# 4-H FOOD SCIENCE ACTIVITY PAGE

*Developed by **Donna Bradley**, Extension Agent, Hickman County*
***Kathy Finley**, Extension Agent, Robertson County*

Beginning

Life Skill
Healthy Lifestyle Choices

## Your 4-H Food Science Project

To have a healthy lifestyle, it is important to learn about the foods we choose to eat. It is important to know how foods are prepared and where we get the foods we eat. Some of the skills you can learn and activities you can do this year are listed below. Check your favorites. Then, work with your 4-H leaders and parents to make a 4-H project plan for what you want to do and learn this year. Start a project folder that includes your project activity page, your project plan and any other activities you complete.

- ☐ Learn ten safe-handling procedures of raw foods.
- ☐ Learn how to properly store foods from different food groups.
- ☐ Create your own recipe and share it with your family or friends.
- ☐ Identify the types of meats available in your local grocery.
- ☐ Identify five dairy products and make a recipe using at least one.
- ☐ Learn five food safety tips.
- ☐ Other _____

## Dairy Facts

Most milk comes from cows, but is also available from goats and other animals.

A good cow will average 5 1/2 gallons of milk per day for 10 months.

Whole milk is 3.5% fat.

## Try This Activity

Visit a grocery store and make a list of the types of milk you can buy. Make another list of the other types of dairy products you find (such as cheese or yogurt). Read the food labels to find out:

- How much fat is in one serving of each product?
- How much calcium is provided in one serving of each product?

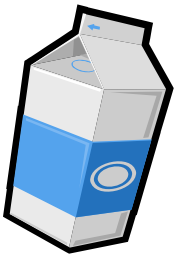
Use the Internet, books or other sources to learn more about dairy products and calcium. Find out how much calcium you should have each day. Which of the products you found in the grocery store should you eat to get the recommended daily allowance of calcium? Record what you learn in your 4-H project folder and share it in a 4-H meeting.

## What About Food Science & Technology?

In the 4-H food science project, you may learn what products and processes have been developed by food science and technology. Food science and food technology make it possible for you have wide choices of food products that have a long storage life and are easy to prepare.

**Food science** is the study of food products. With food science, new food products are developed; new preservation and packaging techniques are developed; and old products are improved.

**Food technology** is the study of food processing. Food technology involves new processing methods for food products or improving old processing methods.



## Make a Chocolate Milkshake

***Ingredients:***

Cold pasteurized milk
Vanilla ice cream
Chocolate syrup

Pour 2 cups of cold, pasteurized milk into a cold mixing cup. Add 1/2 cup of chocolate syrup and 1 pint of vanilla ice cream. Place in a blender long enough to blend thoroughly. Pour in a glass and serve. You should have enough to share with friends or family!

How did it taste? Record the results in your 4-H project folder.

## Dairy Foods Experiment

To see the protein in milk, mix two teaspoons of vinegar in an 8-ounce glass of milk and stir the mixture. Let the mixture stand for 10 minutes, then stir again. Notice the white particles. These particles are the protein. Record your observation in your 4-H project folder.

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## Food Safety

Food-borne illnesses are diseases that are transmitted to humans by food. Following are some ways to protect you from getting a food-borne illness.

- Wash your hands often.
- Wash your hands with soap and warm water.
- Wash your hands:
  * *before you make or eat a snack or meal*
  * *after playing with pets*
  * *after using the bathroom*
- Wash fruits and vegetables with cold water before you eat them.
- Always use clean knives, forks, spoons and plates.
- Cooked foods should not be placed on the same plate that held raw meat, poultry or fish.
- Only put food on clean surfaces.
- Never put your sandwiches or snacks on a dirty table or counter.
- Put backpacks and books on the floor. Don't put them on the kitchen table or counters.

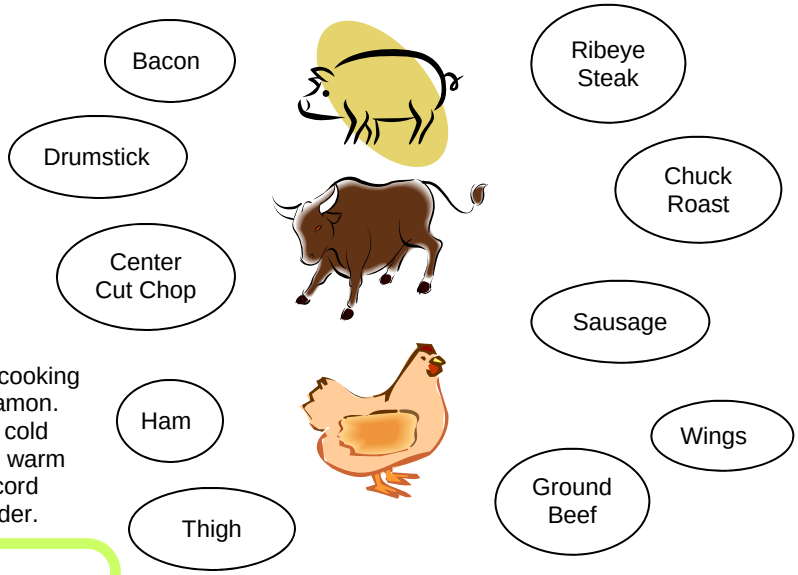
## Career Scavenger Hunt

By asking others, researching on the Internet, or reading a book or magazine—search for a job that uses food science and technology skills and knowledge. Here's what you are looking for.

1. Job Title _____
2. Job Description _____
   _____
   _____
3. Education Required _____
   _____

## Match the Food to the Animal

What animal provides your favorite meat? Draw lines to connect the foods with the animals.




*Hog: bacon, sausage, ham, center cut chop*
*Beef: ribeye steak, chuck roast, ground beef*
*Chicken: wings, drumstick, thigh*

## Try This

Get two friends to try this with you. Rub cooking oil on your hands and sprinkle with cinnamon. For 20 seconds, scrub your hands (1) in cold water only; (2) in warm water only; (3) in warm water with soap. Which works best? Record your observations in your 4-H project folder.

## Service Ideas

- Make a poster to promote June Dairy Month and display it in a public place.
- Give a talk about the importance of calcium.
- Make a display tracing food from farm to table.

Don't forget to submit your project report to your 4-H leader.

## Additional Resources

Making decisions is an important part of the food science and technology 4-H project. This activity sheet has given you the opportunity to explore things to think about as you make choices related to foods. You've learned food safety tips, made a milkshake and learned lots of other cool things. But this is just the beginning! Use the resources listed below to continue learning about food science and technology:

- School & public libraries
- Butchers, chefs, farmers
- 4-H project groups
- The 4-H food science and technology Web page: **http://4h.tennessee.edu/projects/foodscience.htm**

For more ideas, contact your 4-H office.

## Other 4-H Food Science & Technology Activities

Outdoor Meat Cookery
Chicken Barbecue
Judging Teams
Demonstrations
Fair Exhibits
June Dairy Month Exhibits

*Reviewed by Dwight Loveday, Associate Professor, and other members of the state 4-H Youth Development staff*
*Edited by Amy Willis, Extension Program Assistant, and Wanda Russell, Publications Editor*