



# Key Ingredients for Cooking Up New School Food Systems

An Evaluation of  
the Orfalea Fund's  
School Food Initiative  
Executive Summary



## INTRODUCTION

In 2007, The Orfalea Fund (TOF) began working to improve the quality of school food and promote food literacy throughout Santa Barbara County public schools through its School Food Initiative (the Initiative). TOF contributed \$12.75 million in its efforts to improve the quality of school food in Santa Barbara County between 2007 and 2015. The goal was to use school food and related systems as a mechanism to create a community of healthy children and families across Santa Barbara County. Key activities of the initiative were training and technical assistance to food service personnel, providing funding for school and district kitchen equipment and infrastructure, providing support for Wellness Committees to encourage a shift in the culture of school health, and supporting a variety of school-level food literacy programs.

The Initiative has drawn to a close and TOF has taken a number of steps toward understanding the value and impact of their investments and communicating their lessons learned. One of these steps was retaining an independent outside evaluator, Evaluation Specialists, to carry out a rigorous mixed-methods evaluation of this work.

## EVALUATION METHODS

Evaluation Specialists conducted a mixed methods evaluation consisting of four components:

- 🍏 Interviews with 46 stakeholders
- 🍏 A county-wide survey with 45 Cafeteria managers
- 🍏 An analysis of change over time in school- and district-level data collected over the course of the Initiative by the Orfalea Foundation
- 🍏 The development and application of an evaluation rubric

## FINDINGS

The School Food Initiative has accelerated and supported change in personnel professionalism, the quality of school meals, and students' exposure to, and acceptance of, healthy foods. School food personnel were better trained and equipped to engage in healthy cooking techniques, and school culture and policies were more aligned to the goal of improving students' health. Further, the Initiative's impacts seem to be as relevant to students from lower socioeconomic status (i.e., high need) families as they are to those from higher socioeconomic status (i.e., low need) families. However, the initiative efforts may have more positively influenced high-needs students, young students, and students in schools that were heavily engaged with the initiative. Study participants expressed commitment to continuing to support healthy eating efforts and sustaining positive changes for the good of students and school food personnel.

This report is for organizations interested in learning from and replicating these efforts as well as policymakers and school districts interested in improving school food. It presents findings organized into five sections:

- 🍏 Implementation of the Initiative
- 🍏 Outcomes of the Initiative
- 🍏 Barriers and Facilitators to Implementation
- 🍏 Sustainability of the Initiative Activities
- 🍏 Promising Practices





## FINDING 1: IMPLEMENTATION OF THE INITIATIVE

The Initiative comprised of five programmatic activities. The evaluation findings indicate that all five activities contributed to the goal of improving school food systems. Four out of five activities were more successful than anticipated. These were the Culinary Boot Camp, the kitchen equipment and infrastructure grants, the on-site technical assistance, and the support offered to schools and districts to improve school culture.

**Culinary Boot Camp was highly successful** in improving the professionalism and culinary skills of food service personnel, and helping them understand the school food system and their role within it. Food service personnel learned important professional content, including: food safety requirements, knife skills, recipe conversions, baking techniques, organization skills, and practices for enhancing positive team relationships. They also learned about their role in children’s health and in school food reform efforts more broadly. Implementation practices ensured that expectations related to school food reform were similar within schools and across district lines.

**Kitchen equipment and infrastructure grants were highly successful** in providing funding for specialized kitchen equipment and resources necessary to both make and deliver scratch cooking.

**On-site targeted technical assistance by Chef Instructors was highly successful** in providing technical assistance to food service personnel that improved their systems thinking, improved compliance and workflow efficiency, and helped them understand ways to balance the department budget.

**Efforts to improve school culture were highly successful** in assisting districts in shifting school culture and wellness policies, by encouraging initiation and/or action of Wellness Committees.

**Support of school-based food literacy programs, particularly school gardens, was successful** in engaging students and school staff. School gardens, specifically, were instrumental in helping students connect the dots between where food comes from and the food they are offered at school.

Initiative Activity	Not Successful	Minimally Successful	Successful	Highly Successful
	Needs to improve program elements to improve success of program	Some elements found to be successful, while others need improvement	Exactly what the foundation hoped for; expected level of success	Extraordinary; higher level of success than expected, includes unintended success
Culinary Boot Camp				●
Kitchen equipment and infrastructure grants				●
Onsite technical assistance				●
Efforts to improve school culture				●
School-based food literacy programming			●	



## FINDING 2: OUTCOMES OF THE INITIATIVE

The Initiative was designed to positively impact seven outcomes. The evaluation findings indicate that the Initiative successfully impacted all seven intended outcomes, as well as two unanticipated outcomes. While schools of varying characteristics benefitted, some evidence showed that the level of school engagement in Initiative activities mattered. Highly-engaged schools showed greater need for support to improve food-related practices prior to Initiative engagement, and benefitted as much or more than less-engaged schools. The same finding occurred for schools with high proportions of high-need students.

The Initiative drove substantial improvements in school food personnel expertise and empowerment and school food service facilities. It also accelerated improvements in food-related school policies, school food quality, food literacy, students' food-related behaviors, and, to a lesser degree, community involvement around school food. Although the Initiative did not specifically intend to influence other outcomes, there were other positive outcomes from these efforts. Findings indicate that teacher participation in school food and families' food literacy was also improved. On balance, food service personnel rated related outcomes as superior, by a statistically significant margin, in the presence of the School Food Initiative compared to how they would have been in its absence.

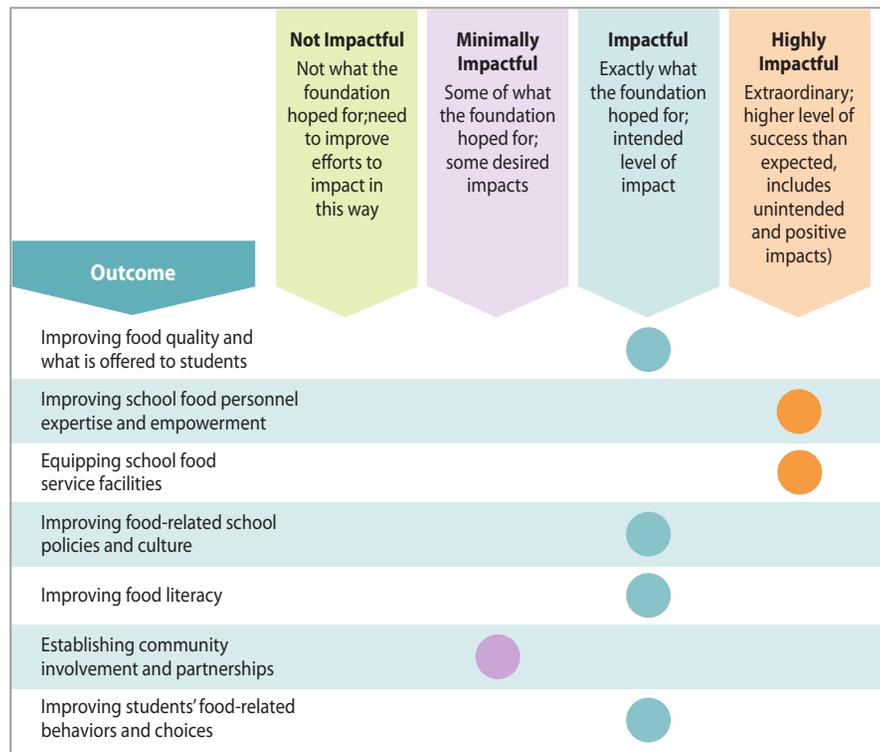
**School food quality and what was offered to students was positively impacted.** Schools provided healthier breakfasts and lunches by:

- 🍏 Adding more fresh fruits and vegetables to menus
- 🍏 Offering salad bars more frequently
- 🍏 Serving more whole muscle meats
- 🍏 Sourcing more organic and local goods
- 🍏 Using healthier scratch-based recipes
- 🍏 Reducing use of processed ingredients
- 🍏 Offering flavored milk less frequently
- 🍏 Surpassing Federal and State guidelines for sugar, salt, and fat in meals.



**School food personnel expertise and empowerment were positively impacted, even more than expected.** As a result of the Initiative, school food personnel were more likely to report:

- 🍏 Feeling more professional and empowered
- 🍏 Understanding the importance of customer service in their work and seeing students as customers
- 🍏 Modeling principles of healthy eating and making positive changes in their personal food choices
- 🍏 Understanding and applying culinary business operation practices
- 🍏 Improving cooking and nutrition knowledge
- 🍏 Increasing self-confidence and a desire to institute change
- 🍏 Having greater mastery in knife skills
- 🍏 Being perceived more favorably by other school staff



**School food service facilities were positively impacted, even more than expected.** The Initiative positioned schools to prepare and deliver scratch cooked foods in ways they could not otherwise, by providing grants for large kitchen instruments, small kitchen equipment and full kitchen redesigns.

**Food-related school policies and culture were positively impacted.** The Initiative supported the creation or expansion of school Wellness Committees, in efforts to develop and implement school policies aligned with research-supported best practices on food service. These efforts promoted a culture of wellness and healthy eating.

Specifically, these Committees have encouraged the following policy shifts:

- 🍏 Designing more user-friendly cafeterias
- 🍏 Adopting nutrition breaks and programs such as Breakfast in the Classroom
- 🍏 Offering recess before lunch

These efforts promoted the following culture shifts:

- 🍏 Supporting wellness and healthy eating
- 🍏 Raising professionalism of food service personnel
- 🍏 Engaging school staff in school food and related efforts
- 🍏 Plating meals for students in a thoughtful manner
- 🍏 Serving healthier foods at Parent-Teacher campus gatherings and school staff meetings

**Food literacy among students and staff were positively impacted.** Students were exposed to new foods as a result of the Initiative, which improved their understanding of nutrition and food systems, as well as the importance of adequate hydration. Other school staff also increased their food literacy in these areas.

**Community involvement and partnerships supporting school food, health, and wellness were positively impacted, though less than expected.** The Initiative helped forge relationships between school districts, schools, and local partners -- such as farmers - and helped schools identify creative ways to engage parent communities. The Initiative had less success in encouraging community involvement and creating partnerships than originally anticipated, though did not dedicate as much effort and resources to this goal as others.



**Students' food-related behaviors and choices were positively impacted.** Students are making healthier choices by selecting scratch-cooked entrees over unhealthy a la carte or vending options. They are also more willing and eager to try new foods and produce. Even students who bring lunch from home are having healthier meals, indicating that the Initiative is influencing some at-home practices as well.

Additionally, two unanticipated positive outcomes were identified

**School staff were positively impacted.** Teachers and administrators ate more food prepared at school following improvements in the quality of the meals. They were also more likely to discuss healthy habits with students.

**Families' food literacy was positively impacted.** Initiative activities also engaged families in creative ways. Parents were exposed to healthy food concepts and new food products through their children, as well as Initiative activities.



 Recipe  
Barriers and Facilitators of Implementation

## FINDING 3: BARRIERS AND FACILITATORS OF IMPLEMENTATION

### BARRIERS TO IMPLEMENTATION

**Initial resistance to change was common.** Students, school food personnel, parents, teachers, and administrators, often initially resisted changes associated with healthier school food and eating.

**Federal and State regulations often impeded change.** Food service regulations were felt to be overly restrictive, often stifling creativity in ways that limited the food service department, thereby limiting scratch cooking.

**Schools had a greater need for food service personnel and cafeteria infrastructures to initiate and sustain change.** Some schools were unable to handle increased demand resulting from improvements in school food, without upgrading or expanding these resources.

**Employment practices do not support the important role school food staff play in influencing student health.** These practices include low financial compensation, lack of benefits, scheduling inflexibility, lack of district-supported professional development, and low social status.

### FACILITATORS OF CHANGE

**Support and involvement from key stakeholders was essential to facilitating change.** This includes district and school leadership, as well as teachers and parents.

**Alignment between individuals' personal belief systems about the role nutrition plays in student health and the values of the Initiative helped spur change.** This was true for change at both the school and district levels.

**Promotion and acceptance of incremental change among food service staff and students facilitated success.** Generally, encouraging staff and students to make changes slowly is more successful than expecting immediate results.

**National and community-wide interest in healthier living aligned with efforts to effect change at school and district levels.** Community and individual awareness of these broader dialogs facilitated acceptance of and enthusiasm for the Initiative.

**Training school food staff together promoted shared values and expertise.** Culinary Boot Camp led them to healthier food and scratch cooking. The Culinary Boot Camps provided food service staff with opportunities to develop a shared skill set and shared philosophy.



## FINDING 4: SUSTAINABILITY OF INITIATIVE ACTIVITIES

Many study participants are optimistic about the sustainability of many of the Initiative efforts. This is because:

**Practices related to healthier and scratch cooking have become the “new normal”.** The new ways of thinking and working learned through SFI are now systematized and routine among many school staff and food service personnel.

**The Initiative created champions committed to maintaining and furthering positive school food change.** Those who have been instrumental in fostering change will not allow progress to unwind. They are personally tied to the work and deeply believe in its value.

Study participants recognize additional support will be needed to maintain or further the positive outcomes already achieved. Specifically, schools and districts need:

- 🍏 On-going professional development for existing and new staff
- 🍏 Funding and resources to support school gardens
- 🍏 Continued support for Wellness Committees, particularly by providing assistance in enforcing new policies
- 🍏 Support to systemically improve compensation and employment policies for school food staff
- 🍏 Alignment of State and National school meal standards to better support scratch cooking.

*I think we have to get back to this very basic idea that your health and your family come first, and if you can take care of those things all else will follow. We have to focus on the fact that we are doing it for the children, and that once we do this for them they're going to have just what they need to be successful in the 21st century.* — Principal

## FINDING 5: PROMISING PRACTICES

Several promising practices were identified in this study. These may inform other organizations' efforts to conduct or fund similar work, preemptively overcome barriers to implementation, and sustain change.

### **Remain up-to-date on the school food climate and related regulations.**

School food quality is a trending issue nationally which results in frequent shifts in regulations and expectations. Improving school food requires understanding school politics and processes. Understand the realities facing school food personnel and operate within them.

**Create an overarching vision and strategic plan.** A thoughtful and connected plan helps everyone stay focused on the ultimate goal of improving children's lives by improving school food. Such a plan also helps stakeholders weather challenges related to change, and includes a sustainability framework.

**Consider a multi-pronged approach to supporting school food personnel, as they are critical to improving school food.** Provide them training, funding for tools, follow-up support, and a peer support mechanism. When equipped with the necessary skills, equipment, infrastructure, and peer accountability system, they can make improvements stick.

**Recognize the importance and contribution of school food personnel in improving children's health and well-being.** Include this as a topic in trainings. Work to improve the employment policies and professionalism of this crucial workforce.

**Get stakeholders on board early and hold them accountable for change.** Engaging all stakeholder groups (parents, administration, teachers, students, coaches, and school food personnel) before launching an initiative to improve school food increases the likelihood of initiative success. Doing so prior to rollout can create buy-in and ease implementation efforts. Explore ways to expand outreach to families and communities to sustain changes made within school walls.

**Engage with the young and the willing.** Before beginning a school food initiative, identify readiness in stakeholders and in the community. Initiate activities with those who demonstrate an inclination toward food-related efforts first. Consider implementing activities with younger students first. When students are provided healthy scratch-cooked school meals from a young age, they can grow up in food literate school environments and expect healthy meals.

**Consider context.** Consider school contexts as part of program planning, perhaps tailoring initiative activities to each subgroup of schools. There



is some indication that this work is particularly effective with schools that are highly engaged and schools with student populations of higher need.

**Embrace change and start small.** Help stakeholders embrace change rather than fear it. The work of improving school food is often perceived as daunting, but with a coalition of supporters can be easier than anticipated and get easier with time. Be clear that incremental, small change is part of the plan and is worthwhile.

**Engage policy-makers and advocates.** Policy-level issues affect on-the-ground conditions for school food initiatives. Be prepared to discuss policy-level issues with key stakeholders who can support or impede change. Discuss the value of school food personnel and particularly ways to demonstrate their value through better compensation, ongoing professional development, and more respect. Also discuss the unintended consequences of school food regulations with activists and policymakers.

**Develop and sustain persistence.** There can be ups and downs even in a program with many successes, so develop and foster a sense of tenacity in your stakeholders. Some food service departments experienced a dip in revenue as a result of initial implementation of scratch-cooking techniques, but later became profitable as a result of perseverance and creativity. In the end, they increased participation in their school meals program.



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### About Evaluation Specialists

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