Standardized Recipes

Learning Objective
Participants will learn:

1. What is a Standardized Recipe?
2. The importance of using standardized recipes.
3. Describe information included in a standardized recipe.
4. How to develop a standardized recipe.
5. Become familiar with additional resources for recipes.

Introduction
A child care institution that participates in the Child and Adult Care Food Program operates a food service. This operation may heat prepared food, may prepare food from “scratch”, or may do a little of both. In any case, standardized recipes or some type of food preparation records will be needed to achieve the nutritional goals set by USDA, meet Montana CACFP policy, and allow institutions the ability and flexibility to create meaningful records.

Standardized recipes are used every day in child nutrition operations as a guide to preparing the foods served to children. They are essential to ensure that the planned serving sizes of food items are provided to the children and are creditable for reimbursement.

Resources
3. MT CACFP website

What is a Standardized Recipe?
According to the United States Department of Agriculture (USDA), a standardized recipe is defined as one that “has been tried, adapted, and retried several times for use by a given food service operation and has been found to produce the same good results and yield every time when the exact procedures are used with same type of equipment and the same quantity and quality of ingredients.” In easier terms, a standardized recipe is a complete, specific set of written instructions for cooks to produce consistent, high-quality recipes every time!

Benefits of Standardized Recipes
Standardized recipes provide a means to establish consistency in the quality of all foods being made, menu planning, and food and labor costs. Understanding how to properly use standardized recipes ensures that the food being prepared is the same regardless of who does the cooking. The food should be the same in taste, texture, yield, appearance, nutritional value, and cost. Following the correct
portion sizes listed on a standardized recipe helps to prevent running out of food and also controls the amount of food wasted.

**Special Dietary Needs/Accommodations**
The use of standardized recipes is also an easy way to keep track of special dietary needs and/or accommodations of the children served. Following a standardized recipe ensures that people on varying diets are receiving the correct type and amount of food to meet their documented dietary needs and restrictions. For children with food allergies, serving foods prepared from a standardized recipe offers assurance to the child and to the parent that an additional ingredient that may contain a major food allergen has not been added to the final product. If a cook strays from the standardized recipe by incorporating additional ingredients, the product quality and portion sizes change, the cost increases, and the potential of unknowingly serving an allergic child an allergen increases. This is a risk that no one wants to knowingly take.

**The Importance of Using Standardized Recipes**
There are many reasons why using standardized recipes are important. The following are reasons why a program would benefit to use them.

*Consistent Food Quality:* Standardized recipes help ensure that the best possible food items are produced every time.

*Predictable Yield:* Knowing how much of an item the recipe will produce helps prevent food waste and shortages when serving to children.

*Accurate Nutrient Content:* Standardized recipes help ensure that the best possible food items are produced every time. Conscientious food and ingredient shopping is also key.

*Food Cost Control:* When the same ingredients and quantities are used each time the recipe is prepared, the cost per serving remains the same.

*Efficient Purchasing:* The quantity of ingredients needed for production can be easily calculated based on the information provided on the recipe.

*Inventory Control:* If a standardized recipe is followed, the quantity of food inventory used each time the recipe is produced can be estimated.

*Labor Cost Control:* Written procedures allow staff to make good use of their time and move through their work day more efficiently.

*Employee Confidence:* Staff can feel more satisfied and confident because eliminating guesswork decreases the likelihood of mistakes and poor food quality.
Reduced Record Keeping: Information from standardized recipes can be easily transferred to daily food production records if your institution uses them. However, standardized recipes are sufficient food preparation records in themselves.

Elements of a Standardized Recipe

All standardized recipes should include the following information:

1. **Recipe Title** – This is the name of the product being created.
2. **Recipe Category** – This is the classification of the creditable component(s) being claimed for reimbursement (fruit, vegetable, meat/meat alternate, bread/grain, dairy).
3. **Serving Size** – This is the single required portion of the final product being served to a child.
4. **Recipe Yield** – This is the total number of servings available when the final product is made.
5. **Equipment and Utensils to Use** – Listing of cooking and serving tools needed to produce and serve the food item.
6. **Ingredients** – Food items used in the recipe.
7. **Weight/Volume of each ingredient** – This is the required amount of each ingredient in the recipe.
8. **Preparation Instructions** – These are the specific directions for preparing the recipe.
9. **Cooking Temperatures and Time** – This is the appropriate temperature and amount of time needed for the highest quality product.

Additional information that could be listed on the standardized recipe can include:

1. **Food Safety Guidelines** – Includes procedures designed to ensure the safety of the food being produced throughout the preparation and serving. (i.e. cooking to proper internal temperatures, cross contamination)
2. **Food Costs** – This is the figured cost of one serving.
3. **Nutrient Analysis Data** – This is a listing of the nutrients per serving (i.e. calories, protein, fat, carbohydrates, etc.)

Benefits in a nutshell:

- Consistent Food Quality
- Predictable Yield
- Accurate Nutrient Content
- Food Cost Control
- Efficient Purchasing
- Inventory Control
- Labor Cost Control
- Employee Confidence
- Reduced Record Keeping
There is not one main recipe template that an institution must use, however; it is important that all of the above elements are listed on the template chosen. Here are a couple of sample templates that you may decide to use. **Standardized Recipe Template #1**; **Standardized Recipe Template #2**. (You can save these templates for future use.)

**Let’s Learn How to Standardize a Recipe!**

Here are the three steps that are involved to standardizing a recipe. There are multiple processes within the three major steps.

1. **Verify the original recipe**
   - Review the recipe
     - Title of recipe
     - Recipe category
     - Ingredients
     - Weight/volume for each ingredient
       - Decide whether to list the amount of each ingredient in a weight or volume. (example: meat/meat alternate and grains are usually in ounce equivalents, vegetables and fruits are usually measured by volume)
       - Convert if necessary for consistency.
       - Avoid using packaging to describe amount (example: 1 envelope, 2 bags, 3 packages).
       - List quantities in the easiest unit of measure (example: ½ C. not 8 Tbsp, 1 lb. 4 oz. not 20 oz.).
       - Provide AP (as purchased), EP (edible portion) or both but specify which you are providing.

<table>
<thead>
<tr>
<th>Common Recipe Conversions</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Unit(s)</strong></td>
</tr>
<tr>
<td>Pinch</td>
</tr>
<tr>
<td>3 Teaspoons</td>
</tr>
<tr>
<td>1 Tablespoon</td>
</tr>
<tr>
<td>8 Fluid Ounces</td>
</tr>
<tr>
<td>2 Cups</td>
</tr>
<tr>
<td>2 Pints</td>
</tr>
<tr>
<td>4 Quarts</td>
</tr>
<tr>
<td>16 Dry Ounces</td>
</tr>
</tbody>
</table>

- Directions on how to prepare
- Cooking temperature and time
- Serving size
- Recipe yield
- Equipment and utensils

- Prepare the recipe
  - For the original, 25 servings, or 50 servings (decision based on individual institution)
Limit the variables. Stick to specifics when creating your first recipe. Alternatives can be added when recipe has been fully standardized.

- Verify yields
  - Weight and/or measure totally yield produced
  - Weight of one serving
- Record changes

2. **Evaluate the product**
   - Informal evaluation
     - You can do this with your family, friends, or your institution.
   - Formal evaluation
     - This involves selecting an audience, having an evaluation form, preparing the recipe, sampling, tasting, summarizing results, and deciding if you are going to use it based on the results. This is an involved procedure and one that takes time.

3. **Adjust the quantity**
   - Decide on a method (described below)
     - Factor method
     - Computerized adjustment
   - Create your New Standardized Recipe tailored to your institution!

Adjusting a Recipe Using the Factor Method

Determine the actual original yield. If you have not made the recipe before, it is a good idea to make the product and measure or count the amount made. You can also use the yield amount that is given with the recipe. Once you have the original yield, determine the adjustment factor. This is done by taking the new yield (the amount that you want to produce) and divide it by the original yield amount. You then record the original amounts on the adjusted form.

**New yield ÷ Original yield = Adjustment Factor**

Make sure that you convert all amounts to the lowest measure, for example: qts. to c., Tbsp. to tsp., lbs. to oz. Multiply each amount by the adjustment factor and then convert to a measurable amount. For example, 1.5 cups rather than 24 Tbsp. See Basics at a Glance for guidance.

Example:

Your cook is going to make a chicken or turkey salad. The original recipe that you have provides 25 servings, but your institution needs to have 60 servings. This is what the calculation looks like?

\[
\frac{60}{25} = 2.4
\]

- Number of servings you want  
- Original number of servings  
- Multiplying factor
DO NOT ROUND THE MULTIPLYING FACTOR. The multiplying factor will be used to adjust the weight and volumes of each ingredient in the recipe.

What about Unique Recipes?
If your institution has a recipe that is unique to its program, you can standardize the unique recipe by completing the steps below:

a) Prepare the recipe and test until the highest quality product is produced. While the recipe is being tested, the cook should be documenting all the steps taken and the outcome of each step.
b) Write out the recipe on an institution specific standardized form using the required components. When writing out the instructions, list them step-by-step for preparation and cooking. You can also include any food safety guidelines that need to be followed.
c) Adjust the recipe to reflect the desired yield.
d) Conduct taste testing with staff and children to judge the appearance, texture, flavor, and overall acceptability of the product.

Adjusting a Recipe using the Computerized Method
If you prefer to use the computerized method, you can take advantage of the Food Buying Guide Calculator located on the MT CACFP website > Resources > Menu Planning. This is a great website that allows you to select a food group and then a specific food within that food group. The specific food will come up and show a weight or measure that the particular food comes in. You then can type in the serving size (based on required CACFP serving size), and the Food Buying Guide will calculate the quantity needed to serve the identified quantity of children with the required CACFP serving size. The calculator will also produce a grocery list for you to print off. Take some time right now and look at the Food Buying Guide Calculator.

Another computerized method called Free-Online-Calculator-Use is a free online cooking measurement calculator. This calculator will scale a recipe’s ingredients using four different options. This converter will provide you with a print friendly version of your recipe which includes a column of the original unit quantities along with the converted unit quantities.

An additional free program to help you convert recipes is called Fruit from Washington – Recipe Quantity Calculator. This program will help you increase or reduce the volume of your recipe. You also have the ability to print your converted recipe.

Take some time right now to look at the tools just explained to you.

Possible Software?
Interested in software programs? Check these out!

- Sierra Master Cook Recipe Software [http://www.mastercook.com/]
- Cookn’ Recipe Software [http://www.dvo.com/]

How to Look at Recipes for Reimbursements?
Whenever creating menus and recipes or even grocery shopping in general, it is important and crucial for you to purchase creditable food. The CACFP will only reimburse meals that are creditable. Please see the Montana CACFP Creditable Food Addendum. If you don’t have a copy, please print a copy now.
When you have a recipe that you have decided to prepare, you need to decide what components of the recipe that you will be counting as a creditable component of your meal. The following are required components to a CACFP breakfast, lunch, and snack (a.m. or p.m.). Serving size amounts are dependent on the age of the children served. Required serving amounts can be found on the CACFP Meal Pattern Chart which should be hanging in your kitchen. If you have one, please contact MT CACFP for a new one.

Breakfast must include:
- Bread/Grain component
- Fruit/Vegetable component
- Milk

Lunch/Supper must include:
- Meat/Meat Alternate component
- Fruit/Vegetable component
- Fruit/Vegetable component
- Bread/Grain component
- Milk

Snack must include:
- 2 of the 4 components (meat/meat alt., fruit/veg, bread/grain, milk)

The Food Buying Guide for Child Nutrition Programs is a wonderful manual to have on hand or saved in your favorites. This resource is a starting point as it establishes base quantities for ingredients based on raw product and finished product. This manual has all of the current information to help you.

1. Buy the right amount of food and the appropriate type of food for your program(s), and
2. Determine the specific contribution each food makes toward the meal pattern requirements.

This manual includes information on all of the required CACFP meal components along with additional foods. It also includes many appendices that provide information from recipe analysis to USDA Child Nutrition Labeling Program.

Resources for Standardized Recipes
This section includes many helpful links for a child care director and/or CACFP manager to use to search for recipes, creating “your institutions” cookbook, and menu ideas. Please take some time to look through each of these links or make a copy of the link to look up later.

- Recipes for Healthy Kids Cookbook (child care centers)
- Recipes for Health Kids Cookbook (home)
- USDA Recipes for Child Care
- What’s Cooking USDA Mixing Bowl
- Snacks that Count – Recipes for Nutritious Snacks
Conclusion
Using standardized recipes is an effective way to enable an institution’s food service to work efficiently, while increasing product quality and children’s satisfaction, limiting food waste, excess labor hours and high food costs. Understanding how to correctly use standardized recipes is one of the most effective ways to run a successful food service operation.
Activity Two

1. Create a standardized recipe for Bean and Cheese Burritos using this Standardized Recipe template #1. Recipe name is Bean and Cheese Burrito. CACFP crediting components are meat/meat alternate and grain. Calculate 50 servings and 100 servings by using the required serving per component. Ages: 3 to 5 year olds. NOTE: If using larger tortillas, double the amount of beans and cheese and cut in half. Upload your Bean and Cheese Burrito recipe.

   Ingredients: Cheddar Cheese, refried beans, corn tortillas (4 - 6”)

   Directions: Spread ¼ cup refried beans on each tortilla. Add 1.5 ounces cheddar cheese on top of beans. Roll tortilla. Place on cookie sheet. Cook at 350 degrees for 10 minutes.

2. Convert the recipe below to 48 servings for 3 to 5 year olds, using the Standardized Recipe Template #2. Upload the newly created Cheesy Spaghetti Bake recipe.

   Cheesy Spaghetti Bake
   Serves 12
   Serving Size: ¾ cup
   CACFP Crediting: Grain/Bread and Meat/Meat Alternate

   8 x 8x 1 ½ baking dish

   2 cups spaghetti, whole wheat, dry
   2 oz. cheese, mozzarella, shredded
   1 egg divided in half
   ½ cup milk, 1%, low-fat
   ½ tsp. salt
   2 Tbsp. Oregano
   2-1/2 lbs. turkey, ground
   1 small onion chopped
   4 cups spaghetti sauce

   Cook spaghetti as package directions indicate; drain. In a large bowl, beat the egg, milk and salt; add spaghetti, oregano, and half the cheese called for. Toss to coat. Transfer to greased baking dish. Brown meat and chopped onion; drain. Add spaghetti sauce and mix well. Spoon over pasta. Bake uncovered, at 350°F for 20 minutes. Sprinkle with the rest of the shredded cheese and bake 10 minutes more. Let stand 10 minutes before cutting.
Quiz Two

1. According to the USDA, a standardized recipe is:
   a. one that has been tried over and over again.
   b. one that has been found in grandma’s recipe file and prepared for the family.
   c. one that has been tried, adapted, and retried several times by a food service operation.
   d. one that has been copied on to a recipe template.

2. Standardized recipes provide a means to establish __________ in the quality of all foods being made, menu planning, and food and labor costs.
   a. Consistency
   b. Organization
   c. Control
   d. Ownership

3. Understanding how to properly use standardized recipes ensures that the food being prepared is the __________ regardless of who does the cooking.
   a. Cheapest
   b. Most delicious
   c. Most nutritious
   d. Same

4. For children with food allergies, serving foods prepared from a standardized recipe offers assurance to the ________ and to the ________ that an additional ingredient that may contain a major food allergen has not been added to the final product.
   a. Child and to the parent
   b. Parent and to the teacher
   c. Child and to the teacher
   d. Teacher and to the other children

5. If a cook strays from the standardized recipe by incorporating additional ingredients, the product quality and portion sizes change, and costs increase. T or F

6. The importance of using standardized recipes cover all of these points except...
   a. Consistent food quality
   b. Hinders picky eaters
   c. Efficient purchasing
   d. Employee confidence

7. The three steps to standardizing a recipe are:
   a. Purchase food, mix the ingredients, serve to children
   b. Weigh the food, prepare the food, count the servings
   c. Verify the original recipe, evaluate the product, adjust the quantity
   d. Verify the ingredients, write on template, serve to children
8. Finish this equation: New yield ÷ Original yield = _______________.
   a. Finished product
   b. Factor dividend
   c. Summation of product
   d. Adjustment factor

9. When creating a standardized recipe, the components counted for CACFP reimbursement must be...
   a. Written on the menu
   b. Purchased by a Food Management Company
   c. Creditable and required
   d. Prepared onsite

10. The resource that provides guidance regarding buying the right amount of food and determining the specific contribution each food makes towards the meal pattern requirements is called...
    a. What’s Cooking USDA Mixing Bowl
    b. The Food Buying Guide
    c. The Food Buying Calculator
    d. Montana CACFP Creditable Food Addendum