

Tool Exploration

3 min

How many dots are on the grid? How do you know?

How do you make numbers?

How do you know what number you made?

How do you add?

How do you subtract?

Part One: Building Numbers

1 min

Build the number 44 using as few clicks as possible.

Part One: Building Numbers

1 min

Build the number 47 using a few clicks as possible.

Part One: Building Numbers

1 min

Build the number 52 using a few clicks as possible.

Part One: Building Numbers

1 min

Build the number 59 using a few clicks as possible.

Part Two: Comparing Strategies

3 min

What are two ways to make 45?

Is one of them faster?

If you could add a button to the tool, what would it do?

Part Two: Comparing Strategies

3 min

What are two ways to make 36?

Is one of them faster?

If you could add a button to the tool, what would it do?

Wrap Up

3 min

Which of these numbers takes the fewest clicks to make?

55

58

49

34

Two Digit Addition Activity

Outline

- Exploration (as a class)
 - Ask generic exploration questions
 - Ask targeted questions
- Building Numbers
 - Build Numbers
- Number Race
- Wrap Up
 - Worksheet (Independent)
 - 2 of each type of problem

Materials

- Chromebook
- Pencil / Paper

Exploration

What do you notice?

What do you wonder?

How do you add numbers?

How do you know how much you added?

What does the lock button do?

Part One: Solve on your own. Use the lock button to help you add.

7 min

1) $21 + 35 =$

3) $48 + 35 =$

2) $42 + 28 =$

4) $22 + 75 =$

Part Two: Class Discussion

How many tens are in 46?

How many tens are in 37?

Use the tool to add $46 + 47$

How many tens are in $46 + 47$?

Part Two: Class discussion

3 min

How would you solve this without using the lock button?

$$34 + 42 =$$

Is is harder without the lock button? Why?

Part Two: Class discussion

3 min

How would you solve this without using the lock button?

$$36 + 48 =$$

Is this problem harder? Why?

3 min

Part Two: Solve on your own without using the lock button

$$26 + 37 =$$

How many clicks did it take?

3 min

Part Two: Solve on your own without using the lock button

$$44 + 38 =$$

How many clicks did it take?

Wrap Up: Reducing Clicks

What's the fewest number of clicks you can use to solve this problem?

$$44 + 38 =$$

How did you reduce the clicks?