes in 4.05.



12) Finally, count the number of wholes, tenths, and hundredths that remain intact. By doing so, the students should recognize that the difference of 4.05 and 1.61 is 2.44.