Copyright 2002 National Academy of Sciences. Reproduced with permission from Science and Technology for Children® "Comparing and Measuring", National Science Resources Center. Not for further reproduction or distribution.

Overview

This section presents three suggested assessment activities. Although not essential, they can provide additional information that will help you evaluate student learning. Consider using various kinds of assessments so that students with different learning styles will have opportunities to express their knowledge and skills.

- Assessment 1 asks individual students to listen to an open-ended measuring problem and to discuss and demonstrate the strategies they would use to solve the problem.
- **Assessment 2** asks students to help create a class story about what they did in the unit.
- **Assessment 3** asks students to use the different tools from this unit to measure their body cutouts from Lesson 2.

Assessment 1: Solving a Measuring Problem

Work with one student at a time for this assessment. As students work on a measuring problem, you can assess whether they have chosen measuring tools appropriate to the task and whether they have used these tools effectively. Remember that in this assessment activity, the emphasis is on **how** students determine the amount of paper to use, not the actual wrapping of the present.

Materials

- 20 blue Unifix Cubes™
- 20 red Unifix Cubes™
 - 1 container of each of the following:
 - 20 wood coffee stirrers
- 20 small wood spools, 4 cm (1½ in)
- 20 plastic spoons
- 20 toothpicks
- 20 unsharpened pencils
- 1 measuring strip (from Lesson 13)
- 1 measuring tape (from Lesson 15)
- 1 roll of adding machine tape
- 1 roll of gift wrap or craft paper
- 1 cardboard shoebox

Scissors

Tape

Note: You can recycle the above materials for each individual assessment.

Procedure

- Let the student know that in this activity, there will be an opportunity to demonstrate knowledge of measuring to solve a problem.
- 2. Read the following question: If you had to wrap a shoebox containing a birthday present and wanted to make certain that you had enough paper, what would you do?
- First, ask the student how to find the answer to the problem. Then show the student the materials that might help solve the problem. Help the student cut the paper and wrap the present, if necessary.
- 4. Try questions such as the following:
 - What tool did you use to measure? Why did you pick this tool?
 - What did you learn in this unit that helped you select the tool?
 - What did you need to do to make certain that the paper fit the present?
- 5. If the paper does not fit the box, ask the students what they could do next time to make the paper fit.