ESTABLISHING PURPOSE

1. What are the key content standards I will focus on in this lesson?
   
   Content Standards:
   
   Virginia Mathematics Standards of Learning 6.6
   
   The student will
   
   a. add, subtract, multiply, and divide integers.
   
   Mathematical Process Goal for Students:
   
   • Mathematical problem solving

2. What are the learning intentions (the goal and why of learning stated in student-friendly language) I will focus on in this lesson?

   Content: I am learning to understand how to add integers, including seeing connections to active whole number addition and finding patterns to develop rules.
   
   Language: I am learning to use language such as distance, amount of change, positive, negative, addition, zero pair, and equals precisely in describing their work.
   
   Social: I am learning to work independently and use peer consultants when needed.

3. When will I introduce and reinforce the learning intention(s) so that students understand it, see the relevance, connect it to previous learning, and can clearly communicate it themselves?

   I will do this at the beginning of the lesson in order to set the stage.

SUCCESS CRITERIA

4. What evidence shows that students have mastered the learning intention(s)? What criteria will I use?

   I can statements:
   
   • I can correctly solve addition of integers problems using number lines or counters.
   • I can explain why the methods work when I solve without using a physical or visual model.

5. How will I check students' understanding (assess learning) during instruction and make accommodations?

   I will spot-check for correct solutions. I will listen to student explanations (to partners and to me). For students who struggle, I will provide additional models and examples, including explanations from peers who are finding success.

INSTRUCTION

6. What activities and tasks will move students forward in their learning?

   Students will use chips or a number line to model simple whole number addition problems given a single situation with multiple values inserted. As students work with the problems, they will look for patterns that will help them find the solution using mental math.
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What resources (materials and sentence frames) are needed?

Number lines, two-color counters, word problems

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How will I organize and facilitate the learning? What questions will I ask? How will I initiate closure?

Students will solve simple problems using reasoning and modeling while looking for patterns. While working independently, students will use peer consultants to help them with their thinking. Class examples will focus on active addition (adding to) using both number lines and counters. After students identify patterns (rules) that generalize, they will begin to practice integer addition.