

Little Red Hen Bakes Bread Written by GEF Staff

Grades: Pre K-2 Subject: Science, Language Arts, Social Studies Time: 3 hours



\* Standards: Students will...

Language Arts Standard 5: Use the general skills and strategies of the reading process. Benchmark # 2: Use meaning clues (e.g., story structure and repetitive phrases) to aid comprehension and make predictions about content (e.g., character's behavior).

Language Arts Standard 6: Use reading skills and strategies to understand and interpret a variety of literary text.

**Benchmark # 1:** Use reading skills and strategies to understand a variety of familiar literary passages and texts (e.g., picture books, predictable books).

Benchmark # 5: Relate stories to personal experiences.

**History Standard 1:** Understand family life now and in the past, and in various places long ago. **Benchmark # 3:** Knows cultural similarities and differences in food between families now and in the past.

Science Standard 12: Understand the nature of scientific inquiry. Benchmark # 2: Record information about the physical world (e.g., drawings, simple data charts).

Technology Standard 4: Understand the nature of technological design.

**Benchmark # 2:** Know that tools (e.g., microwave) have specific functions, such as to do things more easily.

Objectives: Students will be able to ...

- Explain the origins of bread and the bread baking process.
- Follow a step by step procedure for baking bread
- Compare and contrast their bread baking experiences to that of the Little Red Hen.

- Organize and record data using a graphic representation (Venn Diagram).

Please click here to view both the creative artwork for this great lesson and the downloadable PDF.

# Materials:

- "Little Red Hen Bakes Bread' Venn diagram graphic organizer (included below)
- One large mixing bowl
- One spoon
- One measuring cup
- One measuring spoon
- One bread pan
- One hand towel



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- ¼ cup milk
- 5 teaspoons sugar
- 1 teaspoon salt
- 5 teaspoons butter
- 1 package active dry yeast
- 2 ½ to 3 ½ cups flour
- Corn starch or nonstick cooking spray
- Warm water
- Microwave
- Oven
- A copy or multiple copies of "The Little Red Hen"

**Overview:** Wheat, a grass cultivated worldwide, originated in the Tigris and Euphrates River Valley near present day Iraq. It was planted in 1777 for the first time in the United States and is now the primary grain used in US grain products. About 75 % of grain products in the US are made from wheat. It is grown in 42 states. Kansas is the number one wheat producing and flour milling state.

Wheat grain is used to make flour. Flour, a powder made from cereal grains, is the primary ingredient of bread. In a 1½ pound loaf of bread there is approximately 16 ounces of flour. Flour is milled by grinding grain between stones or steel wheels. Today small appliance mills are available in both hand-cranked and electric models. One bushel of wheat produces about 42 pounds of white flour or 60 pounds of whole-wheat flour. Flour is used to make bread, bagels, pancakes, pies, doughnuts, biscuits, cookies, cakes, breakfast cereals, pasta, juice, gravy, noodles, pizza dough and couscous. In North America and Europe wheat flour is one of the most important foods since it is the main ingredient in bread and pastries. In addition, wheat flour is utilized for fermentation to make beer, alcohol, vodka, or biofuel.

Wheat can be grown in the winter but is susceptible to frost or inclement weather. Wheat usually requires about 110-130 days from planting harvesting. Some people plant wheat as a cover crop in the fall. This last crop of winter wheat will be turned back into the soil in the spring to help add nutrients and structure to the soil and prevent erosion over the winter. It also leaves a standing crop, rather than a barren garden during the winter.

**Kid's Speak:** Wheat is one of the most important food crops in the world. It can be grown in harsh environments. It is ground into flour, both white and whole-wheat, and then used to produce many foods. Some of your favorite foods like bread, pizza, pasta, cereal, and cookies are made from wheat flour.

Eco-Fact: The average American consumes 53 pounds of bread per year.

## Procedure:

## **Before Bread Baking Activity:**

Note: Teachers may wish to do this lesson along with two other lessons on the GEF website: *Little Red Hen Plants Wheat* and *Little Red Hen Grinds Flour*.

- Briefly discuss the origin of bread and importance of bread to most societies.

- Read the classic children's story "The Little Red Hen."

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- Discuss the steps that the Little Red Hen followed to bake her bread.

- Explain that the class will bake bread. Tell children when the bread baking process is finished that they will compare and contrast their experiences to that of the Little Red Hen.

- Read recipe with the class or to the class.

## **Bread Baking Instructions:**

**1.** Warm the bowl by filling the bowl with warm water then dumping the warm water out.

2. Add a cup of warm water to the yeast and stir. Be sure to stir until there are no lumps in the yeast.

**3.** Melt the butter in the microwave. Add the butter, the milk, the sugar, and the salt to the yeast liquid. Stir the mix.

**4.** Add two cups of flour to the mix. Continue to add ¼ cups of flour every minute until you have only ¼ cups of flour remaining. Be sure to stir the flour while adding to the mix. Stir until the dough is only slightly sticky.

**5.** Take the remaining flour between your hands and then rub your hands together over the top of an area on the table where you're going to knead the dough. Do this a few times until there's an area on the table lightly covered in flour. Grab the dough ball out of the bowl, slap it down on the table, and start beating on it. Do this for ten minutes. Take the dough, punch it flat, and then fold it back up into a ball again. Repeat several times.

**6.** Shape the dough into a ball. Clean the bowl you were using, and then coat the inside lightly with corn starch or nonstick cooking spray. Put the ball of dough inside the bowl.

7. Put a cloth over the bowl and sit the bowl in a warm area for one hour. The dough will rise.

**8.** Punch the dough three to four times to reduce the size. Lay the dough out on the floured area and spread it out in a rectangle shape. One side should be the length of the bread pan, while the other side should be 1.5 times the length of the bread pan.

**9.** Roll the dough so it is roughly the same size as the bread pan. Tuck the ends of the roll underneath. Coat the bread pan with corn starch or nonstick cooking spray. Place the loaf inside of the pan.

**10.** Cover the pan and loaf with a towel. Place the pan and loaf in a warm area for one hour.

**11.** Place the loaf in an oven at 400 degrees Fahrenheit for thirty minutes. After thirty minutes, remove the loaf from the pan to cool.

## While Bread is Baking:

- Compare and contrast the class experiences of bread baking to that of the Little Red Hen.

- Together with the class create and complete a Venn diagram. See included diagram.

## After Bread is Baked: Eat the bread!

Adaptations: Younger students could draw pictures comparing and contrasting the class experiences of bread baking to that of the Little Red Hen.

## Extensions:

- Students can try each loaf of bread and observe which had the best taste.

- Students can try leaving the loaves out for one week and can observe changes in the loaves.

- Students can find out what type of bread they have at home. Students can then discuss the different types of bread in their homes. Class could make a graph showing the most popular types of bread found in the students' homes.

- Students can learn more about bread and its relation to the USDA Food Pyramid.

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**GEF Community:** Students can share their results with the GEF Community. Students can share their experiences about baking bread. In addition, students can post photos of their loaves of bread to share with the GEF Community. To view full-size lesson plan and print, follow these directions:

- 1. Click on the image above
- 2. Click on the small "print" icon at the top left of the lesson
- 3. Make sure your "Page Scaling" is set to "Fit to Printable Area"
- 4. Click "OK" and your lesson will be printed!

Click on the second icon from the print button to save your lesson to your computer. For technical assistance with printing any of the GEF lessons, please contact: service@greeneducationfoundation.org

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\* All lessons listed on the GEF website have been aligned with the McREL Compendium of Standards and Benchmarks for K-12 Education. GEF curriculum has been developed in accordance with the McREL standards in order to reflect nationwide guidelines for learning, teaching, and assessment, and to provide continuity in the integrity of GEF curricular content from state to state. The decision to utilize McRel's standards was based upon their rigorous and extensive research, as well as their review of standards documents from a variety of professional subject matter organizations in fourteen content areas. Their result is a comprehensive database that represents what many educational institutions and departments believe to be the best standards research accomplished to date. To access the McREL standards database, or for additional information regarding the supporting documentation used in its development, please visit mcrel.org