

# Falling for Vegetables

Children should have access to healthy food and be able to make healthy food choices wherever they are – at home, in school, and in the community. Improving the health of the nation’s children and reversing the childhood obesity epidemic is a shared responsibility and will take the commitment of parents, the foodservice industry, the media, and schools working together. The vision of USDA’s School Meals Initiative for Healthy Children is to improve the health of school children through better nutrition. Implementing the *Dietary Guidelines for Americans* in school meals will have important health benefits for children.

## Focus on Food:

### HealthierUS School Challenge

#### Recognizing Excellence in Nutrition and Physical Activity

The overarching goal of the HealthierUS School Challenge (HUSSC) is to improve the health of the nation’s children by promoting healthier school environments. The HUSSC was established to recognize schools that are creating healthier school environments through their promotion of good nutrition and physical activity.

#### To be certified as a HUSSC School, a school must:

- be enrolled as a Team Nutrition School
- offer reimbursable lunches that demonstrate healthy menu planning practices and principles of the *Dietary Guidelines for Americans* and that meet USDA nutrition standards
- provide nutrition education to students
- provide students with physical education and the opportunity for physical activity
- maintain an Average Daily Participation of school enrollment for reimbursable lunches that meets or exceeds minimum set
- adhere to guidelines established by FNS for foods served/sold in schools outside the National School Lunch Program.

#### Guiding Principles

- Schools will meet all the School Meals Initiative (SMI) requirements including energy and nutrient standards and age-appropriate portion sizes on an ongoing basis.
- Schools will serve reimbursable meals that reflect good menu planning principles, such as serving a variety of healthier foods that look good, taste good, and appeal to the cultural sensitivities of the school and community populations.
- Schools will plan meals that emphasize fruits, vegetables, whole grains and fat-free or low-fat milk and milk products; that include lean meats, poultry, fish, beans, eggs, and nuts; and that are low in saturated fats, trans fats, cholesterol, salt (sodium), and added sugars.

For more information: <http://www.teamnutrition.usda.gov/HealthierUS/index.html>



## Focus on Nutrition: Fall(ing) for Vegetables

### Why should children eat more vegetables?

- Vegetables are nutritious, flavorful, and appealing to children.
- Vegetables are important sources of many nutrients, including dietary fiber, vitamins A & C, potassium, folate, and phytochemicals.
- Eating vegetables that are low in calories per cup, instead of some other higher-calorie foods may be useful in helping to lower caloric intake.
- Eating a diet rich in vegetables as part of an overall healthy diet may reduce the risk of chronic diseases, such as stroke, cardiovascular disease, type 2 diabetes, and certain types of cancers.

### Menu-Planning Practices for Healthy School Meals

- Increase the amounts and variety of vegetables offered because vegetables differ in nutrient content.
- Offer plenty of raw vegetables for more dietary fiber.
- Serve seasonal vegetables.
- Purchase fresh and frozen vegetables, when feasible, to substitute for higher-sodium canned vegetables.
- Try using herbs, spices, and lemon for seasonings to replace part of the salt.

## Resources

Farm to School, [www.farmtoschool.org](http://www.farmtoschool.org)

National Food Service Management Institute. (2009). *Culinary techniques for healthy school meals*. University, MS: Author.

National Food Service Management Institute. (2005). *Healthy cuisine for kids*. University, MS: Author.

USDA Commodity Food Network (CFN), <http://www.commodityfoods.usda.gov/>

U. S. Department of Agriculture, Food and Nutrition Service. (2007, January). *The road to SMI success—A guide for school food service directors*. Washington, DC: Author.

U. S. Department of Agriculture, Food and Nutrition Service. (2007). *HealthierUS school challenge: Recognizing nutrition excellence in schools*. Washington, DC: Author.

U. S. Department of Health & Human Services; National Institutes of Health; National Heart Lung and Blood Institute. *We Can! Ways to Enhance Children’s Activity & Nutrition, We can! “Go, slow, and whoa!”* Available at [www.nhlbi.nih.gov/health/public/heart/obesity/wecan/eat-right/choosing-foods.htm](http://www.nhlbi.nih.gov/health/public/heart/obesity/wecan/eat-right/choosing-foods.htm)

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For more information, visit us on the Web at [www.nfsmi.org](http://www.nfsmi.org)

# Recycling Focus: The Lunch Tray – Reuse, Recycle, Rot

Disposables or permanent ware? That is the big question and the answer depends on what is right for your foodservice operation. Factors to consider include equipment availability, storage, labor, and access to recycling. Let's look at the options.

Schools generate a great deal of waste, especially as a by-product of food service. The meal service tray is often a large component of that waste.

## Permanent ware or reusable trays

These require equipment, water, soap, heat, and labor to clean after each use. Warewashing equipment can require significant amounts of water and may affect your operating expenses and the amount of water your kitchen consumes each day. Machines that are engineered specifically to conserve water not only reduce your water and sewage bills, but also save a considerable amount of the energy used to heat that water.

## Polystyrene trays

These trays are often expensive and have limited options for recycling available. The volume of solid waste contributed to the landfill, and the financial impact of hauling trash away have a major impact on your sustainability efforts and your bottom line.

## Compostable trays

Biodegradable tableware and compostable bags are finding a home in school foodservice. Lunch trays, flatware, cups, and bowls are readily available and usually made of either bagasse or polylactic acid. Bagasse is the pulp left after the juice has been extracted from the sugar cane stalk. Products made from this can withstand heat and are sturdy and biodegradable. Corn-based plastics or polylactic acids (PLA) are a biodegradable thermoplastic derived from corn. The environmental benefits of these containers are expected to be huge as these plastics are easier to dispose of because it is biodegradable. Corn-based plastics break down naturally and can even be composted.

### To learn more about recycling:

U. S. Environmental Protection Agency. (2007, February). *Tools to reduce waste in schools*. Washington, DC: Author. [www.epa.gov/epawaste/education/pdfs/toolkit/tools.pdf](http://www.epa.gov/epawaste/education/pdfs/toolkit/tools.pdf)

U.S. Environmental Protection Agency. *Wastes – Resource Conservation*. [www.epa.gov/osw/conserve/index.htm](http://www.epa.gov/osw/conserve/index.htm)

## Seasonality

### Fruits and vegetables that may be available during the fall:

Although many fruits and vegetables are available canned, frozen or dried all year long, the following fresh fruits and vegetables are in abundance during the fall months:

Apples	Grapes
Bananas	Mushrooms
Beets	Parsnips
Broccoli	Pears
Brussels sprouts	Pumpkins
Carrots	Rutabagas
Cauliflower	Sweet potatoes and yams
Cranberries	Swiss chard
Garlic	Winter squash
Ginger	

Seasonal produce will vary according to geographic region.

### Ways to celebrate seasonal foods:

#### September

Family Day — A Day to Eat Dinner with Your Children™, fourth Monday in September

Fruits & Veggies — More Matters™ Month

National Biscuit Month

National Honey Month

National Mushroom Month

National Papaya Month

National Potato Month

National Rice Month

Whole Grains Month

#### October

National Apple Month

National Cranberry Month

National Pasta Month

National Popcorn Month

National School Lunch Week

Vegetarian Awareness Month and World Vegetarian Day (October 1)

#### November

Family Week (week of Thanksgiving)

National Fig Week (1st week in November)

National Peanut Butter Lovers Month

National Pomegranate Month

National Sandwich Day (November 3rd)

National Split Pea Soup Week (2nd week in November)

### To learn more about using seasonal produce:

U. S. Department of Agriculture, Food and Nutrition Service. SNAP- Ed Connection, Nutrition through the seasons, [http://snap.nal.usda.gov/foodstamp/nutrition\\_seasons.php](http://snap.nal.usda.gov/foodstamp/nutrition_seasons.php)



# Student Activity

## Tomatoes and Herbs Star in Tomato Sauces Three Ways

Tomatoes are a favorite late summer and early fall vegetable. Let's make tomato sauce three ways – a fresh tomato sauce, a barely cooked sauce, and a long-time simmered tomato sauce to see how cooking affects the color, texture, and taste. Use various herbs to explore how flavor can be enhanced.

### Basic Tomato Sauce

#### Ingredients

Olive oil	1/4 cup
Onions, chopped	2 each
Tomatoes, fresh, chopped	10 each
Garlic, fresh, chopped	3 cloves
Basil, fresh	1/2 cup
Salt	1 teaspoon
Black pepper	1/4 teaspoon

#### For fresh, raw, or uncooked tomato sauce:

Combine ingredients and mix. Serve.

This sauce can be eaten right away – tossed with pasta, spooned over grilled meats and vegetables, mounded on lightly toasted or grilled bread, or spread on pizza crust. To make raw tomato sauce, you should only use fresh tomatoes at their peak of ripeness, when they are sweet and juicy and bursting with flavor.

#### For barely cooked sauce:

Heat oil in a sauce pan. Sauté onions until translucent. Add garlic and sauté for 1 minute. Add tomatoes and cook for 30 minutes. Add fresh herbs, salt and pepper.

The benefit of briefly-cooked sauce is it retains the fresh, tart-sweet tomato taste, but also heats the ingredients long enough to add some depth to the flavor of the sauce. You can caramelize onions, sauté garlic, and simmer herbs long enough to infuse the sauce with their flavors.

#### For long cooked sauce:

Heat oil in a sauce pan. Sauté onions until translucent. Add garlic and sauté for 1 minute. Add tomatoes and simmer for 3 hours. Add fresh herbs, salt and pepper.

An extended cooking time helps thicken the sauce as the water cooks out, and makes the flavors meld together. Also any other vegetables you have added to the sauce will become richer and sweeter the longer they cook. Consider adding carrots, celery, or zucchini to the sauce.

### Classroom Herb Garden

Herbs engage all of the senses and are fun for students to touch, see, smell, and taste. Herbs are versatile and can be used in soothing teas or in a spicy tomato sauce. They are easy to raise and have a multitude of uses.

Herbs can be grown indoors or outdoors, in containers or in the ground. To start a classroom herb garden you need: gardening tools (forks, shovels, and rakes), seeds or plants, large containers with drainage holes, seed-starting containers, planting mix, and fluorescent lights.

#### Creating Herb Gardens

**Plan the vision:** Do you want a medley of herbs to stimulate students' senses? Do you want a special theme to support the classroom learning such as colonial herbs, Mediterranean herbs, pizza or spaghetti herbs?

**Prepare the soil:** Most herb plants require similar growing conditions: a minimum of six hours of sunlight per day and moderately rich soil with good drainage. To improve the soil structure and drainage, your students should use garden forks or shovels to loosen the soil to a depth of 8 to 12 inches before planting.

**Plant seeds, plants, or cuttings:** Herbs may be annuals, started from seed each year, like basil; biennials, that require two seasons of growth, such as parsley; or perennials, which grow back year after year, like thyme.

**Harvest:** You can harvest most herbs continually as soon as the plant has enough foliage to sustain growth.

To learn more about herb gardening with students:

Kids Gardening at [www.kidsgardening.com/](http://www.kidsgardening.com/)

# Fish Taco with Jicama Coleslaw and Fresh Tomato Salsa

Serving Size: 1 taco each

Number of Portions: 50

One taco with coleslaw and salsa provides 2 ounces meat/meat alternate, 1 serving bread, and 3/8 cup of vegetable

*This twist on a student favorite, tacos is a good way to add fish to the menu, and the citrus marinade adds a bright flavor. Be careful not to overcook the fish though. The jicama coleslaw introduces a new vegetable in a familiar dish. The school-made salsa is fresh and flavorful and can be made with canned diced tomatoes.*

Ingredients	Weight	Measures	Instructions
Taco seasoning		1/2 cup	<ol style="list-style-type: none"> <li>1. Combine taco seasoning, lime juice and orange juice and mix well. Add fish and toss to coat with seasoning mixture.</li> <li>2. Spray a sheet tray with cooking spray. Spread fish in even layer on tray. Bake 8-10 minutes at 350 °F.</li> <li>3. Heat tortillas according to package instructions. Place 2 ounces of fish in each taco. Spoon 1/4 cup of jicama coleslaw on top of fish. Top with 2 tablespoons (No. 30 scoop) fresh tomato salsa. Fold or roll up tortillas and enjoy. Serve immediately.</li> </ol>
Lime juice	4 ounces	1/2 cup	
Orange juice	4 ounces	1/2 cup	
Halibut or cod, cut into 1 inch cubes	9 pounds	As needed	
Cooking spray or vegetable oil			
Corn tortilla, 6 inch (at least 0.9 oz each)		50 each	

## Jicama Coleslaw

Serving Size: 1/4 cup

Number of Portions: 50

Ingredients	Weight	Measures
Jicama, julienne	2 1/2 pounds	
Carrots, shredded	8 ounces	
Green cabbage, shredded	8 ounces	
Green onions, chopped		1 bunch
Lowfat mayonnaise	14 ounces	
Sugar		2 tablespoons
Celery seed		2 teaspoons
Dry Mustard		1 teaspoon
White vinegar		2 tablespoons

### Instructions

1. Place jicama, cabbage, carrots, and green onions in large bowl and toss lightly to mix.
2. Combine mayonnaise, sugar, celery seed, dry mustard, and vinegar.
3. Pour dressing over vegetables. Mix thoroughly.
4. Cover. Refrigerate until ready to serve.
5. CCP: Cool to 41 °F or lower within 4 hours.
6. Mix lightly before serving. Portion with No. 16 scoop (1/4 cup).

### Nutrients per serving

Calories	197	Saturated Fat	0.5 g	Iron	1.0 mg
Protein	18.6 g	Cholesterol	26.1 mg	Calcium	49 mg
Carbohydrate	20.6 g	Vitamin A	1105 IU	Sodium	238 mg
Total Fat	4.0 g	Vitamin C	11.9 mg	Dietary Fiber	2.73 g

## Tomato Salsa

Serving Size: 2 tablespoons or 1 ounce

Number of Portions: 50

Ingredients	Weight	Measures
Tomatoes, plum, cored	2 pounds, 12 ounces	
Cilantro, fresh, chopped		1/3 cup
Onion, peeled and quartered	3 ounces	
Garlic, fresh cloves, chopped		1 to 2 each
Salt		1/4 teaspoon
Lime juice		1 tablespoon

### Instructions

1. In a buffalo chopper or food processor place tomatoes, cilantro, onion, and garlic. Chop until coarsely chopped.
2. Stir in salt and lemon juice.
3. Cover and refrigerate until ready to serve.  
CCP: Cool to 41 °F or lower within 4 hours.

### For additional recipes:

U. S. Department of Agriculture, Food and Nutrition Services & National Food Service Management Institute. (2006). *USDA recipes for schools*. University, MS: Author.

U. S. Department of Agriculture, Food and Nutrition Services & National Food Service Management Institute. (2006). *USDA recipes for child care*. University, MS: Author.



# Apple and Cranberry Crisp

Serving Size: steampable pan cut 5x10

Number of Portions: 50

*One piece provides 3/8 cup fruit and 3/4 grains/breads for Enhanced Meal Pattern*

*A crisp is an excellent way to add a 3/8 cup serving of fruit and when made with rolled oats and whole wheat flour it will add whole grains to the menu. Other fruits that make good crisps include: cherries, blueberries, peaches, plums, or pears. Dried fruits can be added to fresh, frozen, or canned fruits for added sweetness.*

Ingredients	Weight	Measures	Instructions
Whole wheat flour	14 ounces	3 1/3 cups	<ol style="list-style-type: none"> <li>For topping: Combine flour, rolled oats, brown sugar, cinnamon, nutmeg, salt, and margarine or butter. Mix until crumbly. Set aside for step 6.</li> <li>For filling: Drain apples, reserving juice. Add enough water to juice to make 1 1/2 cups liquid. Set liquid aside for step 5.</li> <li>Place apples and dried cranberries into each steampable pan (12" x 20" x 2 1/2"). For 50 servings, use 1 pan.</li> <li>Spread honey, cinnamon, and lemon juice over apples in each pan. Stir to combine.</li> <li>Pour 1 1/2 cups liquid over apples in each pan.</li> <li>Sprinkle topping evenly over apples in each pan.</li> <li>Bake until topping is browned and crisp: Conventional oven: 425 °F for 35-45 minutes Convection oven: 350 °F for 25-35 minutes</li> <li>Cool. Cut each pan 5 x 10 (50 pieces per pan).</li> </ol>
Rolled oats	9 ounces	3 cups 2 tablespoons	
Brown sugar, packed	15 ounces	2 cups	
Cinnamon, ground		1 1/2 tablespoons	
Nutmeg, ground		1 1/2 tablespoon	
Salt		1/2 teaspoon	
Butter	1 pound	2 cups	
Apples, unsweetened, sliced apples, solid pack, with juice	6 pounds 4 ounces	3 quarts 43 cups	
Cranberries, dried	1 pound	3 3/8 cups	
Water, as needed			
Honey	10 ounces	3/4 cups 2 tablespoons	
Cinnamon		1 1/2 teaspoon	
Lemon juice		1/4 cup	

## Nutrients per serving

Calories	217	Saturated Fat	4.8 g	Iron	0.75 mg
Protein	2.2 g	Cholesterol	19 mg	Calcium	21 mg
Carbohydrate	36.9 g	Vitamin A	245 IU	Sodium	80 mg
Total Fat	8.1 g	Vitamin C	0.8 mg	Dietary Fiber	3.3 g

Source: Adapted from Apple-Honey Crisp, C-02A, U.S. Department of Agriculture, Food and Nutrition Service & National Food Service Management Institute (2005).

## For additional recipes:

U. S. Department of Agriculture, Food and Nutrition Services, & National Food Service Management Institute. (2006). *USDA recipes for schools*. University, MS: Author.  
U. S. Department of Agriculture, Food and Nutrition Services, & National Food Service Management Institute. (2006). *USDA recipes for child care*. University, MS: Author.



# Whole Wheat Sugar Cookies

Serving Size: 1 each    Number of Portions: 100  
 For Enhanced Meal Pattern only: 1 cookie provides  
 1 serving of grains/breads.

Ingredients	Weight	Measures	Instructions
Margarine or butter	1 pound 8 ounces	3 cups	<ol style="list-style-type: none"> <li>1. Cream margarine or butter and sugar in mixer with paddle attachment on medium speed for 10 minutes.</li> <li>2. Add eggs, vanilla, and milk. Mix for 1 minute on low speed or until smooth. Scrape down sides of bowl.</li> <li>3. In a separate bowl, combine flour, baking powder, baking soda, salt, nutmeg, and cinnamon. Gradually add to the creamed mixture and mix for 1 minute on low speed until blended.</li> <li>4. Lightly coat each sheet pan (18" x 26" x 1") with pan release spray or line with parchment paper. Portion with a No. 30 scoop (2 tablespoons) in rows of 4 across and 5 down. For 100 servings, use 4 pans.</li> <li>5. Combine sugar and cinnamon and sprinkle over cookies.</li> <li>6. Bake until light brown.                      Conventional oven: 375 °F for 12 minutes                      Convection oven: 350 °F for 6 minutes</li> </ol>
Sugar	3 pounds	1 quart 2 cups	
Frozen whole eggs, thawed OR Fresh large eggs (see special tip)	12 ounces	1 1/2 cups OR 7 each	
Vanilla		2 tablespoons	
Lowfat 1% milk		3/4 cup	
Whole wheat flour	3 pounds 10 ounces	3 quarts	
Baking powder		2 tablespoons	
Baking soda		1 tablespoon	
Salt		1 tablespoon	
Ground nutmeg		2 teaspoons	
Sugar	8 ounces	1 cup	
Ground cinnamon		1 tablespoon 1 teaspoon	

## Special Tip:

For 100 servings, use 3 1/2 ounces (1 cup 3 tablespoons) dried whole eggs and 1 cup 3 tablespoons water in place of eggs.

For a lighter texture, substitute enriched all-purpose flour for half of the whole wheat flour.

## Nutrients per serving

Calories	173	Saturated Fat	1.29 g	Iron	0.78 mg
Protein	2.81 g	Cholesterol	15 mg	Calcium	30 mg
Carbohydrate	28.22 g	Vitamin A	269 IU	Sodium	207 mg
Total Fat	6.17 g	Vitamin C	0.1 mg	Dietary Fiber	2.1 g

Source: Adapted from Whole Wheat Sugar Cookies, C-30, U.S. Department of Agriculture, Food and Nutrition Service & National Food Service Management Institute (2005).

## For additional recipes:

U. S. Department of Agriculture, Food and Nutrition Services & National Food Service Management Institute. (2006). *USDA recipes for schools*. University, MS: Author.

U. S. Department of Agriculture, Food and Nutrition Services & National Food Service Management Institute. (2006). *USDA recipes for child care*. University, MS: Author.

