Word Problems: Interpreting Remainders

Materials: Interpreting Remainders word problem cards

1. Work with a partner. Choose five word problems that you will both solve independently. For each problem:
   
   a) write an equation with a symbol for the unknown number
   b) draw a quick picture, or diagram, to model the problem
   c) answer the question in a complete sentence
   d) indicate how you interpreted the remainder. Did you:
      - add one to the quotient for the solution?
      - ignore the remainder and use only the quotient?
      - use the remainder as your solution?

2. After completing five problems share your work with a partner. Explain how you solved each problem using accurate mathematical vocabulary.

3. Repeat with other word problems from the set.
Books are on sale for $7. Peter has $30 in his wallet. How many books can he buy?

A teacher bought a packet of 17 batteries. Each calculator uses 3 batteries. How many calculators can the teacher fill with batteries?

There are 32 students in a 4th grade class. Each table in the classroom seats 6 students. How many tables will be needed?

Meg has a new bookcase for her bedroom with 6 shelves. Each shelf holds 8 books. If Meg has 50 books, how many books will not fit on the bookcase?
Jack is moving houses and needs to pack 38 books into small boxes. He packs 6 books in each box. How many books do not fit into boxes?

There are 37 people seated in a cafeteria. Each table holds 2 people. Only one table is not full. How many full tables are there?

Kate baked 84 muffins. If each muffin tray held 9 muffins, how many trays did Kate use?

There are 56 students in a school’s Swimming Club. How many relay teams of 6 can the students make?
A teacher places 55 books onto shelves. Each shelf holds 9 books. How many shelves does the teacher fill?

A farmer packs 46 apples into trays for market. Each tray holds 6 apples. How many apples are in the partially filled tray?

39 students choose to go canoeing at a school camp. No more than 4 students are allowed in each canoe. What is the minimum number of canoes needed for all 39 students to participate?

62 fourth grade students are going on a field trip to the museum and will travel by car. If each car holds 4 students, how many cars will be needed?
Mrs. Jones orders pizzas for a class party. Each pizza will be cut into 8 slices. There will be 36 people at the party. How many pizzas should Mrs. Jones order so that each person can have one slice?

A factory packed 85 teddy bears into large boxes for delivery to a toy store. Each large box held 9 teddy bears. The remaining bears were packed in a small box. How many teddy bears were packed in the small box?

32 athletes are going camping for the weekend. Three athletes can sleep in one tent. What is the minimum number of tents that will be needed?

Write and solve your own word problem that includes a remainder which needs to be interpreted.