

Cafeteria Gardens

A Guide for Child Nutrition Professionals to
Implement Hydroponic and Container Gardens



INSTITUTE OF CHILD NUTRITION

The University of Mississippi

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School nutrition professionals continually seek innovative ways to enhance meal programs and engage students. Indoor cafeteria gardens offer an exciting opportunity to introduce fresh flavors into the kitchen, foster team building among nutrition staff, and build meaningful connections with students. Traditional outdoor school gardens have long been valued for their educational impact and connection to school meal programs. While these gardens offer valuable opportunities for farm-to-school initiatives and hands-on learning experiences, they require outdoor space and are often limited to specific seasons. Indoor cafeteria gardens, on the other hand, offer a complementary or alternative approach, allowing year-round growing and direct integration with daily kitchen operations.

This guide will explore two types of indoor cafeteria gardens: container-based gardens and hydroponic gardens. Container gardens use traditional soil-based growing methods in portable containers. These gardens allow plants to grow in pots or planters filled with soil, making them easy to move and maintain. They offer a way to grow herbs and small vegetables indoors. Hydroponic gardens are soilless growing systems where plants receive nutrients directly through water. Hydroponic systems can be as simple as countertop units or more complex vertical freestanding units. While they typically require more initial setup, hydroponic gardens often produce higher yields in smaller spaces and can grow year-round in controlled environments. Both container and hydroponic growing methods offer unique advantages for school nutrition programs, and some schools successfully implement both types to maximize their growing potential.

Indoor cafeteria gardens offer numerous benefits that enhance your meal program and school community. These gardens make a culinary impact by providing fresh ingredients that enhance flavors while reducing the need for sodium and added sugars. They also create engaging learning spaces that promote healthy eating habits and generate excitement around school meals.

Benefits of implementing a cafeteria garden include:

- Culinary Benefits
 - Enhancing meal flavors with fresh herbs and produce
 - Helping reduce sodium and added sugars in recipes
 - Creating culturally inclusive menu options
 - Supporting speed-scratch and scratch cooking initiatives
- Health Benefits
 - Providing nutrient-rich fresh ingredients
 - Increasing intake of vitamins and minerals
 - Promoting antioxidant-rich herbs
 - Supporting overall wellness through fresh foods

- Educational Benefits
 - Teaching students about where food comes from
 - Building connections between the cafeteria and classroom
 - Providing hands-on nutrition education opportunities
 - Sparking conversations about fresh ingredients
- Environmental Benefits
 - Adding visual appeal to cafeteria space
 - Creating an engaging atmosphere
 - Supporting sustainability efforts
 - Growing food on-site
 - Reducing packaging waste
 - Demonstrating environmental stewardship
- Community Benefits
 - Promoting healthy eating habits
 - Supporting staff and student wellness
 - Encouraging collaborative teamwork

Whether you choose a small herb container garden or a hydroponic system, this guide will help you plan, implement, and maintain a successful cafeteria garden program. We will cover key considerations, step-by-step instructions, and practical tips for school nutrition operations.



Starting a cafeteria garden requires thoughtful planning and team involvement. Here are key steps to ensure success:

1

BUILD YOUR GARDEN TEAM

- Identify a garden leader from your nutrition staff
- Involve interested kitchen team members
- Create shared ownership through rotating responsibilities
- Establish clear communication channels

2

PLAN RESOURCES AND SUPPORT

- Communicate plans with school leaders and administrators
- Identify available funding
- Determine equipment and supply needs
- Consider contacting local gardening centers for resources and advice

3

ASSESS YOUR SPACE

Before planning your garden design, evaluate:

- Available space in or near the kitchen
- Sunlight exposure
- Water access
- Electrical needs (for hydroponic systems)
- Temperature control
- Food safety considerations

4

DEVELOP YOUR GARDEN PLAN

Work with your team to:

- Choose between container or hydroponic gardens
- Select plants that complement your menu
- Create a maintenance schedule
- Plan for harvest and kitchen integration
- Establish food safety protocols
- Consider ways to engage students

Remember: Start small and build on your successes. Even a few herb containers can impact your meal program meaningfully.

CHOOSING YOUR GARDEN TYPE: CONTAINER VS. HYDROPONIC SYSTEMS



When planning your cafeteria garden, understanding the differences between container and hydroponic gardens can help you determine the best fit for your operation—or you might decide to implement both! Here is what to consider:

Container Gardens

- Advantages:
 - Lower initial costs and a simpler setup
 - Traditional growing method using soil
 - Easier to start small and expand
 - More flexible placement options
 - Requires less maintenance
- Considerations:
 - Requires quality potting soil
 - Regular watering needed
 - Seasonal replanting
 - Limited growing space
 - Soil cleanup and maintenance

Hydroponic Gardens

- Advantages:
 - Higher yield in smaller space
 - Year-round growing capability
 - Faster plant growth
 - Water-efficient
 - No soil needed
- Considerations:
 - Higher initial investment
 - Requires a more complex setup and maintenance
 - Regular monitoring of water/nutrients
 - Need for a stable environment
 - Staff training

CONSIDER IMPLEMENTING BOTH A CONTAINER AND HYDROPONIC GARDEN



Many schools find success, starting with container gardens for herbs and then expanding to hydroponic systems as their program grows. This combination allows you to:

- Test different growing methods
- Maximize available space
- Grow a wider variety of plants
- Build staff confidence gradually
- Create different learning opportunities for staff and students

The best choice depends on:

- Available space
- Budget
- Staff interest and expertise
- Menu needs
- Long-term goals

Remember: Success comes from matching your garden type to your operational capabilities and needs. It is crucial to consider the maintenance of both a container and hydroponic cafeteria garden. Choose the garden that meets your staff's knowledge and budget needs.

Getting Started with Container Gardens

Follow these suggested steps to launch your cafeteria container garden:

1

Asses Your Space

- Identify well-lit areas near water access
- Consider counter space or sturdy shelving
- Ensure temperature consistency
- Allow room for staff workspace

2

Plan Your Plants

- Start with easy-to-grow herbs like basil, parsley, or oregano
- Choose plants that complement your menus
- Consider culturally diverse herbs and vegetables
- Focus on items you frequently use

3

Gather Supplies

- Food-safe containers with drainage holes and the appropriate size for the plant
- High-quality potting soil and fertilizer appropriate for edible plants
- Basic garden tools (trowel, watering can)
- Plant markers/labels
- Seeds or starter plants

4

Set Up Your Garden

- Clean and sanitize your growing area
- Fill containers with soil, leaving space at the top
- Moisten soil before planting
- Label all plantings clearly
- Document planting dates

5

Maintain Your Garden

- Establish a daily watering schedule
- Monitor soil moisture
- Rotate containers for even light exposure
- Trim plants regularly to encourage growth
- Watch for signs of pest problems

Remember: Start small with a few containers and expand as you gain confidence. Successfully growing herbs can lead to growing other produce later.

Getting Started with Hydroponics

Follow these suggested steps to launch your cafeteria hydroponic garden:

1 Plan Your System

- Research different hydroponic options (vertical, countertop, deep water culture)
- Determine available budget
- Consider power and water access needs
- Plan for adequate workspace around the system
- Identify level, stable surface

2 Choose Your Location

- Ensure consistent temperature
- Access to electrical outlets
- Proximity to food preparation area
- Consider visibility for educational opportunities

3 Build Your Support Team

- Train interested staff
- Establish maintenance schedules
- Create monitoring protocols
- Document procedures
- Start with fast-growing greens (lettuce, herbs)

4 Select Your Plants

- Choose items used frequently in your menus
- Consider culturally diverse herbs and vegetables
- Consider grow times and harvest cycles
- Plan for continuous production
- Clean and sanitize area thoroughly

5 Setup and Installation

- Install system following manufacturer guidelines
- Test water quality and pH levels
- Document all system settings
- Create maintenance logs
- Check water levels daily

6

Monitor and Maintain

- Monitor pH and nutrient levels
- Keep detailed growing records
- Clean system regularly
- Follow food safety protocols

Remember: While hydroponic growing requires a more complex initial setup, it can provide consistent year-round yields. Start with a simple system and expand as you gain experience.



Building support and sustaining your cafeteria garden starts with effective communication:

1 Engage School Leadership

- Share your vision and goals with administrators
- Outline food safety protocols and maintenance plans
- Discuss budget and space requirements
- Connect garden benefits to school wellness goals
- Provide regular updates on progress

2 Connect with School Staff

- Share menu items featuring garden produce
- Invite teachers to view the garden
- Highlight nutritional benefits
- Create opportunities for classroom connections
- Post garden progress in staff areas

3 Communicate with Families

- Feature garden updates in school newsletters
- Share photos of garden-to-plate success
- Include information about herbs/produce being grown
- Highlight how garden items enhance school meals
- Showcase student engagement with the garden

4 Document and Share Success

- Take “before and after” photos
- Track produce usage in meals
- Share positive feedback from students
- Document cost savings when applicable
- Create signage highlighting garden-to-plate connections

Remember: Focus communication on how the garden enhances your meal program and creates engaging learning opportunities within the cafeteria setting.

ENHANCING SCHOOL MEALS WITH FRESH HERBS FROM YOUR CONTAINER OR HYDROPONIC GARDEN



Fresh herbs can transform your school meals by adding flavor without sodium and added sugars while providing nutritional benefits. Here's how to make the most of your herb garden:

Why Add Herbs to School Meals?

- Enhance flavor naturally without added salt and sugar
- Introduce students to new tastes
- Add visual appeal to dishes and create excitement around menu items
- Increase nutritional value
- Support scratch cooking initiatives

Popular Herbs and Their Uses:

Basil

- Perfect for Italian dishes
- Add to marinara sauces
- Enhance pasta salads
- Garnish pizza
- Infuse oils

Nutrition bonus:

High in vitamins A, C, K, and antioxidants

Parsley

- Brighten soups and stews
- Add to grain bowls
- Mix into salad dressings
- Garnish plates

Nutrition bonus:

Rich in vitamins A, C, and K

Cilantro

- Enliven Mexican dishes
- Add to salsas and bean dishes
- Enhance rice dishes
- Garnish tacos

Nutrition bonus:

High in potassium and folate

Oregano

- Season tomato-based sauces
- Add to roasted vegetables
- Enhance pasta dishes
- Season chicken

Nutrition bonus:

Contains iron and antioxidants

Rosemary

- Season roasted potatoes
- Add to bread recipes
- Enhance chicken dishes
- Infuse oils

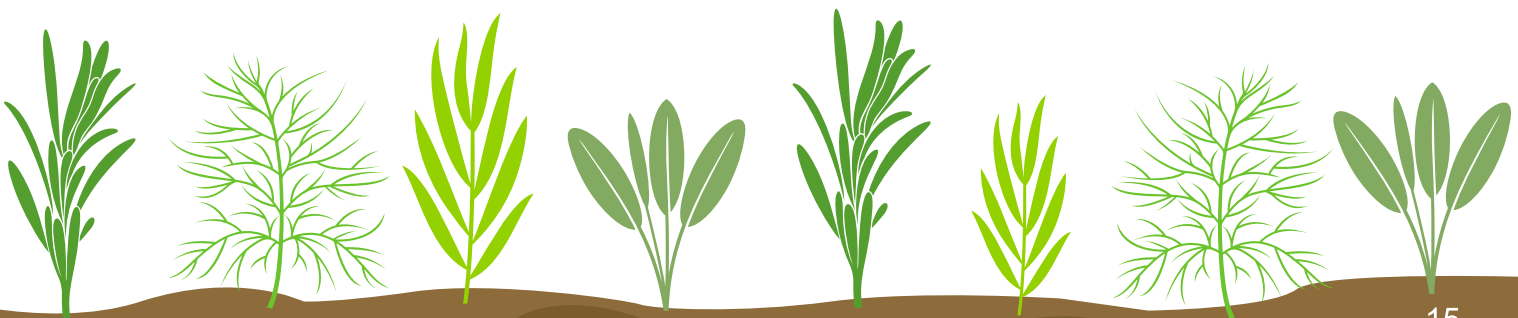
Nutrition bonus:

Contains calcium and vitamin A

TIPS FOR USING FRESH HERBS:

- Start with small amounts and adjust to taste
- Add delicate herbs (basil, parsley) at the end of cooking
- Incorporate hardier herbs (rosemary, oregano) during cooking
- Rinse herbs thoroughly before use
- Store properly to maintain freshness
- Label herbs clearly in the kitchen

Remember: Fresh herbs can support culinary and educational goals, adding nutrition and excitement to your school meals.





Starting a cafeteria garden is an exciting step toward enhancing your school nutrition program. Whether you begin with a few herb containers or dive into hydroponics, remember that every garden starts with a single seed. Your efforts will add fresh flavors to your meals and create engaging opportunities for staff and students to connect with fresh, healthy foods.

As your garden grows, so will your team's confidence and creativity in the kitchen. The herbs and produce you cultivate will bring new life to your recipes, while the visible growing space will spark curiosity and conversation about healthy eating. Most importantly, you will create lasting memories and positive experiences around school meals.

Remember, your cafeteria garden journey is about progress, not perfection. Start small, celebrate your successes, and watch your program flourish! The Institute of Child Nutrition is here to support you every step of the way.

Ready to Grow?
Let's begin!



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