

Math: Grade 1, Lesson 1, Adding within 10

Lesson Objective: Students will use 10 frames as a strategy to solve addition based contextual problems within ten.

Practice Focus: Using a 10 frame to solve addition based contextual problems within 10

TN Standard: 1.OA.C.5

Teacher Materials:

- Concrete manipulatives
- Paper and pencil, or white board and markers

Students Materials:

- 2 different colored crayons or pencils
- Paper and a regular pencil, and a surface to write on
- The student packet for Math, Grade 1, Lesson 1 which can be found at www.tn.gov/education

Teacher Do	Student Do
<p><u>Opening</u> Hello! Welcome to Tennessee's At Home Learning Series for math! Today's lesson is for all our 1st graders out there, though all children are welcome to tune in. This lesson is the first in our series.</p> <p>My name is ____ and I'm a ____ grade teacher in Tennessee schools! I'm so excited to be your teacher for this lesson. Welcome to my virtual classroom!</p> <p>Today we will be learning about 10 frames in mathematics! Before we get started, to participate fully in our lesson today, you will need:</p> <ul style="list-style-type: none"> • 2 different colored crayons or pencils • Paper and a regular pencil, and a surface to write on • The student packet for Math, Grade 1, Lesson 1 which can be found at www.tn.gov/education <p>Ok, let's begin!</p>	<p>Student gets materials.</p>
<p><u>Intro</u> First, we are going to draw a ten frame. A ten frame is made up of two 5 frames put together. We are going to start by drawing a large rectangle. I will draw one first. [Model drawing a rectangle.] Now you draw a rectangle. [Pause.]</p> <p>Now, we are going to divide our rectangle in half like a hot dog bun. [Model.] Now you divide your rectangle in half. [Pause.]</p> <p>The last step is to create our columns. We are going to add 4 lines like this. [Model drawing lines.] Now you add four lines. [Pause.] Great job!</p>	<p>Student draws a rectangle.</p> <p>Student divides rectangle in half like a hot dog bun.</p>

<p>Count how many spaces are in the top row. [Pause.] Show them to your friend. [Pause.] Excellent! Let's count together. [Count with students, pointing to the spaces.] 1, 2, 3, 4, 5. There are 5 spaces in the top row. If you counted five, jump up and down 5 times! [Pause.]</p> <p>Guess how many spaces do you think are in the bottom row? [Pause.] Say your number out loud. [Pause.]</p> <p>Now count how many spaces are in the bottom row. [Pause.] Did you say 5 spaces in the bottom row? [Pause.] You may have guessed that there were 5 spaces in the bottom because the bottom matches the top.</p> <p>How many spaces altogether? [Pause.] [Touch and count the spaces on the top and bottom row.] 1, 2, 3, 4, 5, 6, 7, 8, 9, 10. There are 10! 5 on the top row plus 5 on the bottom row equals 10.</p>	<p>Student adds 4 lines to the ten frame.</p> <p>Student counts 5 spaces. Student shows their ten frame to their friend.</p> <p>Student jumps 5 times.</p> <p>Student answers 5. Student answers 5.</p> <p>Student counts the bottom row. Student answers.</p> <p>Student counts both rows.</p>
<p><u>Teacher Model</u></p> <p>Now let's work on a problem. We are going to look at our friend's garden. [This problem should be written so students can see it and read along with the teacher.]</p> <p>Let's read this problem together. You can read along with me.</p> <p>David saw 4 flowers blooming in his Dad's garden. The next day there were 3 more flowers blooming. How many flowers did David see blooming in the garden?</p> <p>You did a great job reading. What is happening in the problem? [Pause.]</p> <p>Oh... David saw some flowers in his garden. Right! How many flowers did David see first? [Pause.] That's right! 4.</p> <p>What happened on the second day? [Pause.] I heard you say that David saw 3 more flowers blooming. Yes... we can find that in the story!</p> <p>Let's draw, or model, what is happening in the story on our ten frame.</p>	<p>Student reads along.</p> <p>Student answers and explains.</p> <p>Student answers 4.</p> <p>Student answers 3 more flowers bloomed.</p>

<p>You told me that David saw 4 flowers first, so I am going to put one flower in each space. We will start at the top, here, and fill in all of the spaces moving to the right. This is also how we read a book! [Teacher draws and counts each of the four flowers in color #1.] Why did we need to draw four flowers? [Pause]. Right! Because David saw 4 flowers first!</p> <p>Say out loud what happened next? [Pause.] True! On the second day, David saw 3 more flowers that were blooming. I will add 3 flowers to our ten frame. [Using color #2, complete the first row of the model and then finish adding the flowers. Count the flowers as you go. Share with students].</p> <p>How can figure out the total number of flowers? [Pause.]</p> <p>Oh, of course! I already know there are 4 flowers in this first group. So I can just start with 4 and count the rest of them! Will you count with me? [Pause.] [Touch and count.] 4, 5, 6, 7.</p> <p>So how many flowers are there blooming all together? [Pause]. 7? Is that right? Good job!</p> <p>Let's count it another way. Remember, you told me that there were 5 spaces in the top row. Instead of starting with 4 flowers, let's start with the full row because we know that the top always has 5 spaces. Count with me? [Pause.] [Touch and count.] 5, 6, 7. Seven spaces are full. That means 4 flowers plus 3 flowers is 7 flowers. We have 7 full spaces and 3 empty spaces.</p> <p>Great job! Please spin around 7 times!</p>	<p>Student answers.</p> <p>Student answers 3 more flowers bloomed.</p> <p>Student answers count up from 4.</p> <p>Student counts with teacher.</p> <p>Student answers 7.</p> <p>Student counts with teacher.</p> <p>Student spins.</p>
<p><u>Guided Practice</u></p> <p>Let's practice using a ten frame together! [This problem should be written so students can see it and read along with the teacher.]</p> <p>Claire is watching the bird feeder in her yard. Let's read this problem together. You can read along with me!</p> <p>Claire watched 6 birds land on her bird feeder. A few minutes later, 3 more birds landed on the feeder. How many birds were on the bird feeder? [Pause.]</p> <p>You did an excellent job of reading! What is happening in the problem? [Pause.]</p>	<p>Student reads along.</p> <p>Student answers.</p>

<p>Oh! Claire is watching 6 birds on her feeder. Three more birds flew in. Right!</p> <p>How many birds did Claire see first? [Pause.] So there were six birds at first. [Point to fact in the story.]</p> <p>What happened next? [Pause.]</p> <p>I heard you say that three more birds landed on the feeder. Yes... we can find that in the story! [Point to fact in the story.]</p> <p>Let's draw, or model, what is happening in the story together on our ten frames. Earlier, you made a ten frame. Would you please find the ten frame and two different colors of markers or crayons? [Pause.]</p> <p>You told me that Claire saw 6 birds first, so I am going to put 6 circles, one for each bird, in the ten frame. We will start at the top, here, and fill in all of the spaces moving to the right – just like we read a book! Pick one color, and make the circles with me. [Draw and count six circles in color #1.] 1, 2, 3, 4, 5, 6.</p> <p>Why do we needed to draw 6 circles? [Pause.] Right! Because Claire saw 6 birds first!</p> <p>What happened next? [Pause.]</p> <p>Awesome! Claire saw 3 more bird fly to the feeder. Let's grab a different color and add 3 more circles to our ten frame. Do this with me! [Using color #2, add 3 circles. Count the flowers as you go.] 1, 2, 3.</p> <p>How can figure out the total number of birds? [Pause.]</p> <p>Oh, of course, we can count! Will you count with me? Let's start with the first set of birds that were at the feeder. [Touch and count.] 1, 2, 3, 4, 5, 6.</p> <p>Or, we could just start at six, since we know that there were six birds on the feeder. Now, let's add the birds that flew in. Count with me, starting at 6. [Touch and count.] 7, 8, 9. Great job!</p> <p>There is another way to count. Remember that you told me that there are 5 spaces in the top row? We can start at 5,</p>	<p>Student answers 6.</p> <p>Student answers 3 more birds land on the feeder.</p> <p>Student gets materials.</p> <p>Student draws and counts.</p> <p>Students answers because Claire saw 6 birds.</p> <p>Student answers that 3 more birds flew in.</p> <p>Student draws and counts.</p> <p>Student answers by counting.</p> <p>Student counts.</p> <p>Student counts.</p>
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<p>and then add on the rest of the numbers. Let's do it! [Touch and count.] 5, 6, 7, 8, 9.</p> <p>So how many birds are eating together? [Pause.] Right, there are 9 birds eating together. Good job!</p> <p>We are working so hard! We counted our ten frame in 3 different ways!</p> <p>I notice that 9 spaces are full. That means 6 birds eating plus 3 more birds snacking gives us a total of 9 hungry birds!</p> <p>I also notice that we have 9 filled spaces and 1 empty space.</p> <p>Please flap your bird wings 9 times!</p> <p>You are doing such a great job of not giving up! Let's see if you can use a ten frame to model the next situation.</p> <p>Let's read this problem together. You can read along with me! [This problem should be written so students can see it and read along with the teacher.]</p> <p>After the rainstorm, Max saw 9 slimy worms on the sidewalk. One more worm crawled out of the dirt. Max picked them all up. How many worms does he have? [Pause.]</p> <p>Draw another ten frame with me. [Model drawing ten frame.]</p> <p>Think about the starting number. How many worms were there at the beginning? [Pause.] With your marker, either draw a shape or a worm in the spaces that show the beginning number of worms. [Pause.]</p> <p>Now think about how many worms crawled up. [Pause.] With your second color, fill in right number of spaces. [Pause.]</p> <p>Explain what you drew out loud. [Pause.] Hold up your ten frame. Does it look like mine? [Pause.]</p> <p>Count the worms in your ten frame. [Pause.]</p> <p>Did you count 9 worms plus 1 more worm? [Pause.] Wave your elbow if that was your method. [Pause.]</p>	<p>Student counts.</p> <p>Student answers 9.</p> <p>Student flaps arms.</p> <p>Student reads aloud with teacher.</p> <p>Student draws ten frame.</p> <p>Student answers 9.</p> <p>Student draws 9 worms or shapes.</p> <p>Student draws 1 worm or shape.</p> <p>Student explains drawing. Student answers.</p> <p>Student counts.</p> <p>Student answers. Student waves elbow.</p>
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<p>Did you know that there were 5 spaces on the top, so you didn't need to count them, plus the five spaces on the bottom? [Pause.] Clap twice if that was your method. [Pause.]</p> <p>How many spaces are filled? [Pause]. There are 10 filled spaces.</p> <p>How many spaces are empty? [Pause.] There are 0 empty spaces. If all of the spaces are filled in a ten frame and there aren't any empty spaces, then the model is showing us ten!</p>	<p>Student claps.</p> <p>Student answers 10.</p> <p>Student answers 0.</p>
<p><u>Independent Practice</u></p> <p>We have done a lot of work today! Thank you so much for drawing 10 frames with me. You have 5 problems to work on by yourself. I'm going to read each problem for you and then you can work on your own after the show. [Pause.]</p> <p>Sam found 2 dimes on the rug. Matthew found 6 dime on the chair. How many dimes were found? [Pause.]</p> <p>Three otters were playing in the aquarium display. Four more otters joined the fun. How many otters were playing? [Pause.]</p> <p>Your dog, Spot, has five squeaker toys in his bucket. Mom found 2 more under the couch. How many toys does Spot have? [Pause.]</p> <p>There is 1 duck swimming in the pond. Seven more ducks land beside her and start to swim. How many ducks are swimming? [Pause.]</p> <p>Seven cows were eating in the north field and 3 cows were grazing in the south field. How many cows were eating grass? [Pause.]</p>	<p>Student completes independent practice sheet.</p>
<p><u>Closing</u></p> <p>I enjoyed doing some mathematics with you today! Thank you for inviting me into your home. I look forward to seeing you in our next lesson in Tennessee's At Home Learning Series! Bye!</p>	

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