

A Dandelion's Life: Reading Suggestions

Before you begin lesson 3 of the Variations in Plants and Animals unit, read *A Dandelion's Life* by John Himmelman to students. (You can find a copy of the book in the lesson materials kit.)

The purpose of reading the story is to help students recognize

- the basic life cycle of a plant, which involves seeds growing into plants that produce new seeds that can become new plants, and
- that wind can help disperse seeds to new locations where the seeds can survive and grow into new plants that produce more seeds.

As you read the story, comment on various aspects that reveal

- traits of the dandelion seed (size, shape, color), and
- traits of the dandelion plant (roots, leaves, stem, flower, seeds, and the size, shape, and color of leaves and flowers).

Emphasize the traits that affect how the wind disperses the dandelion seeds (e.g., the seeds are light and fluffy, they have a “parachute,” and they’re shaped like a spear so they dig into the ground when they land).

TECHNICAL NOTE: *Just as we distinguished in supplemental math lesson 1 between the sunflower fruit (the outer covering of the seed that we often refer to as the seed) and the actual sunflower seed, which is inside the fruit, the dandelion and other flowering plants also have fruits and seeds we don't often refer to accurately. The structures in dandelions that have the “parachute” are actually the fruit of the plant that holds the seed. The same applies to the structure of cottonwood trees in lesson 5. The cotton is actually the fruit that holds the cottonwood seed.*

On page 23 of A Dandelion's Life, the text should read, “They are replaced by a fuzzy ball of fruits that hold the seeds.” Page 1 and page 24 show this structure nicely—the “parachute” or the fruit holding the seed. It's not critical that students make this distinction in 1st grade, but you might point out the correct names of the structures to them. Throughout the lesson series, we refer to the fruit-seed combination as the “seed.” Even though this term isn't technically correct, it's less confusing for 1st graders.

Because most students are familiar with dandelions, engage them in sharing the traits and variations they've observed in dandelions.

The story ends with the line “And many more seasons of seeds in the air.” After reading these words, ask students, “What do you think will happen to the dandelion seeds in the air? Where will they go? What will happen next?”

If students don't predict that many of the seeds will become new dandelion plants, review the beginning of the story.

As the story concludes, introduce the terms *survive* and *survival*. Ask students the following questions:

- What helped the dandelion seed at the beginning of the story survive?

- What does it mean for a living thing to survive? What do seeds need to survive and become plants?
- How do you think variations in the traits of a seed, such as its size or shape, might help it survive and grow into a new plant? (Relate this to the dandelion story.)

Reinforce the idea that seeds travel on the wind, and how far they travel affects their chances of surviving and growing into new plants that can produce more seeds. Note that in lesson 3, this idea is important in helping students realize that the size trait of cottonwood-tree seeds affects how far they travel on the wind, which is critical to their survival.



Listen to students' ideas. What's visible about student thinking? What do students understand about traits, variation, and survival?