



**SOUTH DAKOTA STATE
UNIVERSITY EXTENSION**

In season:



Spring

Asparagus

Lakota: hust'ola

Lesson Plan

Objectives

Participants will:

- identify asparagus as a vegetable from myplate, the part of a plant it comes from, nutritional content and recommended serving size.
- increase knowledge in selection, purchase, storage and use.
- demonstrate use of asparagus in a healthy recipe and the equipment needed for preparation.

Items Needed for the Lesson

- MyPlate poster
- Parts of a Plant visual
- Regional chart of in season fruits and vegetables
- Asparagus Nutrition Information sheet
- Produce by the Pound visual
- Asparagus recipes

Handouts or Take Home Items

- Pick It! Try It! Like It! Preserve It! fact sheet

Recipe Choices

- Easy Asparagus Soup
- Sautéed Asparagus with Mushrooms

Cooking and Food Safety Skill Sheets

- Handwashing
- Washing Fruits and Vegetables
- Blender Use and Safety
- Stove Top Safety
- Knife Safety and Cutting Boards

Other Cooking and Food Safety Skills

- Cleaning canned goods and can openers
- Storing leftovers
- Kitchen terms – blanch and sauté

Supplies for Asparagus Lesson

- Easy Asparagus Soup
 - » Can opener
 - » Liquid measuring cup
 - » Blender
 - » Sauce pan
 - » Mixing spoon
 - » Stove top or electric burner
- Sautéed Asparagus with Mushrooms
 - » Knife
 - » Cutting board
 - » Colander
 - » Measuring spoons
 - » Measuring cups
 - » Skillet
 - » Bowl with ice water
 - » Spatula
 - » Tongs
 - » Hot pad

What You Say:	What You Do:
Every class we are going to learn about a different fruit or vegetable. I am going to give you some clues and I want you to try to think of what it is. After each clue, raise your hand if you think you know what it is. • It is part of the lily family and is closely related to onions and leeks. • It can grow wild along roadsides and railroad tracks and can be found in most of the United States. • It's one of the first vegetables harvested in spring. • Individual pieces of this are called spears (but they're not sharp). (Answer: Asparagus.)	• Name off each clue; allow a few guesses before moving on to the next clue. • After someone guesses the answer, or you tell them, show them visuals of asparagus.
Asparagus is a vegetable in the "other" subgroup (if this is the first lesson ask if participants know what MyPlate is.) We should be filling $\frac{1}{2}$ our plates with fruits and vegetables. Depending on your age and gender, we should be eating between 1-4 cups of vegetables a day. (Refer to the Daily Recommendations visual for specific age groups.)	• Point to MyPlate poster. • Show the Vegetable Subgroups visual.
Different vegetables come from different parts of the plant. Vegetables are either the root, stem, leaf, fruit, flower or seed of a plant. What part of the plant do you think asparagus is? (Answer: Stem.) Do you know why plants need their stems? (Answer: Stems provide support for the plant and allows nutrients (food, water) to travel up the stem to get to the other parts of the plant.)	• Show Parts of Plant visual; call on people to answer questions.
Although you have to wait 3 years to harvest asparagus, if you plant seeds, when properly looked after asparagus plants can last 25-30 years. Asparagus should be planted as soon as the ground has thawed in the spring. Usually people plant 1-year-old plants (also called "crowns"), but you can plant asparagus seeds as well. Spears are usually harvested in May and June. Asparagus can come in a variety of colors: white, violet-green, pink and purple.	• If you are using fresh asparagus, show the group.
When purchasing asparagus, look for bright green asparagus. The stems should be firm and snap instead of bend. Avoid buying asparagus that is yellow or has dry tips (this means it's old).	

What You Say:	What You Do:
To get the best price on asparagus, buy when it is in season. You can use a produce calculator to find the best buy (whether you should buy fresh, canned or frozen).	Review the Produce by the Pound visual.
Plan to eat fresh asparagus within 2-3 days of purchase or harvest. To store short-term, treat spears like cut flowers. Snap or cut off tough ends and stand them in a glass with a couple inches of water. Cover with a plastic bag and refrigerate 2-3 days. For long-term storage, fresh asparagus can be frozen. To do this, wash spears, snap or trim the ends and cut into even lengths that will fit in a freezer bag or container. Blanch (immerse in boiling water) 2 minutes for small spears, 3 minutes for medium and 4 minutes for large. Remove from boiling water and immediately place in ice water 5 minutes to cool. Drain, package, seal, label, date and freeze. Asparagus will last up to 1 year in the freezer.	Can demonstrate short-term storage if using fresh asparagus.
Why should we eat asparagus? (Possible answers: Low in calories, high in vitamin A and vitamin C, folate and fiber.)	Discuss benefits of eating asparagus, use Asparagus Nutrition Information sheet as a reference.
What are different ways you can eat asparagus? (Possible answers: Raw, pickled, steamed, grilled, boiled, roasted, put in casseroles, salads or soups.) Asparagus does not take long to cook, and if overcooked it can become mushy. If boiling, place in boiling water, cook for 2 ½-3 minutes. If steaming, for 5-7 minutes.	Discuss different ways to eat asparagus.
To prepare fresh asparagus: Wash under cool running water, trim an inch from the stem, or you can snap off the tough ends by holding the top ½ of the spear in 1 hand and the bottom ½ between your thumb and pointer finger, bend the spear until it snaps into 2 pieces.	
Are you ready to try out an asparagus recipe? What is the first thing we always do before preparing food? (Answer: Wash hands.)	- Call on someone for the answer. - This is a good time to review the Handwashing skill sheet.



= for adults or older youth

Use this page if you are going to prepare Easy Asparagus Soup

Equipment List

- Can opener
- Blender
- Mixing spoon
- Liquid measuring cup
- Sauce pan
- Stove top or electric burner

What You Say:	What You Do:
Today we are going to make Easy Asparagus Soup. If we look at the ingredients in this recipe, how many food groups do we have? Which ones? (Answer: 2 if we are including the milk – vegetable and dairy.) We are choosing low fat or non-fat milk and we will get the same amount of nutrients as whole milk but less fat and calories. This recipe uses canned asparagus. When we use canned food, we need to wash the can lids off before opening. Do you know why? (Possible answers: There may be dirt on the lid, we don't know where they've been or what may have crawled across the top of them.)	• Pass out the recipe and read through it with participants. • Call on people. • Discuss the importance of washing off can lids and can openers.
We are also going to use a blender and the stove for this recipe.	• Review Blender Use and Safety and Stove Top Safety skill sheets.
We will be measuring liquid ingredients, what kind of measuring cup should we use to measure those?	• Review Measuring Liquid and Dry Ingredients skill sheet.
If we have leftovers from this recipe, what should we do with them? (Answer: Place the leftovers in a container with a lid and put in the refrigerator within 2 hours.)	• Call on people. • Prepare recipe with participants.

Use this page if you are going to prepare Sautéed Asparagus with Mushrooms

Equipment List

- Knife
- Cutting board
- Colander
- Measuring spoons
- Measuring cups
- Skillet
- Bowl with ice water
- Spatula
- Tongs
- Hot pad

What You Say:	What You Do:
Today we are going to make Sautéed Asparagus with Mushrooms. How many food groups do we have in this recipe? Let's look through the ingredients: • Asparagus (vegetable), salt, olive oil, mushrooms (vegetable), thyme, black pepper. So we have 1 food group in this recipe but we have 2 different vegetables. We need to use fats such as butter and oil sparingly as well as salt. Use herbs and spices to bring out flavors of foods.	• Pass out the recipes. • Call on people or prompt after naming out each ingredient, point to each food group you discuss.
As we talked about earlier, when we look at MyPlate, ½ our plate is fruits and vegetables. We should be eating between 1-4 cups of vegetables per day depending on our age and gender.	• Refer to the Daily Recommendations visual for age and gender specific recommendations.
There are 5 subgroups of vegetables: dark green, red and orange, beans and peas, starchy and others. We need to make sure we are eating vegetables from each of these groups because each has different vitamins and nutrients in them. Both asparagus and mushrooms are in the "other" subgroup of vegetables.	• Show Vegetable Subgroups visual and talk about vegetables in the different groups.
We will be blanching the asparagus in this recipe today. When we blanch vegetables, we put them in boiling water for a short amount of time and then place them in ice-cold water to stop the cooking process. We will also be using the stove to sauté the mushrooms and asparagus. Sauté means to cook food in a small amount of hot fat. The fat we are using today is olive oil.	• Go over Stove Top Safety skill sheet.

Visuals



Asparagus in the ground



Mature asparagus plant



Fresh asparagus



White asparagus

Asparagus Nutrition Information

Type	Serving Size/Weight in grams	Calories	Fiber (g)	Vitamin A (International Units)	Vitamin C (mg)	Potassium (mg)	Folate (mcg)
Asparagus, raw	5 medium spears	16	1.7	605	5	162	42
Asparagus, cooked	5 medium spears	16	1.5	754	6	168	112
Daily Recommendations RDA=Recommended daily allowance AI=Adequate intake	1-4 cup servings of vegetables per day depending on age	Varies according to age and activity level	AI (depending on age) ranges from 14-33.6 g	Daily Value based on a 2,000 calorie per day diet	RDA (depending on age) ranges from 25-90 mg	AI (depending on age) ranges from 3,000-4,700 mg)	RDA (depending on age) ranges from 150-400 mcg)

Asparagus Sources

Information

- UNM Prevention Research Center. "Nutrition Curriculum Module 8 Asparagus." (2012). digitalrepository.unm.edu/chile-plusmod8nc/2
- extension.illinois.edu/gpe/case1/c1facts2b.html
- extension.purdue.edu/foodlink/food.php?food=asparagus

SD Harvest Calendar

- pickyourown.org/SDharvestcalendar.htm

How long to store

- foodsafety.gov/keep/foodkeeperapp/index.html

How to store

- fruitsandveggies.org/fruits-and-veggies/asparagus/

Cooking Glossary

- reallifegoodfood.umn.edu/kitchen-skills-and-tips/cooking-terms-glossary

Fruit and Vegetable Nutrition Facts Chart

- static.maclester.sidearmsports.com/custompages/Deno_Videos/nutrition/fruit_and_vegetable_chart.pdf

Daily Nutrition Goals

- Table A3-2: Healthy U.S.-Style Dietary Pattern for Ages 2 and Older, With Daily or Weekly Amounts From Food Groups, Subgroups, and Components: dietaryguidelines.gov/sites/default/files/2021-03/Dietary_Guidelines_for_Americans-2020-2025.pdf

Lakota translation

- Translated by Jeshua Estes

Photo credit

- Asparagus: By Rasbak – Own work, CC BY-SA 3.0, commons.wikimedia.org/w/index.php?curid=223975

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SOUTH DAKOTA STATE
UNIVERSITY EXTENSION

In season:



Spring

Asparagus

Lakota: hust'ola

Pick it!

Choose firm, closed stalks with green to purplish tips.

Stems should be smooth and even in color.

Avoid dry stem ends and wilted spears.

Thick or thin stems are both acceptable, similar sizes cook more evenly.

To store, trim stems and stand stalks in a glass of 1-2 inches of water.

Cover with a plastic bag and use within 2-3 days.

Try it!

Asparagus can be steamed, boiled, grilled or roasted; add it to salads, pasta dishes, stir-fries or eaten cold with a dip.

The key to perfect asparagus is to cook it briefly.

Cook it as soon as possible to avoid loss of flavor and moisture.

To remove the ends, hold each end and bend until the spear breaks in 2.

The tougher bottoms can be saved for soups or stocks.

Types of Asparagus

Green: Most are green, also grows wild, ranges from pencil-thin to very thick

White: Sunlight deprived stalks, milder and more delicate, mostly available canned, in jars

Purple: Very thick and substantial stalk, not common



Did you know...

Iron is a mineral that our bodies need to make red blood cells, muscles and carry oxygen in the body. Few veggies are high in iron.

Like it!

Sautéed Asparagus with Mushrooms

Ingredients

- 1 pound asparagus, trimmed
- 1 teaspoon salt
- 1 ½ Tablespoons extra virgin olive oil
- ½ cup fresh mushrooms, sliced
- 1 teaspoon fresh thyme, chopped or ½ teaspoon dried
- Freshly ground black pepper to taste

Directions

1. In large skillet, bring 2 inches of water to boil with salt. Prepare ice water, set aside.
2. Add asparagus to boiling water, cook 4-5 minutes, until barely tender. Remove spears, place in ice water. Let cool, drain and set aside.
3. In same skillet, heat oil over medium-high heat. Add mushrooms, asparagus, thyme, salt and pepper to taste.
4. Cook until mushrooms are wilted and asparagus is heated through, 3-4 minutes.
5. Serve warm or chilled.

Yields 4 servings

Nutrition Facts per Serving:
Calories 70, Fat 5g, Cholesterol 0mg, Sodium 0mg,
Carbohydrates 5g, Fiber 2g, Sugar 2g, Protein 3 g

Sources: urbanext.illinois.edu/veggies/asparagus.cfm

Easy Asparagus Soup

Ingredients

- 1 (15 ounce) can asparagus
- 1 (14.5 ounce) can chicken broth
- ½ cup non-fat milk (optional)
- Salt and pepper to taste

Directions

1. Blend the asparagus (with liquid in the can) in blender until it is completely smooth.
2. Heat asparagus and chicken broth in a saucepan over medium heat.
3. Stir in milk (if using) and bring to simmer.
4. Add salt and pepper to taste.
5. Serve and enjoy.

Yields 4 servings

Nutrition Facts per Serving:
Calories 35, Fat 1g, Cholesterol 0mg, Sodium 700mg,
Carbohydrates 5g, Fiber 1g, Sugar 2g, Protein 3g

Sources: digitalrepository.unm.edu/chile-plusmod8nc/2

Lakota word translated by Jeshua Estes

**Find more recipes
and videos at
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