AFTER YOU VISIT THE GARDEN...

Lesson Ideas for Grade 2

Activity #4: Counting the Colorful Koi

Lesson objective:

Students will compare the results of their findings with their predictions, and record the results of their investigation by creating a bar graph.

Materials:

Chart paper from Activity #3
Chart paper
Graph paper for each student

Exploration:

- 1. Have students share what they observed at the Japanese Gardens.
- Ask students to refer to their tally cards. Beginning with the first color prediction, have students share their results (for example, one student may claim to have tallied 20 koi with white spots). Record these on the board (not on the chart paper).
- 3. Allow students to observe the list of results on the board. Ask them to identify any patterns they might see (any numbers that repeat, or "mode", or any that stand out as different from the rest). Help students determine a logical average based on the findings for that observed color. Write this number on the chart, next to the students' predictions from the day before.
- 4. Follow the above directions for the remaining color predictions.
- 5. Ask students to compare their predictions to their observations.

Activity:

- 6. Explain to students that we are going to create a bar graph of the results of their koi observations.
- 7. Help students construct their own bar graphs on graph paper by demonstrating on a large piece of butcher paper or chart paper.
- 8. First, set up the axes. Ask students to volunteer what information should be included on each axis (colors along the horizontal axis, and numbers along the vertical axis). Help students count by fives or tens to save space on the vertical axis.
- 9. Demonstrate how to draw a bar representing the number of fish with each color (for example, a bar may be drawn for 18 koi with white spots). Have students duplicate this, and then complete the rest of the bars on their own.
- 10. Allow early finishers to help other students.
- 11. Place the bar graphs next to students' life-cycle worksheets in the classroom.