



## Describe how the remainder will affect the solution in a division problem

### Practice Set C

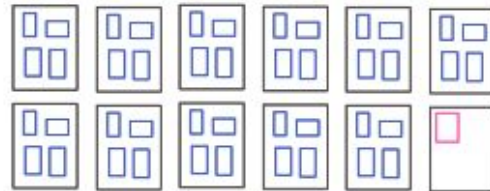
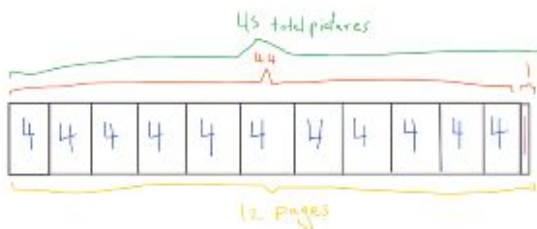
#### Answer Key

1. Marti's photo album has a total of 45 pictures. Each page holds 4 pictures. She said she can only fill 10 pages completely. Do you agree? Explain why or why not. Create a number sentence and visual model to justify your answer.

$P =$  number of pages in a photo album for pictures

$45 \text{ pictures} \div 4 \text{ pictures per page} = p$

*Marti is incorrect.  $45 \div 4 = 11 \text{ r}1$ . This means that she can fill 11 pages completely, and one page with only one picture on it (round up), for a total of 12 total pages with pictures on them. Here are two possible visual representations.*



11 pages with 4 photos each = 44 photos

1 page with 1 photo

45 total photos, 12 total pages

2. Imagine you are filming a video explaining the problem of 45 cookies being shared among 10 friends to new fourth graders. Create a script to explain how you can keep dividing even when you end up with a remainder. You should include visual models to explain your thinking. Also, use the words *divisible* and *equivalent* in your script.

*Students script should reflect an understanding of remainder divisibility. Since cookies are something that can be divided further and still retain their use, the remainder of 5 cookies should be divided again by 10, so that each friend ultimately receives  $4 \frac{1}{2}$  cookies. Their script and drawings should demonstrate that they can fluently use the words *divisible* and *equivalent*.*