

PLACE VALUE, STEP 6

Lesson Plan: Number Concept, Place Value, Step 6

Activity Screen Shot



Theme Host: Chuck



Animal Friend: Husky



OVERVIEW

Students interpret two digit numbers as a count of trees and a separate count of cones.

PRINCIPAL LEARNING GOAL(S)

- Students demonstrate their understanding of the meaning of a two-digit number by creating an image that expresses each digit, the tens digit as a number of trees and the ones digit as a number of pinecones

PREREQUISITE KNOWLEDGE AND SKILLS

- Practiced the act of counting trees (“tens”), and separately pinecones (“ones”)
- Wrote two digit numbers based on a count of trees and pinecones

RESOURCES NEEDED

- Appendix 1 (pictures of apple trees and apples)

POTENTIAL DIFFICULTIES

- Some students may initially ignore the trees (“tens”) and only count individual pinecones (“ones”), but the software will not allow them to click OK until both digits have been entered. Just remind the students that one tree contains ten pinecones.

WARM UP ~ 3-5 MINUTES

- 1) Write a two-digit number on the board (keep both digits below 5 to make it easier, e.g., 43).
- 2) Ask the class what the left digit (e.g., 4) represents.
- 3) Ask the class what the right digit (e.g., 3) represents.
- 4) Repeat the above process a few times.

MAIN ACTIVITY ~ 20 MINUTES

Students are given a two-digit number. They are asked to place first trees and then pinecones into the field so as to correspond to the given two-digit number.

CONSOLIDATION ~15 MINUTES

To help students consolidate their new knowledge and make connections to prior learning, allow time for subsequent discussion. The questions below raise important issues:

- 1) *How could we handle more than 99 pinecones? We used pine trees as 10 pinecones to move from numbers between 0 and 9 to numbers up to 99. What do we need now to go beyond 99?*
 - a) Elicit from students ideas about what a third digit would mean.
 - b) If a student suggests that a third digit would mean 10 pine trees, elicit suggestions for a label to use for 10 pine trees.
 - c) Use Appendix 1 with images of “orchards” of 10 apple trees and a field with some apple trees and apples to have students count a few three-digit numbers.

APPENDIX 1

