



George Washington Carver

11

✓ Lesson Objectives

Core Content Objectives

Students will:

- ✓ Describe the life and scientific achievements of George Washington Carver

Language Arts Objectives

The following language arts objectives are addressed in this lesson. Objectives aligning with the Common Core State Standards are noted with the corresponding standard in parentheses. Refer to the Alignment Chart for additional standards addressed in all lessons in this domain.

Students will:

- ✓ Recall information from the read-aloud “Johnny Appleseed,” particularly that he loved apple trees, to connect to information in this read-aloud, “George Washington Carver,” about a botanist who loved plants (RI.K.3)
- ✓ Define and use new words, such as *crops*, from the read-aloud and the discussion about “George Washington Carver” (RI.K.4)
- ✓ Describe an illustration from “Johnny Appleseed” prior to listening to “George Washington Carver,” using the illustration to check and support comprehension of the read-aloud (RI.K.7)
- ✓ Actively engage in the nonfiction/informational read-aloud “George Washington Carver” (RI.K.10)
- ✓ Explain the meaning of “great oaks from little acorns grow” and use in appropriate contexts (L.K.6)
- ✓ Listen to a variety of texts, including a biography such as “George Washington Carver”

- ✓ Prior to listening to “George Washington Carver,” identify orally what they have learned about Johnny Appleseed
- ✓ Evaluate and select read-alouds or stories on the basis of personal choice for rereading

Core Vocabulary

botanist, n. Someone who studies plants

Example: The botanist studied the strange plants.

Variation(s): botanists

botany, n. The study of plants

Example: Jan wants to study botany when she grows up.

Variation(s): none

canvas, n. A piece of material on which one can paint


Example: The artist painted a rose on the canvas.

Variation(s): canvases

crops, n. Vegetables or plants that are grown on a farm for food

Example: The farmer planted three different crops: corn, soybeans, and wheat.

Variation(s): crop

At a Glance	Exercise	Materials	Minutes
Introducing the Read-Aloud	What Have We Already Learned?		10
	Purpose for Listening		
Presenting the Read-Aloud	George Washington Carver	map or globe	10
Discussing the Read-Aloud	Comprehension Questions		10
	Word Work: Crops		5
 Complete Remainder of the Lesson Later in the Day			
Extensions	Sayings and Phrases: Great Oaks from Little Acorns Grow		15
	Domain-Related Trade Book or Student Choice		



George Washington Carver

11A

Introducing the Read-Aloud

10 minutes



What Have We Already Learned?

◀ Show image 11A-1: Johnny Appleseed

Have students identify the person in the illustration. Ask students what they remember about Johnny Appleseed. As students respond, repeat and expand upon each response using richer and more complex language, including, if possible, any read-aloud vocabulary. If a student's response includes inaccurate factual information, refer back to earlier read-alouds and/or illustrations to correct any misunderstandings.

Remind students that Johnny Appleseed became famous because he traveled throughout the United States, planting apple seeds wherever he could so that apple trees would grow everywhere.

Purpose for Listening

Explain to students that today they are going to learn about another person who became famous because of his love for plants. Tell students to listen carefully to find out what this person did because he loved plants and how he became famous.



George Washington Carver

◀ Show image 11A-2: George Washington Carver

- 1 Do you remember what Johnny Appleseed did that made him famous?

Today you are going to hear about another man who, like Johnny Appleseed, became famous because of his love for plants.¹ He, too, lived many years ago, though not quite as long ago as Johnny Appleseed. His name was George Washington Carver. He became famous throughout the United States as a **botanist**—which is a scientist who studies plants. George first developed his interest in plants as a young boy.



◀ Show image 11A-3: Young George

- 2 [Point to the state you live in, then point to Missouri on a map.]

As a child, George used his free time to explore the forests surrounding his home on a farm in Missouri.² He spent many hours roaming the woods discovering all sorts of wonderful things. George liked to collect things that caught his eye.



◀ Show image 11A-4: Young George planting a new plant in his garden

- 3 Why would the plants die? What do plants need to survive?

George was especially curious about the different kinds of plants that he noticed during his explorations. He wanted to study these plants further, but he knew that if he pulled them out of the ground and took them back to the cabin, they would die.³ So when George found an interesting plant, he would carefully dig it up and remove it from the place it was growing, roots and all, so that he could plant it in a special garden close to the cabin.⁴

- 4 Here, the word *garden* means a plot of land where plants are grown. The word *garden* can have other meanings. The word *garden* also means what you do when you put living things in the soil so they can grow.

George moved plant after plant to this special garden, where he looked after each and every plant, watering and caring for them all to make sure that they continued to grow. As an adult, George later wrote, “I literally lived in the woods. I wanted to know every strange stone, flower, insect, bird, or beast. Day after day I spent time in the woods alone in order to collect my floral beauties and put them in my little garden I had hidden in the brush not far from the house . . .”⁵

- 5 What are floral beauties? What did George do with the floral beauties?



← **Show image 11A-5: Plant doctor**

Fascinated by the plants in his garden, George spent hours tending, observing, and studying them. In time, he came to learn about the special needs of each plant—how much water each needed, whether it grew best in full sunlight or with some shade. George also took a special interest in caring for plants that were not growing well. He became so skillful at caring for these sick plants that people throughout the neighborhood began to call him the “plant doctor.”



← **Show image 11A-6: George painting**

George’s passion for plants led him to develop another talent, that of an artist. Of course, his favorite subjects to paint were his beloved plants! Though he did not have a proper **canvas** or paints, he improvised with what he could find.⁶ George made his first paints from different plant parts. He mashed bark, roots, and wild berries, and used them to paint on old boards or even flat rocks. George continued to paint throughout his entire life.

6 A canvas is something you paint on. When you improvise, you make or do something with whatever you have.



← **Show image 11A-7: Photo of George as an adult**

George was truly a remarkable and talented person. He was an excellent student who learned quickly. He went on to study at college, eventually becoming an expert in **botany**, the study of plants. After he finished college, George became a professor at a famous university in Alabama.⁷

7 [Point to the state you live in, then point to Alabama on a map.]



← **Show image 11A-8: Collage of products**

There, he spent the rest of his life continuing to study plants and experiment with ways to make them grow better. He discovered many ways to help farmers improve how they grew plants and **crops** on their farms.⁸ George encouraged farmers to grow crops other than cotton—especially peanuts and sweet potatoes. He also found many ways to use peanuts in all different types of products like dyes, oils, and makeup. He even came up with a number of recipes for foods that used peanuts. George Washington Carver is especially remembered today for these discoveries.

8 Crops are plants that are grown in large numbers to be used by people.

Comprehension Questions

10 minutes

1. *Literal* What is a botanist? (A botanist is a scientist who studies plants.)
2. *Literal* Who was the botanist you heard about in the read-aloud? (The botanist we heard about was George Washington Carver.)
3. *Inferential* How did George Washington Carver learn so much about plants? (He learned so much about plants because he took care of plants, made his own garden when he was a child, and studied botany in college.)
4. *Inferential* Why was George Washington Carver called the “Plant Doctor”? (George Washington Carver was called the “Plant Doctor” because he was very good at caring for sick plants.)
5. *Inferential* How did George Washington Carver make his paints? (George Washington Carver made his paints from bark, roots, and mashed berries, which are all parts of plants.)
6. *Inferential* How did George Washington Carver help farmers? (George Washington Carver helped farmers by discovering ways to help farmers improve how they grew crops and encouraging farmers to use other crops.) What two plants did he encourage farmers to plant? (He encouraged farmers to plant peanuts and sweet potatoes.)

[Please continue to model the Think Pair Share process for students, as necessary, and scaffold students in their use of the process.]

I am going to ask a question. I will give you a minute to think about the question, and then I will ask you to turn to your neighbor and discuss the question. Finally, I will have several of you share what you discussed with your partner.

7. *Evaluative Think Pair Share:* George Washington Carver was an extraordinary and special person in many ways. Of all the different things that George did or accomplished during his life, which one do you think was the most extraordinary? Why? (Answers may vary.)

8. After hearing today's read-aloud and questions and answers, do you have any remaining questions? [If time permits, you may wish to allow for individual, group, or class research of the text and/or other resources to answer these remaining questions.]

Word Work: Crops

5 minutes

1. In the read-aloud you heard, "[George Washington Carver] discovered many ways to help farmers improve how they grew plants and *crops* on their farms."
2. Say the word *crops* with me.
3. Crops are plants that are grown in large numbers for people to use.
4. The farmer grew wheat and corn crops for people to eat.
5. What other types of plants do you think could be grown as crops? Think about some of the plants that people eat. Try to use the word *crops* when you tell about it. [Ask two or three students. If necessary, guide and/or rephrase the students' responses: "_____ could be grown as crops."]
6. What's the word we've been talking about?

Use a *Sharing* activity for follow-up. Directions: Share what types of crops you would like to grow and why you would like to grow them. Be sure to begin your responses with "I would like to grow _____ as crops because . . ."



Complete Remainder of the Lesson Later in the Day



George Washington Carver

11_B

Extensions

15 minutes

Sayings and Phrases:

Great Oaks from Little Acorns Grow

5 minutes

Remind students of the saying, “great oaks from little acorns grow.” Have students explain the meaning of the saying. If students have trouble, remind them that this saying means that just as a small acorn can grow into a towering oak tree, something that starts out small or not really important can become big or really important.

Ask students if they think George Washington Carver’s life was an example of the saying, “great oaks from little acorns grow.” Why or why not?

Domain-Related Trade Book or Student Choice

Domain-Related Trade Book

Refer to the list of recommended trade books in the Introduction at the front of this teacher’s guide, and choose one to read aloud to the class. As you read, use the same strategies that you have been using when reading the read-aloud selections in this anthology—pause and ask occasional questions, rapidly clarify critical vocabulary within the context of the read-aloud, etc.

After you finish reading the trade book aloud, lead students in a discussion as to how the story or information in this book relates to the read-alouds they have heard in this domain.

Student Choice

Ask students which read-aloud they have heard recently that they would like to hear again. If necessary, reread the titles of recent read-alouds to refresh students’ memories and/or show key illustrations from several read-alouds. You may also want to choose one yourself.

Reread the text that is selected. Feel free to pause at different places, and talk about vocabulary and information that you did not discuss previously during the read-aloud.

After the read-aloud, ask students if they noticed anything new or different during the second reading that they did not notice during the first reading. Also, ask them to try to express why they like this read-aloud. Remember to repeat and expand upon each response using richer and more complex language, including, if possible, any read-aloud vocabulary.