• Adding and Subtracting Decimals
‘Spatializing’ the Curriculum
Grade 4

• Add and subtract decimal numbers to tenths, **using concrete materials**, and student-generated algorithms

• Add and subtract money amounts by making simulated purchases and providing change for amounts up to $100, **using a variety of tools**
‘Spatializing’ the Curriculum
Grade 5

- Add and subtract decimal numbers to hundredths, including money amounts, using concrete materials, estimation, and algorithms
‘Spatializing’ the Curriculum
Grade 6

• Add and subtract decimal numbers to thousandths, using **concrete materials,** algorithms, and calculators
Highlights of Spatial Reasoning in Junior Resource
Challenge with Adding and Subtracting Decimals

• Adding and subtracting decimals that do not have the same ‘end point.’
  (e.g., 6.3 and 5.15)

Using Spatial Reasoning

• Emphasize that like-units must be added or subtracted (e.g., tenths to and from tenths, hundredths to and from hundredths)
• Represent like-units with concrete materials and visual representations
Add like-units to like-units

2.45 + 1.53
Money Problems to Provide Context and Encourage the Use of Concrete Materials

“Aaron needs to buy movie tickets for $8.25, popcorn for $3.50, and a drink for $1.75. About how much money should Aaron bring to the movies?
Using Mathies Money Tool to Represent the Problem
Using Mathies Money Tool to Solve the Problem
Using Mathies Money Tool to Connect Visual and Numeric Representations

$5 + $4 + $3 + $1 + $0.50 = $13.50
Using Number Lines to Represent Strategies

Adding on Strategy

\[ 1.4 + 1.1 \]
Solving a subtraction question by adding on

5.32 – 2.94
Junior Learning Activities for Adding and Subtracting Decimals

Grade 4: Rising Waters

Grade 5: Reaching a Goal

Grade 6: A Weighty Matter