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Food Fight! National Policy, Local Dynamics, and the Consequences for School Food in the U.S.

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Food Fight! National Policy, Local Dynamics, and the Consequences for School Food in the U.S.

By

Helena Carrillo Lyson

A dissertation submitted in partial satisfaction of the requirements for the degree of

Doctor of Philosophy

in

Sociology

in the

Graduate Division

of the

University of California, Berkeley

Committee in charge:

Professor Laura Enríquez, Chair
Professor Margaret Weir
Professor Kathryn De Master

Summer 2017
Abstract

Food Fight! National Policy, Local Dynamics, and the Consequences for School Food in the U.S.

by

Helena Carrillo Lyson

Doctor of Philosophy in Sociology

University of California, Berkeley

Professor Laura Enríquez, Chair

Skyrocketing childhood obesity rates in the U.S. have helped fuel mounting public concern about the health and well-being of America’s children. Efforts to address childhood obesity have increasingly targeted improvements to federal school food programs. Such programs provide critical nutrition to hundreds of thousands of children, including many low-income, minority youth who have been disproportionately affected by obesity. In particular, the landmark 2010 Healthy, Hunger-Free Kids Act (HHFKA) marked the first substantial changes to federal school food policy in recent years, including stricter nutritional requirements for all foods served in schools. In addition, a growing, grassroots farm to school (FTS) movement, which seeks to improve student access to and consumption of fresh, healthy foods, has taken hold in cafeterias throughout the country. It is against this backdrop of dramatic changes to federal policy and widespread school food reform efforts that this dissertation explores how both top-down federal policies and bottom-up, local dynamics have affected the nature and quality of school food programs at both national and local levels. More specifically, this mixed methods project 1) quantitatively examines the effects of federal legislation and state-level sociopolitical factors on school food environments across the country as measured by the prevalence of FTS programs; and 2) qualitatively explores how local-level school food program implementation dynamics affect the outcomes of these programs in two case study school districts in California.

Based on a variety of data sources, including the U.S. Department of Agriculture’s inaugural Farm to School Census, the quantitative analysis tests key hypotheses from the policy diffusion literature related to the impact of federal policy and state-level sociopolitical arrangements on the prevalence of FTS programs across the states. My results highlight inequities in state-level implementation of school food programs based on economic affluence, underscoring the need for increased federal funding to poorer states in order to subsidize the cost of FTS programming. The qualitative component of the project draws on 15 months of interview-based and participatory fieldwork in two large urban school districts resulting in a deep understanding of the nuances of local school food program dynamics and outcomes. Building on theories of neoliberalism and privatization from political and economic sociology, and extending sociological theories of social movement activism, I find that opposing operational structures of federal school food programs – privatized vs. self-operation – play a key role in setting local-
level priorities for the meal programs on the ground. In particular, privatization effectively
discourages schools from exploring the sourcing of fresh foods from small, local farmers and
constrains grassroots FTS efforts. Self-operation, on the other hand, in conjunction with parent-
activists, a motivated nutrition services director, and community support lends itself toward
responsiveness to bottom-up social change efforts that can make school food reform a reality. By
combining quantitative analysis of school food programs on a national scale with qualitative
analysis of programs in case study school districts, my research sheds important light on the
myriad factors that determine the nature and quality of federal nutrition programs on the ground,
and what changes are needed to create healthier and more equitable school food environments
throughout the country. In doing so, my findings contribute to critical policy discussions
surrounding federal school food programs and childhood health.
I dedicate this dissertation to my late father, Thomas Lyson, who taught me how to think like a sociologist before I even knew what sociology was.
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<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
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<tbody>
<tr>
<td>CDC</td>
<td>Centers for Disease Control and Prevention</td>
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<tr>
<td>CDE</td>
<td>California Department of Education</td>
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<tr>
<td>CEP</td>
<td>Community Eligibility Provision</td>
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<td>CNA</td>
<td>Child Nutrition Act</td>
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<tr>
<td>CNR</td>
<td>Child Nutrition Reauthorization</td>
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<tr>
<td>CSA</td>
<td>Community Supported Agriculture</td>
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<tr>
<td>CSS</td>
<td>California Secretary of State</td>
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<tr>
<td>DoD</td>
<td>Department of Defense</td>
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<tr>
<td>DV</td>
<td>Daily Value</td>
</tr>
<tr>
<td>ERS</td>
<td>(United States Department of Agriculture) Economic Research Service</td>
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<tr>
<td>FNS</td>
<td>(United States Department of Agriculture) Food and Nutrition Service</td>
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<tr>
<td>FRAC</td>
<td>Food Research and Action Center</td>
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<tr>
<td>FSMC</td>
<td>Food Service Management Company</td>
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<td>FTS</td>
<td>Farm to School</td>
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<tr>
<td>FY</td>
<td>Fiscal Year</td>
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<tr>
<td>HHFKA</td>
<td>Healthy, Hunger-Free Kids Act</td>
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<tr>
<td>IFB</td>
<td>Invitation for Bid</td>
</tr>
<tr>
<td>IRB</td>
<td>Institutional Review Board</td>
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<tr>
<td>NCES</td>
<td>National Center for Education Statistics</td>
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<tr>
<td>NFSN</td>
<td>National Farm to School Network</td>
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<tr>
<td>NSAC</td>
<td>National Sustainable Agriculture Coalition</td>
</tr>
<tr>
<td>NSLP</td>
<td>National School Lunch Program</td>
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<tr>
<td>OIG</td>
<td>(United States Department of Agriculture) Office of Inspector General</td>
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<tr>
<td>PCSD</td>
<td>Pacific City School District</td>
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<tr>
<td>RFP</td>
<td>Request for Proposal</td>
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<tr>
<td>RWJF</td>
<td>Robert Wood Johnson Foundation</td>
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<tr>
<td>SARE</td>
<td>Sustainable Agriculture Research and Education</td>
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<tr>
<td>SBP</td>
<td>School Breakfast Program</td>
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<tr>
<td>SCSD</td>
<td>Sequoia City School District</td>
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<tr>
<td>SFA</td>
<td>School Food Authority</td>
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<td>SFF</td>
<td>School Food Focus</td>
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<td>SNA</td>
<td>School Nutrition Association</td>
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<td>SNAP</td>
<td>Supplemental Nutrition Assistance Program</td>
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<td>SNDA</td>
<td>School Nutrition Dietary Assessment</td>
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<td>SY</td>
<td>School Year</td>
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<tr>
<td>USDA</td>
<td>United States Department of Agriculture</td>
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<tr>
<td>WIC</td>
<td>(Supplemental Nutrition Assistance Program) for Women, Infants, and Children</td>
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“We can all agree that in the wealthiest nation on Earth, all children should have the basic nutrition they need to learn and grow and to pursue their dreams. And everywhere I go, I meet parents who are working very hard to make sure that their kids are healthy. But when our kids spend so much of their time each day in school, and when many children get up to half their daily calories from school meals, it’s clear that we as a nation have a responsibility to meet. I think that parents have a right to expect that their efforts at home won’t be undone each day in the school cafeteria or in the vending machine in the hallway. I think that our parents have a right to expect that their kids will be served fresh, healthy food that meets high nutritional standards.”

--Excerpts from First Lady Michelle Obama’s Remarks at the Signing of the Healthy, Hunger-Free Kids Act (The White House 2010)

INTRODUCTION

Since the early 1980s, the childhood obesity rate in the U.S. has more than tripled—increasing from only 5 percent of children and adolescents classified as obese in the 1980s to a staggering 17.2 percent, or 12.7 million youth, classified as obese in 2014 (CDC 2011, 2015). Obesity in childhood can contribute to the onset of an array of serious health complications including hypertension, heart disease, type 2 diabetes, pulmonary conditions such as asthma, as well as psychosocial consequences including the stereotyping of obese children as unhealthy, unhygienic, academically unsuccessful, and lazy (Ebbeling, Pawlak, and Ludwig 2002). Together, these complications of obesity can increase the risk of premature illness and death. A widely publicized 2005 report published in the *New England Journal of Medicine* confirmed the dire situation of rising childhood obesity rates in the U.S. The report indicated that for the first time in two centuries, the current generation of children in the U.S. may have shorter life expectancies than their parents. Sending shockwaves through public health circles and the broader American public, the study concluded that if left unchecked, the rapid rise in childhood obesity could shorten life spans by as much as five years (Belluck 2005).

Consequently, childhood obesity became a major focus of public health efforts throughout the country in the late 2000s. In particular, within six months of being in the White House, First Lady Michelle Obama had begun to lay the groundwork for what would become an unprecedented national campaign that would work to transform the American food landscape to promote increased health and wellness for children and adults throughout the country (Evich and Samuelsohn 2016). Among the many progressive public health projects Mrs. Obama spearheaded [including: planting an organic garden at the white house (Burros 2009), redesigning the government’s well known “food pyramid” to an easy-to-read “MyPlate” graphic that more accurately and simply communicates essential dietary guidelines to consumers (Neuman 2011), revamping nutrition labels on food packages to make calorie counts more prominent and portion sizes that more accurately reflect how much Americans eat (Tavernise 2016), and partnering with Wal-Mart to reformulate thousands of its packaged foods to be lower in salts, fats, and sugars (Stolberg 2011)], her “Let’s Move!” campaign, unveiled in 2010, specifically targeted eliminating childhood obesity as a major public health threat in the U.S (Stolberg 2010). The campaign solidified reducing childhood obesity as a national priority and focused on improving school food, expanding access to healthy, affordable foods, and increasing daily physical activity. At the same time that Mrs. Obama launched the “Let’s Move!” campaign, President Obama issued an executive order creating the first-ever national task force on
childhood obesity to develop policy recommendations based on the main pillars of the First Lady’s “Let’s Move!” campaign (Evich and Samuelsohn 2016).

As Mrs. Obama’s campaign gained traction on a national scale, through her promotional appearances on hit TV shows like “Ellen” and “Sesame Street” and through events like Kids’ “State Dinners” at the White House that featured healthy lunch recipes submitted by students across the country (Evich and Samuelsohn 2016), food served in schools was hurtled to the forefront of efforts to improve children’s diets. Evich and Samuelsohn (2016) write of the First Lady’s campaign: “From the very beginning, everyone in the administration acknowledged that schools were absolutely key to tackling childhood obesity. Many kids, especially those in struggling communities, eat about half of their calories at school.”

Indeed, school food plays a critical role in the diets of hundreds of thousands of low-income children, including many Black and Hispanic youth who have been disproportionately affected by obesity (CDC 2015). National data has shown that foods eaten at schools in the U.S. comprise anywhere from one fifth to one half of students’ total daily energy intake (Stallings and Yaktine 2007: 103). Federal school meal programs including the National School Lunch Program (NSLP) and the School Breakfast Program (SBP) are two of the nation's largest food and nutrition assistance public welfare programs. The NSLP falls just behind the Supplemental Nutrition Assistance Program (SNAP), or food stamp program, as the second largest nutrition assistance program based on U.S. Department of Agriculture (USDA) expenditures, while the SBP follows the Special Supplemental Nutrition Program for Women, Infants and Children (WIC) as the fourth largest program (Morgan 2015). The NSLP serves lunch to over 30.3 million children daily in over 99,000 schools throughout the country (USDA ERS 2015)—including 19 million low-income children certified to receive meals at no cost (FRAC 2015), while the SBP provides breakfast to approximately 12.1 million children daily in 89,000 schools nationwide—including 10.1 million poor students who qualify for their breakfasts at free or reduced price (USDA FNS 2012). By providing access to food groups that are under-consumed by many children including fruits, vegetables, and calcium-rich dairy beverages (Ralston and Newman 2015), these federal school meal programs play an important role in the diets of hundreds of thousands of children.

Mrs. Obama’s campaign seized on the 2010 reauthorization of federal child nutrition programs, known as the Child Nutrition Reauthorization (CNR), as a chance to significantly overhaul federal nutrition standards for school food—the quality of which had been significantly eroded in recent decades due to lax nutrition regulations, declining federal contributions to school meals, and the influx into schools of heavily processed junk foods from corporate manufacturers (Levine 2008). The legislative debate for the reauthorization was covered widely by the media and generated significant controversy in Congress—highlighting the tension between making foods healthier for kids and raising taxpayer dollars for the government to fund those policy changes (Nixon 2012). During the run-up to the passage of the bill, famed chef and local foods activist Alice Waters and Katrina Heron wrote in a 2009 New York Times opinion piece, that “throwing a little more money” at the NSLP would not be enough; the current system should be scrapped and started entirely from scratch. They called for the bill to authorize a one-time investment in real kitchens in school cafeterias throughout the country, and for Washington to give schools enough money—roughly $27 billion a year, up from the $10 billion spent at the time—to cook and serve unprocessed foods that are produced without pesticides and are locally grown when possible (Waters and Heron 2009).
While this call for a dramatic increase in federal funding was not realized in the final Act, many reformers hailed the legislation as an important and comprehensive effort to improve the quality of school food (Nixon 2012), and a significant win for the First Lady’s “Let’s Move!” campaign (Evich and Samuelsohn 2016). Signed by President Obama on December 13, 2010, the Healthy, Hunger-Free Kids Act (HHFKA) marked the first substantial policy changes to school food in 15 years. Efforts delineated in the legislation included updated nutritional guidelines for NSLP and SBP foods, such as allowing only 1 percent or nonfat milk to be served and increasing the availability of whole-grain rich foods and fruits and vegetables; an additional federal reimbursement of six cents per meal served; and a community eligibly provision allowing schools in high-poverty areas to offer universal free meals to all students (Ralston and Newman 2015, Haynes-Maslow and O’Hara 2015).

Implementation of the new federal policies, however, was met with significant resistance in cafeterias across the country. School food manufacturers and administrators found the new rules costly and difficult to administer, and students found the new, supposedly healthier meals unappetizing. The resistance quickly led to an “all-out war” over school lunches, “with the first lady and health advocates on one side and school cafeteria managers, food manufacturers and Republicans on the other side” pushing for waivers that would allow schools to opt out of meeting the new standards (Evich and Samuelsohn 2016). Eventually, the waiver idea was dropped, and Congress and the White House agreed to “modestly loosen” some of the updated nutritional standards (Evich and Samuelsohn 2016). Despite the implementation controversy in the aftermath of the 2010 HHFKA, there is little doubt that Mrs. Obama’s efforts have improved the quality of school food in this country. As former New York Times food columnist Mark Bittman wrote in his 2015 farewell column reflecting back on the state of food issues in the U.S. over the past five years: “I’m gratified that real progress has been made on two issues that I honestly did not have much hope for. One is labor…And, although I’ve generally been disappointed in the Obama administration’s positions on food, the Obamas deserve credit for making the school lunch program far better” (Bittman 2015).

Shifts in the political environment spurred by Mrs. Obama’s “Let’s Move!” campaign and the passage of the 2010 HHFKA created an unprecedented political opening for a burgeoning grassroots school food reform movement to grow significantly by increasing public awareness of school food issues and their critical role in the battle against childhood obesity. As such, a nascent grassroots farm to school (FTS) movement in the U.S. expanded dramatically from fewer than 10 programs in 1998, to programs in approximately 42 percent of school districts nationwide by 2015 (Joshi, Azuma, and Feenstra 2008: 230, USDA 2015). FTS programs are focused on the local procurement of foods for school meals from small-scale, local farms, agriculture or nutrition-based educational activities in the classroom, field trips to farms or farmers’ markets, educational sessions for parents and the community, and tending to school gardens (USDA 2016). The FTS movement is widely considered to be a hallmark of the larger alternative agrifood movement that focuses on promoting local, environmentally sustainable, healthy, and socially inclusive alternatives to the industrialized food system, and emphasizes both consumer-based resistance to the agroindustrial complex and community-level collective action (Allen 2004).

FTS programming is often spearheaded at the local level by parents, local food activists, nonprofit organizations, and school food service directors. FTS programs have had documented success in increasing student access to and consumption of locally sourced fruits and vegetables,
as well as improved attitudes toward trying and eating fresh fruits and vegetables (Nicholson et al. 2014, Bontrager Yoder et al. 2014). As such, FTS can play a crucial role in childhood obesity prevention (Feenstra and Ohmart 2012). FTS programs, moreover, have been found to generate higher student participation rates in federal school food programs that, in turn, bring in much needed revenue to schools. FTS programs also benefit small, local farmers by providing new market outlets that help them to maintain their economic viability (Joshi and Beery 2007, Joshi et al. 2008, and Feenstra and Ohmart 2012).

Solidifying the importance and momentum of the growing FTS movement in the battle against childhood obesity, the 2010 HHFKA established, for the first time, a federal Farm to School Program housed in the USDA’s Food and Nutrition Service’s (FNS) Office of Community Food Systems, and authorized $5 million in annual funding over eight years through a competitive grants program to support local-level FTS efforts in school districts throughout the country (Benson, Russell, and Kane 2015).

Research Questions

While previous research has traced the rich and often controversial history and development of the nation’s school food programs (Levine 2008, Poppendieck 2010), the time is ripe for in-depth analysis of school food programs in the aftermath of groundbreaking changes to federal school food policy and the growth in local FTS efforts that have taken hold in school cafeterias throughout the country in the last decade. This dissertation explores the post-2010 HHFKA landscape of school food programs on both a national and local level in light of childhood obesity concerns. To this end, the broad motivating research question for this project is:

(1) How have top-down, federal policies and bottom-up, local-level dynamics affected the nature and quality of school food programs at both national and local levels?

The following two specific research questions guided the analysis:

(a) What are the effects of federal legislation and state-level sociopolitical factors on the prevalence of FTS programs at the state level?

(b) How do local-level dynamics affect the nature and quality of school food programs in two case study school districts in California?

Theory

This research is theoretically positioned at the disciplinary nexus of sociology and political science, and draws on key schools of thought from both disciplines. First, the research draws from policy diffusion theory in political science, which is used by policy scholars to model the spread of policies and programs across states (Berry and Berry 2007, 2014). I rely on policy diffusion theory to explore the dual effects of federal policy and local-level factors on the prevalence of FTS programs throughout the U.S. Second, I locate my research in analyses of neoliberalism and privatization in political and economic sociology and human geography.
(Harvey 2005, Centeno and Cohen 2012, Mudge 2008, Larner 2000, Fourcade-Gourinchas and Babb 2002) to explore the dynamics and consequences of district-level food program operational structures on the nature and quality of food served to students. Finally, the research engages with sociological theories of social movement activism (Aldon and Staggenborg 2004, Van Dyke and McCammon 2010) and civic engagement as it relates to food and agriculture (Lyson 2004) to examine the dynamics of FTS activism and school food program innovation on the ground.

Methodological Approach

This project relies on a mixed methods research design to explore the influences of top-down policy mechanisms and local-level factors on school food environments across the country, and on the dynamics of implementing school food programs on the ground. Mixed methods research entails “the collecting, analyzing, and mixing of both quantitative and qualitative data in a single study or series of studies” (Creswell and Plano Clark 2007: 5). To this end, the macro component of this research is quantitative in nature and focuses on testing key hypotheses derived from the policy diffusion literature related to federal and state-level sociopolitical influences on school nutrition programs across the U.S. In this way, the quantitative phase of the research allows for a general and broad exploration of school food programs on a national scale. The macro analysis is based on an original dataset I created from a variety of sources including the inaugural U.S. Department of Agriculture’s Farm to School Census, the U.S. Department of Education’s School Universe Survey, the U.S. Department of Agriculture’s Your Food Environment Atlas, and the National Farm to School Network’s State Farm to School Legislative Survey. The analysis utilizes multivariate regression techniques to assess the impact of top-down federal policy and state-level internal determinants on FTS program rates across the country.

The qualitative component of the research, which involves in-depth case studies of two school districts in California, allows us to delve into the nuances of local school food program dynamics and outcomes by providing depth of understanding to complement the breadth of understanding afforded by the quantitative analysis. Data for the qualitative phase of the research come from 15 months of fieldwork consisting of interviews, participant observation and archival document analysis in two case study school districts in California—Pacific City School District (PCSD) and Sequoia City School District (SCSD). These districts are among the 200 largest school districts by enrollment size in the nation and are critical in the battle against childhood obesity because of their large share of students who rely on school food programs to meet their daily nutritional needs. The selection of these districts, moreover, presents variation on several key local-level characteristics. In particular, selection of these districts leverages variation in the programs’ operational structures: Sequoia City’s school food program is contracted out by the district to a private food service management company (FSMC), whereas Pacific City’s program is locally controlled and self-operated. The differing local contexts of these districts have shaped distinct dynamics at the district level that have given way to different capacities to react to and implement federal school food policies. Analyzing the qualitative data, I employed a combination of inductive and deductive methods to develop analytical categories and themes based first on the qualitative data collected, and second on broader analytical concepts derived

1 See Appendix A for a detailed explanation of all methods used in the study.
2 Names of all organizations referenced and individuals interviewed have been changed to protect confidentiality.
from the theoretical literature relevant to the research.

**Overview of Chapters**

In Chapter 1, I situate the dissertation project in a historical and theoretical context. I open the chapter with a history of the politics and dynamics of federal school meal programs in the U.S.—beginning with the passage of the National School Lunch Act in 1946, and concluding with the passage and implementation of the 2010 Healthy, Hunger-Free Kids Act. Next, I turn to the growing FTS movement in the U.S. I illuminate both the history and scale of the movement as a key driver of recent school food reform efforts, as well as disparities in the progress of FTS programming across the country. In the second half of the chapter, I focus on the theoretical foundations of the research. I explore key arguments in the policy diffusion, neoliberalism and privatization, and social movement literatures that the research engages with.

In the second, third, and fourth chapters, I present the results of my empirical analyses. Chapter 2 focuses on explaining significant variation in the nature of federal school programs in states across the country when measured by the prevalence of FTS programs. In the chapter, I quantitatively test key hypotheses from the policy diffusion literature related to the impact of federal policy and state-level sociopolitical arrangements vis-a-vis the prevalence of FTS programs across the states. My results highlight inequities in state-level implementation of school food programs based on economic affluence, underscoring the need for increased federal funding to poorer states in order to subsidize the cost of FTS programming.

In Chapters 3 and 4, I narrow the scope of the analysis to qualitatively explore how local-level dynamics of school food program implementation affect the outcomes of these programs in two case study school districts in California—Sequoia City and Pacific City. Building on theories of neoliberalism and privatization from political and economic sociology, and extending sociological theories of social movement activism, I find that opposing operational structures of federal school food programs—privatized vs. self-operation—play a key role in setting local-level priorities for the meal programs on the ground, particularly as they pertain to FTS programming. In Chapter 3, I explore how financial strain triggered school food program privatization in Sequoia City, and how privatization has led to a corporately-defined FTS programming model in the district and constrained grassroots FTS efforts. In Chapter 4, I focus on findings from Pacific City. I examine how local control of the district’s school meals program, in conjunction with parent-activists, a motivated nutrition services director, and community support has enabled collaborative, grassroots FTS programming that has ushered in substantial changes to the district’s school food offerings.

In the concluding chapter, I summarize the key findings from the two case study school districts, and reflect back on the findings from the national-level analysis presented in Chapter 2. I, then, discuss both the theoretical and policy implications of the research. Finally, I conclude with suggestions for future research.

**Significance**

This research is both timely in the battle against childhood obesity and relevant in advancing key theories in the fields of sociology and political science. Through its mixed methods design, it is one of the first studies of its kind to explore the impact of landmark federal legislation on the
landscape of school food program dynamics on both a national and local level. By combining quantitative analysis of school food programs on a national scale and qualitative analysis of school food programs in select California case study school districts, this research provides an unprecedented opportunity to expand our knowledge of school food programs and to engage in interdisciplinary discussions surrounding childhood health and nutrition. Through a focus on school food programs, a key component of the nation’s social welfare policy, this research contributes to central debates surrounding the interplay of national policy, local dynamics, and grassroots activism in the implementation and outcomes of federal public policy programs aimed at improving the health and wellbeing of the nation’s youth. In doing so, this dissertation sheds critical light on the myriad factors that determine the nature and quality of federal nutrition programs, and what changes are needed to create healthier and more equitable school food environments throughout the country.
CHAPTER 1

LITERATURE REVIEW

Federal School Meal Programs

As early as the 1900s, private charities and local school authorities were providing funding for school lunches in locations around the U.S. in response to concerns regarding compromised learning abilities associated with student malnutrition. The depression of the 1930s heightened these concerns as widespread unemployment left many poor school children unable to pay for lunches and in serious need of nutritious foods. By 1932, locally organized school lunch programs began to receive the first federal loans and agricultural surpluses to feed undernourished school children. In 1936, the USDA was authorized to purchase surplus agricultural commodities from farmers and distribute them to local school lunch programs (Ralston et al. 2008). Needy families and school lunch programs thus became constructive outlets for surplus farm commodities. As such, this distribution system removed price-depressing surplus foods from the market through government purchase at a reasonable price for farmers and assisted in feeding poor, hungry school children (Gunderson 2014, Cook-Cottone, Tribole, and Tylka 2013). School cafeterias also helped to put many unemployed Americans back to work at the time. Hence, issues of poverty, hunger, and agricultural surpluses shaped the early federal landscape of school food programs (Poppendieck 2010).

Federal support for school food programs was solidified through the passage of the 1946 Richard R. Russell National School Lunch Act, signed by President Harry Truman to “safeguard the health and well-being of the Nation’s children and to encourage the domestic consumption of nutritious agricultural commodities and other foods” (Ralston et al. 2008: 1). The Act’s main stipulations still provide the guiding framework for the program today including that schools must 1) operate their lunch programs on a nonprofit basis; 2) provide eligible children free or reduced-price meals that meet minimum nutritional standards while using surplus commodities to the extent practical; and 3) report expenditures and receipts to state educational agencies (Ralston et al. 2008).

Major legislative reforms to the 1946 National School Lunch Act began in 1966 with the Child Nutrition Act (CNA), which funded a two-year pilot School Breakfast Program amidst educators’ claims that lunch came too late for many poor children who came to school hungry. Amendments to the CNA in 1975 later made the School Breakfast Program permanent. The 1966 CNA also consolidated the program’s administration by combining school foodservice programs from other agencies into one program under the USDA. The CNA thus reaffirmed that the USDA was to be the administrative home of federal nutrition efforts, thereby reinforcing the link between school food and federal agricultural policies. Today, the Child Nutrition Division of the USDA’s FNS administers school food programs at the federal level. This division provides cash reimbursements to schools for NSLP/SBP meals served, coordinates federal policy, provides

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3 Through the three-tier eligibility system, household income determines if a student is eligible for free, reduced-price, or full-price meals. Household income must be at or below 130 percent of the federal poverty level to qualify for free lunch, and between 130 percent and 185 percent for reduced-price meals. Children with household incomes over 185 percent of the poverty level must pay full price. Local school food authorities set their own price for full-price meals, and reduced-price students must not be charged more than 40 cents for lunch (Ralston et al. 2008).
technical assistance, and oversees the work of state agencies.

At the state level, school food programs are usually administered by state education departments, which in turn operate through agreements with local school food authorities (SFAs). State agencies are responsible for managing fiscal elements of the program, monitoring SFA performance and adherence to USDA nutritional standards, and providing SFAs with technical assistance. SFAs’ jurisdiction usually corresponds to school districts. As such, school boards often set broad food service policy to be executed by school staff. SFAs plan menus that meet federal nutrition requirements, purchase food, oversee meal preparation and services, process applications and certify students as being eligible for free or reduced-price lunches, and keep data and records that document claims for federal reimbursement. Schools must count and report the number of qualified students by eligibility category (free, reduced price, and full price) in order to receive federal reimbursements (Ralston et al. 2008, Schirm and Kirkendall 2012).

Federal school food programs are open to all children enrolled in participating schools and recent statistics suggest that approximately 94 percent of public schools in the country participate. Minority students and students from households with lower income-to-poverty ratios, moreover, tend to participate in school food programs at slightly higher levels than do non-Hispanic White students and students from households with higher income-to-poverty ratios. School food, then, is disproportionately important to minority students and those from low-income families. Children aged 8-13, furthermore, are more likely to participate in school food programs than children in other age groups, and children aged 16-18 are less likely to participate (Ralston et al. 2008).

Participation has grown steadily over most years of the NSLP and SBP, but rates did fall in the early 1980s when concerns over costs emerged for SFAs with the Omnibus Budget Reconciliation Acts 1980-1981. The Act reduced federal reimbursement rates for reduced-price and paid meals, increased the income range for free-meal eligibility making more students eligible for free meals, terminated assistance for foodservice equipment, and reduced appropriations for nutrition education and training grants. In response to lower reimbursement rates, SFAs had to increase prices for paid lunches, which caused a decline in participation among full-paying students (Ralston et al. 2008).

Forced to cope with declining federal contributions to school meals and fewer full-paying students, SFAs during this time found themselves struggling financially to run their programs and began to turn to the corporate food industry for help. In particular, SFAs began selling competitive foods—or a la carte entrees, snack foods, and vending machine items that were unregulated by federal nutrition standards including soda and heavily processed snack foods. Competitive foods were seen as an important way for SFAs to keep their programs financially afloat as revenues from a la carte sales and in some cases vending machines supplemented revenues from sales and reimbursements of NSLP/SBP meals. These revenues also helped fund other district needs including field trips, and athletic and music equipment (Levine 2008, Ralston et al. 2008). Many schools entered into exclusive “pouring rights” contracts with soft drink corporations, for example, in exchange for direct payments to support school funding needs (Zipperstein 2011). This flood of unhealthy foods in schools, moreover, was facilitated by the easing of USDA restrictions banning commercial operations from school cafeterias (Poppendieck 2010, Levine 2008). In addition to partnering with corporate manufacturers to sell competitive foods to students, school districts also turned to private food service management companies during this time to run their school food programs as a way to reduce operating costs.
The increasing presence of competitive foods in schools during the 1980s and 1990s heavily influenced the food offerings in the NSLP and SBP programs (Poppendieck 2010). For example, when receiving commodity items for school meal programs, SFAs have a choice: Use the food item “as is,” or send it to a manufacturer for further processing. In order to entice students to purchase NSLP/SBP meals so the district could receive federal reimbursements, SFAs increasingly began paying multinational agribusiness corporations to heavily process their raw commodity items donated by the USDA into items like french fries, fried chicken nuggets, and fruit pastries. “By the time many of these ‘healthier’ commodities reach students,” a Robert Wood Johnson Foundation study found, “they have about the same nutritional value as junk foods” (RWJF 2008: 1). This transition to serving heavily processed, frozen heat-and-serve foods from corporate manufacturers in school cafeterias, moreover, contributed to a loss of skilled cafeteria workers and the infrastructure needed to prepare fresh, scratch-cooked meals. These conditions still define most school food programming today. For example, in 2013, a nationwide survey of school nutrition officials found that 88 percent of respondents said their district lacked the appropriate infrastructure needed to prepare items from scratch including knives, refrigerators and other equipment (The Pew Charitable Trusts and RWJF 2013). In this way, unregulated competitive foods set an unhealthy standard for foods served in the NSLP and SBP, while at the same time increasing revenue for commercial agribusiness firms and facilitating a cozy relationship between corporate food companies and schools.

Average daily participation rates in the NSLP and SBP grew steadily during this time, however, with participation from students eligible for free and reduced-price meals increasing especially rapidly. During the period from 1983 to 2005, for instance, free and reduced-price lunches served increased by an average annual rate of 1.9 percent per year (Ralston et al. 2008, USDA FNS 2016a). Figures 1 and 2 below depict NSLP and SBP participation rates by certification status since the 1970s.

In response to the increase of competitive foods in schools and research findings indicating that school meals did not meet the dietary guidelines for fat and saturated fat as a percent of calories, legislative changes to national school food policy in the 1990s and 2000s began to focus on emerging childhood obesity concerns. The Healthy Meals for Americans Act of 1994, for example, set new nutritional standards for school food, and launched the School Meals Initiative for Healthy Children, which supported improvements to the nutritional content of school lunches through new computerized, menu-planning systems to help schools develop healthy meals through nutrient analysis. The Act also created the Commodity Improvement Council to lower the fat and sodium content of agricultural commodities donated to schools (Poppendieck 2010). In 2004, the Child Nutrition Reauthorization Act required SFAs to develop wellness plans specifying nutritional standards for school foods and physical fitness goals, increased food safety requirements, and expanded federal funding for fresh fruits and vegetables for school meals. The Act also included a provision for $10 million in discretionary funding for schools to set up FTS programs. The provision failed to be funded, though, when it did not receive an appropriation (Ralston et al. 2008, Poppendieck 2010). At the local level, school boards and state governments around the country also responded to mounting concerns about the corporatization of school lunchrooms and its unhealthy effects on students by banning vending machines with soda and junk foods. For instance, in 1999, the San Francisco Board of Education passed a groundbreaking Commercial Free Schools Act that prohibited schools from entering into exclusive contracts with soft drink or snack food companies (Ziperstein 2011).
**Figure 1.** Average Daily NSLP Participation by Certification Status, 1970-2015


**Figure 2.** Average Daily SBP Participation by Certification Status, 1975-2015

Most recently, the passage of the 2010 Healthy, Hunger-Free Kids Act marked the first significant changes to federal school food policy in over a decade. Changes included updated nutritional standards based on Institute of Medicine recommendations issued in 2009—such as allowing only 1 percent or nonfat milk to be served, increasing the availability of whole-grain rich foods, doubling the amount of fruits and vegetables served and requiring increased variety in vegetables offered including weekly minimum requirements for vegetable subgroups such as dark green, red/orange, legumes, and starch, and setting a maximum calorie intake per day based on student age. These new standards went into effect at the start of the 2012-2013 school year. Under the new law, school lunches meeting these updated standards were entitled to an additional federal reimbursement of six cents per meal served (Ralston and Newman 2015, Haynes-Maslow and O’Hara 2015).

The legislation also gave the USDA the authority to establish nutrition standards for all foods sold on school campuses throughout the school day, including competitive foods. This “Smart Snacks in Schools” rule went into effect for the 2014-2015 school year and stipulated that competitive foods sold a la carte, in school stores, or in vending machines must be a “whole grain-rich” product, or have as the first ingredient a fruit, vegetable, dairy product, or a protein food, or be a combination food that contains at least one quarter cup of fruit and/or vegetable, or contain 10 percent of the Daily Value (DV) of one of the nutrients of public health concern in the 2010 Dietary Guidelines for Americans including calcium, potassium, vitamin D or dietary fiber. In addition, competitive foods must have fewer than 200 calories, and be low in fat, sodium and sugar (Black 2013, USDA FNS 2016a, USDA 2013b). The law also strengthened local school wellness policies by adding rules for transparency and implementation, and through the community eligibly provision, it allowed schools in high-poverty areas to offer universal free meals to all students beginning in the 2011-2012 school year.

Finally, the 2010 HHFKA established the USDA Farm to School program and stipulated $5 million in annual funding through a competitive grants program to support FTS efforts throughout the country. State agencies, schools, school districts, non-profits, local agencies, agricultural producers, and Indian tribal organizations are eligible to apply for and receive funding through the program. Grants assist eligible entities in implementing FTS programs that improve access to local foods in schools. Awarded funds flow directly from the USDA to the applying organization. In fiscal year (FY) 2013—the first year of the grant program cycle—two different grant tracks were offered including planning grants for schools or districts just starting to incorporate FTS program elements into their operations, and implementation grants for schools or districts to help expand their existing FTS programs. In subsequent years, support service grants intended for groups and nonprofit entities working with districts to further develop existing FTS initiatives and provide broad-reaching support services, and training grants for disseminating best practices and spreading successful FTS strategies were included as available grant tracks. Since the grant program’s inception, major grantee activities have included procuring local foods for school meal programs, training staff, purchasing equipment to support the storage, processing and preparation of fresh, local foods, delivering hands-on experiential

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4 Starting on July 1, 2016, competitive foods no longer qualify using the 10 percent DV criteria.
5 Prior to the passage of the 2010 legislation, requirements for competitive foods bought from vending machines, school stores, and concession stands stipulated that schools could not sell foods of minimal nutritional value such as hard candy and regular soda, or items in which the first ingredient was sugar (Haynes-Maslow and O’Hara 2015: 13).
education through school gardens, developing community partnerships, communication networks and outreach materials, and completing project evaluations to measure and document program outcomes and impacts. Recent grant data indicates that awards range from $14,613 to $100,000, with an average award amount of $68,122. The USDA estimates that as of 2015, the grants have reached approximately 12,300 schools and have engaged 6.9 million students in FTS activities across the country (Benson et al. 2015).

Since the 2010 HHFKA went into effect, average daily participation in the NSLP has declined, driven mainly by a drop in paid-lunch participation. The percentage of students paying full price for lunches has dropped 10 percentage points, from 47 percent in 2008 to 37 percent in 2014. Overall average daily participation in the NSLP peaked in 2011 with 32 million students, and only reached 30.5 million students in 2015. Some experts suspect that the updated nutritional requirements associated with the 2010 HHFKA including limits on salt and increased whole grain requirements may have contributed to this decline in paid-lunch participation (Ralston and Newman 2015).

A Growing Farm to School Movement

In tandem with the increasing action surrounding federal school food policy reform in recent years, a grassroots FTS movement has grown dramatically from its beginnings in the 1990s in just a few school districts throughout the country. “The farm to school movement,” Feenstra and Ohmart (2012: 280) write, “emerged amidst the growing public concern about childhood health and obesity, as well as increasing awareness about environmental and economic challenges in our food and agricultural system.” By connecting small-scale farmers with local school districts to supply fresh, healthy foods for school meals, FTS has come to be seen as a way to both support small and mid-scale farmers who have been struggling to stay economically viable in a food system that has come to be dominated by large, multinational corporations, and to address rising concerns of childhood obesity (Feenstra and Ohmart 2012).

Early efforts to bring locally grown, fresh foods to school cafeterias began in the 1990s with a handful of experimental programs (Feenstra and Ohmart 2012). One of the early pioneering FTS programs began in 1995 with a local group of limited-resource farmers in the northern Florida area who formed the New North Florida Cooperative and began a pilot program selling their fresh fruits and vegetables to Florida school districts (USDA 1999). A second early FTS project was started in 1997 in California’s Santa Monica-Malibu Unified School District, when a concerned parent partnered with the school food service director to start a pilot farmers’ market salad bar program that would connect students with fresh, local fruits and vegetables (Joshi and Beery 2007). Berkeley Unified School District in California was also an early innovator in the FTS movement. In the early 2000s, the district began prioritizing scratch-cooking practices and local food procurement, and they established a flagship “edible schoolyard” that allowed for the teaching of garden classes and the preparation of seasonal dishes for school meals by students from produce harvested in the garden (Joshi and Beery 2007).

Expanding from these pioneering programs in the 1990s, FTS activities are now in approximately 42 percent of school districts nationwide (USDA 2015). Collaboration across various sectors is at the heart of the FTS movement. As Feenstra and Ohmart (212: 284) note, “The [FTS] movement has always relied on broad bases of support from many sectors. Indeed,
one of its strengths is that it has appealed to so many diverse food system stakeholders…” In this vein, research on FTS programs has demonstrated that internal and external “champions” of FTS initiatives, such as school food service directors, nonprofit organizations, and foundations, are central to expanding and ensuring the success of FTS programs by drawing on networks of contacts and resources to link various stakeholders and push forward the momentum of the programs (Bagdonis, Hinrichs, and Schafft 2009). One such organization is School Food Focus (SFF), a national, collaborative project that seeks to connect large urban school systems with sustainable sources of healthy food. By focusing on local sourcing and sustainable supply chain relationships, SFF has leveraged the knowledge and procurement power of its member districts to change the substance of school food (Feenstra and Ohmart 2012). The National Farm to School Network (NFSN) is another such organization. Launched in 2007, the network has been instrumental in coordinating, promoting, and expanding the movement on a national level by working through regional agencies to focus on training and technical assistance for FTS stakeholders, networking, public information, and policy reform efforts.

The first-ever, national FTS conference was held in 2002 in Seattle and convened over 250 participants including farmers, school administrators, teachers, parents, sustainable agriculture and environmental nonprofit advocates, community development organizations, government agencies and university and cooperative extension researchers (Feenstra and Ohmart 2012). Since then, annual FTS conferences have continued to be held each year at both the national and state levels. In addition, in November 2010, Congress approved House Resolution 1655 introduced by Representative Rush Holt of New Jersey to officially designate October as National Farm to School Month (NSAC 2011). National Farm to School Month has provided key organizations, including the USDA and the NFSN, with the opportunity to visibly celebrate the FTS movement on a national scale, highlight inspiring examples of FTS innovation across the country, and connect interested participants with resources for starting FTS programming in their local communities. Finally, in 2013, the USDA conducted an inaugural, nationwide Farm to School Census, which, for the first time, assembled data across all 50 states related to local procurement practices and participation in additional FTS activities, including school gardens and agroliteracy programs.

Research suggests that major challenges FTS programs face are related to logistical and budgetary concerns including the cost of the initial investment for equipment and labor to handle fresh foods, the cost of purchasing fresh food from local farmers, prohibitive federal and state procurement regulations, ensuring an adequate volume of fresh food, the logistics of ordering, billing, and delivery, and the development of a distribution system that meets the needs of school food services and small-scale farmers (Colasanti, Matts, and Hamm 2012, Joshi and Beery 2007, and Vallianatos, Gottlieb, and Haase 2004). Scaling FTS up has been particularly challenging, as Feenstra and Ohmart (2012: 286) note, “…lack of processing, distribution, and a regional food system infrastructure have presented bottlenecks…Changing scale leads to changing everything—menus, types of food purchased, price points, delivery options etc.” Studies indicate that despite the challenges, food service professionals participate in FTS because the students enjoy it and they are helping local farmers; and local farmers participate because they are helping to improve children’s dietary habits and the local community, and participation enables them to diversify their marketing strategies to remain economically viable (Feenstra and Ohmart 2012).

Scholars critical of the FTS movement, meanwhile, have charged that FTS programs are producing neoliberal discourses and practices in ways that limit efforts to improve social equity.
Allen and Guthman (2006), in particular, suggest that FTS initiatives, in comparison to traditional school food programs, are contributing to the process of neoliberalization inasmuch as they represent an overarching reorientation from public to private and national to local. Specifically, they argue that FTS programming is often reliant on private funding that comes from a competitive market process instead of more equitable federal funding; the labor practices associated with FTS programming, including dependence on nonprofit organization staff and parent volunteers instead of unionized employees of school districts, align with the flexible and contract labor practices of neoliberal efforts to roll back worker pay and benefits; FTS programs have emerged idiosyncratically rather than equitably, often in communities with the greatest resources; and the local-level nature of FTS implementation resonates with the neoliberal devolution of responsibility and accountability from the state to private, local actors. “In these senses,” Allen and Guthman (2006: 410) argue, “the reason that FTS programs look like neoliberalism is because they are neoliberalism, the emergence of a new configuration of state-society relations engendered by a hostile roll back of the Keynesian state.” What is more, the authors contend that FTS advocates variants of traditional neoliberal discourses including those of personal responsibility, individualism, entrepreneurship, choice, and consumerism. For example, they argue that FTS programs embrace consumer choice among children as a mechanism for creating change, instead of targeting larger structural reforms to the food system. Ultimately, Allen and Guthman (2006: 412) conclude that “the construction of FTS programs without regard to how neoliberalism constrains the politics of the possible may in fact aid in the “normalization” of neoliberal discourses, forms and practices.” In this way, Allen and Guthman (2006) suggest that FTS programs are actually strengthening the dominant, inequitable system that they seek to reform.

In a rejoinder to Allen and Guthman (2006), Kloppenburg and Hassanein (2006) defend the practices and promises of FTS programming. Notably, Kloppenburg and Hassanein (2006: 418) argue that the localism associated with FTS implementation represents not a neoliberal devolution of responsibility and accountability, but an effort to foster the engagement of concerned citizens “in an active process of change in which proximity literally grounds thought and action.” In this way, they contend that FTS initiatives are resisting the “neoliberal project of ceding primacy to market relations and of centralizing effective power and control in transnational institutional structures” (418), and represent opportunities to create innovative practices and policies that reflect the needs of local communities. In addition, Kloppenburg and Hassanein (2006) point out that no FTS advocates desire a permanently privatized funding stream for their work, but instead see private funding as a crucial first step toward funding programming that might otherwise never be initiated; the volunteer nature of much FTS work is not intended to be a permanent displacement of paid, unionized labor and can, instead, be viewed as evidence of active civic engagement that works to improve local communities; and that instead of relying on consumer choice as a mechanism for change, FTS proponents actually work to change public policy to limit the food choices that students have in order to facilitate the development of a “critical, alimentary consciousness” that allows children to make healthy decisions in their daily lives. As such, Kloppenburg and Hassanein (2006) argue that FTS programming is not confined by an overarching neoliberal structure and does not obscure alternatives to neoliberalism, as Allen and Guthman (2006) vigorously contend. “Engagement with and action in the world is how we learn,” Kloppenburg and Hassanein (2006: 420) maintain. Activists engaged in FTS initiatives, they conclude, are undertaking important work in
the form of critical thinking and political action to achieve social equity.  
While FTS programs have spread rapidly across the country in recent years, FTS participation rates vary dramatically by state—from 14.9 percent of school districts in Arkansas to 100 percent of districts in Hawaii and Rhode Island (USDA 2014b). Table 1 below shows states ranked by percent of school districts with FTS programs.

### Table 1. States Ranking by Percent of School Districts with Farm to School Programs, SY 2012-2013

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<th>State</th>
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<tr>
<td>1. Hawaii</td>
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<td>27. Colorado</td>
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<td>2. Rhode Island</td>
<td>100.0</td>
<td>28. Michigan</td>
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<td>3. Maryland</td>
<td>95.8</td>
<td>29. Kentucky</td>
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<td>4. Delaware</td>
<td>94.7</td>
<td>30. North Dakota</td>
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<td>5. Vermont</td>
<td>88.6</td>
<td>31. Pennsylvania</td>
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<td>6. Maine</td>
<td>85.7</td>
<td>32. New Mexico</td>
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<td>7. New Hampshire</td>
<td>81.4</td>
<td>33. Montana</td>
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<td>8. Massachusetts</td>
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<td>34. Utah</td>
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<td>9. North Carolina</td>
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<td>35. Ohio</td>
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<td>10. District of Columbia</td>
<td>73.1</td>
<td>36. Kansas</td>
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<td>11. Minnesota</td>
<td>72.0</td>
<td>37. Indiana</td>
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<td>12. Connecticut</td>
<td>71.4</td>
<td>38. Iowa</td>
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<td>13. West Virginia</td>
<td>70.2</td>
<td>39. Arizona</td>
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<td>14. Alaska</td>
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<td>40. Louisiana</td>
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<td>15. Oregon</td>
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<td>41. Missouri</td>
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<td>16. Virginia</td>
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<td>42. Oklahoma</td>
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<td>17. Florida</td>
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<td>43. Alabama</td>
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<td>18. New York</td>
<td>61.6</td>
<td>44. Illinois</td>
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<td>19. Wisconsin</td>
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<td>20. South Carolina</td>
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<td>21. California</td>
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<td>22. New Jersey</td>
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<td>23. Georgia</td>
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<td>49. Nevada</td>
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<td>25. Tennessee</td>
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<td>51. Arkansas</td>
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<td>26. Washington</td>
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Because school food programs can source fresh fruits and vegetables through programs other than farm to school, including the Department of Defense (DoD) Fresh Fruit and Vegetable Program (USDA 2013a), non-participation in FTS programs does not necessarily indicate that healthy foods are unavailable in school meals. This variation in state-level FTS rates, however, suggests a significant disparity in terms of the availability of the *locally* sourced fresh fruits and vegetables that are prioritized through FTS programming and not necessarily with other
programs, and nutrition education that can increase knowledge of and positive attitudes towards local, healthy foods (Bontrager Yoder et al. 2014).

Below I detail key theoretical streams in sociology and political science that I draw from and build on in the dissertation’s subsequent explorations of how national policy and local dynamics shape school food and FTS program outcomes.

**Policy Diffusion Theory**

Policy diffusion theory is an analytic framework used by scholars to model the spread of policies and programs across states—a process that is termed policy innovation. The framework suggests that national dynamics and internal, state-level characteristics shape patterns of policy innovation across the country. I draw on policy diffusion theory to explore the dual effects of federal policy and state-level sociopolitical factors contributing to uneven school food environments across the country as measured by FTS program prevalence. I build on previous research on the impact of federal policy and internal state characteristics on the diffusion of food-related policies across the U.S., including Mosier and Thilmany’s (2016) analysis of the adoption across states of organic food labeling policies. Rather than modeling the adoption and diffusion of policies and programs across states, however, I rely on policy diffusion theory to identify key national and state-level sociopolitical factors that might contribute to varying FTS rates at the state level. In what follows, I detail key tenets of policy diffusion theory to structure the investigation of the factors that lead to uneven school food program landscapes across states in Chapter 3.

A federalist decentralization of power, in which states maintain autonomous power in policymaking and program implementation across a variety of sectors, characterizes the U.S. political system. In this vein, Karch (2010) describes the states as laboratories of democracy, in which innovative policies and programs can be implemented in individual states and then disseminated if they prove successful. In the policy process literature, there are two principal explanations for the spread of policies and programs across the states: internal determinants and diffusion. Internal determinants explanations presume that political, economic or social characteristics of individual states determine the adoption of a new program or policy. Researchers have found that the internal motivation to innovate based on problem severity and the availability of resources for overcoming obstacles are key state-level determinants of policy and program adoption. Diffusion theory, on the other hand, views policy adoptions as emulations of previous adoptions by other governments. The governments of the 50 states are seen as a social system, and patterns of program and policy adoptions result from states emulating the behavior of other states, such as neighboring or regional states. (Berry and Berry 2007, 2014).

Among the multiple models of policy diffusion is the vertical influence model, which examines the impact of national policy on state-level program and policy adoptions. In vertical influence models, the national government is viewed as a policy pioneer that subsequently influences states to innovate (Berry and Berry 2007). In some cases of vertical influence, the national government can simply mandate policy adoptions to be carried out at the state level. Such national mandates require state officials to enact and implement a specific policy idea.

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6 For example, while DoD vendors are encouraged to purchase local products, only about 15 to 20 percent of the produce DoD provides to schools is currently considered local. For most DoD vendors, local denotes that the produce is sourced from within the state of service or adjacent states (USDA 2013a: 2). By contrast, improving access to local foods in schools is a central and guiding component of FTS initiatives (USDA 2016).
Karch (2006), for instance, cites the example of the Personal Responsibility and Work Opportunity Reconciliation Act of 1996, which imposed a 5-year limit on the receipt of welfare benefits. This 5-year limit became a mandatory component of state welfare policy. Another example is the National Voter Registration Act, which required states to allow individuals to register to vote at the same time that they register their motor vehicles (Berry and Berry 2007). “Mandates,” Karch (2006: 406) writes, “effectively end the diffusion process because they require state officials to adopt a particular policy innovation. State officials possess no discretion when national intervention comes in the form of a mandate.”

Vertical diffusion through federal policy mandates fosters an environment among the states in which policies are adopted evenly. In the case of school food policy, for example, the 2010 Healthy, Hunger-Free Kids Act mandated states to adopt updated school food nutrition standards in their implementation of federal school food programs. These updated standards included increasing the amount and variety of fruits and vegetables served, requiring only low fat and nonfat milk to be served, and setting limits on calories and sodium in school foods. Because these nutrition improvements to school foods were mandated through federal policy, the overall quality of school food in states throughout the country has uniformly improved (Johnson et al. 2016, Schwartz et al. 2015, Cohen et al. 2014, Bergman et al. 2014, Turner and Chaloupka 2015).

In other cases of vertical influence, states retain discretion over their program innovation. In these cases, the influence of the national government on policy adoption can take a variety of forms. National developments such as publicized debates and discussions that illuminate “hot” policy issues raise the political profile of specific policy innovations and frequently spur state activity, according to Karch (2010). As Karch (2010: 100) argues,

National developments seem to be an important diffusion mechanism that can transport policy innovations across state lines and contribute to the emergence of specific programs. Time-pressed state officials appear to take policy cues from their national counterparts. Innovations that are debated at the national level provide a visible, salient example on which state lawmakers can draw.

Influence of the national government on state-level activity can also take the form of providing financial incentives to states to enact programs or policies, most commonly through grant-in-aid programs such as Medicaid (Berry and Berry 2007). Federal grants can foster policy experimentation at state and local levels that would be difficult to achieve in a national program by making resources available to states to overcome obstacles to program adoption by subsidizing the cost of program innovations (Karch 2006). As Karch (2006: 406) writes, financial incentives “rank among the easiest and most direct way for national lawmakers to influence state policymaking without imposing a mandate.” National government fiscal incentives can influence state policymaking by making a program or policy more affordable. Researchers have found that innovative policies diffuse through the states more rapidly when financial incentives are provided to states from the federal government (Welch and Thompson 1980), and that federal grants to states push states to adopt policies that are in line with federal preferences (Allen, Pettus, and Haider-Markel 2004). However, because states are not required to enact a specific program or policy and retain ultimate authority over program innovation, this type of vertical influence can lead to uneven federal program implementation and subsequent
outcomes at the state level.

In cases in which program adoptions are not mandated by federal legislation, policy diffusion theory suggests that, in addition to national financial incentives, several internal, state-level factors may affect innovation and subsequent program outcomes in states. Among these are relevant state-wide legislation, state fiscal health, and government political ideology (Walker 1969, Berry and Berry 2007, 2014). Taken together, these state-level, internal characteristics are all important factors to keep in mind when analyzing policy and program adoption across the states.

Neoliberalism and Privatization

Moving from the national to the local level, my analysis builds on theories of neoliberalism and privatization from political and economic sociology to delve deeply into the nuances of local school food program dynamics and outcomes. Privatization of social services in the U.S., like school food programs, is a key component of the larger neoliberal project that has been underway in the country since the 1980s. In particular, neoliberalism, or the set of political economic practices focused on liberating individual entrepreneurial spirit and skills within an institutional framework characterized by strong property rights, free markets, and free trade, became the guiding doctrine of economic thought and management during the Reagan administration (Harvey 2005: 2-3). The turn towards neoliberalism was in large part a reaction to the Keynesian welfarism and social democratic politics that characterized the early post-war period (Brenner and Theodor 2002) in which governments became substantially larger and more economically influential as they increased social spending, public investment, enterprise ownership, and market regulation (Centeno and Cohen 2012: 319). During this era, state-guaranteed economic security, publicly provided social services, and government protection and provision of stable jobs were prized (Centeno and Cohen 2012: 323-4). Policymakers believed that employing these Keynesian principles would ensure economic stability and social welfare.

By the early 1970s, however, this economic model began to face the dual challenges of high inflation and economic stagnation. These were triggered in part by the oil crisis of 1973, which drove prices up and caused production and economic growth to slow down (Harvey 2005: 12). A global phase of stagflation emerged, which weakened existing governments and left policymakers open to different systems of thought (Mudge 2008: 709). Increasing competition from low-wage economies as world markets became more integrated, moreover, created economic instability and provided a credible rationale for governments to explore alternative modes of governance. In particular, Harvey (2005) argues that the wealthy, who had seen their share of the national income decline in the post-war era, were especially interested in dismantling the Keynesian framework in order to restore their economic power. In this way, the shifting international economic order of the 1970s created new forms of instability that “contributed to foster a global realignment of cognitive frameworks along freer market lines by dramatically strengthening the influence of global finance as a key constituency of national economic policy (Fourcade-Gourinchas and Babb 2002: 536).

As such, reforms to the economy that privileged the influence of the market over that of the state grew in popularity among political elites. A set of neoliberal policies focused on free trade, deregulation, privatization and commitment to private property crystallized (Centeno and Cohen 2012). The turn toward neoliberalism entailed the transfer of economic power and control
from the state to private markets (Centeno and Cohen 2012), with the main role of the state shifting to supporting institutional arrangements that guaranteed private enterprise and entrepreneurial initiative (Harvey 2005: 2, 64). Neoliberal policy, then, was built on the presumptions of what Mudge (2008: 706-7) describes as “the superiority of individualized, market-based competition over other modes of organization.”

Margaret Thatcher and Ronald Reagan were pioneers in enacting neoliberal policies throughout the 1980s. Thatcher, in particular, set out to privatize all sectors of the economy in Britain that were in public ownership, and she worked to dismantle the welfare state including education, health care, social services and universities by cutting back on state obligations and emphasizing the ideal of personal responsibility, corporate initiative, and innovation (Harvey 2005: 60-1). The elevation of neoliberal doctrine successfully redirected the resources of the state from those of welfare-oriented organizations towards agencies managing relations with capital, such as banks and finance ministries (Centeno and Cohen 2012: 325). Elections of both Thatcher and Reagan “solidified the view that free market economics provided a sound basis for policy” (Centeno and Cohen 2012: 324).

Key policies associated with neoliberalism include economic liberalization, deregulation, privatization, and monetarism. As Mudge (2008: 704) writes, all of these policies are targeted at promoting “unfettered competition by getting the state out of the business of ownership.” Importantly, privatization, or the withdrawal of the state from many areas of social provision, is a key component of the neoliberal project. As Harvey (2005: 160) notes:

The corporatization, commodification, and privatization of hitherto public assets has been a signal feature of the neoliberal project. Its primary aim has been to open up new fields for capital accumulation in domains hitherto regarded off-limits to the calculus of profitability. Public utilities of all kinds, social welfare provision, public institutions and even warfare have all been privatized to some degree throughout the capitalist world and beyond.

Privatization as an ideology is premised on private sector takeover of the provisioning of government services or programs (Kamerman and Kahn 1998). At its core, privatization entails a shift of activities or functions from the state to the private sector (Starr 1987). That is, sectors formerly run or regulated by the state are turned over to the private sphere and are deregulated—or freed from any state interference (Harvey 2005: 65). Privatization is presumed to be associated with competition, economic efficiency and choice (Larner 2000: 5). Its proponents contend that privatization, combined with deregulation and competition among private companies, eliminates bureaucratic red tape, increases efficiency and productivity, improves quality, and reduces costs both directly to the consumer through cheaper commodities and services and indirectly through reduction of the tax burden (Harvey 2005: 65).

Opponents of privatization, however, argue that the withdrawal of the state from social provisioning, including of health care, public education, and social services, effectively reduces the social safety net to a bare minimum and exposes larger and larger segments of the population to poverty (Harvey 2005: 76). Deregulation and privatization, moreover, are seen by critics as “transferring power away from democratically elected governments with a mandate to ensure universal service provision, towards private capital concerned primarily with furthering opportunities for accumulation” (Larner 2000: 8). The dismantling of the social welfare
apparatus through privatization has profoundly transformed the relationship between citizens and the economy (Fourcade-Gourinchas and Babb 2002) by facilitating a system that emphasizes personal responsibility and a disdain for bureaucracies and the welfarist state (Mudge 2008).

The history of privatization of social services in the U.S. has its roots in the U.S. government’s long history of providing subsidies to private charities for the delivery of services to the poor. By the 1960s, contracting with voluntary agencies for social services had expanded significantly, and the ideological commitment of the Reagan administration to the private sector in the 1980s accelerated the privatization process. As Kamerman and Kahn (1998: 5) note, between 1975 and 1992, the delivery of social services in the U.S. changed from a system of limited public provision to a system of extensive voluntary agency social services funded by the government through contracts.

The contracting out of publicly funded services to private, for-profit agencies has been identified by scholars and policy analysts as the most common form of privatization in the U.S. Contracting entails government financing of services and specification of various aspects of services, laid out in a contract with a private-sector organization that produces or delivers the services (Kamerman and Kahn 1998). “Social service privatization in the United States,” Kamerman and Kahn (1998: 9) write, “is part of a shift that includes deregulation, governmental downsizing, and the introduction of market or market-like mechanisms where they were previously considered inappropriate.” Public agencies turned to contracting with private agencies as a strategy for implementing rapid growth, as a means of lowering costs, and as a device for diversifying the delivery system and the providers (Kamerman and Kahn 1998: 6). The most frequently cited benefits of contracting are that it is an efficient and cost-effective process. However, an array of downsides have been noted including that contracting opens up more opportunities for fraud, may make it more difficult to ensure accountability for program outcomes, may reduce the ability of voluntary agencies to individualize responses to clients and force them to move toward uniform programming, may undermine confidence in government, may take jobs away from public agency staff, and may create wage discrepancies for staff doing similar work in public and private agencies (Kamerman and Kahn 1998: 12-3).

In the case of school food programs, school food authorities at the local level may either self-operate school food programs—meaning the school district employs school food service staff to run the program—or they can contract with a private food service management company (FSMC) to run the food service operation. A FSMC is a commercial enterprise that is contracted by a school district to manage any or all aspects of the school food service including consulting services, menu planning, food purchasing, preparation and delivery of meals, and bookkeeping. Because FSMCs have the ability to purchase food in bulk at lower prices from preferred vendors, outsourcing the management of school food service operations typically results from a district’s efforts to cut costs and reverse operating deficits. FSMC contracts with school districts are regulated by both federal and state codes.

The turn towards the privatization of school meal programs in the U.S. began during the Nixon administration, which fundamentally transformed the landscape of the NSLP. Nixon was responsible for vastly increasing funding for the NSLP, but he carefully targeted where the money went. In particular, he thought that government support for federal school meal programs should concentrate on helping the poor, rather than subsidizing the rich and poor alike. As such, he increased funding primarily for free meals, and turned the NSLP into the nation’s premier poverty program (Levine 2008). This had important consequences for the NSLP at large. As
Levine (2008: 154) writes, “As it turns out, pouring federal money into free and reduced-price lunches only exacerbated the local funding problem. Traditionally, states had used [full-paying] children’s fees to make up the difference between federal subsidies and the actual cost of meals…” So, when Congress mandated more free meals be made available, schools were forced to raise the cost of full-price lunches to subsidize them. The increased association of the poor with school meals and the rising costs of full-price lunches, however, caused full-paying students, “long the financial backbone of the school lunch program,” to stop buying meals at school. This threw schools around the country into financial disarray. At the same time, then Secretary of Agriculture, Orville Freeman, announced a new set of regulations that would, for the first time, allow school districts to contract with private companies to run, operate, and manage their lunch rooms (Levine 2008: 161). Despite private food service companies operating under a profit motive, Freeman promised that he would not allow the program to be “exploited for commercial purposes” (Levine 2008: 161).

As such, schools began turning to private industry to supply the food and, in some cases, to actually run their meal programs in an effort to bring down the cost of lunchroom operations. By reducing expenses and increasing revenue, privatization of school lunchrooms across the country to corporate food service companies became a desirable option for schools to cope with declining federal contributions to school meals and to cover the costs of free meals mandated by the government (Poppendieck 2010, Ralston et al. 2008, Levine 2008). As Levine (2008: 152) argues,

What emerged in many school districts by the end of the 1970s was a public/private partnership shaped fundamentally by business concerns such as profitability and efficiency…While public resources continued to underwrite the National School Lunch Program, few lunchrooms could stay in business without bowing in some way or other to the brand names, fast food, and corporate models of efficiency, productivity and profit.

Private contracts with food service companies provided a way for schools to meet their obligations to provide school meals as federal reimbursements failed to keep pace with food and labor costs. “Food service companies clearly had the capacity to prepare, freeze, and deliver meals more efficiently than did the schools,” Levine (2008: 160) writes. Private industry became the solution to turn cafeterias into viable operations as the federal government and states were unwilling to put enough resources into school cafeterias (Levine 2008: 160-1).

All of this was made possible, moreover, with the modification of federal nutrition standards for school meals during this time, which made it easier for the food industry to enter the school lunch market. New rules put no restrictions on the amount of salt, sugar, or fat school foods could contain, and fast foods, snacks, and a la carte offerings were now allowed in school cafeterias. (Levine 2008: 164). By permitting frozen heat-and-serve foods into the lunchroom, new regulations allowed food service companies to offer schools the perfect solution to feeding large numbers of poor children without having to invest in new equipment and facilities (Levine 2008: 186). Pre-packaged frozen foods also eliminated the need for skilled labor to scratch cook foods, and for extensive cooking infrastructure beyond freezers, refrigerators, and rethermalization units. Sodas, candy and snack foods flooded into schools through contracts worth millions of dollars between districts and private industry (Levine 2008: 162-3). The USDA
justified the privatization of school cafeterias “as a way to provide new revenues to ailing lunch programs” (Levine 2008: 165). As Nestle (2007: 194) describes it,

> It is easy to understand why schools might welcome corporate takeovers. With a big company in charge, they no longer have to deal with the consequences of serving foods that kids don’t like or with any other aspect of the complicated, messy, and expensive food service business. When management companies take over, the students return to the cafeteria, the operation stops losing money, and the workers keep their jobs and enjoy them more. Schools pay more for fast foods, but they also can add a higher markup and clear a larger profit.

By the 1980s, major food corporations saw their net worths skyrocket as they swiftly expanded into the booming school food market (Levine 2008: 166). In turn, school cafeterias increasingly began to resemble fast-food restaurants. Tacos, pizza, and french fries were seen as the offerings that would bring in enough business from full-paying students to support the struggling programs on a local level (Levine 2008: 168). Privatization continued to grow through the 1980s and 1990s, with food corporation giant Marriott expanding at a rate of 20 percent each year in the provision of school food (Levine 2008: 181-2). Federal rules, moreover, allowing food chains, including Pizza Hut, Little Caesar’s, Domino’s, Taco Bell, Subway, Chick-fil-A, and McDonald’s, to operate in schools in the 1990s contributed to soaring participation rates among students (Levine 2008: 182). Although federal policy prohibits food service companies from making a profit on school food programs, companies can still collect hefty management fees (Levine 2008: 187), and they can make money through a rebate system in which food processors routinely reward food service with rebates (typically around 14 percent) in return for large contracts (Komisar 2011).

Although the 1990s and 2000s saw a spate of state-level legislation banning soda, junk foods, and fast foods in schools, as well as significant reforms to federal nutrition standards for school foods to make meals healthier, privatization is still considered a popular option for many school programs across the country to remain financially viable. The number of school districts that contract out their meal services to a FSMC has steadily increased in recent years from only 8 percent of districts in the 1994-1995 school year to around 17 percent of districts nationwide in 2014 (Nestle 2007, The Pew Charitable Trusts 2014). My qualitative analysis of Sequoia City’s school food program in Chapter 3 explores the dynamics and consequences of school food program privatization for the nature and quality of meals served, and its impact on the ability to implement innovative FTS programming on the ground that can increase student access to and consumption of fresh fruits and vegetables.

*Social Movement Theory and Civic Agriculture*

Lastly, my research engages with sociological theories of social movement activism and civic engagement as it relates to food and agriculture. I draw on these theories in Chapter 5 to examine the dynamics of FTS activism and school food program innovation in Pacific City. As a movement that seeks to strengthen local and regional food systems by connecting school cafeterias with small-scale, local producers, FTS activism is a hallmark of the larger alternative agrifood social movement that promotes local alternatives to the industrialized food system.
Alternative agrifood scholars, however, have only recently begun to draw from social movement theory to analyze the growing alternative food movement in the U.S. (See for e.g. Hassanein 1999, Stevenson et al. 2007, Reynolds 2010, and Benson 2013). Employing social movement theory to analyze the alternative food movement reflects a shift in food research away from a focus on the dominant industrial system to a focus, instead, on the specific, local-level activities aimed at building alternative agrifood paradigms and initiatives (Stevenson et al. 2007). I contribute to this effort by exploring the dynamics of FTS activism on the ground. Specifically, I draw from social movement and organizational theories on leadership (Aldon and Staggenborg 2004), institutional entrepreneurship (DiMaggio 1988, Fligstein 1997), and partnerships and alliances (Van Dyke and McCammon 2010) to structure an explanation of the interrelated processes of social change in Pacific City.

First, although social movement scholars were slow to theorize the role of movement leaders for fear of over-emphasizing human agency at the expense of structural conditions that give rise to collective action, literature in this area has increasingly begun to recognize that leaders are critical to social movement success as “they inspire commitment, mobilize resources, create and recognize opportunities, devise strategies, frame demands, and influence outcomes,” (Aldon and Staggenborg 2004: 171). Importantly, social movement scholars have noted that leaders promote social change as strategic decision-makers who inspire and organize others, formulate ideologies, synthesize information, dialogue with stakeholders, network, and build coalitions (Aldon and Staggenborg 2004: 175).

The recent cross-pollination between social movement theory and organizational theory has offered yet more perspectives on agency and action in institutional settings that shed light on the role key actors play in social change efforts. In particular, neoinstitutionalist theories of institutional entrepreneurs seek to account for action-oriented institutional change despite pressures towards stasis by emphasizing how actors leverage resources to create new or transform existing institutional arrangements (DiMaggio 1988, 1991, Fligstein 1997, 2001). Echoing social movement theories of leadership, organizational scholars emphasize how institutional entrepreneurs engage in key actions including agenda setting, framing action, aggregating interests, and networking and coalition building to motivate change in an institutional setting (Fligstein 1997). Institutional entrepreneurs, moreover, are change agents who initiate divergent actions that challenge existing institutional logics, or established ways of doing things, and actively participate in the implementation of these changes (Battilana, Leca, and Boxenbaum 2009). Drawing from these theories of leadership and agency in social change processes, I explore how nutrition services directors can come to play a central role in school food reform efforts.

Key external partnerships are also crucial to bringing about change in school food programs. Social movement theories focused on alliances, partnerships and coalitions are helpful in exploring this phenomenon. Drawing from social movement and organizational scholars’ identification of the important role that institutional entrepreneurs and movement leaders play in terms of networking and alliance building to enact institutional change agendas, scholars of social movements have delved deeper into how strategic partnerships, alliances, and coalitions function to achieve social change. Transcending notions of social movements as homogenous social entities, the concept of social movement coalitions allows researchers “to grasp more fully the varied constituencies, ideological perspectives, identities, and tactical preferences different groups bring to movement activism” (Van Dyke and McCammon 2010: xii). Diani and Bison
(2004: 283), for example, note that inherent to social movement processes is the presence of “dense informal inter-organizational networks” in which “both individual and organized actors, while keeping their autonomy and independence, engage in sustained exchanges of resources in pursuit of common goals.” Moreover, Staggenborg (2010: 316) writes that coalitions have become a central focus of social movement scholars and contends that “by combining resources and coordinating strategies, movements and their allies are bound to be more effective in achieving goals and creating social changes in culture, institutions, and public policy.”

Coalition work in social movement activism ranges from loosely coupled activities aimed at similar goals to formal coalitions of organizations that bring together different types of actors to focus on particular social change campaigns or efforts (Staggenborg 2010: 317). Research on movement coalitions and partnerships indicates that these alliances generally emerge out of the identification of shared interests and identities, as well as preexisting networks and a history of cooperation (Staggenborg 2010). And as indicated above, institutional entrepreneurs and movement leaders often play a key role in establishing these crucial partnerships. Informed by the literature on social movement coalitions and partnerships, my analysis examines the extent to which school food reform efforts in the case study school districts relied on key partnerships between school officials and external groups, including local nonprofit organizations, to facilitate change to the school meals program.

Lastly, Lyson’s (2004, 2005) sociological theory of civic agriculture provides a useful framework for examining the dynamics of food system social change efforts that are embedded within the structure of local communities. Blending social science theories of civic engagement with the sociology of food and agriculture, the concept of civic agriculture provides a way to understand what Lyson identified as the trend towards locally based agriculture and food production that is tightly linked to a region’s social and economic development. Representing a community-oriented, sustainable alternative to the market-based model of large-scale, industrial agriculture, civic agriculture “embodies a commitment to developing and strengthening an economically, environmentally, and socially sustainable system of agriculture and food production that relies on local resources and serves local markets and consumers” (Lyson 2005: 94). The organizational manifestations of civic agriculture include farmers’ markets, FTS programs, neighborhood and school gardens, community supported agriculture (CSA) operations, community kitchens, and roadside fruit and vegetable stands (Lyson 2004).

Central to the concept of civic agriculture is civic participation and the notion of community problem-solving: “The locally based organizational, associational, and institutional component of the agriculture and food system is at the heart of civic agriculture,” Lyson (2004: 63) writes. Lyson (2005: 97-8) saw increasing civic engagement with the food system through the presence of organizations established to promote a flourishing localized agriculture as evidence of local problem-solving activities that are crucial to the functioning of civic agriculture in local communities. Expanding on Lyson’s (2005) initial formulation of problem-solving and civic agriculture, Bagdonis et al. (2009: 109) contend that Lyson’s use of the concept of civic engagement in the context of civic agriculture emphasizes the orientation of citizen efforts toward the needs and concerns of their wider community, and involvement that is thoughtful, deliberate, and reasoned.

Bagdonis et al. (2009: 109), however, argue that Lyson provides limited empirical findings on the practices and social interactions within communities that might foster civic agriculture beyond just the presence of associations and initiatives, and that we still know little
about the texture and evolution of civic practices related to localized food and agriculture projects. Drawing on social movement theories of framing, Bagdonis et al. (2009) attempt to fill this lacuna in the literature by illuminating how activists with two FTS initiatives in Pennsylvania construct meaning and possible solutions to particular problems in order to shed light on how civic engagement unfolds on the ground in relation to local agriculture projects. In the same vein, I build on Bagdonis et al.’s (2009) efforts to provide empirical evidence detailing the evolution and dynamics of civic practices associated with local food and agriculture social change efforts to contribute to the growing literature on civic agriculture and food system activism. In particular, I attend closely to the role of civically minded parent-activists in mounting school food reform efforts in Pacific City, and the ultimate widespread community buy-in for the proposed FTS initiatives in the district.

Summary of Conceptual Framework

This research draws on theory situated at the disciplinary intersection of sociology and political science. First, I draw from policy diffusion theory to explore the dual effects of federal policy and state-level sociopolitical factors on the prevalence of FTS programs throughout the U.S. (Berry and Berry 2007, 2014). In addition, the research engages with theories of neoliberalism and privatization in political and economic sociology (Harvey 2005, Centeno and Cohen 2012, Mudge 2008, Larner 2000, Fourcade-Gourinchas and Babb 2002, Kamerman and Kahn 1989) to explore the dynamics and consequences of district-level food program operational structures on the nature and quality of food served to students. Finally, the research engages with sociological theories of social movement activism (Aldon and Staggenborg 2004, Van Dyke and McCammon 2010) and civic agriculture (Lyson 2004, 2005) to examine the nature of FTS activism and school food program innovation on the ground. Taken together, this research both draws from and builds on these key theory bases to expand our understanding of the interrelated processes of national policy implementation, local dynamics, and grassroots activism in the execution and outcomes of federal school food programs.
CHAPTER 2
A STATE-LEVEL ANALYSIS OF THE FACTORS INFLUENCING THE PREVALENCE OF FARM TO SCHOOL PROGRAMS IN THE U.S.7

The passage of landmark federal school food legislation in 2010 signified a watershed moment for school nutrition in the U.S. The legislation substantially raised the bar for the quality of food served in schools in the face of alarming childhood obesity concerns. Significant policy changes included stricter nutritional requirements for all foods served in schools, a mandated increase in the amount and variety of fruits and vegetables served in school meals, and the establishment of competitive federal grant funding for FTS program implementation at the local level (Ralston and Newman 2015, FRAC 2010). The passage of the 2010 Healthy, Hunger-Free Kids Act promised to significantly improve the quality of food served in schools throughout the country.

In this chapter, I present findings from the macro-level, quantitative strand of the project that explores the factors affecting the quality of school food programs across the country in the aftermath of the 2010 HHFKA. This component of the dissertation questions why, despite uniform federal policy stipulated in the 2010 HHFKA, we find significant variation in the nature of federal school programs in states across the country when measured by the prevalence of FTS programs. The rate of FTS programs in a state is a key indicator of the quality of school nutrition that goes beyond the federally mandated updated nutrition requirements, as FTS programs have had documented success in increasing student access to and consumption of fresh fruits and vegetables (Nicholson et al. 2014, Bontrager Yoder et al. 2014). Recall from Chapter 1 that FTS rates vary dramatically across the country—ranging from 14.9 percent of school districts in Arkansas to 100 percent of districts in Hawaii and Rhode Island (USDA 2014b). This variation in state-level FTS rates suggests a significant disparity in terms of the availability of the locally sourced fresh fruits and vegetables that are prioritized through FTS programming, as well as access to nutrition education that can increase student knowledge of and positive attitudes towards local, healthy foods.

Drawing on the first-of-its-kind national FTS data, this chapter explores the puzzle of why there is such a difference in FTS rates between states, given federal policy encouraging such programs and their ability to help schools meet the updated federal nutrition standards. In this way, the chapter investigates the impact of federal, top-down legislation and state-level sociopolitical variables on school food environments across the country. In doing so, it sheds important light on the factors influencing school food programs across the country that provide critical nutrition to millions of children each day in the face of childhood obesity concerns. In what follows, I first, briefly, recall key tenets of policy diffusion theory discussed in Chapter 2, and introduce hypotheses generated from the literature that this analysis will test. I then present the findings from the regression analysis, and conclude with the broader implications of my results, and suggestions for future research.

Hypotheses Derived from the Policy Diffusion Literature

In my analysis, I draw on policy diffusion theory, which was set forth by policy scholars to

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7 Material in this chapter was originally published in the journal Food Policy.
model the spread and adoption of policies and programs across states (Berry and Berry 2007, 2014), to explore the dual effects of federal policy and local, state-level factors on the prevalence of FTS programs throughout the U.S. Rather than modeling the adoption and diffusion of policies and programs across states, however, I rely on policy diffusion theory to identify key national and state-level sociopolitical factors that might contribute to varying FTS rates at the state level. One key model of diffusion in this literature is that of vertical diffusion, which views the national government as a policy innovator that subsequently influences states to adopt policies and programs (Berry and Berry 2007). An important way in which the federal government can influence the adoption of programs and policies across the states absent of a federal mandate is through the provision of financial incentives to states in the form of grants that help make the adoption of a program more affordable (Berry and Berry 2007). Through its establishment of the federal FTS grants program, the 2010 HHFKA provided such federal monetary incentives to local entities within states to cover the costs of implementing and expanding FTS programs through a competitive grant process, but it did not mandate the adoption of FTS programs and policies throughout the country. In the absence of a national FTS mandate, the diffusion across states of FTS programs has not been an even process. In this way, the availability of locally sourced fresh fruits and vegetables and nutrition education that is promoted through FTS programs can vary significantly between states throughout the country operating under the same federal school food policy. Based on vertical diffusion theory, however, we would expect that the federal FTS grants have positively influenced the adoption of FTS programming across the country. Given that the 2010 HHFKA marked the first time that the national government specifically allocated funds for the purpose of assisting in the implementation of FTS programs that seek to improve access to local, fresh, and healthy foods in schools—I test the following vertical diffusion hypothesis in this study:

\[ H1 – VERTICAL DIFFUSION: \text{The more federal funding per student a state received through the competitive FY 2013 USDA Farm to School Grants Program, the more districts the state will have with farm to school programs.} \]

A second explanation for the spread of policies and programs across the states in the literature is internal determinants. Internal determinants explanations highlight the role of specific political, economic, and social characteristics of individual states in the policy and program adoption process. Key internal determinants established in the literature are relevant state-wide legislation, state fiscal heath, and government political ideology (Walker 1969, Berry and Berry 2007, 2014). In the case of school food policy, previous research has found that variation in internal state laws governing school food significantly affect the quality of school food programs when assessed by childhood obesity rates. States with school food legislation that sets standards that exceed federal USDA school meal standards and states with strong laws regulating competitive foods are associated with lower student body mass index status, for example (Taber et al. 2012, Taber et al. 2013). These findings suggest that FTS legislation at the state level might be a key factor influencing varying FTS rates across the country. Building on these findings, I focus on the introduction and passage of state-level FTS legislation as a second key independent variable in the analysis to assess the varying impact of state-level legislation on school food environments. To this end, I test the following internal determinants hypothesis in this study:
H2a – INTERNAL DETERMINANTS: States that have passed supportive farm to school legislation as of 2012 will have more districts with farm to school programs.

Progressive, local food practices and policies, moreover, have long been championed by liberal Democrats as opposed to Republicans, whose interests have been conventionally aligned with those of the industrial agriculture sector that produces heavily processed, pre-packaged foods. Liberal state government ideology, I predict, should emerge as a significant positive indicator of FTS rates. As such, I test the following internal determinants hypothesis in this analysis:

H2b – INTERNAL DETERMINANTS: States with more liberal political ideologies will have more districts with farm to school programs than states with more conservative political ideologies.

Finally, state fiscal health and affluence in terms of the wealth of residents might also affect FTS rates, as states with wealthier residents and a larger potential tax base to draw on might have more resources to develop and implement innovative programs such as FTS. To this end, I test a final internal determinants hypothesis:

H2c – INTERNAL DETERMINANTS: States with wealthier residents will have more districts with farm to school programs than states with less wealthy residents.

The above hypotheses take into account that, in the case of school food policy, changes to federal legislation in 2010 establishing a competitive grant program have fostered an environment in which states have had increasing access to federal funds to subsidize the cost of the adoption and expansion of FTS programs that can help support the new nutrition standards. Uneven state-level legislation and internal political and economic dynamics, however, have the potential to lead to varying FTS rates across the country.

Sample

States are the unit of analysis. The initial sample consisted of the 50 U.S. states plus the District of Columbia. I identified Hawaii as an outlier and removed it from the sample because there is only one school district in the entire state. Moreover, because data for D.C. were not available for several key independent variables, I did not include D.C. in the analysis. As such, the final sample consisted of 49 states (n=49).

Measures

Table 2 below provides descriptions of study variables and their sources.

Dependent variable

I use the presence of FTS programs in a given state, which can help support the federally
Table 2. Variable Measurement and Data Sources

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</tr>
<tr>
<td>Farm to school rate</td>
<td>Percent of a state's school districts that participated in farm to school activities (SY 2012-2013)</td>
<td>United States Department of Agriculture Farm to School Census (2013)</td>
</tr>
<tr>
<td><strong>Independent Variable: Vertical Diffusion</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Federal farm to school grant dollars received</td>
<td>Dollar amount of federal farm to school grant dollars received per student (FY 2013)</td>
<td>United States Department of Agriculture Farm to School Grant Program (2015) and U.S. Department of Education National Center for Education Statistics School Universe Survey, Common Core of Data (2012-2013)</td>
</tr>
<tr>
<td><strong>Independent Variables: Internal Determinants</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Farm to school legislation</td>
<td>Coded 1 if state has passed legislation that establishes a statewide farm to school program and provides support from local government agencies, coded 0 otherwise (2012)</td>
<td>National Farm to School Network and Vermont Law School Center for Agriculture and Food Systems State Farm to School Legislative Survey (2002-2014)</td>
</tr>
<tr>
<td>Political ideology</td>
<td>State government ideology conservative-to-liberal scale (0-100), with higher scores indicating greater liberalism (2012)</td>
<td>Berry et al.’s (2010) NOMINATE measure of state government ideology</td>
</tr>
<tr>
<td>Mean income</td>
<td>Mean income of people in the state in the past 12 months in 2013 dollars (2013)</td>
<td>United States Census Bureau (2013)</td>
</tr>
<tr>
<td><strong>Independent Variables: Control Variables</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Average farm to school rate of SARE* peer region (lagged one year)</td>
<td>Average farm to school rate of peer states in SARE region (SY 2011-2012)</td>
<td>United States Department of Agriculture Farm to School Census (2013), United States Department of Agriculture Sustainable Agriculture Research and Education (SARE) Program (2015)</td>
</tr>
</tbody>
</table>

mandated school food nutritional improvements through a focus on the local sourcing of fresh fruits and vegetables, as the outcome of interest in the analysis. Because FTS programs provide a model for positively influencing students’ eating habits through increased access to fresh and healthy foods (Joshi and Beery 2007), state-level FTS rates provide a reasonable measure of the
accessibility of locally sourced, fresh foods in school meals. I measure the presence of FTS programs in a state by the percentage of school districts in a given state with FTS programs for school year (SY) 2012-2013, as defined by the USDA Farm to School census. A district is said to have FTS activities if it participates in any of the following activities: procurement of local or regional foods including fruits, vegetables, eggs, and meat, agriculture or nutrition-based educational activities, such as, but not limited to, serving local food products in school meals and snacks, serving local food products in classrooms, conducting educational activities related to local foods, inviting farmers into the classroom and providing culinary classes focused on local foods, field trips to farms, farmers' markets, or food processing facilities, educational sessions for parents and community members, and creating and tending school gardens (USDA 2014a).

Independent variables

Hypothesis 1 predicts that states that have received more federal funding from the USDA Farm to School Grants program per student will have more districts with healthy food environments than states that have not received as much money. I use FY 2013 USDA Farm to School Grants Program funding data and the total number of students in each state to calculate the amount of federal funding received per student by state. This measure captures the impact of federal legislation on state-level FTS rates.

I operationalize the impact of state-level policy on FTS rates (hypothesis 2a) by including a dichotomous measure of state-level FTS legislation. For the purposes of this analysis, I focus on whether or not a state has passed legislation establishing a statewide FTS program and providing program support from local government agencies as of 2012, according to the National Farm to School Network and the Vermont Law School Center for Agriculture and Food Systems’ State Farm to School Legislative Survey: 2002-2014. For each state, I coded the

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8 The USDA 2013 Farm to School Census was distributed to 13,133 school districts in March of 2013, and 9,887 districts completed the survey, resulting in a 75 percent response rate. As such, the dependent variable for this analysis is calculated based on districts that responded to the survey, as opposed to the total number of districts in each state. Data are not weighted for non-responses (USDA 2014c). As such, it is important to note that the USDA Farm to School Census may underestimate FTS rates by not weighting the data for non-responses—especially for large states like Texas and California that have significantly more school districts than smaller states. For example, in the case of California, the reported FTS rate for the entire state is based on the 625 school districts that responded to the survey, not on the 860 total school districts in the state. To achieve more accurate FTS rates, especially for larger states, the data would need to be weighted for non-responses. Nevertheless, the USDA Farm to School Census provides a useful starting point for analyzing varying FTS rates across the country.

9 The USDA 2013 Farm to School Census asked respondents if the district or any schools in the district participated in FTS activities during the 2011-2012 school year. Response options included (a) Yes, (b) No, but started activities in the 2012-2013 school year, (c) No, but plan to start activities in the future, (d) No activities currently and no plans, and, (e) I don’t know. For the analysis, I summed answers (a) and (b) to determine the total percent of school districts participating in FTS activities for school year 2012-2013 (USDA 2014a).

10 All states except Utah submitted at least one application to the FY 2013 USDA Farm to School Grant Program.

11 Because of how the State Farm to School Legislative Survey defines state-level legislation that establishes statewide FTS programs, the passage of such legislation in a given state does not automatically imply that all districts in the state participate in FTS programs, as might be first assumed. Legislation establishing statewide FTS programs, according to the survey, ranges from mandated state-level coordination of local procurement for districts throughout the state, to legislation requiring districts to give preference to local producers whenever possible, to requiring state public health departments to make FTS grants available to districts. As such, the use of this variable in the analysis is an attempt to capture the impact of the passage of such legislation in a given state on FTS rates.
variable as follows: 1 = state has passed FTS-related legislation, and 0 otherwise.

Hypothesis 2b predicts that states with more liberal state political ideologies will have more districts with FTS programs than states with more conservative political ideologies. Measuring state-level political ideology is difficult and is most commonly operationalized through “broad-brushed proxies” such as partisan legislative control, which often indicates more volatility than is plausible (Carley and Miller 2012: 744). The least-problematic metrics currently available to measure state political ideology, according to many policy diffusion scholars, are the Berry et al. (1998) state-level citizen ideology measure, and the Berry et al. (2010) state government ideology measure. For the purposes of this study, I use Berry et al.’s (2010) NOMINATE measure of state government ideology, which measures the average location of the elected officials in each state on a liberal-conservative continuum, relying on “common-space” congressional ideology scores to construct a measure of state party ideology. The results of the measure are represented numerically on a sliding scale of policy liberalism ranging from 0 to 100, with higher scores reflecting greater liberalism.

Finally, hypothesis 2c suggests that states with wealthier residents will have higher FTS rates than states with less wealthy residents. Following previous policy diffusion studies including Daley and Garand (2005) and Karch (2006), I use mean per capita income, collected from the U.S. Census Bureau, as a proxy for the resources available in a state to implement innovative programs such as FTS initiatives.

Control variables

In addition to testing these key hypotheses, my analysis also controls for two key variables that I predict might affect FTS rates at the state level. The first control accounts for the strength of a state’s local and regional agricultural sector, which I capture as the number of food hubs in the state per 10,000 state residents. Food hubs are businesses or organizations that help build infrastructure for local and regional food systems by providing small and mid-sized producers with the ability to market their production locally and directly to individuals, restaurants, wholesalers, and institutions—such as schools, hospitals and corporate cafeterias. “Food hubs are part of a growing local food system that strengthens rural economies by lowering entry barriers and improving infrastructure to create, as well as expand, regional food markets” (Matson, Sullins, and Cook 2013: 6). Because FTS programs depend on accessibility to locally grown products and a thriving regional agricultural sector, I anticipate that more food hubs per 10,000 state residents will be positively associated with state-level FTS rates.

Second, I control for the possibility that FTS rates in states may be related to their broader geographic location within the United States. In particular, states clustered in specific geographic regions of the country are more likely to have similar FTS rates in comparison to states in more distant regions of the country. Policy diffusion scholars have found that states often look to their neighbors when pursuing policy innovation, and that states are more likely to adopt a new program or policy if their neighboring states have already done so (Daley and Garand 2005, Mooney 2001, Berry and Berry 1990). This regional diffusion pattern may emerge for a variety of reasons including that states in similar regions often face common social, political and cultural conditions that give shape to specific policy issues at hand. In the case of FTS, for example, a positive regional effect could be due to similar environmental conditions for local food production, or long-standing regional political subcultures that might promote or
hinder FTS activities. To account for this possible positive regional effect in FTS rates, I classify states into regional peer groups based on the USDA’s Sustainable Agriculture Research and Education (SARE) region classifications for the United States. Figure 3 below depicts these region classifications, which are a modified version of the regions designated by the U.S. Census Bureau.

*Figure 3. USDA SARE Program Regions of the U.S.*

Data Source: http://www.sare.org/About-SARE/SARE-s-Four-Regions.

I rely on the SARE region classifications for my analysis of FTS rates because they correspond to distinct geographic areas of the U.S. based on regional agricultural priorities. SARE was founded in 1988 with the passage of the Agricultural Productivity Act amidst a growing call from Americans for a government-run, sustainable agriculture program. SARE was the first “science-based, grassroots, problem-solving, business-not-as-usual grant program” to fund research on sustainable agriculture. It is committed to promoting agriculture that enhances environmental quality and natural resources, integrates natural biological cycles and controls, and sustains the economic viability of this kind of farming in the United States. By the 1990s, SARE began funding farmer-led research to learn on-the-ground sustainable agriculture techniques, and by the 2000s, with the growth of sustainable and organic agricultural practices, SARE expanded its grant making to areas including farmer diversity, creating regional and local
food systems, and food distribution. Operationally, the SARE program has divided the country into four regions. A volunteer administrative council of local farmers, ranchers, academics, government officials, agribusiness firms and nonprofit representatives guides each region. These councils set regional priorities and make grants based on these priorities (USDA SARE 2012). In this way, the SARE classifications are appropriate regional distinctions to make when analyzing FTS programs in the United States.

To capture this possible regional effect in FTS rates, I follow Daley and Garand’s (2005) methodology for constructing a regional effects measure. For each state in the sample, I calculated the average FTS rate for all of the states in its SARE peer region, while omitting the state of interest, for one year prior to the outcome variable to allow for possible causality of the regional effects measure. For example, to calculate the regional effects variable for New York, I averaged the farm to school rates for SY 2011-2012 of the 11 other states in the Northeast region, excluding New York. I repeated this procedure for all of the 49 states in the study sample. I then used these state-specific averages as an indicator of regional effects in the regression analysis. I anticipate that this variable will have a positive impact on a state’s FTS rate.

Results

Descriptive statistics

Table 3. Descriptive Statistics for Study Variables before Standardization

<table>
<thead>
<tr>
<th>Variable</th>
<th>Mean</th>
<th>SD</th>
<th>Min</th>
<th>Max</th>
<th>n</th>
</tr>
</thead>
<tbody>
<tr>
<td>Farm to school rate</td>
<td>49.65673</td>
<td>22.92873</td>
<td>14.92</td>
<td>100</td>
<td>49</td>
</tr>
<tr>
<td>Federal farm to school grant dollars received (per student)</td>
<td>0.1692274</td>
<td>0.2359192</td>
<td>0</td>
<td>1.023297</td>
<td>49</td>
</tr>
<tr>
<td>Farm to school legislation</td>
<td>0.3265306</td>
<td>0.4738035</td>
<td>0</td>
<td>1</td>
<td>49</td>
</tr>
<tr>
<td>Political ideology</td>
<td>40.54571</td>
<td>29.90613</td>
<td>2.58</td>
<td>91.63</td>
<td>49</td>
</tr>
<tr>
<td>Mean income (per capita)</td>
<td>27675.22</td>
<td>4027.457</td>
<td>20618</td>
<td>37829</td>
<td>49</td>
</tr>
<tr>
<td>Food hubs (per 10,000 residents)</td>
<td>0.0077442</td>
<td>0.0184976</td>
<td>0</td>
<td>0.1278051</td>
<td>49</td>
</tr>
<tr>
<td>Average farm to school rate of SARE region peers</td>
<td>44.37367</td>
<td>15.13069</td>
<td>31.22272</td>
<td>73.62636</td>
<td>49</td>
</tr>
</tbody>
</table>

*Study sample includes all U.S. states except Hawaii and DC
**Sustainable Agriculture Research and Education

Means, standard deviations, and ranges are presented for all study variables before standardization in Table 3. Farm to school rates range from 14.92 percent of districts with FTS programs in Arkansas, to 100 percent of school districts with FTS programs in Rhode Island. Out of the states that received federal FTS grants, Vermont received the highest amount, at $1.02 per

12 See Appendix A for analytic strategy details.
student, while Texas received the least, at $0.009 per student. Thirteen states did not receive any funding. Of the 49 states in the sample, 33 states have not passed statewide FTS legislation, while 16 have. On the state political ideology score, Massachusetts and Vermont are the most liberal, with scores above 90, while South Carolina and Georgia are the most conservative, with scores below 4. Connecticut and Maryland have the highest per capita income, while Mississippi and Arkansas have the lowest. Meanwhile, Texas has the lowest number of food hubs per 10,000 residents, while Vermont and Maine have the highest number of food hubs per 10,100 residents. Eleven states have no food hubs at all. Finally, states in the north central region had the lowest lagged peer average FTS rates, while states in the northeast had the highest rates. Table 4 below shows average FTS rates by SARE region for school years 2011-2012 and 2012-2013.

Table 4. Farm to School Rates by SARE Region

<table>
<thead>
<tr>
<th>SARE Region</th>
<th>Average Farm to School Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2011-2012</td>
</tr>
<tr>
<td>North Central</td>
<td>34.22%</td>
</tr>
<tr>
<td>Northeast</td>
<td>70.48%</td>
</tr>
<tr>
<td>Southern</td>
<td>37.19%</td>
</tr>
<tr>
<td>Western*</td>
<td>36.20%</td>
</tr>
</tbody>
</table>

*Excluding Hawaii

Correlations

Table 5. Bivariate Correlations of Study Variables

<table>
<thead>
<tr>
<th></th>
<th>FtS</th>
<th>FtSGD</th>
<th>FtSL</th>
<th>PI</th>
<th>MI</th>
<th>FH</th>
<th>FtSSARE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Farm to school rate</td>
<td>1.0000</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
</tr>
<tr>
<td>Federal farm to school grant dollars received (per student)</td>
<td>0.2989*</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
</tr>
<tr>
<td>Farm to school legislation</td>
<td>0.2253</td>
<td>0.1290</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
</tr>
<tr>
<td>Political ideology</td>
<td>0.5327**</td>
<td>0.3898**</td>
<td>0.2338</td>
<td>...</td>
<td>...</td>
<td>...</td>
<td>...</td>
</tr>
<tr>
<td>Mean income (per capita)</td>
<td>0.5398**</td>
<td>-0.0167</td>
<td>0.2781</td>
<td>0.5161**</td>
<td>...</td>
<td>...</td>
<td>...</td>
</tr>
<tr>
<td>Food hubs (per 10,000 residents)</td>
<td>0.3195*</td>
<td>0.6593**</td>
<td>0.1872</td>
<td>0.2890*</td>
<td>0.0560</td>
<td>...</td>
<td>...</td>
</tr>
<tr>
<td>Average farm to school rate of SARE region peers</td>
<td>0.6136**</td>
<td>0.2261</td>
<td>0.1904</td>
<td>0.5417**</td>
<td>0.5181**</td>
<td>0.2490</td>
<td>...</td>
</tr>
</tbody>
</table>

*Correlation is significant at the .05 level
**Correlation is significant at the .01 level
A correlation matrix for the study variables is presented in Table 5. All of the study variables were correlated with the outcome variable in the hypothesized direction. Overall, the results from the correlation matrix suggests that state political ideology, mean income, and lagged average FTS rate of SARE region peers are the strongest, positive predictors of a state’s FTS rate.

Regression analysis

Table 6. Model Comparisons

<table>
<thead>
<tr>
<th>Model 1</th>
<th>Model 2</th>
<th>Model 3</th>
<th>Model 4</th>
<th>Model 5</th>
<th>Model 6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vertical Diffusion</td>
<td>Internal Determinants</td>
<td>Vertical Diffusion &amp; Internal Determinants</td>
<td>Controls</td>
<td>Full Model</td>
<td>Robust Full Model</td>
</tr>
</tbody>
</table>

**Independent variables**

- **Federal farm to school grant dollars received (per student)**
  - Model 1: 6.7889* (3.1620)
  - Model 2: 4.8563 (2.9694)
  - Model 3: 2.3518 (3.5508)
  - Model 4: 2.3518 (3.7599)

- **Farm to school legislation**
  - Model 1: 2.3330 (5.9422)
  - Model 2: 1.3724 (5.8641)
  - Model 3: 0.8114 (5.5861)
  - Model 4: 0.8114 (5.7329)

- **Political ideology**
  - Model 1: 7.9158* (3.2014)
  - Model 2: 5.2734 (3.5344)
  - Model 3: 2.7925 (3.4960)
  - Model 4: 2.7925 (3.8657)

- **Mean income (per capita)**
  - Model 1: 7.9705* (3.1684)
  - Model 2: 9.5107** (3.2505)
  - Model 3: 6.6065* (3.2731)
  - Model 4: 6.6065* (3.1669)

**Control variables**

- **Food hubs (per 10,000 residents)**
  - Model 1: 4.0400 (2.6673)
  - Model 2: 2.5360 (3.3497)
  - Model 3: 2.5360 (2.6368)

- **Average farm to school rate of SARE region peers**
  - Model 1: 12.9578*** (2.6705)
  - Model 2: 7.8194* (3.1685)
  - Model 3: 7.8194* (3.4911)

- **Constant**
  - Model 1: 49.6993*** (3.1590)
  - Model 2: 49.2031*** (3.3033)
  - Model 3: 49.4786*** (3.2479)
  - Model 4: 49.4816*** (2.5789)
  - Model 5: 49.4397*** (3.0784)
  - Model 6: 49.4397*** (3.1146)

- **R² adjusted**
  - Model 1: 0.0699
  - Model 2: 0.3403
  - Model 3: 0.364
  - Model 4: 0.3802
  - Model 5: 0.4309
  - Model 6: ...

- **aic**
  - Model 1: 444.4
  - Model 2: 429.5
  - Model 3: 428.6
  - Model 4: 425.5
  - Model 5: 424.9
  - Model 6: 424.9

- **n**
  - Model 1: 49
  - Model 2: 49
  - Model 3: 49
  - Model 4: 49
  - Model 5: 49
  - Model 6: 49

Standard errors in parentheses
* p<0.05, ** p<0.01, *** p<0.001
The use of regression analysis to explore the impact of the study variables on FTS rates and whether the vertical diffusion and internal determinants variables have an independent effect on FTS rates net of the control factors yielded the results presented in Table 6.

Model 1 regresses just the vertical diffusion independent variable on FTS rates and reveals that the amount of federal FTS funding received per student has a statistically significant, positive effect on the FTS rate. Model 2 regresses just the internal determinants variables on FTS rates. The results reveal that state political ideology and mean income per capita have statistically significant, positive effects on FTS rates. State-level farm to school legislation, meanwhile, also has a positive impact on FTS rates, but this result is not statistically significant. Model 3 regresses both the vertical diffusion and internal determinants variables on FTS rates. With all of the key independent variables in Model 3, mean income per capita emerges as the only statistically significant predictor of FTS rates. While the other variables retain their positive effect on FTS rates, their impact is not statistically significant. Next, Model 4 includes only the control variables. The results show that the regional effects measure has a particularly large, statistically significant positive impact on FTS rates. Food hubs per 10,000 residents, meanwhile, has a positive, but not statistically significant effect on the outcome.

Finally, Models 5 represents the full model with all of the study variables, and Model 6 represents the full model with robust standard errors. The results from the full model demonstrate that even controlling for key state-level factors, mean income per capita remains a statistically significant predictor of FTS rates. The remaining independent variables retain their positive effect on FTS rates in the full model, but none have a statistically significant impact on the outcome. Among the control variables, only the regional effects measure retains its statistically significant, positive effect on FTS rates. Model 5’s adjusted R² value of .43, moreover, indicates that the full model including both the controls and all of the independent variables provides the most explanatory power on FTS rates than the previous models.

Discussion

The results of this analysis indicate that while all of the study’s hypothesized key vertical diffusion and internal determinant factors have the expected effect on FTS rates, only mean income per capita and the average FTS rate of SARE region peers reach conventional levels of statistical significance in the full model. Of the variables that do not reach conventional levels of statistical significance in the full model, the passage of FTS legislation at the state level is perhaps the most puzzling. One possible explanation for why this variable does not have a statistically significant effect on the outcome could be that the actual content of the FTS legislation is perhaps more important that the mere passage of the legislation, which was measured in the analysis. This finding points to the need for a more specific measure of the content of state-level FTS legislation to more adequately capture the effect of state laws on FTS rates. Of the remaining variables that fail to reach conventional levels of significance in the full model, both federal FTS grant dollars received per student and political ideology achieve statistical significance in Models 1 and 2 respectively, indicating that these variables have an important impact on FTS rates, but that other variables tested in the analysis have a more significant effect on the outcome in the full model.

In particular, the statistically significant impact of the regional effects measure suggests that there is a strong regional effect with FTS rates in the United States and lends support to
regional diffusion models in the policy diffusion literature (Daley and Garand 2005, Mooney 2001, Berry and Berry 1990). While more in-depth analysis is needed to tease out the specific dynamics at play with regards to the regional effects on FTS rates, I speculate that state political ideology and mean per capita income may play a role. In particular, recalling the results of the bivariate correlations, the SARE regional effects measure is strongly correlated with both mean income \((r = 0.52, p < .01)\), and state political ideology \((r = 0.54, p < .01)\). These correlations indicate statistically significant, positive associations between the variables and suggest that similar state political ideologies and state fiscal health in specific SARE regions are key factors operating as regional effects on FTS rates. An example is the case of the Northeast SARE region, in which all of the states have relatively high mean incomes, liberal political ideologies and resultantly high FTS rates when compared to other SARE regions.

That mean income per capita in a state has a statistically significant, positive effect on the outcome indicates that as the mean income level within a state increases, so, too, does the percentage of districts within the state that participate in FTS programs. This result is consistent with previous policy diffusion research that a resource-rich environment in a state is crucial to fostering the enactment of innovative programs (Daley and Garand 2005). Because of the federal government’s relatively recent and limited financial support for state-level FTS programs, states have likely had to rely on their own internal wealth to subsidize the cost of developing FTS programs. More affluent states then, are the most likely to have the resources necessary at the local level to pursue the development of such programs in schools throughout the state. More affluent states, for example, might have more vibrant nonprofit sectors that work on school food reform through FTS efforts as a result of larger private donations from state residents to local community organizations.

This finding highlights the inequities in state-level implementation of federal school food programs based on state-level affluence. Although the effect of federal FTS grants does not reach conventional levels of statistical significance in the analysis, the results are encouraging that this vertical diffusion mechanism has the capacity to address this state-level inequity based on internal state affluence to fund and support FTS programs. In this way, this research holds important policy implications for enhancing the quality and equity of school food programs across the country. In particular, these findings underscore the need for increased federal FTS grant allocations targeted at states with less internal wealth to subsidize the cost of pursuing FTS programs that increase the accessibility of fresh and healthy foods for students. In this way, the federal government can play a crucial role in reducing the large gap in FTS rates throughout the country by supporting states with fewer internal economic resources through federal FTS grants. Previous research, moreover, has similarly called for increased federal funding for school food programs to facilitate a more equitable federal school meals program across states, including Peterson’s (2011) suggestion to replace the current, inconsistent in-kind commodity program for the NSLP with increased cash funding for schools in order to allow them to uniformly improve meal quality and child nutrition outcomes.

Conclusions

Drawing on novel national FTS data, this chapter has explored the impact of federal, top-down legislation and state-level factors on FTS program rates across the country. Despite federal school food policy, as mandated in the 2010 Healthy Hunger-Free Kids Act, that set national
nutrition standards and regulations for school food programs across the country and established federal funding for FTS programming, FTS rates still vary significantly by state. Consistent with past work on policy innovation, including Mosier and Thilmany’s (2016) diffusion study of organic certification policies, this study found that both external and internal determinants have an impact at the state level on FTS rates. This research especially highlighted that regional effects and per capita income are key factors influencing FTS rates at the state level.

The study has two key limitations. The first limitation pertains to the use of USDA FTS grants data as a measure of top-down influence on school food programs at the state level. Competitive grants like these require a significant amount of local-level initiative to apply for as funding flows directly from the USDA to local-level entities and not via the state. In the case of the grants data used for this study, the USDA funded just 19 percent of applications for the FTS Grants Program in FY 2013. In this way, grants data like those used in this study may bias findings on the influence of top-down policies towards states that already have the internal capacity to support local entities to apply for the competitive grants. A significant limitation of using this kind of competitive federal grants data as a measure of top-down impact on FTS rates, then, is that the measure captures the effect for states that were able to put together successful grant applications at the local level, and thereby biases the results towards the ability of local entities within states to successfully receive federal funding. Nevertheless, this kind of grants data does provide a worthwhile starting point for better understanding the influences of federal policies on state-level FTS rates.

A second limitation of the study is the difficulty in producing statistically significant results because of the relatively small sample size (n = 49) for traditional statistical analysis. As such, several variables in the analysis, including federal FTS grant funding, political ideology, state-level FTS legislation, and accessibility to food hubs were all found to have a positive impact on FTS rates, but did not reach conventional levels of significance in the final models. Collection and analysis of school district-level data nested within states would help to address this limitation by increasing the study sample size.

Nevertheless, the findings from this research point to several concrete steps forward for facilitating more equitable school nutrition environments around the country. Specifically, the results indicate that the following actions will all help to generate higher FTS rates in states where accessibility to fresh and healthy food is most lacking: 1) increasing federal FTS grant funding to states with fewer economic resources to implement FTS programming, 2) advocating for the passage of comprehensive, state-level FTS legislation that establishes FTS programming at the state level and provides funding for FTS programming, and 3) increasing the number of food hubs throughout the country to strengthen local and regional food systems that are integral to successful FTS programming. Together, these actions can help make FTS programming more viable in all states across the country, and can help schools provide the healthiest food possible to millions of students every day.
CHAPTER 3

PRIVATIZING THE LUNCHROOM: A CASE STUDY OF OPERATIONAL DYNAMICS AND SCHOOL FOOD PROGRAM OUTCOMES IN CALIFORNIA

In the U.S., state and local authorities play a critical role in the decentralized implementation of some federal programs and policies based on a long tradition of deference to local control in certain policy arenas (Peterson, Rabe, and Wong 1986, Lowry 1992, Manna 2006). As such, despite uniform improvements to federal school food policy as stipulated in the 2010 Healthy, Hunger-Free Kids Act, varying local-level conditions have the potential to significantly shape distinct school food program outcomes in school districts throughout the country.

In the next two chapters, I turn to a focus on school food program dynamics at the local level. I qualitatively explore how varying local dynamics affect the nature and outcomes of school food programs in two case study school districts in California. In this chapter, I concentrate on an analysis of Sequoia City School District’s (SCSD) school food program. I begin the chapter with a brief, contextual overview of Sequoia City and the school district. I then turn to a historical overview of SCSD’s nutrition program—highlighting how financial strain triggered the program to become privatized to Pierce Services, a multinational food service management company (FSMC), in order to recover financially from a $1.4 million deficit. In the second part of the chapter, I turn to the effects that privatization of the school nutrition program has had on food offerings and FTS efforts in the district. Building on theories of neoliberalism and privatization from political and economic sociology, I argue that instead of fostering innovation in the delivery of school food services, privatization has effectively discouraged the district from pursuing progressive school food programming, including the sourcing of fresh foods from small, local farmers. I conclude the chapter with a discussion of the implications of these findings for childhood health and nutrition and for the privatization of social services, more generally.

Sequoia City

Sequoia City is a relatively populous, and wealthy California city. According to recent statistics, Sequoia City is home to over one million Californians. The population is primarily Hispanic (33 percent), Asian (32 percent) and White (28 percent), with Black residents composing only 3 percent of the population. Compared to the state of California as a whole, in which the population is primarily White (40 percent), Hispanic (38 percent), and Asian (13 percent), and only 6 percent Black (U.S. Census Bureau 2016), the racial makeup of Sequoia City is less White and Hispanic, and more Asian. Sequoia City School District, meanwhile, has an enrollment of approximately 33,000 students. In relation to racial makeup of the city as a whole, students in the school district are more Hispanic (53 percent), and slightly less White (25 percent) and Asian (13 percent).

Sequoia City is a hotbed of technological innovation, boasting a large concentration of startup companies, venture capital firms, and computer industries. At $84,647, the median household income for Sequoia City residents is well above the statewide figure of $61,818. The city’s poverty rate, 11 percent, moreover, is below the statewide rate of 15 percent (U.S. Census Bureau 2016). In addition, 47 percent of Sequoia City School District students eligible for free or
reduced-price lunch, which is well below the statewide number of 59 percent. As these figures demonstrate, Sequoia City is a relatively economically advantaged California city. Finally, California county-level voter registration data reveals that Sequoia City is located in a county in which 47 percent of residents are registered as Democrats, and 20 percent are registered as Republicans. This political breakdown generally aligns with the state of California as a whole, in which 45 percent of registered voters are Democrats, and 27 percent are Republicans (CSS 2016).

The Path to Privatization

Prior to 2007, Sequoia City’s food service program was self-operated, meaning the district employed school food service staff to operate the program. During this time, school meals were prepared and packaged at approximately 12 different production kitchens in the district, primarily the middle and high schools, and then delivered to the surrounding middle and elementary schools. The district has 39 total schools including 25 elementary schools, two K-8 schools, six middle schools, and six high schools. In the early 2000s, SCSD’s nutrition services staff began exploring the possibility of moving to a central kitchen model of food production, in which meal preparation for the entire district would be consolidated into a single site. The motivation for this transition to a central kitchen model was twofold. The first motivation was to improve the quality of the food served in the district. Penny, director of food services for SCSD at the time, explained that the food served in the district through the site-based model was notably subpar:

Almost everything we were producing at the schools for food was packaged foods—either frozen, rewarmed, or prepackaged in some form, and there wasn’t a lot of fresh fruit and vegetables. There wasn’t a lot of salad, there wasn’t a lot of freshly prepared food...There was a consensus that the food we were providing kids was not so great. It didn’t taste so great. Nutritionally it met all the qualifications. But it just wasn’t so great (Interview, March 9, 2016).

Like most school food programs around the country, Sequoia City was serving primarily frozen, highly-processed, heat-and-serve meals to the students. “The underlying purpose before anything was to provide better service to students,” Penny told me, “we had internal discussions multiple times about how can we provide better food to students faster, fresher, and that really was our purpose to begin with” (Interview, March 9, 2016). In addition, Carolyn, a consulting field supervisor for SCSD’s food services at the time, told me that the hope was that by moving to a central kitchen, food in the district would become more uniform and standardized (Interview, February 19, 2016).

Economic concerns with the site-based production model were the second motivating factor for transitioning to a central kitchen. The site-based production model of preparing meals at numerous locations throughout the district generated high food and labor costs as multiple production sites required large numbers of kitchen managers and created inefficient food purchasing practices that resulted in excessive food costs. Penny emphasized that saving money on food and labor costs was a top priority for the food program. In describing the issue of labor and moving to a central kitchen model, for example, she explained, “We had a growing older
population of food service workers, so we knew a lot of folks were retiring in the next few years. So instead of having a manager at each high school kitchen, we would reduce the amount of kitchen managers to basically the ones that were handling the central kitchen” (Interview, March 9, 2016).

To explore the possibility of transitioning to a central kitchen model, the district partnered with a food service consulting and design firm to conduct a feasibility study to examine if a central kitchen for the district would be both cost-effective and allow for the serving of better quality food in the school cafeterias. Upon completion of the study, SCSD’s food services staff presented the study’s findings recommending the building of a central kitchen in the district to the board of education for inclusion in the district’s upcoming bond measure. The $429 million bond measure was to be focused on improving dilapidated facilities in schools throughout the district including upgrading plumbing, heating, electrical systems, floors, roofs, playgrounds, and gymnasiums. Eager to improve the quality of food in the district and reduce program operating costs, the board of education allocated $5.5 million of the bond funds to the construction of the central kitchen. With little fanfare, Sequoia City voters passed the bond measure with 69 percent of the vote in the spring of 2002. Construction of the central kitchen began in 2004 and continued through 2006.

While the central kitchen was being built, Sequoia City’s food services staff continued to think of ways to reduce program costs. In this pre-HHFFKA landscape with few restrictions on the content of school meals, pizza was being offered every single day in the high school lunch lines, and elementary schools routinely had “pizza parties” on Fridays. Pizza was supplied to the district through pricey contracts with outside vendors including Pizza Hut and Dominoes. According to a local news report at the time, the district spent $1.4 million over five years in contracts with outside pizza restaurants (Noyes 2009). With the anticipated opening of the new central kitchen, nutrition services staff brainstormed ways to create a healthy, low-cost pizza for students. Ken, the manager of food services at the time, proposed the idea of installing a large-scale industrial pizza making machine that would allow the district to make its own pizza onsite. With a huge stainless steel production line, the machine was marketed to be able to produce up to 1,000 pizzas an hour. No other school district in the country had one. Ken also thought that, in addition to not having to pay outside vendors for pizza, the district could actually make money by using the machine to produce extra pizza to sell to other area school districts. As Penny recounted: “The intent was not only to produce our own for our district, but also to use that as another auxiliary service for other districts to be able to produce pizza and be able to recoup the cost. So even though it was expensive, the intent was always to not only produce for the district but to produce for outside” (Interview, March 9, 2016). According to a local news report, the district spent $720,000 to buy the pizza machine, and another $2.2 million to build a home for it in the new central kitchen (Noyes 2009). Sequoia City school board documents reveal that by the time construction on the central kitchen concluded in 2006, total bond measure funding exceeding the original amount allocated for the kitchen, creating a $2.6 million shortfall in funding for the district.

The central kitchen opened for production in January of 2007. Soon after the opening, SCSD’s food services staff realized they were in over their heads. To begin with, no one on staff could get the expensive new pizza machine to work. Operating the machine required specialized labor that the district lacked. The pizza machine needed a full-time technician to keep all of the components, gadgets, and conveyor belts running smoothly, as well as a crew to clean it each
day (Noyes 2009). In addition, Penny recalled that, in hindsight, they were trying to do too much at once with not enough experienced workers:

I think we were understaffed… and I think we tried to incorporate both bringing the central kitchen up at the same time as producing pizza. And if I could go back and do it over again, we would’ve gotten the central kitchen, everything running smoothly first and then started the pizza production second. It was too much at one time… And it just got overwhelming for the department. And then we shut down the pizza making operation, but the central kitchen continued going (Interview, March 9, 2016).

From a machine touted to produce 1,000 pizzas an hour, the district was ultimately only able to produce around 2,000 pizzas in total (Noyes 2009). The district quickly abandoned the machine and returned to ordering pizzas from external vendors.

As a result of the failed pizza machine venture, the food services program quickly fell into financial trouble. The district’s Cafeteria Fund, used to track revenue and expenditures of school food program operations, reached a deficiency of revenues over expenditures of nearly $1 million soon after the opening of the central kitchen. Within six months of the central kitchen opening, a contract with Pierce Services, a large, multi-national FSMC, for consulting services for the district’s school food program, was presented to Sequoia City’s school board as a possible solution. Pierce Services’ portfolio included operating as full-service school food program consultants in approximately 479 schools in California, and 3,550 schools nationwide (Personal electronic communication with Pierce Services, November 5, 2015). Pierce Services guaranteed to the board that by their second year consulting for the program, they would balance the cafeteria fund. Board of Education meeting minutes from the time state, “Benefits of [Pierce Services] include the fact that…they are experienced with school programs, they can assist in increasing revenue and reducing costs, and they guarantee that they will balance this fund” (July 12, 2007). And as Penny noted to me, “[Pierce Services] is very good at showing good numbers” (Interview, March 9, 2016). The board unanimously approved a 2-year contract with the company for on-site consultation, plus menu planning, marketing, accounting, and purchasing. The contract went into effect in July of 2007. District food service employees including cafeteria staff and managers kept their jobs in the district, but both Ken and Penny left. Pierce Services brought in on-site consultants to oversee the program in conjunction with district staff.

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13 In the state of California, statutes and regulations require school districts to retain general managerial control over their school food service operations. As a result, FSMCs are allowed to consult for school food programs, but not manage them (CDE 2015).
14 Sequoia City School District financial documents did not itemize the exact amount the district was required to pay Pierce Services for its services. Federal and state regulations, however, stipulate that school districts that contract out their nutrition program operations may pay FSMCs in one of two ways. First, a school district can pay a flat, fixed-rate administrative fee to the FSMC for operation of their food service program. Alternatively, a school district can pay a per-meal fee to the FSMC, which is inclusive of operational costs of the program and administrative fees (USDA FNS 2016b).
15 California regulations prohibit FSMC contracts that result in the elimination or displacement of district personnel or positions. This means that school districts cannot contract with a FSMC to perform any activities that are currently or customarily performed by school district food service staff, and school districts are responsible for hiring staff for food services (CDE 2015).
Sequoia City’s decision to privatize the school food program in the face of financial strain echoes findings from the general literature on the privatization of social services. In particular, the literature contends that public agencies turn to contracts with private agencies as a strategy for implementing rapid growth and as a means of lowering costs for the delivery of services. As Kamerman and Kahn (1998) note, the most frequently cited benefits of privatization are that it is an efficient and cost-effective process. In this way, privatization is seen as a way “of making appropriate institutional adjustments so that services can be moved from niches where they are less efficiently provided to niches where they are more efficiently provided” (Brodkin and Young 1989: 139). For SCSD, moving from a district-run school food program to a privately-run program proved extremely cost-effective and efficient, as Figure 4 below reveals.

Figure 4. Sequoia City Cafeteria Fund Excess (Deficiency) of Revenues over Expenditures, 2006-2014

According to annual district financial audit reports, prior to privatization of SCSD’s school food program, the district’s Cafeteria Fund had a deficit of revenues over expenditures in the amount of $999,847 for the 2006-2007 school year. To offset this nearly $1 million deficit, the district’s General Fund contributed $1,381,009 to the Cafeteria Fund. After Pierce Services’ first year of consulting for the 2007-2008 school year, the Cafeteria Fund’s deficit of revenues over expenditures was reduced to $422,329, and the district’s General Fund contributed an additional $244,332 to the Cafeteria Fund to continue to help offset program losses. In May of 2008, the school board renewed the district’s contract with Pierce Services, with an option to renew annually for up to four consecutive years. By the end of the 2008-2009 school year, the Cafeteria Fund’s deficit of revenues over expenditures was reduced to $1,309, and by the conclusion of the 2009-2010 school year, the Cafeteria Fund broke even, and generated an excess of revenues over expenditures in the amount of $263,818. As the district continued to
renew its contract with Pierce Services each year, it saw the Cafeteria Fund continue to accrue an excess of revenues over expenditures. After the third year with Pierce Services, the Cafeteria Fund had an excess of revenues over expenditures in the amount of $263,818. This figure grew to $667,154 by the end of the fourth year, and $799,313 by the end of the fifth year with Pierce Services. By the 2013-2014 school year, Pierce Services had stabilized the program by reaching a reserve of three months’ operating costs. Because state and federal laws require that all revenues that school districts accrue in the Cafeteria Fund be used only for the operation or improvement of the school food service (CDE 2013), the district began a spend-down plan of the excess funds at this time, which included one-time expenditures such as replacing kitchen equipment throughout the district and purchasing new delivery trucks.

When I asked Sylvia, a district manager for Pierce Services who works with approximately 20 school districts including SCSD, how Pierce Services was able to so dramatically turnaround the financial situation of Sequoia City’s school food program, she said plainly that they focused on purchasing and systems. Elaborating, she explained:

[SCSD] was doing everything and anything for everybody, and they didn’t have a plan. They were all over the board. They’d just opened a central kitchen. They didn’t have the skillset or people to be running a central kitchen within their own rank and file. They basically lacked systems that tracked food costs, that track the cost of the menu, that track participation rates. They really just didn’t have the tools or the ability to actually make fact-based decisions that are financially based. So, we brought the tools to run those numbers (Interview, November 9, 2015).

Leaving the pizza machine aside, Pierce Services focused on revamping SCSD’s product purchasing infrastructure and generating systems to track food costs and participation rates. In addition, they recognized that the central kitchen was not built to the proper capacity to prepare food for the entire district or to prepare the complex menus for the elementary, middle and high school food programs in the district. As such, Pierce Services transitioned the district back to a model of on-site food preparation at the middle and high schools in the district, and focused the central kitchen on food preparation for just the elementary schools and on food storage for the district.

Pierce Services’ financial turnaround of SCSD’s school food program lends support to arguments in the social welfare literature that privatization provides a cost-effective and efficient alternative to state-delivered social services (Kamerman and Kahn 1989). In describing the benefits of school food program privatization as opposed to self-operation, Sylvia explained:

I think we provide a lot of support. We have a lot of people that can help make sure that [things] get done correctly…Like when there’s a $2 million deficit, just getting that fixed and being out there to train staff and things. Just the resources alone we have a lot of them to be able to support that…. And all of the

16 California regulations limit Cafeteria Fund net cash resources to an amount that does not exceed three months’ average expenditures (CDE 2013).
procurements, all the stuff for food and supplies and everything, we have a whole procurement department that takes care of that…So it really takes a lot off of [the school district’s] plate so that they can really focus on customer service (Interview, November 9, 2015).

Sylvia’s argument in favor of privatization is couched in terms of cost-effectiveness and efficiency. In particular, Sylvia references the company’s handling of procurement for school districts as a key benefit of privatization. Indeed, FSMCs are able to save districts money through their ability to purchase food in bulk at contracted prices with corporate food suppliers. Because FSMCs get prices for food items from manufacturers that school districts are not able to get on their own, they are able to substantially lower food costs for school districts. This makes the allure of privatization very strong for school districts looking to save money.

Consequences of Privatization for Food Quality

Privatization, however, has important nutritional consequences for food served in schools. Food offerings in privatized cafeterias are shaped in large part by a rebate system in which corporate food processors routinely pay FSMCs rebates (typically around 14 percent) in return for bulk contracts (Komisar 2014). This rebate system that FSMCs engage in is highly controversial. To begin, the specifics of the system are shrouded in secrecy as for-profit firms like FSMCs work very hard to keep their finances and operations out of public view. Although USDA rules require that FSMCs pass on to school districts any rebates they receive, this rule is commonly ignored in the industry due to minimal government oversight, and FSMCs instead pocket the rebates. As Bruske (2010a) notes, despite the USDA rules, “it’s widely assumed in food service circles that the big players—Chartwells, Sodexo, Aramark—are not declaring all of the rebates to which school districts are entitled.” For example, in 2010, Sodexo, one of the world’s largest FSMCs, agreed to pay the state of New York $20 million to settle complaints that it fraudulently pocketed rebates from food manufacturers that it was supposed to turn over to New York State school districts and colleges (Komisar 2011, Bruske 2010b). A lack of transparency plagues the system in which FSMCs stand to profit substantially from rebates worth millions.

Because rebates are awarded by manufacturers after specific products are purchased, moreover, the rebate system heavily influences both what manufacturers FSMCs purchase foods from, and the types of foods they purchase for students. In particular, the rebate system incentivizes FSMCs to purchase foods from corporate vendors that pay large rebates, and also influences FSMCs to purchase certain products over others in an effort to get the largest rebates. These are often heavily processed convenience items like sugary breakfast cereals, cookies and muffins (Bruske 2010a), as well as frozen items like fried chicken patties, corn dogs, and french fries that also allow districts to save significantly on kitchen labor and equipment by requiring little more than reheating to be served (Siegel 2011). In this way, the rebate system discourages the sourcing of school food from small-scale, local farmers in favor of large, corporate manufacturers who offer big rebates. As Komisar (2011) notes, “the rebate deals with national food manufacturers cut out local farmers and small producers like bakers, who could offer fresh, healthy food and help the local economy.” As such, food offerings in school cafeterias privatized by FSMCs are heavily influenced by an opaque corporate rebate system.

Indeed, in Sequoia City, food offerings seemed to be influenced by Pierce Services’
corporate partnerships. Common meal offerings in the middle and high schools on days I visited cafeterias in the district were what many in school food circles would deem “carnival food”—prewrapped spicy chicken sandwiches served with potato wedges, cheese and pepperoni pizza, chicken tenders, and jumbo hot dogs. Contributing to the carnival-like food environment, the items were served on small, disposable paper food trays, similar to the kind that you would get served a hotdog or hamburger on at a baseball stadium, sports arena, or carnival. I observed that the vast majority of this food arrived at the schools frozen, and the cafeteria workers simply defrosted and heated the items up prior to the lunch periods. Even peanut butter and jelly sandwiches and bean and cheese burritos came prewrapped and frozen from a corporate distributor and were just defrosted and served to the students still in the individual packaging. Very few menu items required any sort of assembly or scratch preparation. During one of my cafeteria site visits, Tammy, a cafeteria manager at a middle school in the district, struggled to name any meal items that actually required assembly or preparation on her part. After some thinking, she offered that when spaghetti or macaroni and cheese are on the menu, the cafeteria staff actually boil the water and make the pasta on site (Interview, October 8, 2015). Barbara, another cafeteria manager in the district, explained that she assembles a set amount of individually packaged chicken Caesar salads and sandwich wraps in the mornings, but that the vast majority of the items she serves require little more than defrosting and reheating (Interview, September 17, 2015).

Some schools I visited had salad bars with lettuce and sliced fruits and vegetables available, but most just had whole apples, oranges, bananas, and bags of baby carrots in metal bins by the register for students to grab as they were checking out in order to meet the federal fruit and vegetable requirements for reimbursable meals. Susan, a cafeteria manager for one of the high schools in the district, told me that the pizza and the spicy chicken sandwiches are the first to go every day, and that students barely eat out of the salad bar. For a school with over 1,000 students enrolled, Susan puts out enough salad for only 20 servings each day, and there are usually still 10 servings left by the end of the lunch period. As for the apples, oranges, bananas, and baby carrots—they usually go from students’ trays directly to the garbage (Interview, September 21, 2015).

The food offerings in Sequoia City’s elementary schools were similarly reflective of prepackaged, processed foods that require little more than thawing to serve. On the day I visited the central kitchen in the district, where meals for all of the elementary schools are prepared several days in advance, workers were preparing and packaging orange chicken with brown rice entrees to be shipped to the elementary schools. While the brown rice was freshly made on site, the orange chicken was made from two prepackaged components: large bags of frozen, breaded and fried chicken pieces, and jumbo bottles of manufactured orange chicken sauce. In addition, I observed metal trays stacked with frozen, prepackaged grilled cheeses and fruit pastries that had been sent from the manufacturer and were being thawed out to be transferred to the elementary schools. Moreover, since salad bars are not widespread among the elementary schools, central kitchen workers were also packaging individual side salads made primarily from iceberg lettuce, with a small amount of spinach and prepackaged shredded carrots. Lunch entrée items on the day I visited an elementary school cafeteria in the district included chicken nuggets and a dinner roll, and “brown bag” meals consisting of string cheese, a small yogurt, and goldfish crackers.

Several individuals I spoke with while conducting fieldwork in the district commented on the poor quality of the food served since Pierce Services took over. Tammy, a cafeteria manager
at a SCSD middle school told me that “honestly, it’s gotten a lot worse.” She explained that the district switched manufacturers to work with a corporate partner of Pierce Services once they took over, and the quality of the food deteriorated; “it’s just cheaper food and you can tell,” she said (Interview, October 8, 2015). In a similar vein, Arya, a parent in the district, described the food as “poor quality, prepackaged, processed food” (Interview, November 9, 2015); while Elaine, another parent, said,

> When my kids started elementary school, I was kind of disgusted by the food to be honest with you that came out of the cafeteria. My children don’t even eat in the cafeteria, but it just kind of made me sad for the kids that have to eat that food. I feel like it’s way too processed. And I help out with yard duty with the kindergartners and so I’m seeing firsthand what they’re eating every single day. And when the little kids come up to me and they say, "Ms. [Elaine], can you help me open this," I want to be like, "No, I don't want to help you open that. I want to throw it in the garbage." (Interview, October 14, 2015).

Elaine continued to describe to me an example of a lunch that is regularly served to students in her child’s school (and one that I also observed being served to elementary school students):

> I mean, the other day – oh my gosh, so the other day, this is what an example of one of the lunches was – in a little plastic bag was a bag of Goldfish, a cheese stick, and a little – it was a yogurt that – it was one of those crazy “Garanimal” type yogurt things. It had animals and it was all high fructose corn syrup. And then they could have milk. But they, of course, chose chocolate milk because you can have whatever kind of milk that you want. So, yeah. That was a lunch (Interview, October 14, 2015).

**Consequences of Privatization for Farm to School Programming**

Despite these complaints about the poor quality of the food since Pierce Services took over, I discovered that widespread, grassroots school food reform efforts were virtually nonexistent in the district. Arya and Elaine were two standout activists in the district who worked to get a monthly salad bar into their children’s elementary school, but there was not any sort of larger, grassroots FTS movement in the district that I could identify. Arya explained that Pierce Services’ focus on the bottom line was a big deterrent to trying to bring about large-scale reforms to the district’s food program:

> I think it’s all about the bottom line. I don’t think it’s about, you know, what do our kids need necessarily. It’s more, the district’s watching the bottom line and they have to balance their budget and it’s just a piece of the big picture, as far as the budget...It’s just, this is the budget, this is what we’re getting, this is what’s available. We’re working with [Pierce Services], this is it. So, I think that and just trying to get anything done takes so long and jumping through so many hoops. You know, it’s just so, so ridiculously hard. I think it’s very frustrating (Interview, November 9, 2015).
Elaine expressed a similar hopelessness in mounting grassroots efforts to improve the quality of school food with Pierce Services operating the program: “You really are standing up to people who don't have the same values that you do, which is totally fine. I mean, everybody can have their own opinions. But you are outnumbered hundreds to one. I mean, it's not a fun place to be” (Interview, October 14, 2015).

Indeed, Elaine and Arya’s efforts to get a salad bar into their child’s elementary school were initially met with resistance from the district’s food services department. Arya recalled the frustrating experience she had when she first approached the director of the food services department at the time, a Pierce Services consultant, about her idea for a salad bar to increase student access to fresh, healthy foods:

…and then the experience I had with the [food services director], I didn’t feel like he was very receptive to what I wanted as a parent… it seemed like it wasn’t really a priority. You know, just unnecessary. That was just the feeling I got. You know, he didn’t really say anything to that effect. He actually, you know, he seemed like he was totally on board and agreeable, but then, nothing happened, nothing came out of it (Interview, November 9, 2015).

Arya and Elaine had the full support of the school’s principal, Teresa, however, and, together, they were able to re-approach new Pierce Services staff in the district’s nutrition services department the following year and successfully get Pierce Services on board to assist with the salad bar plan. The new food services director was more amenable to the project, Arya recalled. As a result, the salad bar launched in the school as a once-a-month, week-long pilot program during the 2014-2015 school year. Because of labor union issues that prevented the district from paying an extra person to staff the salad bar in one school if other school sites in the district did not also have an extra person, the salad bar had to be staffed entirely by parent volunteers (Interview, November 9, 2015). Arya recounted how Pierce Services came to the school to train the parents so they could get their sanitation certifications. In addition, Pierce Services handled all of the produce ordering. However, Arya noted that Pierce Services did not make an effort to source the produce for the salad bar from local, small-scale farmers, and instead just worked with their already-established, corporate produce vendor (Interview, November 9, 2015). In this way, the procurement for the salad bar did not generate any extra cost for the district. “So, the district is ordering and providing all the food for the salad bar… And the kids do not have to pay anything extra, so they can just get the salad bar and there’s no charge, or if they get hot lunch, they can also get the salad bar, you know, at no additional fee,” Arya explained (Interview, November 9, 2015).

Elaine enthusiastically described to me how successful the salad has been in the school: “The first time we ever had our salad bar, the line went completely across the blacktop. It went through the cafeteria across the blacktop. And it was like, ‘Oh my God, these kids all want salad.’ It’s like a dream come true for me” (Interview, October 14, 2015). Arya echoed Elaine’s remarks on the success of the salad bar:

The kids love it. It was a huge success, huge success. Amazing how the kids ate. I thought, “Oh, I’ll do the salad bar,” you know, “they’ll come and take, like, the corn,” you know, whatever. Like, all the little side yummy things. But they really
truly ate whole salads. We had romaine lettuce and spinach mixed together and then one time we only had the romaine and they were upset; they wanted the spinach in there, too. It was super cool (Interview, November 9, 2015).

Indeed, when I visited the elementary school with the salad bar that Arya and Elaine had worked to get running, I observed the student excitement surrounding the fresh fruits and vegetables. On the day I visited the cafeteria, the salad bar was packed full with lettuce, cherry tomatoes, corn, carrots, broccoli, chickpeas, and cucumbers. Four parent volunteers, dressed in plastic aprons and hair nets, were busy helping to serve students as they went through the salad bar line. They were refilling the fruit and vegetable compartments as needed, and keeping the area generally clean. The line for the salad bar was consistently backed up throughout the lunch periods as students eagerly heaped the fresh fruits and vegetables onto their plates. It was obvious that for these students, the salad bar was an exciting treat.

Ultimately, Arya and Elaine were pleased with the success of their efforts to improve student access to fresh, healthy foods through the salad bar program at their children’s elementary school, but they were also aware of how tenuous the sustainability of the program was because of its reliance on dedicated parent-volunteers. “We got it going and it does have to be run by volunteers, which is really a lot of, you know, a lot of work,” Arya noted, “I wanted to have it every day, but then when it ended up having to be volunteer-run, it’s so hard to get enough people to work for a week once a month that we can’t do it every day” (Interview, November 9, 2015). In a similar vein, Elaine expressed skepticism at the ability of parents at other schools in the district to successfully implement salad bar programs:

And so I've had some other friends at different elementary schools that have heard me over the years ranting and raving about some of these things. Like, "Oh my gosh, how do we get involved? We want a salad bar." And so I do have some friends over at [another SCSD elementary school] who I think are trying to work and doing that as well. It hasn't been pushed through yet, but I know that it takes – it takes a dedicated staff of volunteers because [the district is] not going to fund something that like they just show up with a bunch of vegetables and produce if no one's there to man it and all of that kind of stuff (Interview, October 14, 2015).

In addition, when I asked Arya if she had been able to generate any sort of larger momentum among parents to improve school food in the district, she responded, “I think they all agree that the food is not great…but I don’t think anyone was willing to take it on [because of the time commitment]” (Interview, November 9, 2015). Taken together, Arya and Elaine’s remarks underscore the notion that without a district-wide commitment to increasing the availability of fresh foods in all schools through programs like monthly salad bars, the success of improving the quality of food in the district is totally dependent on the dedication and motivation of parent volunteers And taking on these kind of reform efforts is no easy task for a parent—when I asked Arya if she had considered tackling any additional reform efforts aside from the salad bar, like advocating for more locally sourced, fresh food items, she laughed, and said, “I wanted to, but once I realized how hard it was just to get the salad bar, all my effort ended up going in that and no, I mean, I still – that’s something that I would like to do, but I need a lot of support…So no, I have not done anything else on any other part” (Interview, November 9, 2015).
Instead of a widespread grassroots FTS movement in the district, what I discovered was happening in Sequoia City, instead, was a top-down, corporate FTS initiative developed and implemented by Pierce Services. While I was conducting fieldwork in the district, Pierce Services was in the process of rolling out what they characterized as a FTS program for their school districts in California. A Pierce Services press release from August 2015 described the initiative in the following way:

[Pierce Services] is launching its “[FreshFocus California]” program this month in 41 school districts statewide. The California-specific program places an added emphasis on fresh and healthy options for students by leveraging the state’s bounty of locally grown produce and ingredients throughout the menu… This new emphasis on utilizing California-sourced ingredients means that [Pierce Services] is purchasing the following for the California schools they serve: 100 percent of the fresh dairy is from California farmers and manufacturers; 100 percent of the fresh bakery items are both made in California and delivered by California companies; and 80 percent of all fresh produce is California-grown (Pierce Services Press Release, August 28 2015).

At first glance, the description of the “FreshFocus California” initiative seemed like genuine FTS programming that would connect school districts with local, small-scale farmers to strengthen local and regional food economies. However, I discovered that, in practice, the initiative actually just reinforced already-established corporate purchasing practices through a top-down, one-size-fits-all program being marketed as FTS programming. To begin, the motivation for the initiative stemmed not from any initiative on behalf of parents or Pierce Services to actually improve the quality of the food served in the district, but from a desire on behalf of Pierce Services to increase its business in California. As Donna, a Pierce Services’ regional Vice President responsible for developing and implementing the initiative told me,

…we've lost some business over the years where school districts have been taking the food program back in-house. So back to doing it themselves. And I think, you know, and I think part of that was that while we showed our value in certain ways, we probably weren't progressive enough as it related to the food program… I have not been able to grow the business. I haven't sold any new business here in California, so I'm feeling like the offer that we have as a company in the U.S. is not attractive to my California folks… I think there's a higher, a stronger sense of awareness around clean foods and local foods and scratch cooking, much more so I think than other parts of the country… So, what we realized was, is our national program needed to be enhanced with something else. And that's how we came to [“FreshFocus California”] (Interview, October 29, 2015).

Instead of a bottom-up, grassroots effort to improve the quality of food served in the district, the FTS initiative in Sequoia City came from the top, with a focus on expanding Pierce Services’ business to stay competitive in California’s school food landscape. Moreover, instead of researching small and local farmers to begin partnering with for the
initiative, as is often the cornerstone practice of FTS programming, Donna began by going to Pierce Services’ internal purchasing department and realized that,

…the truth was, 80 percent of the products that I bought, so that is produce and grocery items, are either grown or manufactured by a company in California, 80 percent. And I'm like, holy cow, why aren't we talking about this? That's great…. And then the other piece was 100 percent of our dairy products and 100 percent of our bread products are also made and put out there by California manufacturers. So, as it related to local, I'm doing a good job. I'm doing a good job (Interview, October 29, 2015).

Rather than forging new relationships with local farmers for the initiative, Donna simply looked at what the company was already doing in terms of purchasing for its school food programs in California, and decided to begin marketing that as “local” procurement for the “FreshFocus California” program. When I asked her if she focused at all on small or local farmers for this new initiative, she said:

…while we love to identify specific neighborhood farmers, we're looking at local for the sake of this program is all of California…if it's local to California, if it's grown in the state, if it's made in the state, if it's a company in this state that's, you know, putting a product out there and we're partnering with them, to me that's local. And I know everyone's got their own definition of it but for the sake of [“FreshFocus California”], local is California (Interview, October 29, 2015).

For FTS programming in the U.S., there is no established, federal definition of local. Each school district must create a definition for local that works for its needs and goals based on the unique geography and climate, and abundance of local producers and manufacturers where the district is located. Many districts define local as within a certain number of miles, or within the county. Districts can also opt to define local as within their state, but defining local as an entire state usually only makes sense for states that have restricted numbers of local producers, or short growing seasons (USDA FNS 2015). Donna’s defining of local as the entire state of California for the sake of the “FreshFocus California” program does not represent an attempt to support small, local farmers in the ethos of genuine FTS programming. California is the top agricultural producing state in the country—it produces almost half of all the fruits, nuts and vegetables grown in the country, it leads the nation in milk production (Parsons 2014), and it is home to numerous large corporate food companies including Dole, Sunkist, Sun-maid, and Driscoll. Defining local as the entire state of California allowed Donna to rebrand many of Pierce Services’ established procurement relationships, likely with large, corporate food companies, as “local.” Pierce Services leveraged the scale of its operations and the scope of its already-established supplier network within California to mount what looked like FTS programming in order to attract more business. As a result, Pierce Services was able to retain its competitive national pricing for purchasing bulk food items. Moreover, menu offerings in the district did not change in any meaningful way because of the “FreshFocus California” program. Most importantly, accessibility to locally grown fresh fruits and vegetables, one of the main benefits of
Discussion

Proponents of privatization and the contracting out of social and educational services argue that by involving for-profit firms in the delivery of services, we can make available significantly more cost-effective alternatives that are superior to state-run services by promoting competition, corporate initiative, and innovation (Kamerman and Kahn 1989). My empirical findings support the notion that privatization can facilitate cost-effective programming. Privatization of SCSD’s food program led to a complete financial turnaround of the program’s deficit in a relatively short amount of time. This can be directly attributed to the cost-saving measures implemented by Pierce Services through corporate partnerships and bulk food contracts that the district would not have been able to enter into on its own.

My findings, however, do not support the idea that privatization facilitates corporate initiative, innovation, and increased quality on the ground in the delivery of school food services. On the contrary, privatization in Sequoia City has reinforced more of the same—as evidenced by the “FreshFocus California” initiative. My findings echo Burch’s (2009: 123) conclusions on the privatization of educational services in the U.S., in which she argues that private firms adopt practices and design products to signal their legitimacy as providers of public services and in order to legitimize their role as extensions of the state. They look to the practices of other firms, to the language of policy, to established routines and practice used by districts as cues for what they should be doing...Rather than break the mold, private firms can in fact reinforce tradition.

In the case of Sequoia City, Pierce Services looked to other school food programs throughout California to figure out how to stay competitive in the school food market as they were losing business. Instead of implementing genuinely innovative FTS programming to keep pace, however, they simply rebranded what they were already doing in the delivery of school food services and put forward more of the same under the guise of FTS programming. Consequently, food offerings in SCSD did not change substantially toward an increase in fresh food items sourced from local, small-scale farmers.

Issues of cost-effectiveness, innovation, and efficiency, however, are not the only ends that privatization is concerned with. Privatization also has direct implications for the shifting boundaries of the state and debates surrounding the appropriate size of government (Brodkin and Young 1989). Some political scientists, for example, argue that privatization is an intensely political phenomenon (Feigenbaum and Henig 1994, Feigenbaum, Henig, and Hamnett 1999). In its extreme, they contend, it represents an effort to shrink the government apparatus and roll back the boundaries of state responsibility. In a similar vein, Ilcan (2009) argues that privatization of social services undermines a key element of the Keynesian welfare state—the notion of collective, social, or public responsibility, in favor of a market-oriented system of private responsibility. In a reflection of neoliberal governance, privatization can work to dismantle the

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17 As part of the “FreshFocus California” initiative, Pierce Services did make some minor changes to menu items in SCSD, including switching to nitrate-free lunch meats, all natural cheeses, a “cleaner” marinara sauce, and made-from-scratch salad dressings.
state’s role in welfare provision by shifting responsibility, as determined by public values and expectations, from the state to the market. Privatization is not only a policy end then, but also a battleground on which disputes over the reach and role of government in social policy are being fought (Kamerman and Kahn 1989). As a result, privatization must be assessed on terms beyond efficiency and innovation. For example, what are the trade-offs between economic efficiency versus the social values of equity and justice in the delivery of social services?

This reliance on, and shift in responsibility to, private actors and market forces for social goals has important consequences. As Starr (1987: 134) notes, “Privatization must be seen not only as a technical instrument of policy, but also as a political measure of symbolic consequence.” To begin, privatization realigns institutions and decision-making processes so as to privilege the goals of some groups over the competing aspirations of others (Feigenbaum and Henig 1994: 191). In this way, “privatization alters the institutional framework through which citizens, companies, and organizations articulate, mediate, and promote their individual and shared interests” (Feigenbaum et al. 1999: 36). In contracting out the delivery of school food services to private FSMCs, the government is responsible for setting and enforcing baseline standards and goals for school meals, but day-to-day decision-making and program implementation including what specific foods are served and how they are procured and prepared on the ground shifts to private actors with private interests. Unlike governments and state bureaucracies, private FSMCs have a profit motive and are accountable not only to their clients, but also to their shareholders. As school food activist Siegel (2011) argues, “FSMCs… are, above all else, for-profit entities, incentivized to cut costs wherever possible to retain valuable district contracts and yield maximum returns for their shareholders.” In this way, privatization creates new interest groups that may try to influence political institutions when public policy threatens them or when political influence may generate opportunities for gain (Feigenbaum et al. 1999: 56).

In the realm of school food, we saw this dynamic occur on a national scale in the political battle that erupted over the passage of updated nutritional guidelines for school foods in 2010. In that case, private food service companies lobbied heavily against health advocates for waivers that would allow schools to opt out of meeting the new nutrition standards (Evich and Samuelsohn 2016). Any reforms to school food that represent a move away from heavily processed, frozen foods towards fresher, unprocessed foods that are scratch cooked at schools threaten to bring about sharp declines in profits for private food service companies that manufacture and serve processed, prepackaged foods. As such, these private firms face competing interests of serving their clients fresh, healthy foods in this era of heightened concern surrounding childhood health and nutrition, versus pursuing their profit motive.

This tension is fully illustrated in the case of Pierce Services and their “FreshFocus California” program. That the program was launched in reaction to flagging business (and profits) in California for the company alone demonstrates that Pierce Services’ profit motive was the guiding interest over any sort of motivation to improve the food served in the district in the interest of their student clients. What is more, Pierce Services marketed the program using the language of FTS programming—emphasizing “leveraging the state’s bounty of locally grown produce and ingredients” to provide “fresh and healthy options for students.” Pierce Services promoted its program using the terms and language of FTS without demonstrating any actual move away from its established, corporate suppliers. This example demonstrates how privatization can generate private interests that guide the nature of the delivery of services at the
expense of other interests, such as student health and well-being.

**Conclusions**

Ultimately, my research findings from Sequoia City demonstrate that privatization of school food services in the district resulted in significant cost-savings at the expense of pursuing innovative FTS programming that had the potential to improve the quality of food served to students. My results reveal that since turning to Pierce Services to resolve a dire financial situation, SCSD’s food program has been locked into Pierce Services’ profit-driven structure. Pierce Services’ profit motive sets local-level priorities for the district’s school food program by driving its food purchasing decisions and discouraging procurement of fresh foods from small-scale, local farmers. Consequently, this significantly affects the food offerings in the district for students by privileging processed foods from corporate suppliers. The trade-off for the district, however, is that the program has accrued excess funds over the years since Pierce Services took over that contribute to the financial health of the program and the district as a whole.

Several implications follow from these conclusions. First, the findings suggest a need for increased federal funding for school meal programs to assist all districts in the provision of high-quality, healthy meals. With larger reimbursements from the federal government to subsidize the cost of meals served, more districts will likely find themselves able to break even each year, and not feel pressured to turn to the private sector for help to resolve financial deficits. Keeping school food programs under local, district control raises the likelihood that the programs will pursue the delivery of services in the students’ best interests as determined by local, community needs, as opposed to being beholden to private contractors seeking to maximize their profits.

Next, my results point to a need to continue to raise federal nutrition standards for school foods in terms of restricting heavily processed, pre-packaged foods and requiring foods to be sourced from small, local farms that are more likely to be fresh, nutritious, minimally processed, and sustainably grown. Healthier standards at the federal level surrounding local procurement of fresh foods would make FTS programming mandatory, and would work to lessen the influence of the opaque corporate rebate system on food offerings in schools privatized to FSMCs. Moreover, as Kamerman and Kahn (1989: 264) note, the state is the only entity that can ensure national uniformity and protect all groups equally in the provisioning of social services. To avoid possible inequities in the provisioning of school food, in which districts with privatized school food programs are constrained by private interests and profit motives from pursuing progressive FTS programming, we should work to make the sourcing of fresh, healthy foods from local suppliers the standard that the federal government enforces for all school food programs.

Short of changing federal nutrition regulations in favor of more local sourcing of fresh foods, more stringent policy mechanisms are needed that 1) increase transparency and regulation of rebate systems between private FSMCs and corporate manufacturers, and 2) that hold for-profit providers accountable to the ethos of innovation and entrepreneurial initiative in the delivery of school meals. Limited accountability of private contractors is an enduring issue with skeptics of privatization. As such, proponents of privatization argue that the state must take a stronger watchdog role to monitor private sector contracts, ensure that private contractors meet performance standards, and regulate corrupt or unfair market practices (Feigenbaum et al. 1999). “Ironically,” Feigenbaum et al. (1999: 161) note, “this means that advocates for systemic privatization sometimes have found themselves reaffirming the legitimacy of governmental
intervention in the market.” For private FSMCs, more federal accountability measures must be put in place to ensure that private firms are meeting baseline standards regarding innovative practices in the school food landscape. In addition, stronger government oversight is needed to regulate the corporate rebate system to increase transparency so that school districts can make informed decisions regarding the operation of their school food programs.

Finally, my findings suggest a need for considerable caution on the part of school districts rushing to financially stabilize their school food programs. Districts must thoughtfully evaluate the full implications of their decision and assess whether privatization is the right answer. Although each school district has its own specific local conditions and factors to consider, my results from Sequoia City demonstrate that significant financial turnaround of the program came at a cost for the district in terms of the nature and quality of food served to students. By affecting the quality of food served in the district, the decision to privatize in Sequoia City will have long-term health consequences for the students who rely on school food as a main source of nutrition.
CHAPTER 4
LEADERSHIP, PARTNERSHIPS, AND CIVIC ENGAGEMENT: A CASE STUDY OF SCHOOL FOOD REFORM IN CALIFORNIA

Farm to school programming in the U.S. received a critical boost with the passage of the 2010 Healthy, Hunger-Free Kids Act. The Act established, for the first time, a federal Farm to School Program—authorizing $5 million in annual funding over eight years through a competitive grants program to support local FTS efforts in school districts throughout the country. In this way, federal school food legislation encouraged local-level initiative on behalf of school districts to implement FTS programming and, in doing so, contributed to varying program outcomes at the district level. Continuing Chapter 3’s exploration of school food program implementation and outcomes at the local level, this chapter focuses on how local dynamics shaped school food program outcomes, especially as they relate to FTS programming, in a second case study district—the Pacific City School District.

In particular, the chapter explores how groundbreaking, grassroots school food reform efforts—including a pilot FTS program centered on serving a fresh, scratch-cooked meal made entirely with locally sourced ingredients once a month, and the construction of a state-of-the-art central kitchen and educational farm that promises to drastically improve district meal offerings, were mounted in the aftermath of the 2010 legislation. In the first part of the chapter, I provide a contextual snapshot of Pacific City and the school district. Then, I detail the district’s self-operated nutrition program and early parent calls for reform. Next, I turn to the role that the district’s school food service director played in championing FTS efforts by facilitating key partnerships to envision and oversee reform efforts. Next, I highlight the importance of widespread community support to fund the proposed reforms. Finally, I discuss the implementation of the innovative FTS initiatives in the district. Throughout the analysis, I draw from sociological theories of social movements and civic engagement to structure an explanation of the interrelated processes of social change in the district. I conclude the chapter with a discussion of how my results support previous research that suggests that school food reform efforts rely on the dedication and coordination of a variety of actors from a diversity of sectors working together to reorient school meal programs toward local, sustainable, healthy alternatives, and the implications of my findings for federal school food policy.

Pacific City

According to recent statistics, a little over 400,000 Californians call Pacific City home. Pacific City is a relatively diverse city, with Blacks (28 percent), in particular, making up a much larger segment of the population than in Sequoia City (3 percent) and California at large (6 percent). Hispanics (25 percent), Whites (26 percent), and Asians (17 percent) comprise the remainder of Pacific City’s population (U.S. Census Bureau 2016). Pacific City School District, meanwhile, enrolls approximately 37,000 students. Students in the district are primarily Hispanic (40 percent) and Black (30 percent), with Asians (14 percent) and Whites (12 percent) making up a smaller portion of the student body.

Pacific City is home to a major port, and employs over 200,000 people in city jobs related to marine cargo transportation. Additional major industries in Pacific City include business and
health care services, food processing, transportation, and light manufacturing. The median income in Pacific City is $54,618, which is below the statewide figure of $61,818. At 20 percent, moreover, Pacific City’s poverty rate is higher than Sequoia City’s (11 percent), and California’s (15 percent) (U.S. Census Bureau 2016). In addition, Pacific City School District has a significant number of students eligible for free or reduced-price lunch—73 percent (compared to only 47 percent in Sequoia City School District, and 59 percent statewide). As these statistics demonstrate, Pacific City is a diverse California city with a less economically advantaged population than Sequoia City. In addition, according to California county-level voter registration data, Pacific City is located in a county in which 58 percent of voters are registered as Democrats, and only 13 percent are registered as Republicans. These statistics underscore that Pacific City is located in a more liberal area than Sequoia City, where only 47 percent of voters are registered as Democrats. In fact, Pacific City is located in a county that is among the top five counties in the entire state with the highest percentage of Democratic party registered voters (CSS 2016).

Nutrition Program Snapshot and Parent Calls for Reform

In Pacific City, the school nutrition program has been locally controlled and self-operated for as long as Cindy, the director of the program who has been with the district for 16 years, can remember. This means that the district has employed school food service staff to run the program. The district operates cooking kitchens at 25 of the 86 total schools in the district, where meals are produced on-site. Two of these cooking kitchens serve as central kitchens, preparing the majority, nearly three-quarters, of food for the district. Sixty-four out of the 86 schools in the district receive meals from these central kitchens and are known as “satellite” school sites, which do no on-site cooking. Although food prepared at the central kitchens is scratch-cooked as much as possible, the extent of scratch cooking that is feasible is limited by the old equipment. Moreover, the current kitchen system requires that food service staff prepare most meals several days in advance of service, and then pack these meals in plastic to be sent to the school sites and then reheated.

During the 2009-2010 school year, a group of concerned parents began advocating for widespread changes to the district’s nutrition program. These parents were the early initiators of school food reform in the district. One parent activist I interviewed, Lily, described to me in detail the early stages of her involvement in seeking to bring about healthy change to the district’s school meals. After noticing that the quality of school lunches was not what it should be at her child’s elementary school, she was inspired to promote change. Through involvement in the school’s parent-teacher association, she took on the responsibility of contacting a new, local nonprofit organization, NourishYouth, that was providing healthy, freshly prepared meals to students in local schools. As she describes it:

…it seemed like a really exciting company, and the thought of having organic food and some of it locally sourced seemed like a really great opportunity for the school. And I was a new parent. I had no idea at all what was involved. I had just thought, “This is a school and they can have lunch with whoever they want and we’ll get [NourishYouth] to write up a contract with us.” And then, all of a sudden, 400 students are getting fresh, organic meals…And to me, at the time, I
thought, “Wow, if I could get organic food on 400 plates for lunch, that has an impact.” It felt like a huge impact to me to alter that. And I had no idea like, what was really possible at that time. But that seemed like a really great step. So, I decided to take this on. So, I reached out to [NourishYouth] (Interview, April 17, 2015).

Through her contact with this organization, Lily discovered that they were not able to contract with individual schools and would, instead, have to contract with the district’s entire school meals program. She also learned that a number of other parents had also recently, independently contacted NourishYouth to look into getting them into the PCSD. As Lily remarked, “There were [Pacific City] parents who were doing the same thing at the same time – like, picking up the phone – actually, before me – picking up the phone and saying, ‘We want [NourishYouth]’” (Interview, April 17, 2015).

Motivated by their mutual interest in getting better food into the district, the concerned parents decided to work together on this issue and formed the Pacific City Cafeteria Collaboration—a volunteer group eager to improve food quality in the district. They pursued getting NourishYouth into the entire district by meeting with Cindy, the district’s school food services director, to see what was possible. The parents quickly found out, however, that, although Cindy indicated she was open to ways to improve the food quality in the district, the meal program was already tied to other contracts with food service vendors and would not easily be able to begin contracting with NourishYouth. “There was the contract issues with the vendors. There was the labor contract issues. Layers and layers of complexity,” Lily described, “And I sort of sat back and I was like, ‘Well, you know, this is just classic bureaucracy, right?’” Lily remarked that district budget cuts contributed to evaporating the dream to get NourishYouth in the district and that

…fairly quickly it became clear that there wasn’t enough money for us to engage with [NourishYouth]. And at that point in time, the [parent] group was starting to solidify and decided that we wanted to move forward with our own reform…what became clear was…the way to real systemic change would be to change the system itself. So, we decided to take that on at that point (Interview, April 17, 2015).

With that, the parent activist group ramped up its engagement with the school district and the community. Lily described that the Collaboration’s bi-monthly meetings gathered as many as 200 people, with participants ranging from parents and teachers, to other interested community members. Julia, a strategic planner who worked closely on school food reform efforts in the district, described the early stages of the Collaboration in this way:

There were parents. There were teachers. There were health professionals. I mean it was just a broad coalition at that time that they had amassed. And they were meeting regularly and meeting with teachers and talking about issues of – kids would show up to class but not mentally, so what's the impact of food on that and on behavior? And so there were all these issues that were being churned up and discussed (Interview, May 19, 2015).
As Lily’s and Julia’s recounting of the formation of the Cafeteria Collaboration reveals, concerned parents who were committed to working for change in the district were a crucial component to beginning school food reform efforts in the district. These civically oriented parent-activists, who were passionate about food and agriculture system reform in their community, brings to mind Lyson’s (2004, 2005) melding of civic engagement and food system transformation. These parents’ early efforts to seek out local solutions in the form of a partnership with a local food and agriculture organization to begin sourcing fresh, local, and healthy food for students in the district to solve a problem they collectively identified demonstrates the problem-solving capacity of local communities that is so central to Lyson’s (2004, 2005) concept of civic agriculture and the move towards a healthier, more sustainable, and locally embedded food system. Although Lily and the other parents’ initial concern regarding school food began with observations from their own children’s schools, they quickly realized that reform in the entire district was a critical need for the wider community, and they were deliberate and reasoned in their decision to take on problem-solving the issue of poor school meal quality for the entire district through their formation of the Cafeteria Collaboration.

School Food Service Director Leadership

When Lily and the other parents first approached Cindy, the school food service director, about potentially contracting with NourishYouth, Lily recalled that the meeting was somewhat adversarial. Cindy laid out all the reasons why that route to improvement was not going to be possible, mainly pointing to the current contracts the district was already in and budgeting issues. Importantly, however, Lily recalled that Cindy was not opposed to school food reform, and in fact, said she was willing to engage with the parents and work with them, but that they would need to find another way. That Cindy was open to pursuing reform efforts in the district’s school meals program with the parents would prove to be crucial to the ultimate success of the efforts. In self-operated school districts, school food service directors are charged with overseeing all aspects of the district’s food service program including procurement, menu planning, food preparation, financial management, and personnel management. With such significant control over a district’s program, food service directors can often make or break reform efforts targeted at overall meal improvements.

Mark, a nonprofit activist who works on school garden programming at the state level, remarked on the general importance of school food service directors in making FTS programs happen in districts:

…the interesting thing about farm to school, there's no cookie cutter approach to it, it's not institutionalized, everybody has to figure it out on their own and where we see great strides being made is when you have a proactive, supportive school food service director. They're kind of the gatekeeper for farm to school to happen, in my opinion… I believe that districts, based on whether it's the school board or parent pressure, are going to be looking to replace their food service directors with more farm to school or nutrition-minded food service directors and I think 'cause they're the kind of champions that can make or break it (Interview, January 22, 2015).
Kristen, a school food service director in a southern California school district, reinforced this idea of school food service directors as gatekeepers for instituting progressive reforms to school food programs when she discussed how school food service directors are the ones who have full control over deciding what kind of food sourcing and distribution the district will use and the difficulties in moving away from the established ways of doing things:

The challenge is, I think, getting food service directors to be willing to venture away from the typical distribution setup. I know it's a lot of work, but if you really want to do farm to school, you have to look at alternative distribution so that you can get food from [local] farms…You're taking on one more huge task, without any help. It’s daunting, to say the least. And especially if you don't have the passion for it. Like, if you don't get why it's important for kids to eat local, sustainably produced foods, you're not going to put a ton of extra work into that (Interview, March 6, 2015).

In addition, Maggie, a staff member at a nonprofit organization that partners with school districts throughout California to promote FTS programming, told me that activists like her can do as much as they want in terms of facilitating FTS efforts, but “you just have to have really motivated food service directors that are really sold on the idea [of farm to school]” because “they’re the ones, in the end, that make the buying decisions and do the purchasing. All I can do is just the groundwork” (Interview, July 30, 2015).

In the case of PCSD, Cindy ultimately emerged as a champion of school food reform efforts, and many people I spoke with attributed the district’s success in terms of school food reform efforts directly to her passion and motivation. For example, Julia talked about how Cindy was at the vanguard of the district’s efforts to improve school food in the early stages:

Cindy, she’s really an amazing woman…She was always two steps ahead…I couldn't believe how she was doing what she was even doing with the budget she had…it was really remarkable. She was already going to the farmers’ markets and gardens and all the things that the [Cafeteria Collaboration] really wanted (Interview, May 19, 2015).

Importantly, Cindy had the passion and the interest to put in the extra effort to start serving healthier foods to PCSD students. As Drew, a nonprofit activist, remarked about Cindy’s early desire for change:

Cindy wanted to serve more local food, fresh food, healthier food. This was seen as a positive health intervention in [Pacific City], and if you look at that disparity and life expectancy in different parts of [Pacific City], and a lot of it is tied to food and food security and all these things, [Pacific City] is a really interesting place to create those changes. And there was this willingness (Interview, May 28, 2015).

The narrative of change in Pacific City is woven around Cindy and her motivation to do things differently for PCSD’s students. As Mark said reflecting on the progress Pacific City has made,
“Like you look at [PCSD] and Cindy and she's behind it and great things are happening all over the place” (Interview, January 22, 2015). In the same vein, Ana, a school food service director for another local school district commented, “I do have a ton of admiration for what [Pacific City] is doing, and what Cindy is doing” (Interview, January 30, 2015). These comments reveal how Cindy’s name goes hand in hand with discussions of school food reform efforts in Pacific City and emphasize the important role she has had in spearheading reform efforts to improve the quality of school food in the district.

In particular, Cindy’s initial openness and subsequent ongoing commitment to school food reform enabled her to mobilize a broad base of support for school meal improvement efforts in the district through key actions including networking and dialoguing with stakeholders in the community. As a skilled leader, or institutional entrepreneur, Cindy was able to interface with both the parent-activist group and a local nonprofit organization focused on youth education for sustainable living—the Institute for Green Education—that happened to be searching for a school district to partner with at around the same time. As Lily described it to me:

So, [the Institute for Green Education] had feelers out and they were looking for a district…. And they were interested in [another local school district], and obviously that would have been a great district to take on, but what they found was that there were not – the players were not aligned and ready to go…. And when they came to [Pacific City], what they found is they had a really active parent group, they had a nutrition services director who was on board (Interview, April 17, 2015).

As a result of Cindy’s interfacing with both groups, the Institute for Green Education joined forces with the parents and the district to help realize school food change. With the support of grant funding, the Institute helped produce a feasibility study that provided a concrete path forward for bringing about the changes that the district wanted, including ways to finance these changes. Central to this plan was a $40 million building project to create modern kitchens throughout the district, as well as a new, state-of-the-art central kitchen and educational farm. All of these changes would allow for more on-site preparation of healthy meals throughout the district instead of serving reheated frozen meals, increased local sourcing of food directly from the educational farm, and an opportunity for students to learn about where their food comes from through nutrition and culinary classes at the educational farm. In addition, Cindy and the Institute for Green Education simultaneously developed plans for a small-scale pilot FTS program in the district—the “LocalEats” program. The program was to entail serving a fresh, scratch-cooked lunch in the district once a month made entirely with locally sourced ingredients, prioritizing products from small, family farms. It was created as a framework for making small changes to the district’s school food program in preparation for the opening of the central kitchen and educational farm, with the hope of eventually institutionalizing local procurement and scratch cooking practices in the district.

Cindy’s leadership, then, was the second major element responsible for facilitating the transition to healthier school meals in the district. This finding supports previous research demonstrating that supportive school food service directors are central to improving school food programs on the ground (Bagdonis et al. 2009, Buckley et al. 2013). Bagdonis et al. (2009: 111), in particular, found that FTS “champions” can play a pivotal role in linking other stakeholders
and maintaining the energy, enthusiasm and forward momentum of local FTS efforts. In PCSD, Cindy’s passion and openness to help facilitate reform efforts in the district enabled her to use her integral position as the director of the program to become an internal champion for change and interface with stakeholders. My findings also coincide with previous research on the important role of movement leaders and institutional entrepreneurs in facilitating social change efforts by actions including aggregating interests, networking, and coalition building, as detailed in the social movement and organizational theory literatures.

In addition, by combining resources and coordinating strategies, the partnership between the parent-activists, the district, and the Institute for Green Education allowed the reform efforts to be more successful than they would have been if any single group had been acting on its own. Cindy or the parent-activists, for example, would likely not have had the time or expertise to come up with such a grandiose plan for school food reform in the district on their own. The partnership with experts at the nonprofit organization, who had knowledge in the arena of large-scale school food reform, enabled the efforts that had been discussed to become a reality. This finding, thus, reinforces previous research on the benefits of social movement coalitions in effecting change. Research on food system social change efforts, in particular, has similarly found that key partnerships with outside, non-governmental organizations are crucial to developing and spearheading change initiatives. Bagdonis et al. (2009) and Trainor (2006), for example, have all concluded that nonprofit partnerships with school districts play a key role in the success of FTS programs.

Local Community Support

Widespread support of the local community was the last key factor facilitating school food reform in PCSD. The proposal developed by the Institute for Green Education for the central kitchen and educational farm implied that funding was not going to come from private donors, but would instead require widespread community buy-in and support. In this way, a citywide bond measure became the focal point of funding the path forward for school food reform efforts in PCSD. The bond would provide district access to $475 million in facilities upgrade funds, with roughly $44 million to be designated for revamping school kitchens throughout the district, and the construction of a 30,000-square foot central kitchen, a one-acre educational urban farm and greenhouse that would eventually supply some of the district’s fresh produce needs, and a teaching kitchen and culinary classrooms. The bond required a 55 percent supermajority vote for approval. Many of the parent-activists were involved in canvassing the community in support of the bond measure. In November of 2012, just over 84 percent of Pacific City voters approved the bond (Murphy 2012).

Many people I interviewed about school food reform efforts in PCSD emphasized the various bases of community support Cindy and the district relied on in their efforts to mount change. Mark, for instance, remarked that, in addition to Cindy’s leadership, “it’s the team that makes that [change] happen. She has staff under her, nonprofit support, they got the bond measure, and once again, there's no cookie cutter way to do it, but if there’s a will, there's a way and there's usually organizations that'll help support it” (Interview, January 22, 2015). Rachel, a FTS nonprofit activist in California, also was careful to characterize change efforts in Pacific City as a community project: “And then, like, PCSD, you know, has been, like, this crazy linchpin, like community change around school food and they've made, like, huge
progress...They got, you know, a $475 million bond passed to fund all this stuff” (Interview, January 27, 2015). Kristen, too, remarked on the importance of various forms of community backing for Pacific City’s success: “I think Cindy’s support from her community enabled her to make that change—the bond, the [Institute for Green Education]. That was amazing for Cindy because her task was exceedingly daunting, given the challenges that you face in [Pacific City].” (Interview, March 6, 2015). In this way, the widespread community backing for the ultimate passage of the bond measure to fund the new central kitchen and educational farm that will pave the way for institutionalizing FTS practices in the district reveals a profound prioritizing of local food and agriculture to benefit the health and well-being of the community’s youth, and the immense problem-solving capacity of the Pacific City community that is in line with Lyson’s (2004, 2005) vision for civic agriculture projects across the country.

Farm to School Implementation

While I was conducting fieldwork in Pacific City in the spring of 2015, plans for the central kitchen and educational farm were well underway. In April of 2016, ground was officially broken on the construction site for the new complex, and the completed 32,552 square-foot kitchen and instructional farm and greenhouse were on schedule to open during the 2017-2018 school year. Meanwhile, the district had found widespread success implementing its pilot FTS “LocalEats” program.

During the 2013-2014 school year, in collaboration with the Institute for Green Education, Pacific City’s nutrition services department applied for and received a $100,000 grant from the USDA’s Farm to School Grant Program to implement the pilot “LocalEats” program. A press release after the district received the grant for the program explained:

> [Pacific City] will use implementation funds to develop and expand an innovative school lunch program called [“LocalEats”], with two primary goals. First, we will increase the amount of California grown and processed products consumed by children in the [PCSD] by developing and testing recipes made with California crops and expanding our local sourcing to include grains, meats, and dairy in addition to fresh produce. This increase will establish new supply chain relationships which will benefit not only [PCSD], but the entire CA economy. Second, we will increase students’ awareness of the origin and agricultural character of the food items on their plates through a robust marketing and communications program. We understand that to make significant change, shifts in school meal procurement must be accompanied by shifts in student awareness and understanding of farm to school principles (PCSD Press Release, November 18, 2013).

Through a series of community conversations and input from nonprofit organizations, Pacific City had previously developed a definition of “local” for the district’s school food program procurement strategy—within a 250-mile radius of Pacific City. For the “LocalEats” program, the district began establishing relationships with local, family-owned farmers within that geographic radius to feature fresh, healthy items for the “LocalEats” meals. The district was especially interested in transcending fresh fruits and vegetables to focus on locally sourced,
sustainable “center-of-the-plate” items, like proteins, for the program. New procurement relationships established included a family farm that produces free-range, antibiotic and hormone-free organic chicken, and a local farm that produces pasture-raised, GMO-free, organic beef. Because Pacific City’s nutrition services program is self-operated, it is not beholden to sourcing food only from preferred corporate manufacturers. Without an external profit motive, PCSD has the flexibility to explore sourcing food from small-scale, local farmers in response to community calls for change. As Katie, a Pacific City nutrition services staff member told me,

We’re not under national contracts with various vendors, so we’re not tied to who we’re buying from. We’re a nonprofit, we’re not for-profit, so our goal is not to be making money, whereas for [food service management companies] the goal is to be making money right, so we’re not under as much pressure to control our food costs…I think there’s a lot of different ways that [Pacific City] can procure locally (Interview, October 5, 2016).

The flexibility to purchase fresh foods from local farmers has greatly improved meal offerings in the district through the “LocalEats” program. In contrast to the pre-packaged, frozen and reheated food that is still served in many schools today, a sample “LocalEats” meal stands out for its emphasis on fresh, healthy items. During one of my cafeteria site visits in Pacific City, I observed a “LocalEats” meal consisting of lemon and oregano roasted, antibiotic-free chicken drumsticks, served over brown rice or whole grain macaroni and cheese, with organic, local, spring strawberries and sugar snap peas. Other sample “LocalEats” entrees have included sesame soba noodles with bok choy and tofu, jambalaya with andouille sausage, and chorizo and greens over penne pasta.

To ensure that students would be willing to try the new, healthier meals, PCSD nutrition services staff held a series of taste tests at schools throughout the district to introduce students to the new menu items and recipes that had been developed in collaboration with the Institute for Green Education. At the taste tests, students had the chance to vote for items that they liked to be featured in future “LocalEats” meals, and to participate in conversations about what they liked about the items, including how it looked and tasted. While I was conducting my fieldwork, taste test items included antibiotic-free barbeque chicken sandwiches with slaw, bean and cheese tostadas with fresh avocados, organic beef and bean chili, and fresh tabbouleh salad. In addition, to build staff capacity to implement the FTS program, the district held multiple “LocalEats Boot Camps” that have helped to educate Pacific City nutrition services staff on the fresh California ingredients, and how to scratch cook the new recipes. As Katie described to me:

We started procuring a local chicken raised without antibiotics, and we haven't cooked chicken from raw in this district for decades. But we really just found that the only way we could afford higher quality chicken products would be to move to a raw product, and then it just becomes obvious that professional development training is so, so key. So, we actually did a full day of training last year that we paid for out of USDA [grant funding] on handling raw poultry and on some issues around sustainable meat production and that type of thing – recipe, some nitty-gritty of preparing some new recipes (Interview, March 17, 2015).
The district began the program by serving a “LocalEats” lunch once a month, but quickly increased the frequency to once a week by the 2014-2015 school year. In describing the initial motivations and outcomes of the “LocalEats” program to me, Drew, a staff member at the Institute for Green Education, explained how the program “was a solution to really figure out: how do you catalyze change towards healthier school meals?” and to slowly begin to ready the district for preparing fresh, scratch-cooked meals out of the new central kitchen on a regular basis (Interview, May 28, 2015). He emphasized how the program has created an innovative, concrete framework for Pacific City to serve fresher, healthier foods. In particular, the “LocalEats” program represents what Drew and the Institute for Green Education have dubbed a “bite-size implementation strategy,” in which Pacific City is gradually transforming their entire school food model as they work toward serving “LocalEats” meals every day in the district. By establishing new procurement relationships with local farmers, and returning to scratch-cooked recipes once a week, the “LocalEats” program is forming the foundation for large-scale, sustainable changes to Pacific City’s school meal program that will, advocates hope, be institutionalized with the opening of the new central kitchen and educational farm. As Cindy explained to me: “So [the “LocalEats” Program] was really a way for us to increase our farm to school effort and move beyond produce, but then at the same time try these new recipes that will eventually be a daily occurrence for our students…we wanted to work on new recipes and new, different preparations for the new central kitchen” (Interview, January 14, 2015).

In addition, PCSD’s serving of “LocalEats” meals has played an important role in strengthening Pacific City’s local and regional food economies by increasing institutional demand for locally sourced items from small, family farms. PCSD statistics collected after the implementation of the “LocalEats” program in the 2013-2014 school year reveal that the district purchased nearly 50,000 pounds of local food items that would likely not have, otherwise, been purchased locally. This represents a significant boost to Pacific City’s local food economy. Drew underscored these positive program outcomes when he explained the overall benefits of the program:

[The “LocalEats” Program] is about the triple win plus one. So the triple win is that fresh food is good for student's health and their ability to learn, it's good for the economy because it keeps money in the local economy, and the environmental impact of less packaging. And the fourth, the plus one, is that kids learn where their food comes from and they make that connection, and I think that's really important that we value that, and then we expose the supply chain (Interview, May 28, 2015).

The early success of the program in Pacific City generated momentum on a state-wide level, and the program expanded to 15 California school districts in 2014, to 42 districts in 2015, to 58 districts in 2016, and, most recently, to 71 school districts in 28 counties across California by 2017—all of which now also serve a “LocalEats” meal once a week featuring locally sourced, scratch-cooked items. Taken together, the “LocalEats” network now represents 2,923 schools, an enrollment of 1.85 million students, and thousands of staff who collectively serve over 309 million school meals a year (35 percent of the state total).

The scaling-up of the program to districts throughout the state was facilitated, in large part, by an intentional marketing strategy executed by the Institute for Green Education. The
Institute’s trademarking, branding, and marketing of the “LocalEats” program enabled the initiative to easily expand beyond Pacific City. In particular, the Institute developed and trademarked a catchy logo for the program, and generated large amounts of marketing materials including posters to be hung in school cafeterias, and t-shirts and aprons for cafeteria staff to wear to promote the program. The Institute also put out frequent press releases on the early successes of the program, many of which got picked up by local, state, and national media outlets. In addition, the Institute created a day-long orientation program for new school districts entering the program, as well as an online, peer-to-peer network for participating school districts. This network enabled food service directors throughout California to connect with one another and share recommendations for new local procurement relationships and “LocalEats” recipes, as well as problem-solve issues that arose in the implementation of the program. Drew emphasized the critical, supportive role the Institute has played, and will need to continue to play, in expanding the program: “We have to continue to provide resources for school districts to succeed. So we’ll be developing more of those, be it marketing communications, strategies, things like that” (Interview, May 28, 2015). Key to the Institute’s marketing strategy, moreover, was recognizing that the “LocalEats” program was not one-size-fits-all. From the start, the Institute celebrated the different and creative ways in which school districts were implementing the program within their distinct, local contexts. Each new district was encouraged to tailor the “LocalEats” program to their students’ tastes, the availability of fresh, local ingredients, and the school kitchen capacities. This flexibility of the program design to be adjusted to a variety of local contexts facilitated the widespread adoption of the innovative program beyond the confines of Pacific City.

What is more, as the “LocalEats” program expanded, the Institute for Green Education established statewide “LocalEats” Collective Action Days to leverage the strength of the entire network of participating school districts in order to publicize the success of the program. On the designated Collective Action Days, all participating school districts served locally sourced, fresh meals, hosted community events, and joined a statewide media campaign to celebrate the program’s collective impact on student health outcomes and strengthening local and regional food systems. In addition, in 2015, the California State Assembly honored the “LocalEats” program by unanimously passing a resolution commending the program for 1) advancing student health and academic achievement, 2) investing in California agriculture and California’s economy, and 3) benefitting the state’s environment. Further, the resolution urged all California schools to participate in the program. Inspired by the success of Pacific City’s “LocalEats” program, at least two additional school districts in states outside of California have begun implementing their own version of a “LocalEats” program.

Conclusions

While many challenges limit the ability of school districts to provide healthy and nutritious food environments for students in the face of childhood obesity concerns, this analysis of school food reform efforts in Pacific City reveals the potential of coordinated social change initiatives to bring about large-scale improvements to federal school food programs. In this way, these findings support previous research that suggests that school food reform efforts rely on the dedication and coordination of a variety of actors from a diversity of sectors working together to enact change (See for e.g. Trainor 2006, Bagdonis et al. 2009, Conner et al. 2011, and Buckley et
al. 2013). Moreover, although the research was conducted in a large, urban school district, the lessons generated from the results are nevertheless useful for any school district across the country operating federal school meal programs. All school districts operate within a specific community context, and it is this local context that my research has demonstrated we must be attuned to when mounting school food reform efforts.

Several implications follow from the findings presented in this chapter. First, the results suggest that local control of a district’s nutrition program is essential to enabling large-scale school food reform efforts. My findings indicate that local control of Pacific City’s program correlated with district responsiveness to community calls for change. Without private interests or external profit motives directing program implementation and goals, Pacific City’s nutrition program had the flexibility to be receptive to parent calls for reform and to adapt to the changing landscape of school food service delivery resulting from the landmark 2010 legislation that helped to make FTS part of a national conversation. Cindy, in particular, as a local community member and long-time district employee, was arguably more invested in improving the district’s school food program in response to calls for change than a private consultant from a profit-focused FSMC would have been. In this way, the program has been able to set its own priorities based on national dialogues concerning childhood obesity and the importance of FTS programming as a result of its self-operated model.

Being self-operated, however, has come at a financial cost for the program. When I asked Cindy about the operating finances of the program, she said that the program has always broke even, up until the previous year, when Pacific City implemented a new living wage ordinance that resulted in many school food service employees receiving a 33 percent raise that the program couldn’t cover. The district had to contribute $220,000 from the General Fund to help cover these increased labor costs, with no requirement that the money be paid back. Further, implementing the 2010 HHFKA regulations has cost the district $500,000 in increased costs each year, while only bringing in $250,000 in additional revenue, which has also triggered the district to transfer money from the General Fund to cover the deficit. As such, these financial troubles for the program have largely been the result of new rules and regulations that were out of the control of the nutrition services program, like the city-wide minimum wage increase, and the federal changes to school food policy. In this way, Pacific City’s program has suffered some financial hardship in recent years specifically as a result of being self-operated. The trade-off, however, is that by being self-operated, the district has been able to be responsive to bottom-up social change efforts that have made school food reform in the district a reality.

In addition, results from this research speak to the importance of locally embedded reform efforts that realize success through their harnessing of the varied assets and resources of the local community to enact change. Importantly, school districts require support from both civically engaged parent-activists and the local community to realize school food reform. The established ways of operating federal school food programs are deeply engrained and require significant motivation, passion, and resources to be changed. Community problem-solving efforts that bring together individuals and organizations from a variety of sectors are integral for challenging the status quo and, in this case, working to institutionalize FTS practices that will benefit students by both providing them with healthier and fresher foods, and educating them on the importance of local, sustainable agriculture. Facilitating the creation of a vibrant nonprofit sector and active parent-teacher associations is especially crucial then for small, rural, or economically disadvantaged school districts throughout the country to ensure a supportive
community context for school food reform.

That civically engaged parents-activists, a supportive local community, and a passionate school food service director are so crucial to moving FTS efforts forward, however, speaks to a critical need for more significant reforms to school food policy at the federal level to ensure the equitable provisioning of fresh, healthy school meals across the country. My findings from Pacific City underscore that coordinated local-level action and external funding in the form of a city-wide bond measure and a federal FTS grant were needed to provide the healthiest food possible to students. Local-level solutions, however, do not ensure equitable and just delivery of school food services. Pacific City had just the right confluence of factors to achieve genuine school food form. As Lily remarked, “It was really an alignment of people and social factors that facilitated this. Because you think about – in another place or another time, this just could have been dead in the water” (Interview, April 17, 2015). Indeed, most school districts across the country likely lack this alignment of factors to bring about successful school food reform. Sociologist and school food scholar Poppendieck (2010: 255) cogently sums up this problematic practice of relying on local-level successes as a means to transform school food more broadly:

Telling success stories is an important way to counteract the disabling myths that are rife in the world of school food, but telling success stories is also a hazardous business. It can create a false sense that the various problems associated with school food can be solved with just a little effort and creativity at the local level.

In a similar vein, food policy scholar Nestle (2007: 284) emphasizes how a focus on successful, grassroots reform efforts at the local level elevates the importance of individual actions in achieving healthier school meals instead of changes to policy: “Parents, teachers, and food service directors in schools around the country have transformed meal programs to deliver healthier food…Effective and important as these grassroots efforts may be, they must be instituted school by school and depend on individuals rather than policy.” Poppendieck (2010: 255), moreover, explains how school food reform efforts that are reliant on “a champion with vision, stamina, and courage, and hopefully connections, influence, and clout, an organizational base, and adequate resources, not only financial but also interpersonal and sometimes technical” is a tall order for most school districts. She concludes that “counting on saints and heroes is not good public policy. Congress has the ultimate responsibility for school food programs, and Congress needs to step up to the plate to enact changes in federal law that make local improvements much easier to achieve” (266).

As such, continued improvements to school food policy at the federal level that build on the progress made by the 2010 HHFKA are needed to put all school districts throughout the country on the path to being able to serve the freshest, most nutritious food possible to students. Changes to federal school food policy that are needed to achieve this include: 1) updating procurement regulations so as to require schools to procure foods from local, small-scale farmers that are more likely to be fresh, minimally processed, and nutritious than foods sourced from large, corporate suppliers, 2) transitioning from a system of competitive FTS and equipment assistance grants to a significant overall increase in financial support to all school districts to subsidize the cost of local procurement and to assist in cafeteria and kitchen renovations to enable a return to scratch cooking, 3) increasing professional development training and resources to teach school food service workers how to prepare fresh foods, and 4) making nutrition
education mandatory in the classroom to familiarize students with fresh, healthy foods, and encourage them to make nutritious choices in the school cafeteria. Together, these changes to school food policy at the national level will raise the baseline standards for federal school meal programs, and will ensure a more equitable provisioning of healthy school meals that is not so heavily reliant on local-level social change actions. Nevertheless, the results from Pacific City point to the important role that coordinated community action can play in mounting school food reform efforts absent substantial improvements to school food policy and nutrition standards at the federal level.
CHAPTER 5

CONCLUSION

Several years after the passage of the 2010 Healthy, Hunger-Free Kids Act, a Robert Wood Johnson policy brief issued in 2016 concluded that we are beginning to see signs that the childhood obesity rate in the U.S. has leveled off—with obesity prevalence for youth ages 2 to 19 holding steady at just below 17 percent since 2003-2004. More encouraging, the report also concluded that among preschool-aged children (2 to 5 years old), the obesity rate has actually decreased from 13.9 percent in 2003-2004 to 8.9 percent in 2011-2014. In addition, the report revealed decreasing rates of childhood obesity in some school districts, cities, counties, and states throughout the country (RWJF 2016). While these results have been encouraging for proponents of First Lady Michelle Obama’s efforts to combat childhood obesity through improvements to school nutrition policy, they underscore that there is still a long way to go towards achieving a marked decline in overall childhood obesity rates in the country. The relative stability of the overall childhood obesity rate in the face of dramatic improvements to federal school food policy suggests that childhood obesity is a complex phenomenon that is shaped by a variety of dynamics that go beyond just changes to federal school nutrition policy.

Indeed, my research on school food programs in the aftermath of the 2010 HHFKA revealed that a variety of state and local-level dynamics, in conjunction with federal policy, were instrumental in shaping the nature and quality of school meals served on the ground that provide critical nutrition to many poor, minority children—or those most affected by the obesity epidemic. In this concluding chapter, I reflect on the major findings of my study. First, I discuss the results from Sequoia City and Pacific City in relation to one another, and in the context of the key national-level findings presented in Chapter 2. Then, I turn to the implications of the research—both for the theoretical literature relevant to the research, and for policy discussions surrounding school food, and childhood health and nutrition. Finally, I conclude the chapter with suggestions for future research.

Reflections on Major Findings

Research results from Pacific City and Sequoia City demonstrated that the nature and quality of school food programs on the ground, especially in terms of FTS programming and the accessibility of fresh, locally sourced food in school cafeterias, was shaped in large part by distinct, local-level dynamics. In particular, contrasting program operation models—privatized vs. self-operation—played key roles in setting local-level priorities for school meal programs that determined what kind of food was procured and served to students. In this way, my results underscored that despite improved uniform nutrition standards for school meals set at the federal level, the quality of school meals can still vary significantly from school district to school district.

Chapter 3 revealed how, in Sequoia City, privatization of the school nutrition program led to a prioritizing of procurement of highly processed, prepackaged foods from established, corporate suppliers. Privatization of the program resulted in significant cost-savings for the district, but occurred at the expense of pursuing innovative FTS programming. Consequently, the nature and quality of food served in the district was determined in large part by private, corporate
interests. Attempts at FTS programming in the district, moreover, came primarily from the top down, and did not represent genuine efforts to establish new relationships with small-scale, local farmers to source fresh items for scratch-cooked school meals. Evidence from Pacific City presented in Chapter 4, meanwhile, underscored that local control of the district’s nutrition program was essential to enabling coordinated social change initiatives to bring about large-scale improvements to the school food program to institutionalize farm to school programming. Without private interests or external profit motives directing program implementation and goals, Pacific City’s program had the flexibility to be responsive to bottom-up social change efforts, and to enable locally embedded, community-engaged reform efforts to transpire that made FTS programming in the district a reality. Through key community partnerships and parental support and involvement, the district developed an innovative “LocalEats” FTS program that enabled the local procurement of fresh, healthy foods to be scratched cooked and served to students on a regular basis. With the anticipated opening of the central kitchen and educational farm, moreover, FTS programming is on track to be institutionalized as a central component of nutrition services in the district.

In the context of the national findings presented in Chapter 2, the local-level results from Pacific City and Sequoia City shed both confirmatory and contradictory light on the key factors that contribute to varying FTS rates. In particular, if we translate to the local context Chapter 2’s key finding that state-level economic affluence is a significant, positive predictor of state-level FTS rates, we would expect that wealthier school districts would be more likely to have implemented widespread FTS programming than poorer districts because they have the internal wealth and resources to subsidize the programming. Findings from Sequoia City and Pacific City, however, revealed that comprehensive, innovative FTS programming did not correlate with the wealthier school district. Pacific City, the overall poorer school district when assessed by city-wide median income and district-wide percent of students eligible for free or reduced-price lunch, enacted more far reaching and innovative FTS programming than the wealthier school district, Sequoia City. That the local-level results contradict the national-level finding here suggests a need to dig deeper at the local level to uncover what additional factors might be at play in determining FTS programming outcomes.

District statistics from Sequoia City and Pacific City reveal that a higher percentage of enrolled students eat school meals in Pacific City compared to Sequoia City. Specifically, approximately 56 percent of students in Pacific City eat school lunch daily, while only 42 percent of students in Sequoia City eat school lunch daily. These statistics reveal that more students in Pacific City rely on school meals than in Sequoia City, where students are more likely to bring packed lunches from home each day. That more students in Pacific City rely on school meals than in Sequoia City is likely related, in part, to the broader economic conditions of the two districts. That is, students in Sequoia City are more likely to come from well-off families that have the resources and the time to pack lunches from home, whereas students in Pacific City are more likely to come from poorer families that are less equipped to pack lunches from home and are thus dependent on meals served in school.

In this way, families in Sequoia City may have been less interested and engaged in mounting grassroots school food reform efforts because their children tended not to depend on school food for a critical source of nutrition in the same way as children in Pacific City did. Thus, even though community economic resources were ostensibly available in Sequoia City to subsidize FTS programming, a countervailing influence on the likelihood of pursuing innovative
school food reform could have been that school meals were not seen as a critical need in the community because of the high local level of affluence. Indeed, the two, key parent-activists I spoke with in Sequoia City indicated that their initial participation in school food reform efforts stemmed not from their desire to improve school meals because their children and others relied on them every day, but from their efforts to get peanuts and other allergens out of the school cafeteria and classrooms because their own children suffered from severe food allergies. Neither of the parents’ children actually ate school food, and it was not until they saw the quality of the meals served in school when they were addressing the food allergens issue that they realized this was an important cause to take up for the students who do rely on school meals in the district. Their efforts to get a salad bar into their children’s school, then, was a way to both provide a healthy, allergen-free way for their own children to eat food served in school, and to increase the accessibility of fresh fruits and vegetables for all students. The need to improve the quality of food in the district, however, was not readily apparent to these parents because their children did not eat lunch at school, and they did not view school food as a critical need in the community.

By contrast, even though Pacific City had less local economic wealth to pursue innovative FTS programming, parents and community members were arguably more engaged with the school nutrition program in the district than in Sequoia City because of the importance of school meals to so many students in the community. As the results from Pacific City in Chapter 4 revealed, large numbers of parents and community members independently came together and formed the Cafeteria Collaboration to advocate for healthier school food in the district. This indicates that parents and community members from across the district were aware of the importance of school meals, and were motivated to participate in reform efforts because they recognized that healthy school food was a critical need for so many students in the district. This demonstrates how overall high levels of economic affluence might actually contribute to a lower likelihood of pursuing widespread FTS programming at the local level. School food might be seen as less visible and important in these economically advantaged communities than it is in poorer communities, in which larger swaths of students depend on school meals.

Findings from the national level presented in Chapter 2 were not entirely contradictory, however, when applied to the local level results. In particular, although not statistically significant, national results showed that states with more liberal political ideologies were more likely to have higher FTS rates than states with more conservative political ideologies. Translated to the local level, this finding helps to explain why Pacific City enacted widespread FTS programming and Sequoia City did not. Specifically, Pacific City is located in one of the most liberal counties in California based on voter registration by political party, while Sequoia City is located in a liberal, but no overwhelmingly so, California county. In this way, we can surmise that exceptionally left-leaning parents, community members and organizations in Pacific City were more likely to actively support and engage in the social justice project of improving school food in the community than their counterparts in Sequoia City, who might have been less prone to overt social activism. What is more, the vibrant, equity-focused food justice nonprofit sector in Pacific City that proved to be central in advancing school food reform efforts through key partnerships with the district was likely heavily influenced by the liberal political culture of area.

Finally, national-level results presented in Chapter 2 pointed to the positive, although not statistically significant, impact that federal USDA FTS grant dollars per student had on FTS rates at the state level. This finding was supported at the local level. In particular, Pacific City applied
for and received a $100,000 USDA FTS grant to implement its innovative “LocalEats” program, while Sequoia City did not apply for or receive any federal FTS grant funding and, consequently, did not implement innovative FTS programming in the district. This suggests that at both the state and local level, federal funding to supplement the cost of pursuing FTS programming is crucial to achieving results on the ground.

In sum, assessing the results of each strand of the research vis-à-vis the other facilitates a comprehensive and nuanced understanding of the factors contributing to the nature and quality of school food programs on the ground in the aftermath of the 2010 HHFKA.

**Theoretical Implications**

This research drew on theory situated at the disciplinary intersection of sociology and political science. In Chapter 2, I relied on policy diffusion theory to explore the dual effects of federal policy and state-level sociopolitical factors on the prevalence of FTS programs throughout the U.S. Resonant with previous research on policy diffusion, I found that both external and internal determinants had an impact at the state level on policy innovation and adoption. My results especially highlighted that regional effects and state-level per capita income were key factors influencing FTS program adoption at the state level. In this way, my research contributes to political science efforts to understand the complex process of policy and program diffusion in the U.S.

Specifically, my findings offer support for the impact of geographic proximity as a “long-running theme in diffusion research generally” (Karch 2007). In the case of FTS, my results highlighted that states in closer regions of the country were more likely to have similar FTS rates than states in more distant regions of the country. Neighboring states, I speculated, were likely to have shared cultural, environmental, and societal conditions that shaped specific reactions to policy-relevant problems and capacities to implement innovative programming like FTS. As such, my results lend support to the geographic basis of state policy diffusion and adoption in the literature. Most studies in the policy diffusion literature, however, fail to distinguish among the many factors that could produce a geographic pattern. “Even when [regional] proximity has a statistically significant effect on diffusion,” Karch (2007: 58) contends, “the source of this relationship remains open to interpretation.” Indeed, my analysis stopped short of teasing apart and statistically testing the specific dynamics at play in contributing to the regional effects factor. In this way, my findings support calls for a greater focus in diffusion research on the effects of imitation, emulation, and competition among states so as to isolate more precise explanations of the mechanisms through which policies and programs diffuse among the states (Karch 2007).

More broadly, policy diffusion scholars have begun to suggest the need to combine traditional, statistical analyses with local-level, qualitative explorations to better understand the processes of policy diffusion on the ground (Karch 2007, Mosier and Thilmany 2016). My effort in this concluding chapter to explore the school district-level findings presented in Chapters 3 and 4 in the context of the state-level findings presented in Chapter 2 contributes to this call to expand policy diffusion analysis beyond strictly quantitative explorations. In this way, my research provides a framework for bringing together statistical analysis and qualitative findings to examine the mechanisms of adoption of innovative policies and programming across the country.

In Chapter 3, I engaged with theories of neoliberalism and privatization anchored in
political and economic sociology to explore the dynamics and consequences of school district-level nutrition program operational structures on the nature and quality of food served to students. Based on the case of school food programming in Sequoia City, my findings offered rich, empirical support to claims in the privatization literature that involving for-profit firms in the delivery of social services results in significant, cost-effective alternatives to state-run services. On the other hand, my results contradicted findings in the literature that privatization fosters corporate initiative, innovation, and increased quality on the ground in the delivery of services. Instead, my findings demonstrated that privatization generated private interests focused on corporate profits that directed the nature of the delivery of services at the expense of social justice-oriented interests, and that privatization resulted in more of the same in the delivery of school meals as opposed to innovation and creativity. In this way, my research echoes calls from critics of privatization in the literature (See for e.g. Burch 2009, 2010, and Bulkley and Burch 2011) to approach the act of privatization with a considerable amount of caution and skepticism vis-à-vis its purported benefits. More broadly, my findings cast doubt on the utility of the larger neoliberal project underway since the 1980s that entails shifting responsibility for social service provisioning to private actors and market forces, if we are to prioritize social justice and equity-focused outcomes and goals.

Finally, in Chapter 4, I drew on theories of social movement activism to examine the nature of FTS efforts and school food program innovation on the ground. Specifically, I relied on social movement and organizational theories on leadership and institutional entrepreneurship, and partnerships and alliances to shape an analysis of social change processes in Pacific City. In addition, the sociological theory of civic agriculture provided a framework for exploring the civic practices associated with food system social change efforts that were inextricably embedded within the context of the local community. My results from Pacific City highlighting the key role of the supportive and skilled nutrition services director in making school food reform a reality and a success in Pacific City supports previous research in the social movement literature on the importance of movement leaders and institutional entrepreneurs in facilitating social change efforts through actions including aggregating interests, networking, and coalition building. That external community partnerships played a central role in implementing the school food reform project and ensuring its success in Pacific City, moreover, coincides with previous research on the benefits of social movement coalitions and partnerships in developing and spearheading social change initiatives. In this way, my study empirically supports key theoretical perspectives established in the social movement literature. Finally, my research provides much-needed empirical evidence to substantiate central theoretical tenets of the sociological literature on civic agriculture and food system activism. In particular, my findings pertaining to the role of committed parent-activists and a supportive community context in enacting food system change bolsters the literature on the evolution and dynamics of civic engagement as it relates to food-related social change efforts.

Policy Implications

In shedding critical light on the myriad factors that contribute to the nature and quality of federal nutrition programs in the U.S., my study illuminates several key policy recommendations at the state and federal level that would work within our current paradigm for school meals to help facilitate healthier, and more equitable school food environments throughout the country. Before
turning to these recommendations, however, I will first briefly explore more radical and overarching policy changes to our country’s school food model that have been proposed in the school nutrition literature. Poppendieck (2010), in particular, advocates for a thorough reconsideration of school food, instead of a piecemeal or incremental effort. She argues that it is time for an entirely new paradigm for school meals in this country—one that does away with three-tier eligibility system, enabling school food to lose its stigma. In its place, she proposes a system of universal free school meals, in which there is nothing for sale in school cafeterias, no cashiers, no cumbersome recordkeeping—just students heading to the cafeteria every day to eat healthy, nutritious meals together. Poppendieck (2010: 263-4) argues that such a system would

...benefit poor children who would no longer have to eat a meal seasoned by shame, and it would benefit middle-income children for whom healthy school meals could become the norm. It would benefit overstressed, time-starved working families by taking one more task, and one more parent-child battleground, off the table. It would benefit food service staff, who could turn their attention from accounting to cooking. And in the long run it would benefit us all through savings in health care costs and better educational outcomes.

A universal free system, she notes, has been successfully implemented in various countries around the world, including Sweden, where “school meals are part of the budget, financed by a combination of national and local funds” (267). Implementing a universal free meals program in the U.S., however, faces a steep ideological barrier, as many Americans oppose the idea of federally subsidizing the cost of school food for children whose parents can afford to do so without help. “The idea of paying for meals for “rich kids” bothers people,” Poppendieck (2010: 267) writes. In response, she advocates for taking school food out of the federal antipoverty category of social services altogether, and for reconceiving of the program as an integral part of the school day for all students to share together. To pay for this universal free program, which some experts have estimated would be a 100 percent increase over the cost of continuing the existing program, Poppendieck (2010: 286) proposes using proceeds of increased federal income taxes. In this way, parents of higher income students would pay more through a progressive tax structure, and community members who are not parents would also pay as well to help fund the program. She also suggests taxing unearned income, or capital gains, at a higher rate, taxing soft drinks, and reducing income guarantees and commodity payments to corn and soy producers as additional ways to fund a universal free program (290-1). Given that Americans tend to harbor a conservative distrust of federal programs, and politicians are often loath to raise taxes to pay for public services, Poppendieck’s proposal is a radical one for the U.S. that would surely be an uphill political battle.

The closest we have come in this country to establishing the universal free system that Poppendieck advocates for is the Community Eligibility Provision (CEP) that was passed as a component of the 2010 HHFKA. The CEP allows the nation’s highest poverty schools and districts to serve breakfast and lunch at no cost to all enrolled students, without requiring students to demonstrate eligibility. Any school or school district with 40 percent or above of students who have previously been identified as eligible for free meals through household data matching with other needs-based programs like SNAP (food stamps) are eligible to participate. Participating schools receive a federal reimbursement per meal based on a formula that estimates
the share of students that would receive free or reduced-price meals if the school collected meal applications, and reimburses schools at the highest (free) federal reimbursement rate for this share, while the remaining meals are reimbursed at the lowest (paid) rate. In this way, schools with higher portions of students previously identified as free-lunch eligible receive the highest reimbursement rate for more meals, making it financially easier for them to implement the provision. The CEP was initially phased in a few states at a time beginning in the 2011-2012 school year, and became available to all states during the 2014-2015 school year. Early evaluation reports have concluded that the CEP has boosted school meal participation, as well as the financial viability of school food programs at the local level. By the 2016-2017 school year, there were 20,721 schools participating in the program, affecting up to as many as 9.7 million children (FRAC 2017).

While the CEP represents an important and promising step toward removing the stigma of school meals in some of the country’s poorest communities, and simplifying the administrative burden of operating the program by eliminating the use of applications to collect family income data to certify students by eligibility category, it stops short of widespread transformative change to our nation’s school food system. Until the CEP is legislated to extend beyond high-poverty areas to provide universal free meals for all students throughout the country without a three-tier reimbursement system, wholesale transformation of our current school food system toward a comprehensive universal free model will be out of reach. What is more, recent child nutrition reauthorization bills that have been introduced into Congress to reauthorize the 2010 HHFKA have included provisions to severely restrict eligibility requirements for the CEP. A bill introduced to the House by Republican Representative Todd Rokita in 2016, for example, would limit community eligibility to schools that have a majority, or 60 percent, of their students living at or near the poverty line, instead of only 40 percent. This would cause 7,022 schools that serve nearly 3.4 million students now using the CEP to have to reinstate paper eligibility applications and return to a system of offering free, reduced-price, and full-price meals (Neuberger 2016). This example demonstrates the tenuousness of the CEP in federal child nutrition policy, and the political opposition that exists toward moving toward a universal free system in this country.

While I agree with Poppendieck that a universal free system of school meal provisioning is the best solution to achieve the healthiest and most equitable school environments possible in this country, I think it is important to also offer policy suggestions that would work within the parameters of our current system to improve the nature and quality of school food. In what follows, I offer several such recommendations.

First, my results point to a clear need for increased federal funding for school meal programs that goes beyond the additional six cents reimbursement per meal stipulated in the 2010 HHFKA.

**POLICY RECOMMENDATION 1: Significantly increase federal and state reimbursements for school meals that meet federal nutrition requirements.**

Increasing the amount of money that school districts receive from the federal government in the form of reimbursements will go a long way toward supporting school districts in the provision of high-quality, healthy meals. Based on the current federal reimbursement rate for school lunches, school districts receive $3.16 for each free meal served, $2.76 for each reduced-price meal
served, and $0.30 for each full price meal served, plus an additional $0.06 per lunch that meets the new nutrition standards. An additional $.02 per lunch is provided to schools in which 60 percent or more of the second preceding school year lunches were served free or at a reduced price. This money is typically combined with proceeds from the sale of full-price meals, which average $2.50 per meal nationally, and a la carte snacks, to cover all costs associated with providing the meal including labor, equipment, supplies, and transportation (SNA 2017). School food experts agree that to work within these tight budgets, most school districts have just one dollar to spend on food for the average school lunch (SFF 2017). While the cost of producing school meals differs from community to community based on variations in food prices and labor costs, there is no question that sourcing a fresh, nutritious meal for students with just a single dollar to spend on food per meal is extremely difficult. In Pacific City, for example, Katie, a nutrition services department staff member estimates that they have approximately 60 cents to spend per entrée, 20 cents for the fruit or vegetable, and 25 cents for milk—or $1.05 for an entire, reimbursable meal. For a “LocalEats” meal, the district pays 40 cents per raw, locally sourced, antibiotic-free chicken leg, and high schoolers require two drumsticks to meet the USDA protein requirement for entrées. At 80 cents, the “LocalEats” entrée is well over the budgeted 60 cents per entrée. When given a choice, it is easy to see then how school districts would be enticed to opt for commodity chicken supplied by the USDA at low cost to the district that has been pre-processed into frozen chicken nuggets.

School food activists Waters and Heron (2009) estimate that high-quality, nutritious school meals prepared from locally sourced, organic ingredients would cost about $5 a piece. As such, a dramatic increase in the federal reimbursement rates for school meals in the amount of several dollars is needed to provide schools the flexibility to explore the procurement of local, fresh items that will inevitably cost more than using USDA commodity items and procuring food from conventional sources. Moreover, increasing federal reimbursements to all school districts rather than relying on competitive USDA Farm to School Grants to help fund the procurement of healthy foods will facilitate a more equitable transition to serving healthier meals in schools. In addition, while some states are required to also provide per-meal reimbursements to school districts, not all states have this requirement. Both mandating and increasing reimbursement rates at the state level, then, can work to supplement federal reimbursements and help facilitate the provisioning of fresh, healthy meals. What is more, larger reimbursements from both state and federal agencies will help safeguard districts from suffering severe financial losses that can trigger them to turn to the private sector for help, as was the case in Sequoia City. Higher reimbursements are needed to enable districts to retain local control of their nutrition programs. As evidenced by Pacific City School District, keeping school food programs under local, district control increases the likelihood that the programs will pursue the provisioning of services in the students’ best interests as determined by community needs, as opposed to being beholden to private interests and corporate profit motives.

Next, in order to increase the amount of fresh, nutritious foods available in all schools throughout the country, federal school food procurement regulations must be updated so as to require schools to source a certain percentage of their food items from local farms.

POLICY RECOMMENDATION 2: Update federal school food procurement regulations so as to require schools to source fresh foods from local farms.
Foods sourced from local, small-scale farms as opposed to large, corporate agribusiness manufacturers are more likely to be fresh, seasonal, minimally processed, and grown using sustainable, environmentally friendly techniques. Increasing the availability of these fresh foods in school cafeterias as opposed to heavily processed, prepackaged items from industrial suppliers that are high in sodium and sugar is a critical step towards ameliorating childhood obesity and promoting equitable health outcomes. What is more, increasing local procurement for school food programs will also support community economic development throughout the country by strengthening local and regional food economies.

Federal procurement regulations do not currently allow “local,” or any designated geographic area, to be used in product specification or vendor requirements in school food solicitation. There are ways, however, in which school districts can still identify and procure local foods while working within the regulatory framework, but the process is not easy or straightforward. The USDA handbook on procuring local foods for child nutrition programs, for instance, is an alarming 154 pages long and itself even states that procuring local foods can require creativity on the part of nutrition services staff. School nutrition service directors, with so much already on their plates, often lack the time, persistence and creativity to wade into the convoluted details of how to increase the sourcing of local foods for their programs. In Pacific City, for example, a staff person devoted entirely to FTS programming and sourcing food locally was hired to oversee the process in the district.

In order to resolve this issue, federal regulations need to be changed so as to make fresh, local sourcing a straightforward procurement requirement, rather than a complicated option that schools can pursue if they wish. This will work to uniformly increase student access to fresh and nutritious meals. First, the federal government must come up with a baseline definition of “local” that schools can use as a starting point for developing their own, more refined definition. A reasonable federal definition would be defining “local” as any product produced within the state that the school district is located in. Federal regulations can then encourage schools to narrow the definition further, if applicable, based on their unique geographic and food production circumstances. What is more, federal regulations could also encourage school districts to identify small, family-owned farms as a component of their definition of local. Federal regulations must then be changed so as to require school districts to procure a percentage of their foods from these local producers. I suggest a gradual phase-in of this requirement, such as initially requiring schools to source 15 percent of their food items from local producers, and then moving to 25 by

18 For example, through informal procurement methods, used when the value of a procurement is less than $150,000, school districts can request quotes exclusively from local producers, based on how the district choses to define local. On the other hand, through formal procurement methods, used when the value of procurement exceeds $150,000, schools must use either an invitation for bid (IFB) or a request for proposal (RFP) method for procuring foods from possible vendors. When using IFBs or RFPs, schools can use specifications, vendor requirements, or evaluation criteria to target local foods. For example, schools may include the specification in their RFP that foods be fresh (harvested within a day or two of delivery), which might increase the likelihood that a local vendor would win the contract. Schools can also specify farm size, harvest techniques, or a desire for particular varieties unique to the region, such as a specific variety of apple only grown by local farmers, in their RFPs that can also help to target local foods. In addition, schools can use the geographic preference option passed in the 2008 Farm Bill to target local procurement of unprocessed agricultural products. This option allows schools to define “local,” and to decide on the amount of preference to give to local items in the procurement bidding process. For example, many schools elect to assign extra points in the selection phase to vendors that offer local products, making them more competitive. Finally, schools can also use the DoD Fresh Fruit and Vegetable Program to order fresh, and often local, produce for school meals (USDA FNS 2015).
the following year, and so on. This will allow school districts the time and flexibility to begin the process of identifying and forming relationships with local farmers in their state. As time progresses, sourcing food from local farms will slowly become more of the norm, rather than the exception, in the realm of school food procurement.

To assist schools in returning to a system of scratch cooking fresh foods that are sourced from local farms, two additional policy changes must be enacted at the federal level. First, additional federal funding must be allocated to increase professional development training for school foodservice workers.

**POLICY RECOMMENDATION 3: Significantly increase federal funding to all school districts for professional development training to teach school foodservice workers the technical skills needed to cook fresh foods from scratch.**

While the 2010 HHFKA mandated a minimum amount of annual training hours for all state school nutrition program directors, managers, and staff, most school food service workers lack the skills necessary to scratch cook foods. As such, hands-on, intensive training workshops are needed on the ground in schools to instruct school food services on how to handle and prepare fresh, raw ingredients into nutritious school meals. While the USDA currently offers competitive Team Nutrition Training Grants to help schools provide training and technical assistance to school nutrition foodservice workers, and Professional Standards Training Grants to facilitate and support increased training efforts, these grants are not enough. Training school foodservice staff across the country should not be contingent on competitive grant funding that requires local level coordination to apply for. Each school district operating federal school meal programs should be allotted a set amount of money each year, based on the size of their nutrition services staff, to hold ongoing workshops and trainings on a variety of topics related to preparing fresh meals from scratch. In this way, scratch cooking will be prioritized in federal nutrition policy, which will inevitably lead to the preparation of healthier, more nutritious school meals for students.

Relatedly, we must move away from a system of competitive Equipment Assistance Grants and enact a one-time investment to upgrade school cafeteria and kitchen facilities throughout the country.

**POLICY RECOMMENDATION 4: Enact a one-time federal investment to all school districts to subsidize the cost of cafeteria and kitchen renovations.**

Preparing fresh meals from scratch requires schools to be equipped with real kitchens. With the deskilling of school foodservice workers that occurred with the move to packaged, frozen heat-and-serve items several decades ago, the equipment needed to handle and prepare raw ingredients disappeared from school cafeterias. Today, most schools today lack the equipment needed to scratch cook meals from fresh ingredients. A 2013 nationwide survey of school foodservice workers, for example, found that only 1 in 10 school districts nationwide has all the kitchen equipment needed to serve healthy meals (The Pew Charitable Trusts and RWJF 2013). Real kitchens then must be installed in schools around the country to enable a return to scratch cooking. Currently, the USDA distributes Equipment Assistance Grants that enable school districts to purchase equipment to serve healthier meals that meet the updated meal standards.
These grants however, are awarded on a competitive basis. In order to ensure an equitable transition to serving healthy meals around the country, all school districts must receive a federal subsidy to update their kitchen facilities based on their individual needs. Experts estimate that the median per-district cost of replacing and upgrading equipment to allow schools the ability to prepare and serve healthy foods is $131,000 (The Pew Charitable Trusts and RWJF 2013). By financially investing in installing real kitchens in all schools throughout the country, federal policy will lay the foundation for a fair and just provisioning of healthy school meals.

In order to maximize this significant federal investment in child nutrition programs that I have called for in the preceding policy recommendations, we must also make nutrition education a mandatory component of the K-12 education curriculum in the country.

**POLICY RECOMMENDATION 5: Make nutrition education a mandatory component of K-12 national science education standards.**

By fostering positive attitudes towards fresh, healthy foods, thereby increasing the likelihood of students consuming fresh fruits and vegetables in the school cafeteria, nutrition education is central to empowering students to make healthy choices and improving child health outcomes. In this way, nutrition education plays a key role in battling childhood obesity. While a variety of government agencies including the USDA, the CDC, the National Institutes of Health, the Department of Education, and the Department of Health and Human Services have developed various nutrition education curriculums for use in school classrooms, the curriculums are supplemental to core education requirements, and there is little incentive or time for teachers to incorporate the nutrition education materials into their lesson plans (Hard, Uno, and Koch 2013). Making nutrition education a mandatory component of federal science education standards will ensure that the federal investment in healthy school lunches is maximized by providing children with critical knowledge of food and agriculture from farm to fork, and the ability to make healthy food choices. What is more, garden-based nutrition education, in which hands-on, garden-based activities including planting and harvesting a vegetable garden are used to reinforce classroom nutrition lessons, should be especially emphasized in the federal education standards.

Finally, as long as privatization continues to be an option for the provisioning of school meals in this country, stricter federal regulations must be enacted and enforced to hold food service management companies accountable and to increase transparency related to their practices.

**POLICY RECOMMENDATION 6: Enact and enforce stricter federal regulations for food service management companies surrounding accountability and transparency.**

Although federal regulations require that FSMCs pass on to school districts any rebates they receive from corporate manufacturers, this rule is woefully under-enforced. A lack of transparency surrounding the practices of FSMCs allows them to secretly pocket rebates worth millions to which school districts are entitled. Stricter regulations must be enacted and enforced at the federal level that hold FSMCs accountable to fair and just practices.

Currently, federal regulations require the FNS, an agency of the USDA, to provide
periodic program oversight through monitoring reviews of each state’s administration of federal school meal programs, and to assist school districts in oversight at the local level. In addition, while federal regulations require that state agencies annually review each FSMC contract before it is signed to ensure compliance with federal requirements, school districts retain responsibility for ensuring that all food operations comply with federal regulations. A recent federal audit report on FSMCs, however, found that most school districts are not equipped to properly monitor FSMC contracts at the local level. In particular, most school districts in the report’s review did not ensure that the FSMC they contracted with fully credited them for purchase rebates, as required. School districts were largely unaware that they were entitled to those purchase rebates, or they failed to verify that they had actually received all rebates due to them. This occurred, the report concluded, because school districts were not provided adequate instructions and guidance from the FNS on how best to monitor and track such rebates (USDA OIG 2013).

The federal government must reevaluate and streamline the oversight system of FSMCs. Leaving the majority of the oversight process to local level district authorities who lack proper training on procedures, techniques, and best practices is allowing FSMCs to get away with illegally misappropriating millions of dollars in rebates. To ease the oversight burden on local school districts and to ensure operational integrity throughout the country, the federal government should take a more active watchdog role over FSMCs. In particular, federal officials should be responsible for the majority of FSMC oversight procedures, with local officials taking on more of a supportive role. While local officials should, nevertheless, be more thoroughly trained on oversight procedures for FSMCs, they should not bear the bulk of the administrative burden. Federal officials must take on the responsibility of more strictly monitoring FSMCs through routine annual audits of FSMC contracts. By both more thoroughly educating local officials on oversight rules and regulations, and shifting the administrative burden of supervision to the federal government, FSMCs will be more stringently regulated and less likely to cheat school districts out of rebates that are rightfully theirs.

Taken together, these changes to school food policy at the federal level will dramatically raise the baseline nutrition standards for the program, and will ensure a just and equitable provisioning of healthy school meals across the country. There is no question, however, that to enact these policy recommendations will require a tremendous increase in federal spending on school nutrition programs. As Poppendieck (2010) outlined, however, there are a multitude of ways in which we can find the money to increase federal expenditures on school meal programs. The biggest challenge to increasing federal spending on nutrition programs then is not how to come up with the money—it is ideological. We must change the way we think about school meals in this country in order to rally public support for increased funding for school meals at the federal level. We need to reinterpret the original stated goals of the National School Lunch Program to safeguard the health and well-being of the country’s children and to encourage the domestic consumption of agricultural commodities for the current era. Specifically, we need to emphasize achieving health equity in the face of an unprecedented childhood obesity epidemic as an overarching goal of federal nutrition programs. We must also move away from the notion of federal school food programs as an outlet for cheap agricultural commodities like corn and soy that have completely flooded our industrial food system, enabled by decades of Farm Bill policies favoring corporate agriculture. Instead, we need to focus on federal nutrition programs as an outlet for locally grown, fresh foods produced by small, family farmers. Finally, it is crucial that we remove the stigma of school food as a welfare program for the poor. We must
work to increase student participation in school meal programs across eligibility categories by eliminating competitive foods and vending machines in schools, and serving only high-quality, nourishing meals that all students will be excited about eating together. Ultimately, to substantially increase federal funding for school food programs in this country, we must work to cultivate a shared sense of civic responsibility for the provisioning of healthy school meals for all of our nation’s children to enjoy.

Suggestions for Future Research

The results of my study highlight the need for future research that strengthens our understanding of the dynamics of national policy and local factors in shaping school food program outcomes. In particular, findings from the quantitative strand of the research highlight the need for future research that investigates additional state-level factors to penetrate the causal mechanisms at play in determining FTS program prevalence. Additional state-level data including budgets and expenditures for school food programs, school food issue salience, and state and local resources available should be collected and analyzed to contribute to our knowledge of the role state-level dynamics play in federal program implementation and policy outcomes. Future studies are also needed at the school district level in order to gain finer-grained insights into the role of not just state, but also local dynamics at play in the school food arena. Collection and analysis of school district-level data nested within states would address a significant limitation of the current study—the small sample size and the resulting difficulty in producing statistically significant results with an n of 49. Future research could also take into account additional federal grant programs beyond the Farm to School Grants that support healthier school food, such as the USDA’s Team Nutrition Grants, which support schools to implement “smarter lunchrooms” techniques that encourage students to eat more whole grains, fruits and vegetables, and Equipment Assistance Grants that allow school food authorities to purchase equipment to scratch cook and serve healthier meals that meet the updated mandates. By including data on these additional federal grants, we can generate a more thorough understanding of vertical diffusion processes in facilitating the move toward healthier school lunches in this country.

Meanwhile, results from the qualitative component of the study underscore the need for additional research to better understand how local level dynamics shape nutrition program outcomes on the ground. Specifically, more research on school food program privatization versus self-operation is needed to continue to tease out the ways in which local dynamics affect school food program implementation. Data on school nutrition program privatization in the U.S. is not well documented. Because no federal agency routinely collects school food program privatization data in this country, it is difficult for researchers to analyze trends over time in relation to other relevant data including farm to school programming and childhood obesity rates. To contribute to our understanding of the consequences of privatization in the realm of school food, more empirical data is needed to document and describe national and regional patterns. The effects of school food program privatization on the capacity of local communities to mount social change reform efforts should be prioritized in future studies. More research is needed to explore how, if at all, parents and grassroots social change actors are being brought into conversations surrounding the role of private market actors and the delivery of social services, and at what stages in the privatization process. Are parents and community members being silenced as a result of privatization, and what effect does this have on the equitable delivery of
healthy school meals? Additional empirical research is needed to contribute greater clarity surrounding the practices and impact of private actors on the provisioning of school meals vis-à-vis programs that are self-operated and embedded in local communities. In this way, we can better inform federal school food policy in the pursuit of democratic values of equity, justice, and fairness.

In addition, local-level research on school food program dynamics in rural areas is needed to clarify and expand the findings generated in this study. More than half of all school districts in the U.S. are located in rural areas, and they enroll nearly 25 percent of all students in the country (NCES 2013). Obesity rates, moreover, are actually higher among children residing in rural areas, compared to children living in urban areas (Johnson and Johnson 2015), and conditions in rural school districts are sufficiently distinct from urban ones so as to warrant being examined independently. In particular, rural school districts are more likely to have 1) limited fiscal resources to assist in meeting the demands of federal and state education agendas, 2) chronic shortages of experienced, well-educated teachers, and 3) an ethos of political conservatism and cultural homogeneity that fosters traditional, localized value systems (Stern 1994). Research on school food programs in rural areas should focus on exploring how specific challenges endemic to rural districts have shaped distinct school food program implementation strategies and outcomes, and how federal and state school food policies can be developed to address the specific needs of rural districts.

Finally, future comparative studies are needed that situate and explore U.S. school food programming and reform efforts in an international context. Childhood obesity has become a global concern that extends beyond the confines of the U.S. In the UK, for example, childhood obesity became a major political issue when a 2004 report stated that if the UK continued on its current trajectory, more than 50 percent of children would be obese by 2020 (Morgan and Sonnino 2008). In Italy, moreover, researchers found that a whopping 35 percent of Italian children under age 10 were either overweight or obese in 2004 (Sonnino 2009). In light of these recent childhood obesity concerns, a growing school food reform movement has taken hold on a global scale. In Italy, for instance, the school meal system has undergone radical reforms including a “quality revolution” in Rome that has redesigned the system to focus on seasonality, variety, locality, and nutritiousness, and new guidelines in Pisa that include a preference for seasonal, fresh, and local products with short supply chains (Sonnino 2009, Morgan and Sonnino 2008, Galli et al. 2014). The move towards privileging local farms and foods has made school meals integral to conserving local traditions in Italy and protecting the territoriality of the country’s local food culture (Sonnino 2009). With the help of increased government funding, England, too, has implemented a radical new school food policy that includes updated nutritional standards and nutrition education efforts (Morgan and Sonnino 2008). Future studies are needed that examine U.S. school food programming in an international context. Such comparative research can help push school food reform efforts forward in the U.S. by illuminating the successes and challenges of school food programming dynamics around the world in light of global childhood obesity concerns.
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APPENDIX A

RESEARCH DESIGN AND METHODS

Mixed Methods Research Design

This project utilizes a mixed methods research design to explore the dynamics and outcomes of school nutrition programs at both national and local levels in the aftermath of the 2010 Healthy, Hunger-Free Kids Act. Mixed methods research (or mixed research) can be broadly defined “as research in which the investigator collects and analyzes data, integrates the findings, and draws inferences using both qualitative and quantitative approaches or methods in a single study or a program of inquiry” (Tashakkori and Creswell 2007: 4). The purpose of mixed research is to provide a more complex understanding of a phenomenon that would otherwise not be accessible by using one approach alone (Creswell and Plano Clark 2011).

The formalization of the practice of using multiple research methods in the social sciences is generally traced to Campbell and Fiske’s (1959) seminal article that introduced the idea of triangulation—or the process by which “more than one method is used as part of a validation process that ensures that the explained variance is the result of the underlying phenomenon or trait and not of the method” (Johnson, Onwuegbuzie, and Turner 2007: 113–4). The formative period of mixed research continued through the 1980s, as mixed methods gradually gained momentum as a viable alternative research approach and was established as a third methodological paradigm to quantitative and qualitative traditions. (Creswell and Plano Clark 2011, Guest 2012). In this way, Johnson et al. (2007: 129) describe mixed research as “an intellectual and practical synthesis based on qualitative and quantitative research; it is the third methodological or research paradigm (along with qualitative and quantitative research). It recognizes the importance of traditional quantitative and qualitative research but also offers a powerful third paradigm choice that often will provide the most informative, complete, balanced, and useful research results.”

The philosophical orientation most often associated with mixed research is pragmatism (Morgan 2007, Teddlie and Tashakkori 2009). The pragmatist paradigm “debunks concepts such as “truth” and “reality” and focuses instead on “what works” as the truth regarding research questions under investigation” (Teddlie and Tashakkori 2009: 8). Pragmatism aligns with mixed methods research because “it rejects the either-or choices from the constructivism-positivism debate. Pragmatism offers a third choice that embraces superordinate ideas gleaned through consideration of perspectives from both sides of the paradigms debate in interaction with the research question and real-world circumstances” (Teddlie and Tashakkori 2009: 73). In this way, the pragmatist orientation of mixed research 1) views knowledge as being both constructed and based on the reality of the world one experiences and lives in, 2) views social inquiry as occurring similarly in research and day-to-day life—researchers test their beliefs and theories through experience and experimenting, looking for what works, what solves problems, and what answers problems, 3) prefers action to philosophizing and endorses “practical theory,” and 4) takes an explicitly value-oriented approach to research that is derived from shared cultural values.

19 By comparison, qualitative research is typically rooted in a constructivist paradigm that emphasizes inductive logic and exploratory research grounded in theory, while quantitative research is often anchored in a positivist paradigm that focuses on deductive logic and confirmatory research (Teddlie and Tashakkori 2009).
including democracy, equality, and progress (Teddlie and Tashakkori 2009: 74). Mixed research, moreover, combines both inductive and deductive logic in the practice of both exploratory and confirmatory analysis. In Morgan’s (2007: 71) words, “The pragmatic approach is to rely on a version of abductive reasoning that moves back and forth between induction and deduction—first converting observations into theories and then assessing those theories through action.”

As mixed research has grown in popularity among social science researchers, scholars have generated a variety of typologies to describe and classify mixed methods research designs (See for e.g. Greene, Caracelli, and Graham 1989, Morgan 1998, Creswell and Plano Clark 2007 and 2011, and Teddlie and Tashakkori 2009). These typologies offer frameworks for understanding and categorizing the complexity of mixed methods research processes and dimensions. Below, I classify my mixed research design along three key dimensions: structure, function, and process. See Figure 5 below for a graphic illustration of my mixed methods research design.

(1) **Structure.** I classify my design based on Morse’s (1991, 2003) widely-used notational system that highlights timing (using methods in sequence, designated by the “→” symbol, or concurrently, designated by a “+” sign) and orientation (using a dominant method, designated by uppercase letters, and a less dominant method, designated by lowercase letters). Based on this taxonomy, I classify my research design as “QUAN + QUAL,” representing the parallel\(^\text{20}\) collection and analysis of quantitative and qualitative data, giving equal weight to both types of data.

(2) **Function.** I define the function of mixing methods in my research design based on Greene et al.’s classifications (1989) that include triangulation, complementarity, expansion, development, and initiation. My research design entails complementarity, in which quantitative and qualitative methods are used to answer related questions through an elaborative design that permits qualitative methods to provide depth of understanding to complement the breadth of understanding afforded by quantitative methods.

(3) **Process.** I categorize my process for mixing methods and integrating quantitative and qualitative data based on Creswell and Plano Clark’s (2007) typology that takes three forms: merging the data, connecting the data, or embedding the data. My research design is focused on connecting the data, in which I connect the insights gained from one type of method to a different type of method in a meta-inference stage to answer related and overarching research questions.

\(^{20}\) Following Teddlie and Tashakkori (2009), I opt to use the term *parallel* (instead of *concurrent* (Creswell and Plano Clark 2007), or *simultaneous* (Morse 2003) to denote the timing of each method in my research design. As Teddlie and Tashakkori (2009: 144) argue, *concurrent* and *simultaneous* imply that the QUAN and QUAL phases of a study occur at exactly the same time. *Parallel* is a more inclusive term that allows for cases in which the two different types of data were collected at different times due to practical considerations (for e.g. the researcher could not collect all of the data at the same time).
Figure 5. Graphic Illustration of Parallel Mixed Research Design*

*Adapted from Teddlie and Tashakkori (2009)
Quantitative Strand

The quantitative strand of the project allows for a general and broad exploration of school food programs on a national scale. The purpose of the quantitative strand is to statistically test key hypotheses derived from the policy diffusion literature related to federal and state-level sociopolitical influences on school nutrition programs across the U.S. as measured by the prevalence of FTS programs at the state level.

Analytic strategy

I conducted the analysis using Stata/SE v. 10. I first calculated descriptive statistics for the predictor and outcome variables. Then, I standardized all of the independent variables and left the dependent variable in its original metric for ease of interpretation. Next, I generated bivariate correlations to assess the crude relationship between prevalence of FTS programs and the study variables. Then, I used an ordinary least squares multivariate approach to model the relationship between state-level FTS rates and the independent variables capturing vertical diffusion, internal determinants, and the key controls. Finally, I calculated robust standard errors using the Huber-White sandwich estimators. Tests for multicollinearity were conducted by calculating variance inflation factors. Values were all below 2.06, well below any value that would indicate collinearity issues. Regression specification error tests were performed for model specification purposes and adjusted R-squared values were used to evaluate overall model fit.

Qualitative Strand

The qualitative component of the research allows for a rich, local-level analysis of school food program implementation and outcomes on the ground. I employ the case study method (Yin 2003, 2015) to analyze how contrasting local-level conditions shape distinct school food program dynamics on the ground. The case study method allows for a close attention to contextual conditions based on a belief that they might be highly pertinent to the phenomenon of study (Yin 2003: 13). Using a comparative, multiple-case study design (Yin 2003, 2015), I selected two school districts based on contrasting local-level dynamics. Selecting two case study school districts compared to a single case study district allows not only for a direct comparison of contrasting local conditions that shape school food program outcomes, but also enhances the generalizability of my findings. Analytic conclusions drawn from multiple cases are often considered more compelling and robust than conclusions drawn from a single case study (Yin 2003).

Case selection

School food programs are a prime example of a federalist decentralization of power as states and local school districts are given specific jurisdiction over how federal school food policies are implemented. In this way, the design and implementation of federal school nutrition programs can vary significantly by state, as differing state funding structures and mandates can dramatically affect the shape and form school food programs take on the ground. In order to isolate the political, social, and economic factors that contribute to variation in school food
programs on a local level, the effect of state-level factors is held constant in the qualitative analysis. Limiting the case selection to school districts in one state accomplishes this and enables any variation in school nutrition programs that are simply a result of differing state policies to be ruled out.

As a state commanding one of the largest portions of the federal school food program budget and serving meals to the second largest number of students in the country, California is an ideal state to study the landscape of school food programs. California trails Texas as the state with the second largest number of students participating in the NSLP and the SBP daily. In FY 2015, an average of 3.3 million students participated daily in the NSLP, and an average of 1.7 million students participated daily in the SBP. Schools in California served approximately 553 million lunches and 285 million breakfasts in FY 2015 (USDA FNS 2016a). During the 2014-2015 school year, 10,414 California schools participated in the NSLP, while 9,923 schools participated in the SBP. In that same year, California schools received a total of $1.4 billion in federal funding for the NSLP, $478 million in federal funding for the SBP, and federal commodity entitlements valued at $173 million (CDE 2016).

Not only is California home to some of the largest participation rates in federal school food programs in the country, but it is also the birthplace of some of the earliest, most innovative school food reform efforts in the country. The farmers’ market salad bar program that was started in the Santa Monica-Malibu Unified School District in 1997, for example, is widely considered to be one of the first FTS programs in the country. California is also home to the Berkeley Unified School District, which was the first school district in the country to pass a progressive food policy that ultimately led to the renowned 2004 School Lunch Initiative—a partnership of the Berkeley Unified School District, the Center for Ecoliteracy, and Alice Waters’ Chez Panisse Foundation. This initiative supported a growing FTS movement and established the Edible Schoolyard at Martin Luther King Jr. Middle School, which integrated agrifood literacy garden classes into the curriculum. California was also one of the first states to launch a statewide FTS organization—the California Farm to School Program—a collaborative project that has sought to advance and institutionalize the FTS model throughout California (Joshi and Beery 2007). Finally, California was also one of the first states to ban the sale of soda and junk food in public schools. In 2005, then governor of California Arnold Schwarzenegger signed two groundbreaking bills into laws amidst heavy opposition from corporate beverage and agribusiness firms that would serve as models for states around the country to improve school food environments. The first bill, SB 12, banned the sale of junk food not meeting nutritional standards, including candy, cookies, and chips, in public schools, while the second bill, SB 965, banned the sale of soft drinks—Coke, Pepsi, fruit drinks and sugared waters, in public schools. These laws were the toughest in the nation at the time and have set the standard for school food reform efforts (Isaacs and Swartz 2006).

This vanguard nature of California vis-à-vis innovative school food programming makes California a particularly useful state to analyze school food program outcomes in the aftermath of groundbreaking legislation because it is one of the few states in the country that has a rich and vibrant history of school food activism. In this way, understanding the early successes and challenges of school food programming and reforms efforts in California, and the interplay with federal school food policy changes, is critical to establishing baseline empirical findings surrounding contemporary issues of childhood nutrition and health in the U.S. As such, the cutting-edge nature of California as the case study state has implications for the generalizability
of the study’s findings. In particular, the findings are most generalizable to other U.S. states with similarly progressive school food and FTS landscapes. Nevertheless, the findings from California provide an important beginning framework for exploring school food programming in other U.S. states as grassroots school food reform activism continues to spread throughout the country.

District selection

Out of the nearly 15,000 school districts in the U.S. today, the 200 largest districts have a disproportionate share of low-income students who rely on school food for a key source of nutrition. In the context of school food politics and reform efforts, it is these largest school districts that require the most attention, as their school food programs are critical in the battle against childhood obesity (Poppendieck 2010). According to recent statistics, 27 of the 200 largest school districts by enrollment size in the nation are in California (ASU 2017). Based on comparative data of the 27 districts in California, I selected two districts based on key contrasting local-level conditions—Sequoia City School District and Pacific City School District. Table 7 below provides a comparison of the two districts along key dimensions.

| Table 7. Comparison of Case Study School Districts, SY 2014-2015 |
|----------------------|----------------------|
| Number of schools    | Pacific City: 86     |
|                      | Sequoia City: 42     |
| Student enrollment   | Pacific City: 37,147 |
|                      | Sequoia City: 32,938 |
| Student racial/ethnic composition |
| White                | Pacific City: 12%    |
|                      | Sequoia City: 25%    |
| Black                | Pacific City: 30%    |
|                      | Sequoia City: 2.8%   |
| Hispanic             | Pacific City: 40%    |
|                      | Sequoia City: 53%    |
| Asian                | Pacific City: 14%    |
|                      | Sequoia City: 13%    |
| Free and reduced price lunch eligible |
|                      | Pacific City: 73%    |
|                      | Sequoia City: 47%    |
| Number of lunches served daily |
|                      | Pacific City: 20,700 |
|                      | Sequoia City: 13,800 |
| School food program operation model |
|                      | Pacific City: Self-operated |
|                      | Sequoia City: Privatized |

First, the selection of the districts leverages key variation in the programs’ operation structures. Sequoia City’s school food program is privatized, whereas Pacific City’s program is locally controlled and self-operated. Second, using the percentage of students eligible for free and reduced price lunch as a proxy for district-wide socio-economic capacity, these districts also represent variation along this spectrum. Pacific City has approximately 73 percent of students eligible for free and reduced price lunch, while Sequoia City has only 47 percent of eligible students. Further, the districts also present variation in terms of racial minority composition, with Pacific City harboring large Hispanic and Black student populations—38 percent and 30 percent respectively, and Sequoia City possessing a large White population at 25 percent and Hispanic population at 52 percent. Compared to the state of California as whole, in which Hispanics (38 percent) and Asians (13 percent) represent the two largest racial groups after Whites (40 percent), Sequoia City is more similar to the general racial makeup of the state, while Pacific City is notable for its large population of Black students (U.S. Census Bureau 2016). Approximately 20,700 lunches are served daily in Pacific City, while 13,800 are served daily in Sequoia City. As such, based on student enrollment, a higher proportion of students eat school meals at Pacific City compared to Sequoia City. In addition, the school districts also vary in
terms of their local community context. Pacific City School District is situated in a community with an active and vibrant food justice and alternative food movement sector. Lacking such a robust local foods culture, Sequoia City serves as an important analytical counterpoint to Pacific City along this dimension. Moreover, Pacific City is located in a particularly liberal California county, in which Democratic voters make up 58 percent of registered voters in the county, compared to only 47 percent in Sequoia City.

In sum, the selection of these two case study districts represents variation along several key dimensions including school food program operation model, economic capacity, racial composition, strength of alternative food movement sector, and political orientation. The differing local contexts of these districts have likely shaped distinct social organization and political coordination at the district level—all factors that imply different capacities to react to and implement federal school food policies.

Methods

My research period was 15 months, beginning in December of 2014 and concluding in March of 2016. I followed all University of California, Berkeley Institutional Review Board (IRB) policies and procedures for the protection of human subjects throughout the research process. I received IRB approval for the research on September 3, 2014 (Protocol Number 2014-06-6481). 21 My fieldwork consisted of semi-structured interviews, participant observation and archival document research. I conducted 65 total interviews with key school food stakeholders including school administrators, food service directors and staff, school board members, school principals, parents, external stakeholders—including nonprofit and community partners, as well as government and corporate actors at the state and federal level. 22 I prioritized representation from a wide range of individuals active in school food politics, program implementation, and FTS efforts. Table 8 below summarizes my population of interviewees. I identified potential interviewees through a variety of sources including extensive online research on the case study school food programs, and making contact with school food and FTS organizations including the National Farm to School Network, the California Farm to School Network, the USDA Farm to School Program, the California Alliance for Family Farmers, the California Foundation for Agriculture in the Classroom, the School Nutrition Association, the Alliance for a Healthier Generation, and School Food Focus. Once I identified a potential interviewee, I approached the person via email to schedule an interview. 23 Each interviewee was required to sign a consent form prior to being interviewed stating there were no direct benefits or risks to taking part in the research. 24 Each interview was audio recorded and lasted approximately one hour in length. Most interviews took place either at the interviewees’ place of work, or at a mutually convenient location like a café or coffee shop. Interviews with individuals outside of a reasonable driving distance from me (for e.g. federal school food stakeholders located in Washington D.C.), were conducted via telephone. All audio recordings of interviews were transcribed.

The main goal of the interviews was to better understand the nature of interviewees’ involvement with school food and FTS programs and politics, their perspectives on

21 See Appendix B for a copy of my IRB approval letter.
22 I did not conduct interviews with students for my research.
23 See Appendix C for a copy of the email recruitment script.
24 See Appendix D for a copy of the consent form.
contemporary school food issues, and how the landscape of school food has changed since the landmark 2010 school food legislation. The interview questionnaire consisted of both open- and close-ended questions and the interviews were semi-structured. Key questions of interest varied depending on the nature of the interviewee’s relationship to school food programming and politics, but were broadly related to the nature of the interviewee’s involvement with school food, basic information about the dynamics and implementation of the district’s school food program (how food is sourced, where food is prepared, how meals are planned, etc.), how recent changes to federal school food policy has affected the implementation of the district’s school food programs and the politics surrounding school nutrition, top priorities and goals of the district’s school food program, key community and parent leaders coordinating school food reform efforts and their main achievements and goals, the nature of private food service industry involvement in school nutrition programming, and the greatest challenges/barriers that school food programs face in trying to serve the healthiest food possible to students.²⁵

Table 8. Classification of Interview Participants

<table>
<thead>
<tr>
<th>Classification</th>
<th>Interview Participants</th>
<th>n</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total</strong></td>
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<td></td>
</tr>
<tr>
<td><strong>Location</strong></td>
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<td></td>
</tr>
<tr>
<td>Pacific City</td>
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<td>29</td>
<td></td>
</tr>
<tr>
<td>Sequoia City</td>
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<td>29</td>
<td></td>
</tr>
<tr>
<td>State/national</td>
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<td>42</td>
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</tr>
<tr>
<td><strong>Classification</strong></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Nonprofit/foundation employees</td>
<td>20</td>
<td>31</td>
<td></td>
</tr>
<tr>
<td>School food service employees</td>
<td>12</td>
<td>18</td>
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<tr>
<td>School food service directors</td>
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<td>11</td>
<td></td>
</tr>
<tr>
<td>Parent-activists</td>
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<td>9</td>
<td></td>
</tr>
<tr>
<td>Food service industry employees</td>
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<td></td>
</tr>
<tr>
<td>School district employees</td>
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<td></td>
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<tr>
<td>School board members</td>
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<td>3</td>
<td></td>
</tr>
<tr>
<td>School principals</td>
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<td>3</td>
<td></td>
</tr>
<tr>
<td>Consultants</td>
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<tr>
<td>Journalists</td>
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<td>County public health department employees</td>
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<tr>
<td>State department of education employees</td>
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<td>1.5</td>
<td></td>
</tr>
<tr>
<td>Lobbyists</td>
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<td>1.5</td>
<td></td>
</tr>
<tr>
<td>Professional association employees</td>
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</tr>
<tr>
<td>Federal government employees</td>
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</table>

In addition to conducting interviews, I also attended school board, and nutrition services’ meetings, and visited school cafeterias and kitchens in both case study districts to observe key stakeholders in action and the dynamics surrounding implementing school food programs. In Pacific City, I attended 10 school food-related meetings, and visited 6 cafeterias and one of the district’s central kitchens. In Sequoia City, I attended 5 school-food related meetings,²⁶ and visited 6 cafeterias and the district’s central kitchen. I took field notes during all of the

²⁵ See Appendix E for a copy of the interview guide.
²⁶ In contrast to Pacific City’s weekly nutrition services staff meetings, Sequoia City’s nutrition services department did not have regularly scheduled staff meetings. As a result, there were fewer opportunities to attend school food-related meetings in Sequoia City than in Pacific City.
participant observation fieldwork and the notes were generally transcribed later the same day. Finally, I conducted extensive archival research of documents from both districts that shed light on the nature and process of implementing the school food programs including school board documents, official reports, press releases, and media coverage.

I used NVivo v.11 for mac software to analyze the qualitative data. I employed a combination of inductive and deductive methods to develop analytical categories and themes based first on the qualitative data collected, and second on the broader analytical concepts derived from the theoretical literature relevant to the research. In coding the qualitative data and developing major themes from the data, I focused my analytic strategy on generating descriptive frameworks for each case study (Yin 2003). This descriptive approach allowed me to explore all the data collected and helped illuminate key and significant aspects of the data to focus on in organizing the case studies. In this way, the analysis of the data was an iterative process of exploring, categorizing, and testing the data, informed by the study’s theoretical propositions, to generate a cogent understanding of how local-level conditions shape school food program dynamics and outcomes.
NOTICE OF APPROVAL FOR HUMAN RESEARCH

DATE: September 04, 2014
TO: Laura J. ENRIQUEZ, Socio
    Helena C. Lyson, Sociology
CPHS PROTOCOL NUMBER: 2014-06-6481
CPHS PROTOCOL TITLE: Food Fight! National Policy, Local Dynamics, and the Politics of School Food in America
FUNDING SOURCE(S): NONE

A(n) new application was submitted for the above-referenced protocol. The Committee for the Protection of Human Subjects (CPHS) has reviewed and approved the application on an expedited basis, under Category 6.7 of the federal regulations.

Effective Date: September 03, 2014
Expiration Date: September 02, 2017

Continuation/Renewal: Applications for continuation review should be submitted no later than 6 weeks prior to the expiration date of the current approval. Note: It is the responsibility of the Principal Investigator to submit for renewed approval in a timely manner. If approval expires, all research activity (including data analysis) must cease until re-approval from CPHS has been received. See Renew (Continue) an Approved Protocol.

Amendments/Modifications: Any change in the design, conduct, or key personnel of this research must be approved by the CPHS prior to implementation. For more information, see Amend/Modify an Approved Protocol.

Three-year approvals: Minimal risk, non-federally funded protocols that are not subject to federal oversight may now be given a three-year approval period. Please see Three Year Approvals for information about which protocols can qualify for three-year approvals.

The addition of federal funding or certain modifications that increase the level of risk may require a continuing review form to be submitted and approved in order for the protocol to continue. If one or more of the following changes occur, a Continuing Review application must be submitted and approved in order for the protocol to continue:
• Changes in study procedures that increase risk;
• Addition of federal funds.

Unanticipated Problems and Adverse Events: If any study subject experiences an unanticipated problem involving risks to subjects or others, and/or a serious adverse event, the CPHS must be informed promptly. For more information on definitions and reporting requirements related to this topic, see Adverse Event and Unanticipated Problem Reporting.

This approval is issued under University of California, Berkeley Federalwide Assurance #00006252.
If you have any questions about this matter, please contact the OPHS staff at 642-7461; fax 643-6272; email ophs@berkeley.edu.

Sincerely,

[Signature]

Jane MAULDON
Committee for Protection of Human Subjects
APPENDIX C

EMAIL RECRUITMENT SCRIPT FOR INTERVIEWING

Hello, my name is Helena Lyson. I am a graduate student at the University of California, Berkeley in the Department of Sociology. I am conducting research on school food and nutrition programs in key school districts through California this year. My faculty mentor for this project is Laura Enriquez, a Sociology professor at UC Berkeley.

I have identified you as a key school food stakeholder in the community and I would like to invite you to take part in my research study. If you agree to participate in my research, I will conduct an interview with you at a time and location of your choice, preferably at your place of work. The main goals of the interview will be to better understand the nature of your participation in school food politics, your perspectives on contemporary school food issues, and how the landscape of school food politics has changed since the landmark 2010 Healthy, Hunger-Free Kids Act. It should last between one and two hours.

If you are interested in participating in my research, we can schedule an interview over email or phone, or you can let me know at a later date whether you would like to be interviewed.

Feel free to contact me at hlyson@berkeley.edu or at 510-847-0569 if you ever have any questions or if you would like to talk to me about my project. I will always be happy to answer any questions, so please do not hesitate to ask.
APPENDIX D

INTERVIEW CONSENT FORM

UNIVERSITY OF CALIFORNIA AT BERKELEY

Consent to Participate in Research

“Food Fight! National Policy, Local Dynamics, and the Politics of School Food in America”

Introduction and Purpose
My name is Helena Lyson. I am a graduate student at the University of California, Berkeley in the Department of Sociology. I am conducting research on school food and nutrition programs in key school districts through California this year. My faculty mentor for this project is Laura Enríquez, a Sociology professor at UC Berkeley. I have identified you as a key school food stakeholder, and I would like to invite you to take part in my research study.

Procedures
If you agree to participate in my research, I will conduct an interview with you at a time and location of your choice, preferably at your place of work. The main goals of the interview will be to better understand the nature of your participation in school food politics, and your perspectives on contemporary school food issues and the landmark 2010 Healthy, Hunger-Free Kids Act, in particular. It should last between one and two hours. With your permission, I will audiotape and take notes during the interview. The taping is to accurately record the information you provide, and will be used for transcription purposes only. If you choose not to be audiotaped, I will take notes instead. If you agree to being audiotaped but feel uncomfortable at any time during the interview, I can turn off the tape recorder at your request. Or if you don't wish to continue, you can stop the interview at any time.

Benefits
There is no direct benefit to you from taking part in this study. Benefits to society include that this research will have broad impacts in areas related to food, health, agriculture, inequality, and public policy by seeking to uncover the politics behind school food programs in order to explore the realm of possibilities for creating healthier and more equitable federal school food, nutrition, and health services.

Risks/Discomforts and Confidentiality
As in all research involving human participants, there is a small risk of breach of confidentiality. I will do everything I can to prevent this from happening. You will be referred to by a pseudonym in my field notes. In the unlikely event that my field notes are lost or stolen, the use of pseudonyms will help protect your privacy. The list that links pseudonyms to actual names will be kept in a secure location, separate from all other data. Only I will have access to the audio recordings of interviews, which will be encrypted and stored on a password protected hard drive. Your name and personal information will never be used in publications or presentations about this study unless you explicitly say so by signing below. You are always welcome to change your mind later as well. When the research is completed, I will delete audio recordings after transcription, but I may save the interview transcripts and notes for use in future research done by myself. The same measures described above will be taken to protect confidentiality of this study data. Finally, the potential risk of harm to participant reputation or employability is minimal.
Rights

*Participation in research is completely voluntary.* You are free to decline to take part in the project. You can decline to answer any questions and are free to stop taking part in the project at any time. Whether or not you choose to participate in the research and whether or not you choose to answer a question or continue participating in the project, there will be no penalty to you or loss of benefits to which you are otherwise entitled.

Questions

If you have any questions about this research, please feel free to contact me at any time. I can be reached at hlyson@berkeley.edu or at 510-847-0569. Laura Enriquez can be reached at enriquez@berkeley.edu

If you have any questions about your rights or treatment as a research participant in this study, please contact the University of California at Berkeley’s Committee for Protection of Human Subjects at 510-642-7461, or e-mail subjects@berkeley.edu.

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CONSENT

You will be given a copy of this consent form to keep for your own records.

If you wish to participate in this study, please sign and date below.


Participant's Name *(please print)*

Participant's Signature Date

If you agree to allow your name or other identifying information to be included in all final reports, publications, and/or presentations resulting from this research, please sign and date below.


Participant's Signature Date
APPENDIX E

INTERVIEW GUIDE

I. General questions for all key school food stakeholders

1. What is your role in the district’s school food program/school food politics in general? (E.g. school food service director, school principle, school board member, concerned parent, farm to school community activist).

2. What led you to get involved in school food programs/school food politics?

3. Describe the nature of your work/involvement with school food programs/school food politics. What are some issues you have taken a particular interest in? Why? What actions have you undertaken to address these issues? Describe the successes/challenges you’ve faced in addressing your areas of interest.

4. From your perspective, what are the most pressing school food issues today, either in your district or nationally? Describe the details of these issues.

5. Are you familiar with the 2010 Healthy Hunger-Free Kids Act? If yes, in what ways do you think this legislation has changed the landscape of school food politics, either in your district or nationally? (Probe: What is your perspective on the current tension between promoters of the legislation and school nutrition professionals who are unable to meet the new standards and are requesting waivers? In what ways do you think the legislation has helped facilitate healthier school environments? In what ways is the legislation flawed? Do you think the legislation goes far enough in its effort to improve school food environments? Why or why not? Has the legislation changed who is participating in school food politics and how they are participating? How so? And if so, what effect has this had on school food environments and key school food issues?)

6. Are you familiar with the growing farm to school movement? If yes, what is your sense of how the movement fits into the broader terrain of school food politics and the strengths and weaknesses of the movement?

7. As a key school food stakeholder, what are your goals for the future of school food in America? What changes would need to be made to the current system to achieve these goals?

II. Specific questions for State/School Food Authorities/School Food Service Directors

1. Personal information

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27 Some questions have been adapted from Ross and Crawford’s (2013) and May et al.’s (2014) school food surveys.
1a. How long have you been the state/district’s school food authority director?

1b. Please tell me about your experience in food service prior to being a school food authority director.

1c. What is the highest level of education you’ve completed? Major in college? Any training related to food/nutrition?

2. State/School district food service characteristics

2a. Do your district’s schools participate in the national school lunch program and/or school breakfast programs? Describe the nature of this participation. What about other programs, like the USDA fresh fruit and vegetable program, or the Department of Defense Fresh Fruit and Vegetable Program? How satisfied are you with the way these programs are structured at the national/state/local level? What aspects of these programs are you dissatisfied with? Why?

2b. How do your state/district’s school food program nutrition standards regulating foods and beverages compare to federal and other state standards? If different than federal/state standards, why? (I.e. are there state/district laws in place for competitive foods, snack bars, vending machines etc.? If yes, what is the history of how these laws came into place?)

2c. Does your school district contract with a food service management company (E.g. Sodexo, Aramark, Chartwells)? If yes, describe the nature of this partnership (pros/cons). If no, why not? Does your school self-operate and/or prepare foods from scratch instead? If yes, describe the pros/cons.

2d. What types of meal service systems are used in the schools throughout the district? (E.g. cafeteria lines, kiosks/freestanding carts, grab ‘n go meals, a la carte lines, vending machines, and/or snack bars)? Describe why certain systems have been selected over others.

2e. Does your district receive USDA commodities? If yes, how are these items integrated into the school food program (I.e. are they sent to third-party processors before being served to students?) Approximately what percent of food served in schools is from USDA commodities? What are your feelings on the USDA commodity program for school food programs?

2f. Does your district sell competitive foods? Why or why not? Do you feel that selling competitive foods impacts your ability to improve the nutritional quality of foods served? Please explain.

2g. What methods are used for planning school menus? (E.g. food-based planning, enhanced food-based planning, nutrient standard menu planning, assisted “NuMenus”). Why?

2h. How and where are school food meals prepared in your district and why? (E.g. from scratch, reheated, in central kitchens, on-site kitchens, satellite kitchens etc.)
2i. Walk me through the state and/or district procedure for subsidizing district breakfasts and lunches (E.g. per-meal reimbursement, annual lump sum etc.). What verification procedures does your district use for receiving subsidies?

3. How would you describe the current nature of the California state budget for school nutrition services? Of the school district budget for school nutrition services? Are the budgets adequate?

4. What are the main factors that have influenced the quality and nature of your district’s school food programs over the past three years? (E.g. changes to federal/state policies, budgetary concerns, community/parental pressure to reduce childhood obesity etc.)

5. Does your district have a wellness policy? If yes, tell me about the policy and how it came to be.

6. Does your school district participate in farm-to school programs such as local procurement of fresh foods, school gardens, and/or agro literacy curriculums? Why or why not? If yes, describe the nature of this participation and your satisfaction/dissatisfaction/major challenges with these programs. Has your school’s preference for local procurement increased/decreased/stayed the same over the past 3 years? (Ask about California Thursdays: new initiative to source food locally on Thursdays, started by Berkeley Center for Ecoliteracy)

7. In what ways has the district engaged key stakeholders—parents, students, school staff, administrators, and community activists, in the school food program? What more would you like to be done in this regard?

8. Has your district identified main goals for the future of your school food program? If yes, describe these main goals and why they have been selected. (E.g. improving nutritional quality and appeal of school meals, increasing student participation in school meal programs, strengthening district wellness policy, reducing childhood obesity).

9. What are the biggest challenges you face in trying to attain the healthiest school food environments possible in your district? (E.g. budgetary concerns, lack of student interest). How do you think these challenges can be overcome? (E.g. staff training, new/better equipment, more money, nutrition education support etc.)

10. Describe any strategies your district has successfully implemented in its effort to improve the school food program. (E.g. enhancements to quality and appeal of food, wellness committee, garner student and parent input in school meal planning). Are there any strategies you would like to implement but haven’t? Why?

11. As you may know, the 2010 Healthy Hunger-Free Kids Act changed nutrition standards for school foods to make them healthier.
11a. In what ways and for how long has your district been working to change/improve the nutritional quality of school food? If these changes began before the 2010 legislation, what spurred the district to initiate these improvements?

11b. Are you a member of the national School Nutrition Association (SNA)? What are your thoughts on the current tension surrounding the SNA’s stance to grant schools waivers from meeting the new nutritional standards?

12. Is there anything else I haven’t brought up that you’d like to talk about regarding school food?

13. Specific data to collect regarding district school food programs:
   2013-2014 school year
   Total number of schools in the district (elementary, middle/jr. high, high, other)
   Number of schools participating in SBP and NSLP
   Number participating in only SBP
   Number participating in only NSLP
   Number not participating in either SBP or NSLP
   Total number of students enrolled
   Number approved to receive free meals
   Number approved to receive reduced price meals
   Average daily attendance
   Full price/reduced price of breakfasts and lunches
   Number of breakfasts served (free, reduced, full price)
   Number of lunches served (free, reduced, full price)

III. Specific questions for parents

1. Does your child usually eat the school breakfast and/or school lunch on school days? Why or why not?

2. Compared to last school year, is your child more or less likely to eat school meals this year? Please explain.

3. In general, what are your thoughts on the food that is served in school meals?

4. How much would you say you know about the school meal program (including FTS programs) at your child’s school? What do you see as the main successes/challenges facing the school meal program at your child’s school?

5. As you may know, rules for school meals in the U.S. were changed in 2010. Some of these changes included requiring students to select more fruits and vegetables, serving more whole grains, limiting student calorie intake, serving only lowfat milk, reducing the amount of salt in foods, and setting stronger nutrition rules for snack foods sold in schools. What are your
thoughts on these changes to improve school foods? How much would you say you support these changes?

6. Do you have any final thoughts on school food either in your child’s district or nationally?