

# Promoting and Supporting School Salad Bars

*An Action Guide for State Health Practitioners*



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### Suggested Citation

Centers for Disease Control and Prevention. *Promoting and Supporting School Salad Bars: An Action Guide for State Health Practitioners*. Atlanta, GA: US Dept of Health and Human Services; 2015.

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# Chapter 1: Introduction









**Students who are offered a school salad bar respond by trying new items, adding more variety into their diets, and increasing their daily consumption of fruits and vegetables.**

## Introduction

School salad bars can be part of a comprehensive nutrition education program that involves school staff, parents, and community members to influence the amount of fruits and vegetables students eat every day. This guide will help you learn more about school salad bars and discuss ways in which you can promote, market, and support school salad bars in your states, communities, and schools.

## Who is the audience for this guide?

This guide is intended for state public health nutrition practitioners who want to help place more salad bars in schools. You may want to share parts of this guide and its resources with key stakeholders in your state, including obesity and chronic disease staff, school health staff, school nutrition professionals, and food safety staff.

You may already be excited about using school salad bars to increase fruit and vegetable consumption among children, but are not sure how to start. You may still have doubts about whether school salad bars are an effective strategy to improve healthy eating. After reading this guide, you should be ready to champion school salad bars by using the strategies outlined here.

## Why school salad bars?

Fruits and vegetables provide an important source of vitamins and minerals for children and are recommended as part of a healthy diet in the *Dietary Guidelines for Americans*. Most fruits and vegetables, when prepared without added fats or sugars, are relatively low in calories. Eating them instead of higher calorie foods can help children achieve and maintain a healthy weight.<sup>1</sup> Because most US children aged 6-18 years attend school daily, schools are in a unique position to influence and promote fruit and vegetable intake among children. School salad bars are one way to offer more fruits and vegetables to students. Research and experience in schools shows that students who are offered a school salad bar respond by trying new items, adding more variety into their diets, and increasing their daily consumption of fruits and vegetables.<sup>2</sup>

Why target schools? First, today's children are tomorrow's adults. If the palates of children can be changed so that they prefer fruits and vegetables, then this change could be for a lifetime. Second, students are in school for a large part of their day, where they can be easily exposed to new foods, participate in nutrition education, and see adults and other teachers as role models who eat fruits and vegetables. School-based interventions can improve healthy eating.<sup>2,3</sup> These types of interventions often integrate salad bar programs into school wellness policies and reinforce them with nutrition education, school gardens, lessons in fruit and vegetable preparation, and food tastings.

Self-serve salad bars can increase students' consumption of fruits and vegetables in schools and can help schools meet the standards of the United States Department of Agriculture's (USDA) National School Lunch Program (NSLP). The NSLP standards, which were implemented during the 2012-2013 school year, require more fruits and vegetables in school lunches. These standards can be a powerful incentive for schools to use salad bars because salad bars are an easy way to ensure the required offerings are met.<sup>4</sup> A 2013 USDA policy memo to all regional directors of child nutrition programs stated, "USDA encourages the use of salad bars in the school meal programs. Schools with salad bars offer a wider variety of vegetables and fruits than other schools. Salad bars have the potential to improve nutrition and encourage the consumption of fruits, vegetables, and legumes. In addition to the nutritional benefits, salad bars may lower plate waste in school feeding programs."<sup>5</sup>

The importance of school salad bars is underscored by the *CDC Guide on Strategies to Increase Fruit and Vegetable Consumption*, which recommends establishing practices in schools to encourage fruit and vegetable consumption. One such practice can be to add a salad bar to the school cafeteria.<sup>6</sup> The 2010 report to the President by the White House Task Force on Childhood Obesity recommended that "schools should consider upgrading their cafeteria equipment to support the provision of healthier foods, for example, by swapping out deep fryers for salad bars."<sup>7</sup>



In 2010, First Lady Michelle Obama launched *Let's Move Salad Bars to Schools (LMSB2S)* to increase children's fruit and vegetable access by donating salad bar equipment to schools. All K-12 school districts participating in the NSLP are eligible to apply.<sup>8,9</sup> An evaluation of school districts that received salad bars during 2010-2013 indicated that salad bars could help schools comply with the new federal school lunch standards, and most schools saw an increase in students participating in the school lunch program as a result of the salad bars. Most schools reported that they coupled the new salad bars with classroom education, taste testing, cooking classes, special events, and promotions.<sup>10</sup>

Meeting the new meal standards and implementing salad bars will also help schools become eligible for recognition as part of *USDA's HealthierUS Schools Challenge: Smarter Lunchrooms (HUSSC: SL)*. The HUSSC: SL is a voluntary certification initiative established in 2004 and open to all schools that participate in the NSLP and School Breakfast Program. The initiative, which establishes standards for a school environment, is supportive of healthy and active kids and provides recognition for schools that meet these standards. Monetary awards are available for each award level of Bronze, Silver, Gold, and Gold Award of Distinction.<sup>11</sup>

## How was this guide developed?

This guide was developed because state health agency staff asked for strategies to promote and support salad bars in schools. They asked for guidance on how to identify partners and collaborators, tips on how to tie school salad bars into existing nutrition or obesity programs, talking points about how to address common issues around salad bars, and case studies from other states that have incorporated school salad bars into their work. To develop this guide, states were asked to share what they have accomplished in this area to provide strategies that other states might try.

## How should you use this guide?

This guide will help you become an effective ambassador by providing the knowledge you need about salad bars. This guide offers you a variety of activities to support school salad bars, from initial strategies, such as starting a conversation about school salad bars in your state, to ambitious projects, such as evaluating how well salad bars are changing eating habits among students. The guide facilitates peer-to-peer learning by passing on information about other states' successful salad bar projects to provide ideas about what could work for you. You might use this guide to help incorporate school salad bar strategies into your state work plans. This guide can be shared with your partners when you invite them to join you in your salad bar activities.

Chapter 2 answers many of the common questions and concerns public health staff encounter when they try to implement salad bars in schools. After reviewing and understanding the rationale and implications for salad bars at the school and district level in Chapter 2, you can turn to Chapter 3 of this action guide to learn about specific strategies *state health agencies* can take to promote and support school salad bars. Chapter 3 provides examples of who to collaborate with and a variety of activities you might do to begin your salad bar efforts, such as talking to partners, developing facts sheets and articles, and providing presentations and trainings. Chapter 3 also includes several examples of states in the field that have implemented different strategies to incorporate school salad bars into their work. Chapter 4 then describes how to evaluate your salad bar activities to demonstrate the effect your efforts are having. Finally, the appendices include a list of resources to show you where to turn for help, (including examples of fact sheets, brochures, and surveys), and a sample logic model.

You can use the information in this guide to build your own knowledge base, as well as educate and train others in your state about how school salad bars can make children healthier.

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# **Chapter 2: Common Questions About School Salad Bars**





## Common Questions About School Salad Bars

It is important to know some of the common concerns about school salad bars and how to address those concerns. This chapter will ask some questions that you or others in your state might have about school salad bars and help you navigate solutions for those issues. This chapter also includes examples and tips from school districts around the country where creative food service directors have made salad bars work in their schools.



### Will students use school salad bars?

Yes, several school districts around the country are finding that salad bars help entice students to buy more school lunches and eat more fruit and vegetables.

Wisconsin's Chilton School District found that having a daily salad bar that includes seasonal, local produce helped spark a rise in lunch participation. Similarly, two school districts in California—Ventura and Riverside—found a spike in lunch participation after introducing salad bars.

Many schools with salad bars have farm-to-school programs, school gardens, and nutrition education programs to support salad bar efforts. These schools have noted that when kids get hands-on experience with a garden or farm, they are excited about trying the vegetables they have seen growing and may be more willing to try new foods in the cafeteria.

Food service directors have come up with different strategies to help introduce salad bars in their schools and entice students to participate. Some have found that children are more accepting of fruits and vegetables if they are introduced gradually. When trying to move kids away from iceberg lettuce, Jessica Shelly, School Nutrition Director in Cincinnati, Ohio, found that by mixing lettuce offerings, students were more receptive to the unfamiliar greens; she first changed to 75% iceberg and 25% romaine, then half and half, and then to 25% iceberg and 75% romaine.

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Providing samples or taste tests of salad bar offerings can also increase participation. When the farm-to-school program in Davis, California, provided samples in the classroom, children were more willing to try a new food, or even a food that they were familiar with but had decided not to try.

Using quality produce with an attractive presentation is also key to enticing students to participate. The food service manager at the Chilton School District says, "Start with local apples, for instance. Add finger foods like vegetables and dip. Presentation is critical. If you can't make it look great, wait. Bright colors are always best. Mixing spinach into lettuce brings a dark color. Setting out a bowl of iceberg lettuce will get you a lot of wasted lettuce." Give fruits and vegetables creative names to pique student interest, such as "tender steamed carrots" instead of just "carrots," or "fresh broccoli bites" instead of just "broccoli." Create a sign or chalkboard with these names to display in the lunchroom, and place signage with the creative titles on the salad bar.



## Tips for encouraging students to use salad bars

- Get kids excited about produce by taking them on farm field trips or having farmers or chefs in the classroom.
- Begin with fruits and vegetables that kids know and like, and then introduce new foods little by little.
- Give samples in classroom tastings.
- Use quality produce, possibly from local farms.
- Change the offerings so students don't get bored with the same foods.
- Place the salad bar in a location where students can first fill up their tray with salad before selecting their hot entrée.
- Present food in attractive displays with a mix of colors. Bright colors are appealing.
- Display a variety of whole fruit options together in an attractive bowl or basket (instead of chafing pans).
- Give fruits and vegetables creative and descriptive names to pique student interest.
- Use signage to nudge kids toward the salad bar choices.



## Are salad bar lunches reimbursable by USDA?

**Yes.** The USDA's March 27, 2013, policy memo states,

"USDA encourages the use of salad bars in the school meal programs...schools with salad bars offer a wider variety of vegetables and fruits than other schools. Salad bars have the potential to improve nutrition and encourage the consumption of fruits, vegetables, and legumes. In addition to the nutritional benefits, salad bars may lower plate waste in school feeding programs.

There are many ways that salad bars can be incorporated into the reimbursable meal. Salad bars can feature a special fruit and vegetable theme, a baked potato bar, or a side salad. Salad bars can be set up in a variety of ways, including preportioned and prepackaged food items to emulate the grab-and-go concept to accommodate a high volume of students in a short period of time."<sup>5</sup>

Schools have taken different approaches to ensuring their salad bar lunches are counted correctly. Some schools prepackaged salads in serving sizes that meet the USDA criteria. Others have staff at the salad bar serve students appropriately sized servings, whereas others allow students to serve themselves by using ladles or other utensils that hold a single serving of a particular fruit or vegetable.

In Riverside, California, salad bars contain all components required for a reimbursable meal—meat or meat alternative, vegetable or fruit, grains or breads, and milk. Kids serve themselves with a *spoodle* (a combination spoon and ladle), which holds a full serving. An adult monitor at the point of sale, which is at the end of the salad bar, ensures kids have taken what they need.

The USDA also permits schools to select alternatives to counting servings at the point of sale. Schools may request the state's permission to use an alternative the school develops, or they may use an alternative that the state has developed and preapproved.<sup>5</sup> Cincinnati schools make sure kids meet the reimbursable meal criteria before they even reach the salad bar. Jessica Shelly says, "Kids get offered two half-cup servings of vegetables, like mixed greens, at the main line, so I know they have the minimum before they even get to the salad bar. With this method you can even put the salad bar after the cashier. The cashier ensures the three components, and then the child gets an empty bowl for the salad bar."



## How can you maintain the safety of school salad bars?

There is risk to be managed anytime food is provided in an institutional setting, whether it is by salad bar or by serving other foods on the hot line. Safe food handling practices should always be followed.

There are important steps that can be taken to maintain the safety of school salad bars:

1. **Apply food safety principles.** Schools use standard operating procedures (SOPs) based on Hazard Analysis and Critical Control Points (HACCP) guidelines to minimize risk, and these SOPs can be adapted to include procedures for salad bars.<sup>12</sup>

Because local food safety regulations that help determine school SOPs vary from jurisdiction to jurisdiction, food service directors should talk with their local food safety official to find out what concerns they might have.

For an example of SOP safety methods for salad bars, below is a list based on one used by Jessica Shelly in Cincinnati. For more complete lists, go to *Handling Fresh Produce on Salad Bars*<sup>13</sup> or *Tricks of the Trade: Preparing Fruits and Vegetables*.<sup>14</sup>

- **Long tongs.** Salad bars in Cincinnati schools use longer tongs with 13-inch handles and quarter size pans instead of half pans. This ensures that the handles of the tongs do not slide into the food.
- **Use one side of bar.** Students are sent down only one side of the salad bar, and the back row of the bar is kept empty. This keeps kids from reaching across the food in front to grab items from the far side. Note that this solution might not work in schools that need to use both sides of the bar to keep students moving rapidly through the lunch line.
- **Keep condiments in preportioned packets.** Keeping condiments in packets prevents a lot of unnecessary contact with squeeze bottles.
- **Handwashing.** Allow students to wash their hands before moving through the lunch line. Keeping hands clean by washing hands with soap and running water is one of the most important steps to avoid getting sick and spreading germs to others. Alcohol-based hand sanitizer that contains at least 60% alcohol is a good follow-up to hand washing. Sanitizers can reduce the number of germs on hands that are not visibly dirty, so consider having hand sanitizer stations next to the salad bars.

Of course, standard food safety measures also apply to salad bars. These include maintaining temperatures in a safe range, hand washing for food preparers, preventing bare hands from touching ready-to-eat foods, and cleaning produce by rinsing instead of soaking to avoid transferring germs from one piece of produce to another.<sup>15</sup> Electrified salad bar units can maintain safe temperature indefinitely, and certain other units can hold safe temperatures for at least 4 hours.

Although there are no national guidelines that prevent elementary students from using self-serve salad bars, there may be food safety regulatory requirements in your district regarding school salad bar use that may be confusing to you and your staff, or may even pose a barrier. School districts should check for local regulations with their state or local food safety regulatory program. If your food regulatory requirements present a barrier to the use of salad bars, then speak with your food safety office to discuss what you might be able to do to bring salad bars into your schools. Work with your food safety officials to better understand what you can do, how you can do it safely, and to potentially understand if you could request a waiver to certain requirements on the basis of your specific circumstances.

2. **Consider prepackaged salads.** Some schools prefer to minimize risk from self-service by providing premade, prepackaged salads.

Angela Fraser, food safety specialist at Clemson University, says, "Some districts started to make nice salads and put them in plastic clamshell containers. Food service feels that gives them much more control over prices and presentation. They change up the ingredients based on what the kids want."

To help increase the appeal of the salads, give them creative and descriptive names, such as Mexican Fiesta Salad or Chicken and Corn Confetti Salad.

3. **Train staff in food safety.** When salad bars are new to a school, staff must be trained on how to prepare and serve the produce. The Chilton District in Wisconsin retrained food staff to handle fresh produce.

Many food service staff say it is essential to get the food service staff well-trained and excited about salad bars. Jessica Shelly in Cincinnati says, "At the beginning, I was afraid they would be resistant, but they were appreciative because it took much less time to set up the salad bar compared to making veggie trays or preparing chef salad."

In addition to training all staff who prepare and serve the salad bars on safe handling practices, consider having a kitchen manager get food safety certified. Having food safety certified kitchen managers can play an important role in the prevention of critical food safety violations, and they can serve as better on-the-job trainers for staff.<sup>16</sup> There are currently [four accredited programs](#) through the American National Standards Institute (ANSI), Conference for Food Protection (CFP).<sup>17</sup>

4. **Train the students in food safety.** Training students in good etiquette is essential. Angela Fraser, who has a PhD in food science with a focus on public health, says, "Ideally, what we want is to make sure students are washing hands. If they're sick, they don't have self-service opportunities, and if they are self-serving, then they're supervised."

Jessica Shelly in Cincinnati says, "We made a homeroom PowerPoint presentation and a video on how to use salad bars. Kids love the video because teachers are doing all the wrong things, and kids are doing it right. Most schools want to start with high school students, but we started with elementary to indoctrinate healthy eating habits as early as we could, and the little kids do fine. The number one offenders are the teachers, who walk by, pick up a cucumber slice, and pop it in their mouth. Kids more follow the rules."

Many schools train students on salad bars before the one in the cafeteria is used. Rodney Taylor in Riverside says, "We make sure kids are ready to go by training ahead of time with an abbreviated salad bar in the multipurpose room. We run through three classrooms at a time in 15-minute intervals so the kids get accustomed to using the salad bar. Teachers train the kids ahead of time on etiquette, so, for example, they know if someone drops something on the floor, to leave it alone so staff can pick it up."

Once the students are using the salad bar, use signage with pictures to remind them about the rules for using the salad bar. The list below is an example of salad bar etiquette from *Tricks of the Trade: Preparing Fruits and Vegetables*.

5. **Monitor the students.** Adult monitors can make sure students are practicing safe behaviors, encourage them to try new foods, and ensure they are taking quantities that qualify for USDA reimbursement. Monitors can remove food or utensils that may have been contaminated. Monitors can even serve kids what they want from the bar, thereby reducing the potential for contamination.
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There's a trade-off between the benefits of monitors and the costs. Some schools provide a dedicated monitor for the salad bar, whereas other schools require their monitors to do double duty, such as operating the cash register. Some schools use parent volunteers, although in some locations, personnel who are not certified in food safety are not allowed to act as monitors. Check with your local and state food regulatory agency. The [FDA Food Code](#) requires monitors to be food employees, trained in safe operating procedures for salad bars. If this is the requirement in your district, speak with your food safety office to discuss what you might be able to do to bring salad bars into your schools. Work with your food safety officials to better understand what you can do, how you can do it safely, and to potentially understand if you could request a waiver to certain requirements on the basis of your specific circumstances.



### Salad Bar Etiquette for Kids<sup>13</sup>

1. Always wash your hands first.
2. Use utensils. Never use your fingers.
3. If a utensil or plate falls on the floor, don't put it back. Tell a cafeteria person.
4. Don't taste food items at the salad bar.
5. Take a small amount of new foods to try.
6. Take only what you can eat.
7. Don't bring food back to the salad bar.
8. Don't put your head under the sneeze guard or food shield.
9. Ask a friend or a cafeteria person to help if you can't reach.
10. Always be polite in line. Wait your turn.
11. Always use a clean plate for seconds.

## How much staff time will it take?

The amount of time needed to set up and manage a salad bar will vary depending on a school or district's situation. Typically, salad bar efforts start small, and then with success grow to include more types of fruits and vegetables, more nutrition education and community involvement, and often connect to a farm-to-school or school garden program.

There are three considerations related to the amount of staff time needed:

- Food preparation.
- Monitoring.
- Education and outreach.

### Food preparation

Many schools start their salad bar efforts with small changes, such as adding more vegetables or fresh fruit to the existing serving line. This would likely require little or no additional staff time. Once a school has seen success in a small way, it may be ready to commit more staff time.

Other schools plunge right in from the beginning by purchasing or acquiring a dedicated salad bar that requires many more fruits and vegetables. More produce may require more prep time, although time can be saved by using prewashed and precut produce. Jean Saunders in Chicago says, "We have so many schools, and each situation is different. Typically, prepping for a salad bar does take a little more time, but many of the products come precut, and it's safe to say that prep time is not a major barrier for us."

Sandy Curwood in Ventura says, "Yes, our staff are doing more prep, which means more skilled staff. Because this means more time for union workers, the union supports the salad bars. The money goes locally for produce and to support the local economy by paying staff. If you step back and look at the bigger picture, it's a better business model."

Christine Mitnacht, food service manager for the Chilton, Wisconsin, schools says, "Staffing the salad bar is not an issue. It takes 2 hours per school facility per lunch to prep the salad bar. All kitchen staff are trained on how to do it, and they rotate through positions."

Jessica Shelly in Cincinnati says that once a salad bar is in place, she saves half an hour to an hour a day in preparation time that can be used for other things, such as prepping more entrees.

### Monitoring

In some schools, monitoring is done by a staff person on the line who can observe the salad bar but is not dedicated to the salad bar, such as a cashier. This will not add much staff time.

Other schools provide a dedicated monitor who helps with serving. Riverside, California schools use dedicated monitors. The food service director says, "We need at least one additional 3-hour person per salad bar. This costs us \$5,100 per year, but this is offset by reduction in waste because kids are choosing their own meals, instead of having stuff forced on them that they don't want."

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## Education and outreach

Some districts choose to devote substantial staff time to building nutrition education programs beyond just their salad bars. Staff may create educational materials, lead field trips to farms, or organize school visits by farmers. Staff are needed for such programs, whether they are shifted from other duties, hired specifically for the program, or are college interns or other volunteers. One benefit of salad bar programs can be job creation. The Santa Monica-Malibu Unified School District reported that they reorganized their staff and were able to add a permanent salad bar program coordinator position. They also found grant funding to support five site-coordinator positions and line-worker positions.

## Do school salad bars cost more?

When considering a salad bar, schools may be concerned about costs. Jessica Shelly from Cincinnati Public Schools found that adding salad bars keeps “costs the same or slightly less.” Her cost per meal did not change between schools with salad bars and those without. She says, “Instead of employees making chef salad every day, they just give the kid a plate. So the produce cost increased, but labor dropped, and they balanced out. All foods from the salad bar are discarded after lunch, so we worked hard with staff to control amounts prepared.”



### Save Money by Buying Locally

*“We have a limited budget to spend on meals, so whenever economically feasible we purchase local. We’re able to take advantage of opportunity buys. Two years ago there was a big glut of fall peaches in Michigan. They were small, which was perfect for us, but not for retail. So we got them for a good price, and the kids had fresh peaches for the first time. They said, “Hey, we didn’t know peaches had furry skin!” Two years ago there was a glut of apples, and we got them cheap, and it was win-win because the farmers made more than they would have selling for juice.”*

—Jean Saunders in Chicago

*Salad Bar—The Lunch Box Guide*<sup>22</sup> says that “it’s not uncommon to experience a 2 to 4-fold increase in produce purchases.” The good news is that the guide goes on to say this increase can be more than offset by reductions in ready-to-heat and *a la carte* food purchases.



## Do salad bars work in cold climates?

Some people have said, “It’s easy for schools in California to get local produce year-round, but we live where the growing season is short.” Fortunately, even in cold climates, creative food service directors ensure salad bars work well year-round. Options include:

- Purchasing out-of-state salad ingredients from distributors.
- Freezing local produce in season.
- Shifting the type of produce offered in the off-season.

Chartwells, the contractor that provides food service for most Chicago schools, augments produce from out of the area with locally grown fruits and vegetables that are harvested at peak ripeness and flash frozen for winter. They work with processors who purchase from local farmers and freeze carrots, peas, corn, beans, and squash. Jean Saunders says, “The advantage to working with local farmers is that the frozen vegetables are higher quality than we could purchase elsewhere. Our contracts specify that the produce be picked when it’s ripest and frozen within 48 hours. In season, we have a big commitment to local apples, peaches, plums, potatoes, peppers, and spinach.”

In Burlington, Vermont, the Director of Food Service, Doug Davis, lives on a farm. Not only does the Burlington district purchase from local farmers, but they have several school farms. High school culinary students harvest strawberries and broccoli in summer to be frozen for winter use. Doug says, “The frozen broccoli’s color is good and appealing to the kids. Our produce bounty is in summer before schools are open, so we try to grab that bounty and preserve it. Every school now has an herb garden, which is easy to grow, and we harvest the herbs and dry them. We even have a windowsill herb garden in winter. When the kids help grow the herbs, when they see them in food, they’re more likely to try the food.”

## CHAPTER 2: KEY POINTS

- Strategies, such as taste testing, gradual introduction of new foods, placing the salad bar at the beginning of the lunch line, and incorporating foods into nutrition education and field trips can help encourage students' use of salad bars.
- Food safety concerns for salad bars can be addressed by using appropriate food handling procedures and by training students and staff on the correct use of self-serve salad bars.
- Additional staff time may be needed for food preparation, monitoring, and nutrition education. Staff time can be secured by adding job responsibilities to existing staff, securing volunteers, or creating new jobs.
- Salad bars may cost the same or less than existing food service options by generating more revenue in school lunch, by buying local produce, and by ensuring reimbursement from USDA.





# **Chapter 3: How to Promote and Support School Salad Bars**





## How to Promote and Support School Salad Bars

Now that you know some of the common concerns around school salad bars and how to address them, this chapter will provide ideas about how state health departments can promote and support school salad bars.

### Talk with people about school salad bars

The first and easiest thing you can do to champion school salad bars is to talk with people to get the lay of the land. Who are the key players, and what are their attitudes toward school salad bars? Are they supportive, neutral, or opposed? Are they willing to help? How can they help?

Look for opportunities to bring up school salad bars at meetings, trainings, and conferences. You can contact key people to meet with them specifically to talk about salad bars, or let them know you would like to add salad bars to the agenda of a meeting set for another reason.

You can approach this systematically by making a list of people who you think could help or who are in positions to make decisions about salad bars. Good people to start with are those with whom you already have relationships.

To help you make the list, you can ask yourself the following:

- **Who in my health agency works in nutrition or with schools?**  
These could include CDC-funded nutrition, physical activity, and obesity staff, fruit and vegetable coordinators, food safety staff, maternal and child health (MCH) directors, CDC-funded school health staff, and SNAP-Education program staff.
- **Who in my health agency works on food safety?**  
Ensure your food safety staff are on board. Food safety staff (or sometimes known as environmental health staff) may or may not be supportive of school salad bars because they are concerned about food safety in schools. Engaging this group early in the process can help identify potential barriers and discuss potential solutions.
- **Who in the state department of education influences school lunch?**  
These could include child nutrition directors or CDC-funded school health staff.

Other possible contacts include:

- People associated with local schools, including food service directors who have successfully implemented salad bars, school boards and administrators, parent-teacher associations, school health advisory councils, and school nurses.
  - Organizations your health agency is involved with, including Cooperative Extension, Supplemental Nutrition Assistance Program-Education (SNAP-Ed) providers, CDC-funded school health, or childhood obesity prevention working groups.
  - Professional associations, such as school food service associations, school nurse associations, and school health associations.
  - Farmers markets, the state fruit and vegetable growers association, farm-to-school programs, a school garden program, and grocery vendors.
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## How to get the most out of your conversations

- 1. Know key information, and prepare talking points.**

To convince doubters that school salad bars are a good idea, you need to know key information about why salad bars are important and how they can be implemented. The information in this guide will give you the background information you need and can help you think through how you would answer some of the common concerns.
  - 2. Making the first contact.**

There may be some people on your list with whom you have worked before and others that you have identified as key players with whom you do not already have a relationship. In either case, how do you approach them for a meeting? Consider what might be a mutual interest for both of you.

    - You could contact the person and say, "I'd like to talk with you about the new school lunch requirements and offer some ideas that could help make sure your lunches meet them."
    - If you are approaching someone from the education world, you could say, "I work in the health department, and I think we have a mutual interest in the health of our kids. Schools cannot achieve their primary mission of educating students if kids are not healthy. School salad bars are one way to give students access to healthier foods in school. Could we set up a time to talk about how we can serve our mutual interests together?"
  - 3. Speak their language.**

Once you are talking with someone, they will be more receptive to your information if you speak in their language and are willing to listen and learn about their concerns. For example, resistance from food safety staff can be reduced by having an early face-to-face meeting that clearly lays out the salad bar plan. In this meeting, be sure to provide details and speak in their language. Include the following information in your initial meeting with them:

    - i. The facts about the benefits and safety of school salad bars.
    - ii. Discuss possible operating procedures for the salad bar with him or her. Include the plans for how the food will be dispensed at the salad bar, if children will serve themselves, and how the salad bar will be monitored and by whom.
  - 4. Seize opportunities.**

As you talk with people, look for opportunities to collaborate. Can you work with them on a training or fact sheet? Would they be open to forming a task force with people from other organizations to work on school salad bars, or more broadly on obesity? Can they recommend other people whom you should talk with?
  - 5. Follow up.** Keep a record of the meeting with notes, and list follow-up steps. Write a thank you note, or e-mail afterward when you can include supporting materials.
-

## Beyond talking one-on-one: other ways to share information

### Fact sheets and articles

One way to reinforce your message is to give people fact sheets, and another is to place articles about school salad bars in publications, such as newsletters, where they can reach a larger audience.

Missouri placed well-designed fact sheets tailored for the newsletters of specific professional audiences. A one-page fact sheet called, “Top 10 Reasons to Use Salad Bars in Schools,” was distributed by the Missouri Association of Rural Educators and Missouri Council of School Educators. Similar articles with salad bar messages were published in the *Missouri School Nurses Newsletter*, the *Missouri School Nutrition Association Newsletter*, the *Missouri Farm to School Newsletter*, and the Missouri Parents and Teachers Association website. The article for the PTA was called, “Kids Love Choice!” and said, “What mom doesn’t want her child to eat more vegetables? Salad bars are a proven method for making this happen—mostly because they allow kids to make their own choices about what and how much they put in their salad bowl.”

Rather than creating brand new fact sheets or articles to include in your communication channels, consider pulling from resources already available from other sources, such as the [Let’s Move Salad Bars to Schools \(LMSB2S\) website](#) and the [Association of State Public Health Nutritionists \(ASPHN\) website](#). You can find helpful resources to build the case for school salad bars, such as fact sheets, videos, and activity guides. A number of states have also created tools that might be useful to you. All of those are listed in the resources section, but a few to highlight are:

- [Safe Use of Salad Bars in Schools](#). This modifiable fact sheet from ASPHN answers many of the common questions and concerns public health staff encounter when they are trying to implement salad bars in schools. The fact sheet covers such topics as relevant federal, state, and local guidelines and codes; salad bar food safety; and standard operating procedures for salad bars.
- [LMSB2S Parent Tool Kit](#). The resources on the LMSB2S website provide a top 10 list of reasons to have a salad bar, common questions and answers about salad bars, a sample letter to a school district, and other relevant background information.
- [Salad Bars—The Lunch Box Guide](#). This is a handbook that food service personnel can use to establish salad bars in their schools. It covers everything from the benefits and drawbacks of different types of salad bars, to setting up health and food preparation procedures, purchasing strategies, marketing, and student training.

### Make presentations and conduct trainings

You could start giving presentations to groups by adding salad bar talks to trainings and conferences that are already planned. To save time, with permission, you can adapt materials from existing presentations that others have given, some of which are referenced in the Appendix.

In Iowa, Kathy Simmerman and colleagues with the School Nutrition Association of Iowa presented information to 275 school food service personnel at their Fall Nutrition Workshop about how to implement salad bars. They plan to reinforce their messages by distributing a salad bar video to people who participated.

In Arizona, Cynthia Melde and colleagues at the Arizona Department of Health Services presented a salad bar training at the School Nutrition Association of Arizona Conference. They also held a webinar that was recorded and posted online. These trainings reached school health partners, state agency representatives, and 100 food service directors serving 248,728 students in Arizona.

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## Stories from the field

This section shares some stories from the field to give you ideas about how you can work with others in your state or districts to place more salad bars in schools.

### Salad bars as part of nutrition education

Creative and committed food service directors and school staff throughout the country have put salad bars in their schools and are reinforcing them with nutrition education. Many schools with salad bars have farm-to-school programs, school gardens, taste testing, and nutrition education programs to support salad bar efforts. These schools have noted that when kids get hands-on experience with a farm, they are excited about trying the vegetables they have seen growing, and may be more willing to try new foods in the cafeteria.

### Teaching About Eating

Rodney Taylor, director of food services in Riverside, California, has been implementing school salad bars for 16 years. He's on a mission to help his kids, 70% of whom qualify for free or reduced price lunches. He said, *"We've got farmers and chefs in the classroom, and our entire program teaches kids to be lifelong healthy eaters. It's not enough just to have healthy food; they need to know why and what to eat. We see a big carry over outside the school. Parents tell us their kids want them to change what they buy. Our district's nutritionist partners with the medical center to teach parents how to feed their kids. At all levels, from prekindergarten to grade 12, we're doing nutrition education."*

Sandy Curwood, Food and Nutrition Services Director and registered dietitian in Ventura, California, said, *"We see school lunch as part of the education system. Not only do we use produce from local farms in the cafeteria, the Farm-to-School project has nutrition educators and garden experts that tie into the curriculum, giving kids nutrition education and gardening lessons. The cafeteria becomes a practical learning lab. We ask the students, 'What nutrients do you get from that? Which farmer grows it, and when is it in season?'"*

### Food safety fact sheet in Minnesota

Lisa Gemlo found that one of the biggest obstacles to getting salad bars in Minnesota schools was that food service workers believed state and local environmental health experts were telling them salad bars are not safe or were not allowed.

Lisa decided that the best fix was to convene environmental health experts to develop a fact sheet that would make clear that health codes allowed salad bars with proper procedures.

At first, Lisa was stymied because she did not have relationships with the health department's environmental health experts, and she was turned down by the first people she approached. Success came when she contacted a health department staffer who had attended one of Lisa's training sessions for *Produce Safety University*.

When Lisa met with her, the staffer said that both environmental health staff and food service staff needed clear information, and that a fact sheet would help. The staffer volunteered to draft the fact sheet, which eventually was approved for distribution after input from the Department of Agriculture, the University of Minnesota Extension, the Environmental Health Division, and other partners from around the state.

## Fact sheets and a video in Missouri

Pat Simmons in Missouri worked with the University of Missouri extension, the Department of Elementary and Secondary Education, and the Parent Teachers Association on projects that included fact sheets, trainings for food service employees, a video about salad bars, and a survey of parents' attitudes toward salad bars.

Pat said, "It was easy to include the University of Missouri extension because we've worked with them on many projects. When it came time to do the salad bar video, we knew that extension was already doing a farm-to-school film and had a team out interviewing food service directors. So it was simple to ask them to add a few questions about salad bars to their interviews."

When it came time to doing the survey of parents, Pat reached out to the president of the Missouri PTA, someone whom she did not previously know. Pat said, "I didn't have to work hard to convince her to help. She's on board with creating healthy environments for kids, and that's a big push for the PTA. Plus, I have credibility coming from the department of health."

Because she was asking the PTA to do work, Pat wanted to sweeten the pot. She said, "I offered to develop an article for their website, so I had something to offer if they helped me distribute the survey. So I wasn't just asking for a handout, but giving them something to benefit them, too."

## An evaluation of salad bars in three school districts in Wisconsin

Amy Meinen from the Wisconsin Department of Health Services worked with a consulting firm to do an assessment of three school districts that were at different stages of offering salad bars: the Chilton District offered salad bars with local produce every day to all ages of children; the Slinger District offered a salad bar without local produce every Friday; and the Cambridge District did not have salad bars, but had begun to offer locally grown produce in its lunch program.

The project helped identify many activities the state health department can do to promote school salad bars, such as offering trainings to food service staff on safe food handling. It also identified practical tips from Chilton, the district with daily salad bars.<sup>18</sup>

## Keys to success

States that have made progress in promoting, marketing, and implementing school salad bars have found certain keys to success that may be helpful to others that would like to do the same. These include:

- ✓ **Sometimes it is easier and faster to partner with people you already know.** Your success might depend on taking advantage of your existing relationships. If you have worked with people before, you know and trust each other. One Fruit and Vegetable Coordinator found it easy to enlist her state's Child Nutrition Program Director because they had previously worked together in the Department of Health, whereas another coordinator found it easy to set up a joint project with a colleague who was also a workout buddy.
  - ✓ **Don't be afraid to make new contacts.** Pat Simmons in Missouri had success with her school survey because she reached out to the president of the PTA, someone she did not know. Lisa Gemlo enlisted a key partner on her food safety fact sheet project by cold-calling a food safety expert in her own department of health. Jack Ferreri in Wisconsin said, "When you're talking to someone for the first time, what you really need is to give them a sense of your personality, and establish trust. You need to put people at ease, let them know that you're a good person, that they're a good person, and, 'Hey, let's talk about how we can do some good work together.'"
-

- ✓ **Think about nontraditional partners.** Pat Simmons said, “We found that school nurses were unexpected allies and champions. I have a good relationship with our department’s state school health coordinator, and one of her charges is to be the contact for school nurses. She helped me reach out to school nurses. I found they’re very focused on physical activity and nutrition, and they’re advocates in the school.” As a result, Pat was able to place a salad bar article in the *Missouri School Nurses Newsletter*.
- ✓ **Enlist champions.** As you are contacting people to talk about school salad bars, look for those who share your passion and have the knowledge and expertise to be respected leaders. In Salem, Oregon, Joyce Dougherty, the Child Nutrition Program Director, has a public health nutrition background and is leading her department by providing culinary trainings for food service workers on how to cook foods like winter squash, kale, and eggplant with recipes that are “child-friendly.” In Riverside, California, Food Service Director Rodney Taylor is an articulate spokesman for salad bars who often shares his successes with other food service personnel.
- ✓ **Fit salad bars into existing work.** It will be far easier to fit salad bars into existing work, both your own and your partners’, than starting entirely new projects. Examples from the above success stories include adding salad bar presentations to trainings that have already been planned, adding a salad bar fact sheet to a series of farm-to-school fact sheets, and adding salad bar interview questions to a video production about farm-to-school.
- ✓ **Find ways to show people that salad bar work fits their job description.** Overworked people in your own or other organizations will be leery of committing to yet one more task. When you suggest a joint project, the trick is to make the project seem doable and in line with their work priorities. For example, the agencies in charge of school lunch might still be trying to adjust to the new USDA nutrition regulations. If you can find a way to show them that salad bars are a good way to help schools meet the new regulations, they might help to get the word out to schools.
- ✓ **Seek to understand before being understood.** Lisa Gemlo stressed, “I needed to acknowledge their workloads, their priorities, and their concerns with the topic area before I could break down the barriers.”
- ✓ **Offer something when you want help.** Pat Simmons in Missouri had a better chance of getting the PTA president on board when she offered to write them a newsletter article.
- ✓ **Be persistent.** Do not get discouraged by obstacles. Lisa Gemlo did not let initial skepticism from food service workers stop her from spreading the word about salad bars. Instead, she used it as inspiration to tackle the challenges food service staff were facing.
- ✓ **Determine if it’s better to work top-down or bottom-up.** In some states with central control, school lunch policies can be set at the state level, so you can be most effective focusing there. In other states, each school district sets its own policy within the requirements of reimbursable meals. In that case, you might need to take a bottom-up approach, possibly by working with pilot school districts and showing their successes to other schools.





## Activities to Promote and Support School Salad Bars

- Network with other agencies and individuals to discuss school salad bars.
- Encourage other agencies and organizations to incorporate salad bars into their work plans.
- Pass out fact sheets at meetings or workgroups.
- E-mail fact sheets to relevant individuals and groups.
- Offer to write a newsletter for an e-mail blast or other publication to food service personnel, food safety staff, school nurses, or parents.
- Conduct a presentation on the benefits of school salad bars at relevant meetings.
- Conduct a training on the benefits of salad bars and overcoming barriers with audiences in your state.
- Research successful salad bar initiatives among school districts in your state, and write a brief summary to share with other districts and state level staff.
- Set up a Web page with school salad bar resources and stories from the field.
- Conduct a survey of school staff or parents to determine the challenges and support for school salad bars.
- Search for and distribute funding opportunities to schools and districts.

## CHAPTER 3: KEY POINTS

- Make a list of people who might be able to help you with your salad bar efforts or who are in positions to make decisions about school salad bars. This could include people at the state level, such as school nutrition professionals, school health staff, or food safety professionals.
- Go beyond state level staff to secure allies at the district, school, and community levels, such as school health advisory councils, parent-teacher associations, community farmers markets, farm-to-school programs, and local businesses.
- Be prepared with talking points, make sure to speak the other person's language, and consider the issue from their perspective.
- Leverage the partnerships and relationships you already have, and consider ways you can collaborate with others to jointly help spread the message that school salad bars are one way to increase fruit and vegetable consumption.
- Seize opportunities to build salad bar discussions into existing workgroup meetings, presentations, and trainings.
- There are a variety of things you can do to help educate people about school salad bars and to build momentum for this movement. Some tasks will take less time, and others will take more. Examples include fact sheets, e-mail blasts, newsletter articles, presentations, trainings, developing success stories, Web pages, and seeking funding opportunities.



# **Chapter 4: Evaluating Your State's School Salad Bar Efforts**





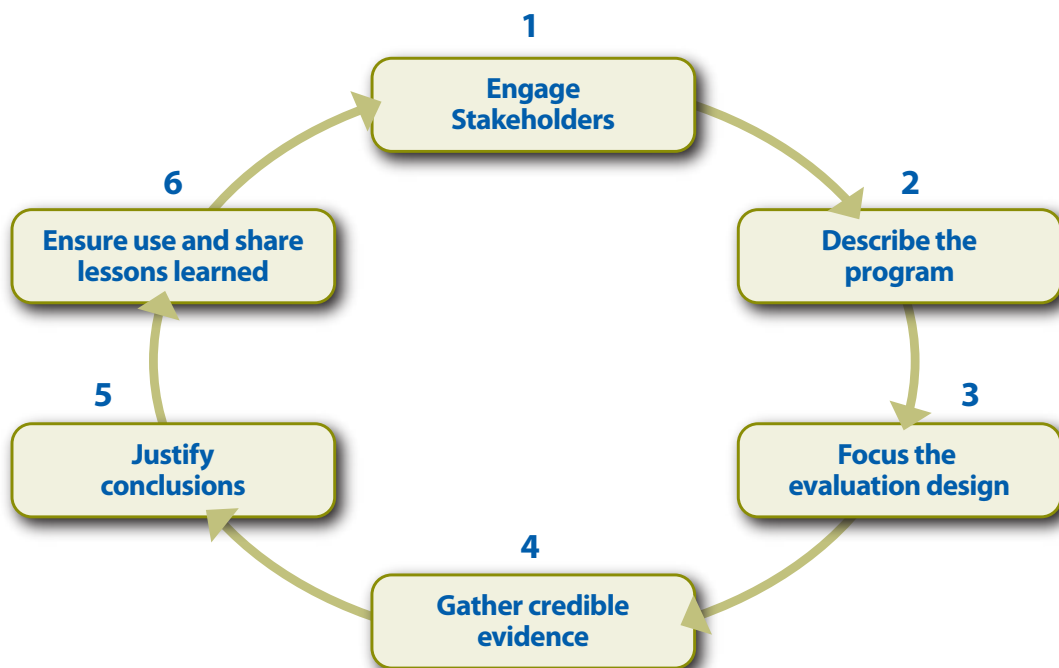
## Evaluating Your State's School Salad Bar Efforts

Many types of activities you could do to help promote, support, and market school salad bars in your state were presented in the previous chapter. Evaluating these projects is also important. Some of the reasons to evaluate your projects include:

- **Program improvement.** Evaluating your projects as you go will help you find out midstream if you are off course so you can make timely corrections. It will also help you determine what worked well and what did not so your next project will be even better.
- **Demonstrating impact.** Evaluation will help you determine and document whether you achieved your desired outcomes. For example, if you create and distribute a fact sheet, you want to know if it influenced people's knowledge and attitudes. If you are evaluating a school district's salad bar program, you want to know if it increased fruit and vegetable consumption among students. Once you have shown that your activities have had an effect, you can share your program with others who might want to replicate it.
- **Accountability.** Many funders expect or require evaluation of projects they fund. By evaluating, you demonstrate to your partners, stakeholders, and funders that you were able to accomplish what you intended to do.

Make sure to plan for your evaluation efforts at the beginning, at the same time as you are planning your project activities. This will allow you to collect the information you need to evaluate your program in a timely, efficient way. If finding existing staff time to conduct evaluation is challenging, consider hiring a contractor to help you implement evaluation activities. You might also seek out low-cost or free sources of evaluation assistance through a local university, such as graduate students who might need to fulfill a certain number of practicum hours in their community.

[CDC's Framework for Program Evaluation in Public Health](#) provides a list of six steps to effectively evaluate public health programs. In this chapter, these six steps will be discussed in the context of evaluating school salad bar efforts in your state. The steps are:



## Step 1: Engage stakeholders

Stakeholders are much more likely to buy into and support your evaluation efforts if they are engaged in the evaluation process from the beginning. Moreover, to ensure that the information collected, analyzed, and reported meets the needs of the program and stakeholders, it is best to work with the people who will be using this information throughout the entire process.

If you have a workgroup or coalition at the state level working on school salad bars, be sure to involve them in your evaluation efforts. A number of possible stakeholders related to school salad bars were identified earlier. Some of these at the state level might include:

- CDC-funded nutrition, physical activity, and obesity staff.
- Maternal and child health (MCH) directors.
- CDC-funded school health staff.
- SNAP-Education program staff.
- Food safety or environmental health staff.

Your stakeholders should be included in every step of the evaluation framework. They can help in developing the logic model, identifying evaluation questions, collecting and analyzing data, interpreting findings, and disseminating results.

## Step 2: Describe the program

Describing the program includes developing a logic model. This will set the stage for identifying the evaluation questions and focusing the evaluation design. A logic model visually shows the link between activities and intended outcomes. It is helpful to review the model with your various stakeholder groups to ensure a shared understanding of the model and the program.

Logic model elements include:

**Inputs:** Resources necessary for program implementation.

**Activities:** The interventions or activities that the program implements to achieve health outcomes.

**Outputs:** Direct products obtained as a result of program activities.

**Outcomes (short-term, intermediate, long-term):** The changes, effects, or results of program implementation.

A good logic model will help you determine what to evaluate and when on the basis of the maturity of your program. For example, if you are just starting to do some salad bar work in your state, you will likely want to evaluate the activities column of your logic model.

You may already have a logic model for your program that includes school salad bar work. If not, you may choose to adapt the logic model included in Appendix 1 to develop and evaluate your own state's efforts to promote and implement school salad bars. The attached logic model provides suggestions of inputs and activities that may describe your program's context and projects, but be sure to adapt it on the basis of your program. Ensure that your outputs and outcomes align with your specific proposed activities.

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Once you have developed a logic model, you can update it any time to reflect changes in your program or your desired outcomes. You should review and update your model regularly as you identify new roadblocks and opportunities.

### Step 3: Focus the evaluation design

After developing your logic model, you should focus your evaluation design. The amount of information you can gather about your program is potentially limitless. However, evaluations should be restricted by the number of questions that can be realistically asked and answered, the methods that can be used, the feasibility of data collection, and the available resources. Be sure that your evaluation is focused on information that will be used by the program, stakeholders, and decision makers. Your logic model will help you develop your evaluation questions.

#### Process Evaluation

*Process evaluation questions* measure the inputs and activities of a program. Process evaluation will help determine how well your program was implemented. In general, process evaluation focuses on the first three boxes of the logic model: inputs, activities, and outputs.

Examples of salad bar process questions might include:

- What partners agreed to be part of your salad bar work?
- How were materials disseminated to the salad bar working group, and how often did you meet?
- How many fact sheets did you distribute?
- How many hits did you get on your new salad bar website?
- How many requests for technical assistance have you received?
- How many food service workers did you invite, and how many did you train?
- Did the participants of your training find the training helpful?

#### Outcome evaluation

*Outcome evaluation questions* ask whether your project achieved the desired outputs and outcomes specified in your logic model. This typically means measuring changes in knowledge, attitudes, skills, behaviors, and health outcomes of the target population. Outcome evaluation focuses on the last three outcome boxes of the logic model: short-term, intermediate, and long-term outcomes.

Examples of salad bar outcome evaluation questions might include:

- How many schools in our state have salad bars?
  - Did any additional schools in our state set up a salad bar after our presentations or trainings?
  - Have any new state or district policies been passed that support salad bars?
  - Has there been an increase in school lunch participation in schools with salad bars?
  - Have schools with salad bars seen any increases or decreases in their revenue?
  - Was there a change in the amount of fruits and vegetables consumed by students in schools with salad bars?
-

## Step 4: Gather credible evidence

Now that you have solidified the focus of your evaluation and identified the questions to be answered, it is time to select the appropriate methods that fit the evaluation questions you have selected. You might choose to use a mixed methods approach (i.e., both qualitative and quantitative methods) to help you tell the story of what's happening in your state around school salad bars. The qualitative data may help provide value, understanding, and application to the quantitative data collected.

On the basis of the methods chosen, you may need a variety of data sources, such as interviews, focus groups, and surveys. Data may come from existing sources (e.g., School Health Profiles, Youth Risk Behavior Surveillance System) or gathered from program-specific sources (either existing or new).

Consider the pros and cons of each method. For example, the use of existing data sources may help reduce costs, maximize the use of existing information, and offer the ability to see trends over time; however, these data sources may not be specific enough to your state's program or context. Before collecting data, be sure to understand and follow relevant local, state, and federal rules related to research and confidentiality.

### Tap into existing data sources

Some data relevant to school salad bars may already be collected in your state. To assess the number of school districts that require or recommend salad bars and the number of schools that actually have salad bars in your state, you might use the following CDC survey:

- The *School Health Profiles* (Profiles) is a system of surveys conducted every 2 years assessing school health policies and practices in states, large urban school districts, territories, and tribal governments. The 2012 school-level questionnaire asked if the school offers a self-serve salad bar to students. The school questionnaires went to a representative sample of public middle schools and high schools in participating states, territories, tribal governments, or large urban school districts.

To determine how many servings of fruits and vegetables students are consuming per day and if there is any change in consumption over time, you might use data collected by this CDC survey:

- The *Youth Risk Behavior Surveillance System* (YRBSS) monitors six types of health-risk behaviors that contribute to the leading causes of death and disability among youth and adults. It includes a national school-based survey conducted by CDC and state, territorial, tribal, and local surveys conducted by state, territorial, and local education and health agencies and tribal governments. It is conducted every other year among students in grades 9-12. There are indicators on the survey that measure the number of times fruits and vegetables are consumed per day.

### Collect your own data

Before collecting data, remember to be sure to understand and follow relevant local, state, and federal rules related to research and confidentiality.

#### *District or school surveys*

Although some statewide data about the number of salad bars exist, you may need to fill in gaps. For example, if you are concerned about the number of salad bars in *elementary schools*, which is not collected by the School Health Profiles, or if you want more detailed information than available through existing surveys, you may want to create and disseminate your own surveys to the schools and districts in your state. You might want to determine the number of schools that have related programs, such as Farm-to-School or that have supporting structures in place, such as school health committees. Examples of such surveys that you can use as models are listed in the Resources in Appendix 2.

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### **Interviews or focus groups**

You could develop a series of questions and set up phone interviews. You could probe further by conducting focus groups of important stakeholders.

### **Surveys with key stakeholders**

You could develop and implement a survey that would reach more respondents by using written questionnaires or by using an online service. These surveys could help determine their level of awareness about school salad bars or any perceived barriers that might exist in this population. You could also use this type of survey after conducting a training to see if the staff feel more equipped to implement salad bars as a result of the training.

Some groups you might target are:

- **Food service personnel**  
Food service personnel can be skeptical of salad bars, citing concerns, such as preparation, time, and cost. A survey could identify these and other barriers that might be addressed in training. Arizona surveyed food service personnel to ask whether their schools currently have salad bars, and, if not, then why not. They also asked whether personnel were knowledgeable about the benefits of salad bars. A link to their survey is included in the Appendix 2.
- **Food safety staff**  
Resistance from food safety staff can be a barrier. A survey can find out whether they are supportive or not, and whether they are well-informed about salad bar food safety. Minnesota created a best practices fact sheet after learning that food safety staff were unclear about the rules for implementing school salad bars.
- **Parents and teachers**  
Parents and teachers can be powerful advocates for salad bars. A survey can determine whether they are adequately informed and supportive. Missouri's Department of Health and Senior Services partnered with the Parent Teacher Association to survey parents' attitudes toward salad bars.



## Example of Process Evaluation: Wisconsin's Process Evaluation of Salad Bar Programs in Three School Districts

A process evaluation of school lunch programs in three Wisconsin school districts was conducted during 2011. The purpose was to understand how attitudes and practices determined the success of school salad bar programs. One school offered well-established daily salad bars and a robust farm-to-school program; the second offered a basic salad bar only on Fridays by using nonlocal produce; and the third did not have a salad bar.

Evaluators interviewed key food service staff in each district, and asked each food service director to answer questions, including the following:

- What food preparation methods are you using (from scratch cooking, prepackaged)?
- At what level are the menus planned?
- What is your definition of a salad bar?
- Did or do you incorporate nutrition education components into the introduction of the school meal program?
- If you do have nutrition education components, then what are examples of the activities?
- What are the biggest challenges you face with your lunch program?
- Have parents in the district voiced concerns about the nutritional quality of the lunch program?
- Do you think it's a good idea to have salad bars in schools?
- Are you aware of the fundraising tools available to earn money for a salad bar?

The questionnaires provided basic information that was further enhanced by the interviews. The information identified barriers that were keeping two of the districts from implementing daily salad bars. The district with the successful salad bar program provided advice and examples that could be used to help other districts interested in establishing or expanding salad bar programs.

### ***In-depth evaluations of school salad bar programs***

You may want to conduct an in-depth evaluation of a school or school district in your state that has implemented salad bars. This type of evaluation could help identify barriers and facilitating factors in implementing salad bars, as well as determine if the desired outcomes were met (e.g., increase in school lunch participation, increase in students' fruit and vegetable consumption). Such an evaluation could provide useful information in promoting salad bars to other school districts within your state.

If you choose to conduct an in-depth evaluation, consider adapting existing instruments to help answer your evaluation questions. Appendix 2 includes some examples of materials used by others who have done similar evaluations. In addition, the [National Collaborative on Childhood Obesity Research \(NCCOR\) Measures Registry](#) is a source of survey instruments, including a number of 24-hour dietary recall questionnaires. Similarly, the California Department of Public Health has released a [Compendium of Surveys for Fruit and Vegetable Consumption and Physical Activity](#)

## **Example of District-Level Outcome Evaluation: Riverside Unified School District Farmer's Market Salad Bar Program Evaluation**

During 2008-2009, the Riverside Unified School District worked with the University of North Carolina at Chapel Hill Center for Health Promotion and Disease Prevention to evaluate the success of a salad bar program that included 29 schools. The evaluators collected data from two schools without salad bars and from four schools before and after salad bars were implemented.

To plan the evaluation, staff developed a logic model and used it to develop six evaluation questions:

1. How is students' fruit and vegetable consumption during school lunch related to the introduction or availability of a salad bar?
2. How are students' attitudes toward fruit and vegetable consumption related to the introduction or availability of a salad bar?
3. Are student participation in school lunch, school lunch revenue, and meals per labor hour related to the introduction or availability of a salad bar?
4. What issues, challenges, or benefits do school food service staff experience when salad bars are introduced and continued in elementary schools?
5. What issues, challenges, or benefits does a nutrition services director experience when introducing salad bars into elementary schools?
6. What issues, challenges, or benefits do local farmers who provide produce for the salad bars experience when they participate in the farm-to-school program?

To find out whether salad bars caused students to increase consumption of fruits and vegetables, food service personnel and teachers administered the School Lunch Recall (SLR) to students immediately after lunch to find out how many fruits and vegetables they had eaten at lunch. To find out whether students' attitudes toward fruits and vegetables became more positive after being exposed to them through salad bars, they administered fruit and vegetable neophobia scales (FNS and VNS). The results were statistically analyzed. The evaluation also looked at food service revenue and costs both before and after the program's implementation.

The evaluation results showed that children who chose the salad bar significantly increased consumption of fruits and vegetables at lunch by half a serving. Although some increase in acceptance of fruits and vegetables in salad bar schools occurred, it could not be definitively tied to the presence of salad bars. Food costs were no greater in the salad bar schools than in the comparison schools. The evaluation found a slight increase in labor hours per meal for schools implementing the salad bar. An ancillary benefit was that the program generated revenue for small farmers.

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## Step 5: Justify conclusions

Justifying conclusions includes analyzing the information you collected, and interpreting and drawing conclusions from your data. This step is needed to turn the data collected into meaningful and useful information. Often, groups fail to appreciate the resources, time, and expertise required to clean and analyze data. If you have not yet hired a contractor or tapped into expertise from a local university, you might consider getting some assistance in your data analysis and interpretation phase.

Periodically meeting with your stakeholder groups and discussing preliminary findings will help guide the interpretation of your data. Stakeholders often have novel insights or perspectives to guide interpretation that evaluation staff may not have, leading to more thoughtful conclusions.



## Step 6: Ensure use and share lessons learned

To get the most value from an evaluation, you should clearly communicate the results to funders, partners, other state agencies, schools, and school districts. Here are some ways you might share your evaluation results:

- Write a final report and distribute it to all your key stakeholder groups.
- Meet with all or some of your partner and stakeholder groups to discuss the results and the implications for the program.
- Translate your findings into simple brochures or flyers that can be distributed at meetings and posted on your website.
- Seek out opportunities to share your results with the media. Prepare a press release that can easily be shared with media outlets.
- Request opportunities to present your evaluation at conferences, coalition meetings, or webinars.
- Write and share a story about your program that includes achievements, as well as obstacles and lessons learned. These stories could be about your own state-based efforts or stories from schools in your state that have been successful with salad bars.
- Submit your stories and materials on [USDA's Best Practices Sharing Center](#) so other state agencies can benefit from your hard work.
- Publish your findings in a journal article.

It is important to note that you do not have to wait until the final evaluation report is written to share your evaluation results. Consider sharing interim results along the way. Well-told stories about your project can be a powerful tool for showing movement in your program's progress over time and demonstrate its value and effect. It can also help engage potential partners or funders.

By communicating your results effectively, you can accomplish the following:

- **Provide "how to" directions for others.**  
Sharing what you did and how well it worked will help others implement similar programs.
- **Show effects and contribute to the scientific literature.**  
By publishing your results in journals, you can contribute to the literature that shows whether salad bars can increase students' fruit and vegetable consumption.
- **Be accountable to funders.**  
A well-done evaluation will give funders confidence that their money was well spent and perhaps assist in garnering future funding.

An additional resource that can help in sharing your evaluation results is CDC's *Developing an Effective Evaluation Report: Setting the Course for Effective Program Evaluation*.<sup>19</sup>

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## CHAPTER 4: KEY POINTS

- Evaluation should be an integral part of your school salad bar efforts and can help with program improvement, demonstrating effect, and being accountable to funders.
- Be sure to involve the same stakeholders you are including in your overall salad bar efforts in your evaluation activities. This will ensure the evaluation results will meet their needs, as well as yours.
- Develop a logic model or use an existing logic model to help describe your program. A good logic model will help you determine what to evaluate on the basis of the maturity of your program.
- Your logic model will help you develop your process and outcome evaluation questions, which are the questions you will be measuring in your data collection.
- Consider using data already being collected from existing sources to help answer your evaluation questions.
- To fill the gaps, you might collect your own data through district or school surveys, individual interviews, or small focus groups.
- Be sure to include your stakeholders in the process of analyzing your data and interpreting the results of your findings.
- To get the most value from your evaluation efforts, you should clearly communicate the results to funders, partners, other state agencies, schools, and school districts.

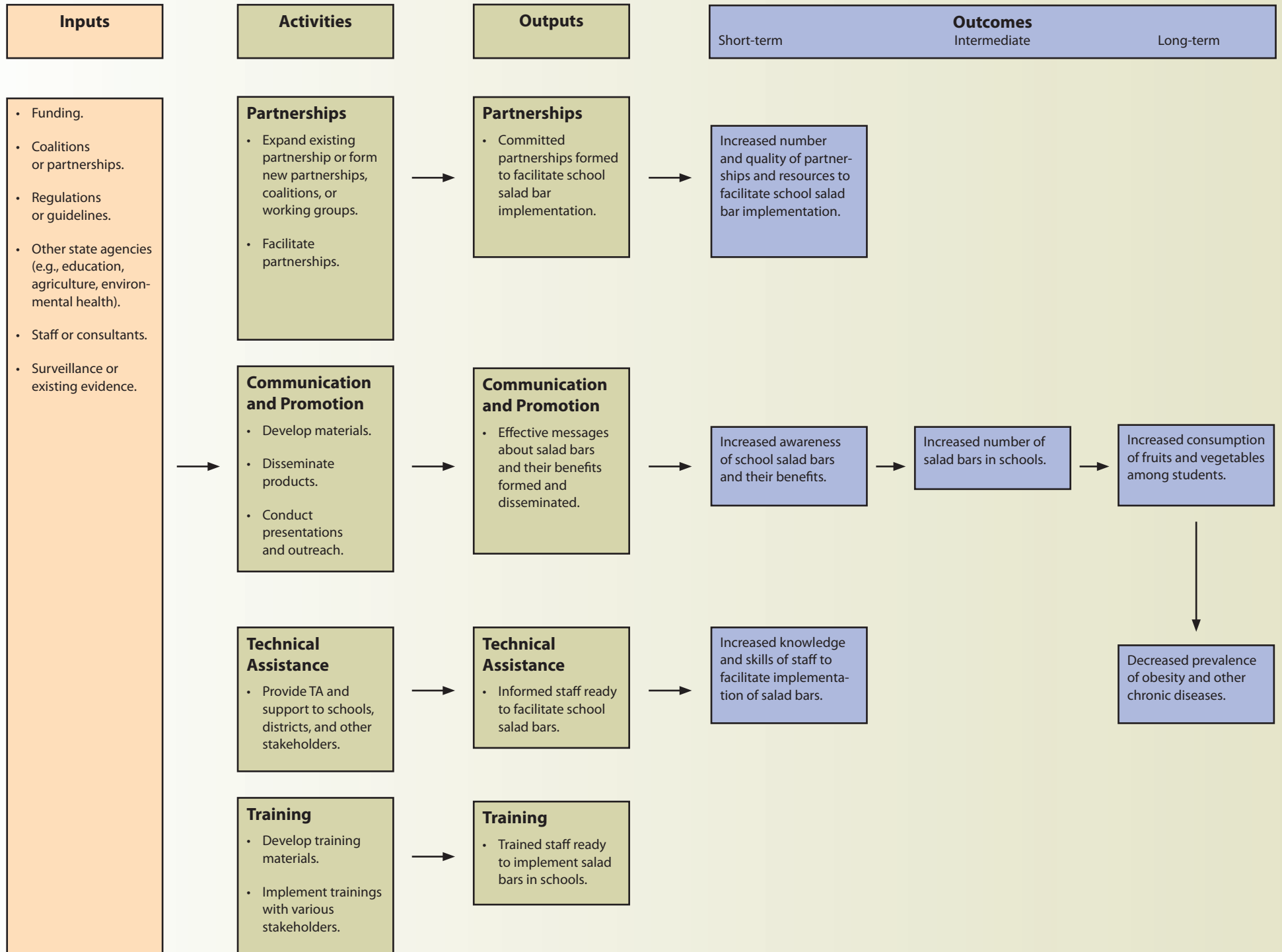
# Appendices







# Appendix 1: State Health Agency's Role in School Salad Bars—Logic Model



## Appendix 2. Resources

### Federal or national guidance and websites

- *Fruits and Veggies Matter*. <http://www.fruitsandveggiesmatter.gov/>.
  - *Nutrition Standards in the National School Lunch and School Breakfast Program*. Final Rule, January 26, 2012, setting new guidelines for increased servings of fruit and vegetables in schools. <http://www.gpo.gov/fdsys/pkg/FR-2012-01-26/pdf/2012-1010.pdf>.
  - *Salad Bars in the National School Lunch Program*. USDA memo SP 02-2010 - Revised to regional directors encouraging use of salad bars in school lunch programs. [http://www.education.nh.gov/program/nutrition/nslp\\_memos/2011/documents/02\\_2011\\_revised.pdf](http://www.education.nh.gov/program/nutrition/nslp_memos/2011/documents/02_2011_revised.pdf).
  - *School Lunch Salad Bars*. 41-page report from USDA Food and Nutrition Service, 2002. Covers prevalence of salad bars, fruits and vegetables served, and characteristics of schools offering salad bars. <http://www.fns.usda.gov/ora/menu/Published/CNP/FILES/saladbar.pdf>.
  - *Smarter Lunchrooms Movement*, USDA. A website with resources on how to make a lunchroom environment that will entice students to make healthier choices. <http://healthymeals.nal.usda.gov/healthierus-school-challenge-resources/smarter-lunchrooms>.
  - *USDA Child Nutrition Commodity Foods Policy and resources available for the administration of the USDA's Schools/Child Nutrition (CN) Commodity Programs*, which include the National School Lunch Program (NSLP), Child and Adult Care Food Program (CACFP), and the Summer Food Service Program (SFSP). <http://www.fns.usda.gov/fdd/programs/schcnp/>.
  - *USDA School Meals Programs*, including National School Lunch Program and Fresh Fruits and Vegetables Program, <http://www.fns.usda.gov/cnd/>.
  - *USDA SY 2013 National School Lunch Foods Available List*. <http://www.fns.usda.gov/fdd/foods/SY13-schfoods.pdf>.
  - *USDA Produce Safety University*. A 1-week training course designed to help school food-service staff identify and manage food safety risk associated with fresh produce. <http://www.fns.usda.gov/food-safety/produce-safety-university>.
  - *USDA Farm to School Resources*, <http://www.fns.usda.gov/farmtoschool/census/resources>.
  - *USDA Healthy Meals Resource System, Best Practice Sharing Center*. Offers an avenue for school food authorities and state agencies to share resources and tools they use to serve healthy menus that meet school meal regulations. <http://healthymeals.nal.usda.gov/best-practices>.
  - *USDA Team Nutrition Resource Library*. Includes grade-specific curricula and lessons to support nutrition education and promotion efforts. All materials are available free of charge to participating schools. [www.teamnutrition.usda.gov](http://www.teamnutrition.usda.gov).
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## Other websites

- *Association of State Public Health Nutritionists (ASPHN) school salad bars* Web page. [http://www.asphn.org/areas.php?sid=53e6d0&area\\_id=1](http://www.asphn.org/areas.php?sid=53e6d0&area_id=1).
- *Let's Move Salad Bars to Schools* website. <http://saladbars2schools.org/>.
- *Safe Use of Salad Bars in Schools*, modifiable fact sheet, Association of State Public Health Nutritionists, [http://www.asphn.org/resource\\_read.php?resource\\_id=571](http://www.asphn.org/resource_read.php?resource_id=571).
- *Farm to School: Dig In. Farm-to-school salad bar tool kit.* <http://www.phabc.org/modules.php?name=Farmtoschool&pa=showpage&pid=4>.
- *National Farm to Schools Network.* <http://www.farmtoschool.org/>
- *The Lunchbox school salad bar resources.* Includes videos on implementing salad bars, a student activity guide, and an article on best practices. <http://www.thelunchbox.org/programs/salad-bars/>

## Implementation

- *Best Practices—Handling Fresh Produce in Schools.* Describes best practices for handling all types of produce, including leafy greens, tomatoes, melons, and sprouts. <http://www.nfsmi.org/documentlibraryfiles/PDF/20100826093915.pdf>
  - *Fruit and Vegetables Galore.* A guide for school foodservice professionals with tips on planning, purchasing, protecting, preparing, presenting, and promoting fruits and vegetables. [http://www.fns.usda.gov/tn/resources/fv\\_galore.html](http://www.fns.usda.gov/tn/resources/fv_galore.html).
  - *How to Develop a Salad Bar for School Lunch Menu Programs.* Slusser, Neumann, and Lange, School of Public Health, University of California, Los Angeles. 1998. A guide to planning, implementation, and monitoring a salad bar program. Includes advice on training and motivating staff and students, food purchasing, and cafeteria preparation. Based on Los Angeles Unified School District. <http://www.calsna.org/documents/SaladBarDev.pdf>
  - *How Schools Work & How to Work with Schools—A Primer for Professionals Who Serve Children and Youth.* National Association of State Boards of Education. How-to guide to help you work with schools. Covers Coordinated School Health Program, school governance structures, and successful strategies for enlisting schools. [http://nasbe.org/nasbe\\_marketplace/index.php?dispatch=products.view&product\\_id=29925](http://nasbe.org/nasbe_marketplace/index.php?dispatch=products.view&product_id=29925).
  - *Implementing Salad Bars in Public Schools: A Survey of School Food Service, Parents, and Students.* Boss, Ashley. *Vegetarian Journal*, April, 2011. Magazine article based on an online survey and phone interviews by The Vegetarian Resource Group. It identifies barriers that include difficulty complying with USDA guidelines and offers advice for addressing the identified complaints. [https://www.vrg.org/journal/vj2011issue2/2011\\_issue2\\_salad\\_bars.php](https://www.vrg.org/journal/vj2011issue2/2011_issue2_salad_bars.php).
  - *Rainbow Days—A Food Services Student Activity to Engage Kids with Salad Bars.* Guide to organizing Rainbow Days where children are encouraged to eat “rainbows” of fruits and vegetables. <https://www.wholekidsfoundation.org/downloads/pdfs/lunchbox-rainbow-daypacket.pdf>
  - *Riverside Unified School District Farm to Market Salad Bar Program.* Guide to setting up a farm to market salad bar program based on the district’s experience. [http://www.saladbars2schools.org/wp-content/uploads/2014/01/RUSD\\_Farmers\\_Market\\_Salad\\_Bar\\_Program-1.pdf](http://www.saladbars2schools.org/wp-content/uploads/2014/01/RUSD_Farmers_Market_Salad_Bar_Program-1.pdf)
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- *Safe Use of Salad Bars in Schools*, Minnesota Department of Agriculture; Minnesota Department of Health; University of Minnesota Extension, 2012. <http://www.health.state.mn.us/divs/hpcd/chp/cdrr/nutrition/docsandpdf/SchoolSaladBarSafety.pdf>.
- *Salad Bars—The Lunchbox Guide*. Guide to implementing salad bars in schools for food-service staff and others. Topics are equipment selection, regulations, purchasing, recipe development, training, marketing, and student interface. <https://www.wholekidsfoundation.org/downloads/pdfs/lunchbox-salad-bar-guide.pdf>
- *Tricks of the Trade: Preparing Fruits and Vegetables*. United States Department of Agriculture, Food and Nutrition Service, FNS-365, February 2004. [http://www.fns.usda.gov/sites/default/files/tricks\\_trade.pdf](http://www.fns.usda.gov/sites/default/files/tricks_trade.pdf)

### Talking points, posters, and PowerPoint presentations

- *Advocating for Salad Bars in Missouri Schools Talking Points*. Two pages of talking points for conversations with decision makers about salad bars. <http://health.mo.gov/living/wellness/nutrition/saladbarstoschools/pdf/SaladBarTalkingPoints.pdf>.
- *Minnesota's Let's Move Salad Bars to Schools materials*. Includes a field guide for starting salad bars, a PowerPoint presentation, sample letters to supporters and superintendents, and a fact sheet about the safe use of salad bars. <http://www.health.state.mn.us/divs/hpcd/chp/cdrr/nutrition/FTS/saladbars-schools.html>.

### Case studies and data collection or evaluation tools

- *Arizona salad bar survey*. Questions and results from survey. [https://www.surveymonkey.com/sr.aspx?sm=LNjfp30z12aIJ0a0KoMfWW57qE53V0iWZDVp8nM98L8\\_3d](https://www.surveymonkey.com/sr.aspx?sm=LNjfp30z12aIJ0a0KoMfWW57qE53V0iWZDVp8nM98L8_3d).
  - *Compendium of Surveys for Fruit and Vegetable Consumption and Physical Activity*. The Network for a Healthy California, California Department of Public Health. Collection of survey instruments to measure fruit and vegetable consumption, physical activity, food security, and factors that influence those behaviors. <http://food-hub.org/files/resources/Network-Compendium.pdf>.
  - *The Crunch Lunch Manual: A case study of the Davis Joint Unified School District Farmers Market Salad Bar Pilot Program*. Analysis of a Farmers Market Salad Bar program in Davis, California, in 2003. Covers lessons learned, finances, and helpful resources, and documents an increase in fruit and vegetable consumption. <http://saladbars2schools.org/pdf/crunch-lunch.pdf>
  - *Eat Your Colors Every Day Salad Bar and Salad Options Project in Florida Schools*. Project designed to increase student consumption of fresh produce by implementing, enhancing and expanding salad bars and a variety of salad bars in schools. Project successfully increased fruit and vegetable consumption ranging from 9% to 31% by incorporating foodservice models, promotion material, and nutrition education. <http://www.pbhfoundation.org/pdfs/about/history/past/saladbar/flabrochure.pdf>
  - *Farm to School Evaluation Toolkit*. National Farm to School Network and UNC Center for Health Promotion and Disease Prevention. [http://www.farmtoschool.org/files/publications\\_385.pdf](http://www.farmtoschool.org/files/publications_385.pdf)
  - *Riverside Unified School District Farmers' Market Salad Bar Program*. Overview of the district's program, including survey results showing increased fruit and vegetable consumption. <http://www.thelunchbox.org/sites/default/files/Riverside%20Unified%20Farmers%20Market%20Salad%20Bar%20Program.pdf>
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- *Riverside Unified School District Logic Model and Evaluation Plan*. <http://centertrt.org/?p=intervention&id=1101&section=10>
- *A Salad Bar Featuring Organic Choices – Revitalizing the School Lunch Program*. Flock, Petra, Ruddy, Parent, and Peterangelo, Evergreen State College, 2003. Analysis of an organic salad bar in Olympia Washington listing factors that lead to a roughly 25% increase in vegetable intake. [http://www.farmtoschool.org/files/publications\\_102.pdf](http://www.farmtoschool.org/files/publications_102.pdf)
- *Salad Bars in Schools: A Fresh Approach to School Lunch*. Nikkel and Porter, Toronto Food Share, 2005. Based on a pilot program with schools in the Toronto area, gives step-by-step instructions for starting and running a successful salad bar program. [http://www.phabc.org/files/farmtoschool/Salad\\_Bar\\_Manual.pdf?NSNST\\_Flood=a51199b9a59a925e92e42c97a695516a](http://www.phabc.org/files/farmtoschool/Salad_Bar_Manual.pdf?NSNST_Flood=a51199b9a59a925e92e42c97a695516a)
- *Salad Bars in Missouri Schools Success Stories*. Stories and tips from school districts that have implemented salad bars. <http://health.mo.gov/living/wellness/nutrition/saladbarstoschools/schoolsinfo.php>
- *Salad Bar Use in Missouri Schools*. Survey results about salad bar use in Missouri schools. <http://health.mo.gov/living/wellness/nutrition/saladbarstoschools/pdf/SaladBarData.pdf>
- *Santa Monica Salad Bars*. Mascarenhas and Gottlieb, Community Food Security Project, Urban and Environmental Policy Institute, Occidental College, Los Angeles, 2000. Reports on the success of salad bars in the Santa Monica-Malibu Unified School District from 1997-2000. <http://departments.oxy.edu/uepi/cfj/publications/SantaMonicaSaladBarsReport.pdf>
- *School Health Profiles (Profiles)*. Survey conducted every two years assessing school health policies and practices in states, large urban school districts, territories, and tribal governments. <http://www.cdc.gov/HealthyYouth/profiles>
- *Youth Risk Behavior Surveillance System (YRBSS)*. Monitors health-risk behaviors that contribute to the leading causes of death and disability among youth and adults. <http://www.cdc.gov/HealthyYouth/yrbs/index.htm>

Note: Links to nonfederal government organizations found in this document are provided solely as a service to the reader. These links do not constitute an endorsement of these organizations or their programs by CDC or the federal government, and none should be inferred. CDC is not responsible for the content of the individual organization sites listed in this document.

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## Appendix 3: Acknowledgments

*Promoting and Supporting School Salad Bars: An Action Guide for State Health Practitioners* was prepared by the Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, Division of Nutrition, Physical Activity and Obesity in collaboration with consultants Joan M. Atkinson and Robert L. Peters.

The following individuals provided valuable feedback during the development of this guide and, in some cases, are quoted in this action guide:

Diane Beth, Nutrition Manager/Fruit and Vegetable Nutrition Coordinator, North Carolina Department of Health and Human Services, Raleigh, North Carolina

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Joyce Dougherty, Child Nutrition Program Director, Oregon Department of Education, Salem, Oregon

Mary Ann Ellsworth, Fruit and Vegetable Nutrition Coordinator, New Jersey State Department of Health & Senior Services, Trenton, New Jersey

Jack Ferreri, Account Supervisor, Knupp & Watson & Wallman, Madison, Wisconsin

Gail Feenstra, Food Systems Analyst, University of California at Davis, Davis, California

Angela Fraser, Associate Professor and Food Safety Specialist, Clemson University, Clemson, South Carolina

Lisa Gemlo, Farm to School Planner, Minnesota Department of Health, St. Paul, Minnesota

Donna McDuffie, Nutrition Coordinator, Minnesota Department of Health, St. Paul, Minnesota

Sharon Sass, Nutrition Education Advisor, Arizona Department of Health Services, Phoenix, AZ

Jean Saunders, Director of Marketing, Chartwells-Thompson Hospitality for Chicago Public Schools, Chicago, Illinois

Jessica Shelly, Food Service Director, Cincinnati Public Schools, Cincinnati, Ohio

Kathy Simmerman, President Elect, School Nutrition Association of Iowa, Davenport, Iowa

Patricia Simmons, Fruit and Vegetable Nutrition Coordinator, Missouri Department of Health and Senior Services, Jefferson City, Missouri

Betty Sun, Marketing Manager, California Department of Public Health, Sacramento, California

Rodney Taylor, Director of Nutrition Services, Riverside Unified School District, Riverside, California

Carol Voss, Fruit and Vegetable Nutrition Coordinator, Iowa Department of Public Health, Des Moines, Iowa

Hope Wilson, Program Manager, Farm to School Network, Phoenix, Arizona

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## Appendix 4: References

1. US Department of Agriculture. *Dietary Guidelines for Americans, 2010*. 2nd ed. Washington, DC: US Dept of Agriculture, US Dept of Health and Human Services; 2010.
  2. Slusser WM, Cumberland WG, Browdy BL, Lange L, Neumann C. A school salad bar increases frequency of fruit and vegetable consumption among children living in low-income households. *Pub Health Nut*. 2007;10(12):1490-1496.
  3. Florence MD, Asbridge M, Veugelers PJ. Diet quality and academic performance. *J Sch Health*. 2008;78:209-215.
  4. Nutrition standards in the National School Lunch and School Breakfast Program. Final rule, January 26, 2012, setting new guidelines for increased servings of fruit and vegetables in schools. <http://www.gpo.gov/fdsys/pkg/FR-2012-01-26/pdf/2012-1010.pdf>. Accessed February 27, 2015.
  5. USDA policy memo. Salad bars in the National School Lunch Program. 2013. <http://www.fns.usda.gov/sites/default/files/SP31-2013os.pdf>.
  6. Centers for Disease Control and Prevention. *Strategies to Prevent Obesity and Other Chronic Diseases: The CDC Guide to Strategies to Increase the Consumption of Fruits and Vegetables*. Atlanta, GA: Centers for Disease Control and Prevention, US Dept of Health and Human Services; 2011. [http://www.cdc.gov/obesity/downloads/FandV\\_2011\\_WEB\\_TAG508.pdf](http://www.cdc.gov/obesity/downloads/FandV_2011_WEB_TAG508.pdf). Accessed February 27, 2015.
  7. Solving the Problem of Obesity Within a Generation: White House Task Force on Obesity Report to the President. Recommendation 3.4, page 41. 2010. [http://www.letsmove.gov/sites/letsmove.gov/files/TaskForce\\_on\\_Childhood\\_Obesity\\_May2010\\_FullReport.pdf](http://www.letsmove.gov/sites/letsmove.gov/files/TaskForce_on_Childhood_Obesity_May2010_FullReport.pdf). Accessed February 27, 2015.
  8. Let's Move Salad Bars to Schools. <http://www.saladbars2schools.org/>. Accessed February 27, 2015.
  9. Let's Move Salad Bars to Schools: a public-private partnership to increase student fruit and vegetable consumption. [http://www.saladbars2schools.org/wp-content/uploads/2014/01/A\\_Public\\_Private\\_Partnership.pdf](http://www.saladbars2schools.org/wp-content/uploads/2014/01/A_Public_Private_Partnership.pdf). Accessed February 27, 2015.
  10. Gretchen Swanson Center for Nutrition. Evaluation of the Let's Move Salad Bars to Schools Initiative. 2014. [http://www.saladbars2schools.org/wp-content/uploads/2014/01/Exec\\_Summary\\_Eval\\_Infographic.pdf](http://www.saladbars2schools.org/wp-content/uploads/2014/01/Exec_Summary_Eval_Infographic.pdf). Accessed February 27, 2015.
  11. USDA's HealthierUS Schools Challenge. <http://www.fns.usda.gov/hussc/healthierus-school-challenge>. Accessed February 27, 2015.
  12. USDA, Food and Nutrition Service. Guidance for school food authorities: developing a school food safety program based on the process approach to HACCP principles. [http://www.fns.usda.gov/sites/default/files/Food\\_Safety\\_HACCPGuidance.pdf](http://www.fns.usda.gov/sites/default/files/Food_Safety_HACCPGuidance.pdf). Accessed February 27, 2015.
  13. USDA, National Food Service Management Institute. Handling fresh produce on salad bars. <http://www.nfsmi.org/documentlibraryfiles/PDF/20110822025744.pdf>. Accessed February 27, 2015.
  14. USDA, Food and Nutrition Service. Tricks of the trade: preparing fruits and vegetables from salad bars galore. FNS-365. 2004. [http://www.fns.usda.gov/sites/default/files/tricks\\_trade.pdf](http://www.fns.usda.gov/sites/default/files/tricks_trade.pdf). Accessed February 27, 2015.
  15. USDA, National Food Service Management Institute. Best practices: handling fresh produce in schools. <http://nfsmi.org/documentlibraryfiles/PDF/20100826093915.pdf>. Accessed February 27, 2015.
  16. Cates SC, Muth MK, Karns SA, Penne MA, Stone CN, Harrison JE. Certified kitchen managers: do they improve restaurant inspection outcomes? *J Food Prot*. 2009;72(2):384-391.
  17. Accreditation Programs, American National Standards Institute. Conference for Food Protection. <https://www.ansica.org/wwwversion2/outside/ALLdirectoryListing.asp?menuID=8&prgID=8&status=4>. Accessed February 27, 2015.
  18. Formative Assessment of Salad Bars in Wisconsin Schools, Final Report, December 30, 2011. Available upon request.
  19. Centers for Disease Control and Prevention. *Developing an Effective Evaluation Report: Setting the Course for Effective Program Evaluation*. Atlanta, GA: Centers for Disease Control and Prevention, US Department of Health and Human Services; 2013.
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