

# Special Nutrition Program Operations Study: State and School Food Authority Policies and Practices for School Meals Programs School Year 2011-12

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# Special Nutrition Program Operations Study: State and School Food Authority Policies and Practices for School Meals Programs School Year 2011-12

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## **Table of Contents**

<u>Section</u>		<u>Page</u>
	Acknowledgements	i
Section I:	Executive Summary	1
	Background and Purpose of the Study	1
	Participation	2
	SFA Operations	4
	SFA Finances	
	Meal Prices	9
	Non-Profit Operations	11
	State Policies and Support	
	Conclusions	
Section II:	Study Overview	17
	Study Purpose	19
	Study Design	
	Data Sources	
	State Child Nutrition Director Survey	
	SFA Director Survey	
	SFA Sample Selection	
	Data Collection Procedures	
	State Child Nutrition Director Survey	
	SFA Director Survey	
	SFA Director Survey Response Rate	
	Weighting and Adjustments	
	0 0 /	
	Base Weights Non-Response Weights	
	Variance Estimation	
	Table Variables	
	Significance Tests Missing Data	
	Wissing Data	
Section III:	Participation in NLSP, SBP, and Other Nutrition Programs	
	Background	
	Research Questions	
	Results	
	SFA and School Participation in the NSLP and the SBP	
	Student Participation in the NSLP and the SBP	
	SFA Participation in Other Programs	
	Special Initiatives to Improve Nutrition and the School Environme	

### <u>Section</u>

### <u>Page</u>

Section IV:	SFA Operations	47
IV-1.	Staff Credentials and Responsibilities	49
	Background	
	Research Questions	
	Results	
	Experience and Tenure	
	Education Certification and Responsibilities	
	Certification and Responsibilities	55
IV-2.	Kitchens and Meal Service	59
	Background	59
	Research Questions	59
	Results	
	Kitchen Facilities	
	Use of Food Service Facilities by Other Programs	
	Types of Meal Service Systems	64
	Policies and Practices Regarding Location and Timing of School	
	Meals	66
IV-3.	Food Safety and Training	73
	Background	73
	Research Questions	73
	Results	74
	Food Safety Plans and Staff Certifications	74
	Food Safety Certification	
	Safety Topics Covered in Trainings	76
	USDA Materials	
	Food Defense Plan or Practices	
	Special Diets	
	Components of Food Safety	
	Food Recall Notification Procedures	85
IV-4.	Food Procurement	89
	Background	89
	Research Questions	
	Results	
	Use of Geographic Preference and Farm to School	
	Food Purchasing Specifications	93
	Food Service Management Companies	

IV-5.	Menu Planning and Nutritional Analysis10	1
	Background10	1
	Research Questions	
	Results	
	Menu Planning Systems102	
	Nutrition Analysis of Planned Menus10	
IV-6.	Meal Counting and Claiming Procedures	7
	Background	7
	Research Questions	8
	Results	8
	Technology Used at the Point of Service10	8
	Training and Monitoring of Cashiers10	
	Types of Payment Accepted for School Meals11	
IV-7.	Availability of Non-USDA Meal Alternatives11	3
	Background11	3
	Research Questions	4
	Results114	4
	Alternative Meal Practices11	4
	Comparison of State and SFA Nutrition Standards to Federal	
	Requirements11	6
	Availability of Free Potable Water Where School Lunches Are Served 11 Policies and Practices for Serving Meals to Students Who Are Unable	7
	to Pay	9
Section V:	SFA Financials	1
V-1.	Meal Prices	3
	Background12	3
	Reimbursement Rates	3
	The Potential for Cross-Subsidization and the New HHFKA	
	Provisions12	3
	Research Questions	4
	Results	5
	Meal Prices from SY 2009-10 to SY 2011-1212	5
	Factors that May Have Influenced Meal Pricing Decisions	2
	Actions Taken to Avoid Raising Meal Prices and Minimize the	
	Effects on Participation	5

<u>Section</u>

V-2.	Expenditures, Revenues, and Unpaid Meals	137
	Background	
	Measuring Expenditures versus Costs	
	Operational Definition of Breaking Even	
	Unpaid Meals	
	Research Questions	
	Results	
	Expenditures and Revenues	
	Operating as a Nonprofit	
	Lost Revenues from Unpaid Meals	
Section V	I: State Policies and Administration of the NSLP and SBP	151
VI-1.	Communication Issues	153
	Background	153
	Research Questions	153
	Results	154
	Communication between State Agencies and SFAs	154
	Communication between SFAs and School Staff	
	Communication between SFA and Participating Households	
	Communicating About Food Holds or Recalls	158
VI-2.	State Finances and Budget	161
	Background	161
	Research Questions	161
	Results	
	State Subsidies to SFAs	161
	Budget Issues	
VI-3.	State Policies and Practices	165
	Background	
	Eligibility and Alternative Meals	165
	School Meal Operations	
	Charter Schools	167
	Research Questions	167
	Results	
	Eligibility Provisions	
	Alternative Meals	
	School Meal Operations	
	Charter Schools	

<u>Section</u>

VI-4.	Training and Technical Assistance	
	Background	
	Research Questions	
	Results	
Section V	VII: Conclusions	
	References	

### **Appendices**

<u>Section</u>

А	State Child Nutrition (CN) Director Survey 2011 A-1
В	School Food Authority (SFA) Director Survey 2011 B-1
С	Weighting Procedures for the Base-Year Survey of School Food Authorities
D	Nonresponse Bias Analysis D-1
Е	Supplementary Tables E-1

<u>Tables</u>	Page
I-1.	Percentage of SFAs with All Schools within each Grade Level Participating in the NSLP and the SBP, SY 2011-122
I-2.	Percentage of Students Approved for Free or Reduced-Price Meals and Percentage of Students without Access to the SBP and NSLP, SY 2011-12
I-3.	Percentage of SFAs with One or More Schools Participating in Other Nutrition Programs and Initiatives, SY 2011-124
I-4.	Percentage of SFAs with Select Operational Characteristics, SY 2011-126
I-5.	Percentage of SFAs with Various Shares of their Schools having Food Safety Plans and Regular Inspections, SY 2011-128
I-6.	Reimbursement Rates for the NSLP and SBP, SY 2009-10 to SY 2011-128
I-7.	SFA's Average Meal Prices, Reimbursement Rates, and Revenues per Meal for the NSLP and SBP by Grade Level, SY 2010-119
I-8.	SFAs' Average Difference in Revenues per Meal, SY 2010-11 versus SY 2011-12
I-9.	NSLP and SBP Reimbursement Rates for Free School Meals and Average Prices for Paid Meals, SY 2009-10 to SY 2011-12
I-10.	Percentage of SFAs by Annual Cash Receipts as a Percentage of Cash Expenditures, SY 2010-11
I-11.	Percentage of States with Select Policies, SY 2011-12
I-12.	Percentage of States with Charter Schools and their NSLP Participation Levels, SY 2011-12
I-13.	Percentage of States Providing School Meal Training and Technical Assistance by Topic and Frequency, SY 2011-1214
II-1.	State Director Questionnaire Content
II-2.	SFA Director Questionnaire Content
II-3.	Sample Frame Coverage of SFAs, Schools, and Students in SY 2009-10
II-4.	SFA Sample by Enrollment

II-5.	Response Rate for the SFA Survey
II-6.	Unweighted and Weighted Sample Sizes for the Base-Year Cross- Sectional Estimates, by SFA Size, Urbanicity, and Poverty Level
III-1.	Percentage of SFAs with All Schools within each Grade Level Participating in the NSLP by SFA Characteristics, SY 2011-12
III-2.	Percentage of SFAs with All Schools within each Grade Level Participating in the SBP by SFA Characteristics, SY 2011-12
III-3.	Among SFAs that Participate in the SBP, Percentage of SFAs with Schools that Received SBP Severe-Need Reimbursement by SFA Characteristics, SY 2011-12
III-4.	Percentage of SFAs with Pre-K Programs that Provide Access to School Meals, SY 2011-12
III-5.	Percentage of Students Approved for Free or Reduced-Price Meals and Percentage of Students without Access to the SBP and NSLP, SY 2011-12
III-6.	Percentage of Students, in Each Grade Level, Approved to Receive Free Meals and Reduced-Price Meals by SFA Characteristics, SY 2011-12
III-7.	Percentage of SFAs with One or More Schools Participating in Other Nutrition Programs, SY 2011-12
III-8.	Among DoD Fresh Program Participants, the Percentage of SFAs Satisfied with the Program, SY 2011-12
III-9.	Among DoD Fresh Program Participants, the Percentage of SFAs Satisfied with Various Aspects of Program by SFA Characteristics, SY 2011-12
III-10.	Percentage of SFAs that Participate in the Farm to School Activities by SFA Characteristics, SY 2011-12
III-11.	Among Farm to School Participants, the Percentage of SFAs that Participate in Various Specific Activities, SY 2011-12
III-12.	Among SFAs Providing Nutrition Education, the Percentage of SFAs that Took Part in Other Farm to School Activities, SY 2011-12

<u>Tables</u>		<u>Page</u>
III-13.	Percentage of SFAs Recognized as a HealthierUS School by SFA Characteristics, SY 2011-12	45
IV-1.1.	Percentage of SFAs with Directors with Various Levels of Food Service and Job Tenure Experience, SY 2011-12	50
IV-1.2.	Percentage of SFAs with Directors with Various Tenure Levels by SFA Characteristics, SY 2011-12	50
IV-1.3.	Percentage of SFAs with Differing Director Education Requirements by SFA Characteristics, SY 2011-12	51
IV-1.4.	Percentage of SFAs with Directors with Different Levels of Education by SFA Characteristics, SY 2011-12	52
IV-1.5.	Percentage of SFAs with Directors with Different Highest Level of Education by Total Years of Directors' Experience, SY 2011-12	53
IV-1.6.	Percentage of SFAs with Licensure Requirements as Compared to Percentage of SFA Directors who have the Qualifications by SFA Characteristics, SY 2011-12	56
IV-1.7.	Percentage of SFAs with Directors who are Full-Time or Part-Time by SFA Characteristics, SY 2011-12	57
IV-2.1.	Percentage of SFAs Using Different Types of Kitchen Facilities by SFA Characteristics, SY 2011-12	61
IV-2.2.	Percntage of SFAs that Used Food Service Facilities for Various Types of Reimbursable and Nonreimbursable Meals by SFA Characteristics, SY 2011-12	62
IV-2.3.	Among SFAs that Allow Food Service Facilities to be Used for more than SBP and NSLP, the Percentage of SFAs Using those Facilities for Other Reimbursable Meals by SFA Characteristics, SY 2011-12	63
IV-2.4.	Among SFAs that Allow Food Service Facilities to be Used for More Than SBP and NSLP, the Percentage of SFAs Using those Facilities for Nonreimbursable Purposes by SFA Characteristics, SY 2011-12	64
IV-2.5.	Percentage of SFAs with Schools Using Various Types of Eating Locations by SFA Characteristics, SY 2011-12	67

<u>Tables</u>		<u>Page</u>
IV-2.6.	Among SFAs that have High Schools, the Percentage of SFAs with High Schools that Allow Students to Eat Off Campus by SFA Characteristics, SY 2011-12	70
IV-2.7.	Among SFAs that Have Elementary, Middle, High, or Other Schools, the Percentage of SFAs with Different After Lunch Student Mobility Policies by School Type, SY 2011-12	71
IV-2.8.	Among SFAs that Have Elementary Schools, the Percentage of SFAs with Elementary Schools Following Various Lunch and Recess Schedules by SFA Characteristics, SY 2011-12	72
IV-3.1.	Percentage of SFAs with Written Food Safety Plan Based on HACCP Principles in Schools by SFA Characteristics, Food Safety Program Components, and SFA Director Certification, SY 2011-12	74
IV-3.2.	Percentage of SFAs that Followed Various Food Safety Practices, SY 2011-12	75
IV-3.3.	Percentage of SFAs Using a Food Defense Plan or Food Defense Practice by SFA Characteristics, SY 2011-12	
IV-3.4.	Among SFAs that Used a Food Defense Plan or Practices, the Percentage of SFAs Using Various Food Defense Practices by SFA Characteristics, SY 2011-12	79
IV-3.5.	Percentage of SFAs with Policies and Procedures to Accommodate Students with Special Diets by SFA Characteristics, SY 2011-12	79
IV-3.6.	Percentage of SFAs that Use Various Types of Food Service Procedures to Protect Students with Special Diets by SFA Characteristics, SY 2011-12	80
IV-3.7.	Percentage of SFAs with All, Most, Some, or No Schools having Two or More Safety Inspections by SFAs Characteristics, SY 2010-11	81
IV-3.8.	Among SFAs that reported their Schools Did Not Have Two Safety Inspections, the Percentage of SFAs Citing Various Reasons, SY 2010-11	82
IV-3.9.	Percentage of SFAs that Reported Food Safety Inspections are Conducted by Various Types of Agencies by SFA Characteristics, SY 2010-11	83

IV-3.10.	Percentage of SFAs with One or More Schools Cited for Food Safety Inspection Violations by SFA Characteristics, SY 2009-10
IV-4.1.	Percentage of SFAs that Gave Preference to Purchasing Unprocessed Foods that Have Been Locally Grown, Raised, or Produced, SY 2011-12
IV-4.2.	Among SFAs Giving Preference to Local Foods, the Percentage of SFAs that Do This Always, Sometimes, or Only If they are Priced Competitively, SY 2011-12
IV-4.3.	Among SFAs Giving Preference to Local Foods, the Percentage of SFAs that Purchase Various Foods and Define Local in Different Ways, SY 2011-12
IV-4.4.	Percentage of SFAs that Used Selected Methods to Purchase Foods by SFA Size, SY 2011-12
IV-4.5.	Percentage of SFAs that Contracted with an FSMC by SFA Characteristics, SY 2011-12
IV-5.1.	Percentage of SFAs that Used Various Menu Planning Methods by SFA Characteristics, SY 2011-12103
IV-5.2.	Percentage of SFAs that Conducted Nutrition Analysis of Planned Menus by SFA Characteristics and Type of Menu Planning System, SY 2011-12
IV-6.1.	Percentage of SFAs that Had at least one School that Used Certain Technologies to Capture Meal Counts at POS, SY 2011-12109
IV-6.2.	Percentage of SFAs that Provided Select Training to Cashiers, SY 2011-12 110
IV-6.3.	Percentage of SFAs that Accepted Different Payment Methods, SY 2011-12 111
IV-7.1.	Percentage of SFAs that Reported Meal Alternatives were Offered in their Schools by SFA Characteristics, SY 2011-12
IV-7.2.	Percentage of SFAs by the Strictness of their SFA and State Nutrition Standards Policies for School Meals, SY 2011-12117
IV-7.3.	Percentage of SFAs by whether their State had an À la carte or Vending Machines Policy and the Strictness of their Local Policies, SY 2011-12117

IV-7.4.	Among SFAs that Provide Free Drinking Water during Meals, the Percentage of SFAs that Had Various Sources of Water by SFA Characteristics, SY 2011-12	118
IV-7.5.	Percentage of SFAs that Take Various Actions When a Student, Not Approved for Free Meals, Does Not Have the Money to Pay by SFA Characteristics, SY 2011-12	120
V-1.1.	Reimbursement Rates for the NSLP and SBP, SY 2009-10 to SY 2011-12	123
V-1.2.	Average Price Charged by SFAs for a Paid Student Breakfast and Lunch, SY 2009-10 to SY 2011-12	126
V-1.3.	SFA's Average Meal Prices, Reimbursement Rates, and Revenues per Meal for the NSLP and SBP by Grade Level, SY 2010-11	127
V-1.4.	Price Increases for Paid Student Breakfasts and Lunches, SY 2009-10 to SY 2011-12	129
V-1.5.	Patterns of Price Change in the NSLP and SBP across Two Periods: SY 2009-10 to SY 2010-11 and SY 2010-11 to SY 2011-12	
V-1.6.	SFAs' Average Difference in Revenues per Meal, SY 2010-11 versus SY 2011-12	131
V-1.7.	Comparison of the Average Price Charged by SFAs for Adult Meals to the Minimum Price Guidance by Grade Level, SY 2011-12	
V-1.8.	NSLP Minimum Nutrient and Calorie Requirements: Nutrient Standard Menu Approaches (School Week Averages)	133
V-1.9.	NSLP and SBP Reimbursement Rates for Free School Meals and Average Prices for Paid Meals, SY 2009-10 to SY 2011-12	134
V-1.10.	Top Four Strategies SFAs Report Their LEA Used to Avoid Increasing the Price of Paid NSLP and SBP Student Meals, SY 2011-12 versus SY 1988-89	135
V-2.1.	Percentage of SFAs by Daily Food Service Expenditures per ADA, SY 2010-11	140
V-2.2.	SFAs' Daily Food Service Cash Expenditure per ADA by SFA Characteristics, SY 2010-11	141

V-2.3.	On Average, the Percentage of SFAs' Cash Expenditures Spent on Various Inputs, SY 2010-11
V-2.4.	Percentage of SFAs Reporting they were Charged for Indirect Costs by SFA Characteristics, SY 2010-11
V-2.5.	Percentage of SFAs by Daily Cash Receipts per ADA, SY 2010-11 144
V-2.6.	SFA's Daily Cash Receipts per ADA by SFA Characteristics, SY 2010-11 145
V-2.7.	Percentage of SFAs by Annual Cash Receipts as a Percentage of Cash Expenditures, SY 2010-11
V-2.8.	Percent of SFAs Operating At or Above the Break-Even Level by SFA Characteristics, SY 2010-11
V-2.9.	Among SFAs with Unpaid Meal Costs, the Percentage of SFAs with Various Practices for Providing a Meal to Students Who Cannot Pay, SY 2010-11
V-2.10.	Among SFAs with Unpaid Meal Costs, the Percentage of SFAs that Took Various Actions to Recover Costs from Unpaid Meals, SY 2011-12
V-2.11.	Among SFAs with Unrecovered Lost Revenue from Unpaid Meals, the Percentage of SFAs with Various Magnitudes of Losses, SY 2010-11
V-2.12.	Among SFAs with Unrecovered Lost Revenues from Unpaid Meals, the Percentage of SFAs by Break-Even Status given Actual Lost Revenues versus the Assumption All Unpaid Revenues were Recovered, SY 2010-11 150
VI-1.1.	Percentage of States that Used Various Methods to Communicate with SFAs by Topic, SY 2011-12154
VI-1.2.	Percentage of SFAs that Used Various Methods to Communicate to School Staff by SFA Characteristics, SY 2011-12156
VI-1.3.	Percentage of SFAs that Used Various Methods to Communicate with Individual Households by SFA Characteristics, SY 2011-12
VI-1.4.	Percentage of SFAs that Communicated to Households on Various Topics by SFA Characteristics, SY 2011-12

Tab	les

P	age	

VI-1.5.	Percentage of SFAs that Received and Communicated Information about Food Holds/Recalls by Various Methods, SY 2011-12159
VI-2.1.	Percentage of States Providing Different Types of Subsidies and Support for School Meals, SY 2010-11
VI-2.2.	Percentage of States that Reported Various Food Service Program Areas were Affected by State Budget Issues, SY 2011-12
VI-3.1.	Number and Percentage of SFAs and Schools in Each State Operating under Provision 2 or Provision 3, SY 2011-12170
VI-3.2.	Among the States that Used Direct Verification, the Percentage of States that Used Various Implementation Procedures, SY 2011-12
VI-3.3.	Percentage of States by Use of Direct Verification and Future Plans, SY 2011-12
VI-3.4.	Percentage of States with Policies for Providing Meals When Students Are Unable to Pay, SY 2011-12
VI-3.5.	Percentage of States that Used Various Warehouses Practices for USDA Foods, SY 2011-12
VI-3.6.	Among SFAs that Used FSMCs, the Percentage of SFAs and Schools by the type of FSMC used as Reported by State Directors, SY 2011-12
VI-3.7.	Among SFAs that Used National FSMCs, the Percentage of SFAs and Schools that Used Specific Companies as Reported by State Directors, SY 2011-12
VI-3.8.	Use and Review of State-Developed Prototype Contracts for Food Service Management Companies (SY 2011-12)
VI-3.9.	Percentage of States with Different Policies Governing Food Recalls and Notification of District-Level Personnel, SY 2011-12
VI-3.10.	Nutritional Standards for Food and Beverages Offered in School Meals, SY 2011-12
VI-3.11.	Number of Charter Schools Operating in Each State and Participating in NSLP and SBP, SY 2011-12

VI-4.1.	Percentage of States Providing School Meal Training and Technical Assistance by Topic and Frequency, SY 2011-12	184
VI-4.2.	Percentage of States that Used Various Approaches for Training and Technical Assistance, SY 2011-12	185
C-1.	Base Weights for the SN-OPS SFA Sample	C-2
C-2.	Distribution of the SFA Sample by Survey Response Status	C-3
C-3.	Definition of Nonresponse Adjustment Cells	C-4
C-4.	JKN and FPC Factors to Be Used for Variance Estimation	C-5
D-1.	Sample Sizes by Response Status, Response Rates, and Test of Association Between Response Status and Selected Characteristics of Sampled SFAs	D-3
D-2.	Comparison of Weighted Distributions of Sampled SFAs, by Response Status and Selected Characteristics	D-4
D-2.	Comparison of Weighted Distributions of Sampled SFAs, by Response Status and Selected Characteristics (continued)	D-5
D-3.	Comparison of Weighted Estimates of FNS-742 Frame Statistics for Sampled SFAs, by Response Status and Selected SFA Characteristics	D-8
D-4.	Comparison of Weighted Estimates of Select Survey Statistics Before and After Nonresponse Adjustment, by Response Status	D-9
E-1.	Educational Requirements and Years of Experience for State CN Directors, SY 2011-12	E-1
E-2.	Percent of SFAs where all schools had two or more safety inspections, by SFA Characteristics for SY 2008-09, SY 2009-10, and SY 2010-11	E-3
E-3.	Median, Minimum, and Maximum NSLP Meal Prices for Full-Price Lunches in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-4
E-4.	Distribution of NSLP Meal Prices for Full-Price Lunches in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-5
E-5.	Median, Minimum, and Maximum NSLP Meal Prices for Full-Price Lunches in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-6

Е-6.	Distribution of NSLP Meal Prices for Full-Price Lunches in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12
E-7.	Median, Minimum, and Maximum NSLP Meal Prices for Full-Price Lunches in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12E-8
E-8.	Distribution of NSLP Meal Prices for Full-Price Lunches in High- Schools, SY 2009-10, SY 2010-11, and SY 2011-12
Е-9.	Median, Minimum, and Maximum NSLP Meal Prices for Reduced-Price Lunches in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12E-10
E-10.	Median, Minimum, and Maximum NSLP Meal Prices for Reduced-Price Lunches in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12
E-11.	Median, Minimum, and Maximum NSLP Meal Prices for Reduced-Price Lunches in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12E-12
E-12.	Median, Minimum, and Maximum NSLP Meal Prices for Adult Lunches in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12
E-13.	Distribution of NSLP Meal Prices for Adult Lunches in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12
E-14.	Median, Minimum, and Maximum NSLP Meal Prices for Adult Lunches in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12E-15
E-15.	Distribution of NSLP Meal Prices for Adult Lunches in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12E-16
E-16.	Median, Minimum, and Maximum NSLP Meal Prices for Adult Lunches in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12
E-17.	Distribution of NSLP Meal Prices for Adult Lunches in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12E-18
E-18.	Median, Minimum, and Maximum SBP Meal Prices for Full-Price Breakfasts in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12
E-19.	Distribution of SBP Meal Prices for Full-Price Breakfasts in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12

#### <u>Tables</u>

#### <u>Page</u>

E-20.	Median, Minimum, and Maximum SBP Meal Prices for Full-Price Breakfasts in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-21
E-21.	Distribution of SBP Meal Prices for Full-Price Breakfasts in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-22
E-22.	Median, Minimum, and Maximum SBP Meal Prices for Full-Price Breakfasts in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-23
E-23.	Distribution of SBP Meal Prices for Full Price Breakfasts in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-24
E-24.	Median, Minimum, and Maximum SBP Meal Prices for Reduced-Price Breakfasts in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-25
E-25.	Median, Minimum, and Maximum SBP Meal Prices for Reduced-Price Breakfasts in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-26
E-26.	Median, Minimum, and Maximum SBP Meal Prices for Reduced-Price Breakfasts in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-27
E-27.	Median, Minimum, and Maximum SBP Meal Prices for Adult Breakfasts in Elementary Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-28
E-28.	Distribution of SBP Meal Prices for Adult Breakfasts in Elementary Schools, SY 2009-10, SY 2010-11, and SY2011-12	E-29
E-29.	Median, Minimum, and Maximum SBP Meal Prices for Adult Breakfasts in Middle Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-30
E-30.	Distribution of SBP Meal Prices for Adult Breakfasts in Middle Schools, SY 2009-10, SY2010-11, and SY 2011-12	E-31
E-31.	Median, Minimum, and Maximum SBP Meal Prices for Adult Breakfasts in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-32
E-32.	Distribution of SBP Meal Prices for Adult Breakfasts in High Schools, SY 2009-10, SY 2010-11, and SY 2011-12	E-33
E-33.	USDA Meal Reimbursements as a Percent of Total Revenue: Distribution of SFAs, SY 2010-11	E-34

Tables
--------

E-34.	Student Payments for Reimbursable Meals as a Percent of Total Revenue: Distribution of SFAs, SY 2010-11	E-34
E-35.	State and Local Funds as a Percent of Total Revenue: Distribution of SFAs, SY 2010-11	E-35
E-36.	Non-Reimbursable Sales as a Percent of Total Revenue: Distribution of SFAs, SY 2010-11	E-35
E-37.	Type and Dollar Amount of State Subsidies for Breakfast to SFAs in Each State, SY 2010-11	E-36
E-38.	Type and Dollar Amount of State Subsidies for Lunch to SFAs in Each State, SY 2010-11	E-37
E-39.	Number of SFAs and Schools Using FSMC in Each State, SY 2011-12	E-38
E-40.	Number of Charter Schools Participating in the NSLP and SBP as Separate SFAs or Part of a Larger SFA in Each State, SY 2011-12E	E-39

### <u>Figures</u>

### <u>Page</u>

I-1.	Percentage of SFAs with Certification Requirements as Compared to the Percentage of SFA Directors Holding the Qualification, SY 2011-12	5
III-1.	NSLP Student Participation, 1969-2012	30
IV-1.1.	Percentage of SFA with Certification Requirements as Compared to the Percentage of SFA Directors Holding the Qualification, SY 2011-12	54
IV-2.1.	Percentage of SFAs Using Different Types of Meal Service Systems, SY 2011-12	65
IV-2.2.	Percentage of SFAs with Various Average Times Allotted for Breakfast by Type of School, SY 2011-12	68
IV-2.3.	Percentage of SFAs with Various Average Times Allotted for Lunch by Type of School, SY 2011-12	69
IV-3.1.	Percentage of SFAs with Differing Proportion of Schools that Have at least One Food Service Supervisor or Manager with Food Safety Certification, FY 2011-12	76

<u>Figures</u>
----------------

Page
------

IV-3.2.	Percentage of SFAs Using USDA Materials to Assist in Food Safety, FY 2011-12	77
IV-3.3.	Among SFAs with Schools Cited for Food Safety Violations, the Percentage of SFAs with All, Most, Some, and No Schools having Various Types of Violations	85
IV-3.4.	Percentage of SFAs that Receive Alerts about Food Recalls via Various Methods, SY 2011-12	86
IV-3.5.	Percentage of SFAs that Use Various Methods to Alert Schools about Holds or Food Recalls, SY 2011-12	87
IV-4.1	Percentage of SFAs Obtaining Nutrition Information for Foods Via Various Methods, SY 2011-12	93
IV-4.2.	Percentage of SFAs that Specify Nutrient Requirements for a Single Serving When Ordering Food, SY 2011-12	94
IV-4.3.	Percentage of SFAs Satisfied with the Availability of Nutrition Information, SY 2011-12	94
IV-4.4.	Percentage of SFAs that Specify Per-Serving Nutrient Requirements by Food Type, SY 2011-12	95
IV-4.5.	Percentage of SFAs that Require Various Nutrition Information from Food Vendors, SY 2011-12	96
IV-4.6.	Percentage of SFAs that Received Requested Nutritional Information from Vendors, SY 2011-12	97
IV-4.7.	Percentage of SFAs that Used Various Methods to Purchase Foods, SY 2011-12	97
IV-4.8.	Among SFAs that Used a FSMC, the Percentage of SFAs that Used Various Methods to Track Rebates, Discounts, or Fees, SY 2011-12	100
IV-6.1.	Percentage of SFAs that Conducted Onsite Monitoring of Cashiers, SY 2011-12	111
IV-7.1.	Percentage of SFAs that Offered Alternatives to SBP and NSLP Meals, SY 2011-12	115

<u>Figures</u>		<u>Page</u>
VI-1.1.	Percentage of SFAs that Reported their State Communicated to them by Various Methods, SY 2011-12	155
VI-2.1.	Percentage of States Providing Subsidies for Meals to SFAs, SY 2010-11	162
VI-3.1.	Percentage of States with at Least One SFA that Used Direct Verification, SY 2011-12	171
VI-3.2.	Among Those that Have Charter Schools that Participated in NSLP or SBP, the Percentage of States by Various Charter School-SFA Relationships, SY 2011-12	182
E-1.	Safety Topics on Which Food Service Employees Have Been Trained	E-2

# **Section I: Executive Summary**

### Background and Purpose of the Study

The National School Lunch Program (NSLP) and the School Breakfast Program (SBP) are the two largest school-based child nutrition (CN) programs providing meals and snacks to millions of school-age children every day. Since its inception in 1946, when malnourishment was a nationwide concern, the program has focused on improving the health and well-being of the Nation's children through the provision of CN programs. More recently, concern has shifted from malnutrition to childhood obesity and the nutritional quality of school meals. After expert review, the Institute of Medicine (IOM) in the 2009 report, *School Meals: Building Blocks for Healthy Children*, recommended that the U.S. Department of Agriculture (USDA) adopt revised standards for menu planning, including (1) increasing the amount and variety of fruits, vegetables, and whole grains; (2) setting minimum and maximum levels of calories; and (3) focusing more on reducing saturated fat and sodium. These recommendations were incorporated into the Healthy, Hunger-Free Kids Act (HHFKA) in 2010 and resulted in USDA revising the CN program requirements. While the HHFKA is a very comprehensive bill that includes over 70 sections divided among four titles, several of the provisions are particularly important for school food operations and include:

- School meal pattern standards: the HHFKA required USDA to issue a proposed rule within 18 months to update meal pattern requirements for the NSLP and the SBP.
- Competitive foods standards: the HHFKA provided USDA the authority to set nutrition standards for all foods regularly sold in schools during the school day, including vending machines, the à la carte lunch lines, and school stores.
- Professional standards: the HHFKA required USDA to establish a program of required education, training, and certification for various categories of school food service staff.
- School lunch pricing and accounting: the HHFKA required USDA to administer a number of provisions related to equitable school lunch pricing and strengthened accounting procedures for the sale of non-program foods.

The implementation timeline for the new requirements began in late 2010 and continues through school year (SY) 2013-14, with the meal pattern changes being phased in starting in SY 2012-13. Given the number of students participating in NSLP and SBP, there is a realization that the quality and nutrient content of school meals is one way to improve children's diets and potentially reduce the obesity problem as well as improve food security and help children's readiness to learn.

The Special Nutrition Program Operations Study (SN-OPS) is a multiyear study designed to provide the USDA's Food and Nutrition Service (FNS) with a snapshot of current state and School Food Authority (SFA) policies and practices and a baseline for observing the improvements resulting from the implementation of the HHFKA. The SN-OPS base-year activities involved collecting data via surveys from all state CN directors and a stratified sample of SFA directors, which was weighted to represent the population of SFAs. The study provides FNS with key information about the characteristics, ongoing efficiency, and effectiveness of the school meals

programs so FNS has a better understanding of what is happening at the state and local levels and then can address program policy needs, develop informed regulations and guidance, and provide needed technical assistance.

### **Participation**

Participation levels in the school meals programs, especially among students certified for free or reduced-price meals (F/RP), measure the degree to which the programs are successful in reaching low-income children. In addition, because NSLP and SBP reimbursements are tied to the number of meals served, student participation data are important for Federal budgeting and planning purposes. Changes in participation levels over time as compared to SY 2011-12 may provide one early (albeit gross) indication of how schools and students react to the implementation of the provisions included in the HHFKA.

Table I-1 shows that school participation in the NSLP was nearly universal, and participation in the SBP was high. As the table shows, 97 percent of SFAs had all their schools participating in the NSLP. Participation in the SBP was similar, albeit a bit lower, and 79 percent of SFAs had all their schools participating in the program.

# Table I-1.Percentage of SFAs with All Schools within each Grade Level Participating in<br/>the NSLP and the SBP, SY 2011-12

Program	Elementary	Middle	High	Other	All schools
NSLP	99.1%	99.7%	99.0%	92.7%	96.6%
SBP	85.9	88.2	88.1	77.8	78.8
Weighted <i>n</i>	12,495	9,410	10,828	4,569	14,533
Unweighted <i>n</i> <sup>1</sup>	1,281	1,097	1,182	547	1,389

<sup>1</sup>*n* is less than 1,401 because not all SFAs have each type of school, and 12 SFAs provided implausible school count data. Data Source: SFA Director Survey 2011, question 2.1.

While all students who attend a school that participates in the NSLP and SBP can participate in the program by selecting a reimbursable meal, student eligibility to get F/RP meals is based on the combination of household size and income. Students living in families earning at or below 130 percent of poverty qualify for free meals. In addition, students are categorically eligible for free school meals if they or any member of the household receives benefits from certain assistance programs. Students living in families with incomes between 131 percent and 185 percent of poverty qualify for reduced-price meals.

As shown in Table I-2, SFA directors reported that over half (51 percent) of their students were approved for either F/RP meals during SY 2011-12. Forty-four percent of students in all schools were approved to receive free meals during SY 2011-12. Additionally, SFAs reported that 7 percent of students were approved for reduced-price meals. These percentages were fairly consistent across school levels.

While school participation in the NSLP and SBP was very high, access to school meals at the student level was not universal. SFA directors reported that, overall, 7 percent of students did not have access to the SBP, and 2 percent did not have access to the NSLP during SY 2011-12. Students

did not have access to the programs because either their schools did not participate or they were attending half-day kindergarten and did not have access to meals. Students enrolled in schools with nontraditional grade spans ("Other" schools) were the least likely to have access to the SBP (15 percent were without access) and the NSLP (6 percent were without access) compared with elementary, middle, and high schools.

	Percentage of students					
Student group	Elementary	Middle	High	Other	All schools	
Approved to receive free meals	48.8%	42.6%	36.9%	41.5%	43.9%	
Approved to receive reduced-price meals	7.0	7.5	6.7	6.9	7.0	
Students without access to the SBP	7.2	6.5	5.7	14.5	6.9	
Students without access to the NSLP	2.1	1.7	2.5	5.7	2.3	
Total student enrollment: weighted n	23,049,561	9,106,558	13,786,311	2,132,498	48,074,928	
Total SFAs: weighted <i>n</i> <sup>1</sup>	12,269	9,158	10,488	4,450	14,28	

# Table I-2.Percentage of Students Approved for Free or Reduced-Price Meals and<br/>Percentage of Students without Access to the SBP and NSLP, SY 2011-12

<sup>1</sup>*n* is less than 14,678 weighted (1,401 unweighted) because not all SFAs have each type of school and item non-response. Data Source: SFA Director Survey 2011, question 3.1.

In addition to participating in the NSLP and SBP, SFAs and their schools have opportunities to participate in several other FNS-administered programs and initiatives that are intended to complement the core breakfast and lunch programs. These other programs and initiatives extend meal service beyond lunch and breakfast (NSLP After-School Snack Program and the Child and Adult Care Food Program (CACFP) At-Risk Afterschool Snack or Supper Program), offer meal service in the summer (Summer Food Service Program (SFSP)), provide access to and information about fruits and vegetables during the school day (Fresh Fruit and Vegetable Program (FFVP) and farm to school activities) and promote a healthier school environment (Healthier US Schools Challenge (HUSSC)). Additionally, some SFAs utilize the DoD Fresh Program as a purchasing alternative to obtain fresh fruits and vegetables. Table I-3 shows that about one-third of SFAs had at least one school that participated in NSLP Afterschool Snack Program or SFSP that extended meal services beyond school year breakfast and lunch. SFA participation in the fresh fruit and vegetable programs also was substantial, with 20 percent of SFAs having at least one school engaged in the farm to school activities, 26 percent participating in the DoD Fresh Program, and 35 percent participating in the FFVP. DoD Fresh and FFVP both target increasing the quantities of fresh fruits and vegetables in students' diets, and 45 percent (not shown) of SFAs had schools participating in at least one of these programs. Far fewer SFAs had schools participating in the CACFP At-Risk Afterschool Snack or Supper Program, which can only be offered in areas where at least 50 percent of the students are eligible for F/RP meals. Similarly, only 6 percent of SFAs had schools in the HUSSC voluntary initiative that recognizes participating schools that meet a relatively high standard for healthier school environments through the promotion of nutrition and physical activity.

# Table I-3.Percentage of SFAs with One or More Schools Participating in Other Nutrition<br/>Programs and Initiatives, SY 2011-12

		Total SFAs		
Program	Percentage of SFAs	Weighted n	Unweighted n <sup>1</sup>	
USDA FFVP	34.7%	14,544	1,392	
NSLP Afterschool Snack Program	31.9	14,544	1,392	
SFSP	30.0	14,544	1,392	
DoD Fresh	26.0	14,544	1,392	
Farm to school	20.4	14,530	1,391	
CACFP At-Risk Afterschool Snack or Supper Program	4.4	14,533	1,392	
HUSSC (received an award)	5.6	14,678	1,401	

 $^{1}n$  is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 11.1 and 11.2.

### **SFA Operations**

The resources and methods SFAs use to produce school meals will likely affect how quickly they can adapt to the new regulations stemming from the HHFKA. During this period of change, it is important to examine the current status of SFA operations to provide insight into how prepared they are to adopt and respond to changes brought about as a result of the HHFKA and identify potential transition challenges.

One provision contained in the HHFKA relates to professional standards for school food service and state agency directors. USDA is required to establish a program of required education, training, and certification for all SFA directors and establish criteria and standards for states to use in the selection of state agency directors responsible for the CN programs. USDA may contract with universities and professional associations to establish and manage the program. At the time of this report, USDA was in the process of finalizing proposed regulations related to professional standards. Although the majority of SFAs had director-level professional food service training requirements, 42 percent (not shown) of the SFA directors indicated that their district did not require any of the certifications listed in the questionnaire. Figure I-1 shows the training requirements SFAs had for their directors relative to the percentage of SFA directors who held these qualifications. The most commonly reported district requirement was to be certified as a ServSafe Food Safety professional; this was also the most common credential held among SFA directors. Given the current certification and training profile of SFA directors, it is highly likely that new minimum requirements for SFA directors will affect the majority of SFAs.

# Figure I-1. Percentage of SFAs with Certification Requirements as Compared to the Percentage of SFA Directors Holding the Qualification, SY 2011-12



*n* is less than 14,678 weighted (1,401 unweighted) because of item non-response. The estimate for question 14.6 on district requirements is based on 14,250 weighted (1,376 unweighted) responses, and the estimates for question 14.7 on certifications held by current SFA directors is based on 14,267 total (1,378 unweighted). Multiple responses were allowed. Data Source: SFA Director Survey 2011, questions 14.6 and 14.7.

The updated school meal patterns for NSLP and SBP meals require schools to increase the availability of fruits, vegetables, whole grains, and fat-free and low-fat fluid milk in school meals; reduce the levels of sodium, saturated fat, and trans fat in meals; and meet the nutrition needs of school children within their age/grade calorie requirements. The new school meal patterns are being phased in starting in SY 2012-13. The USDA also established science-based nutrition standards for foods and beverages sold in schools (throughout the school campus and the school day) outside of the school meals program that will affect the competitive (also called alternative) foods available to students. These updated competitive food standards will be implemented by the beginning of SY 2014-15. In addition, the regulation codified previously issued guidance on the need for schools to make available free drinking water during the lunch meal service, which began in SY 2011-12.

Many SFAs already engage in activities in line with many of the provisions in the HHFKA. For example, many SFAs participated in FNS programs promoting fresh fruits and vegetables. Table I-4 shows that 51 percent of SFAs gave geographical preference to locally grown or local raised agricultural products at least some of the time. However, within this group only 8 percent reported that they gave local preference most of the time. Not surprisingly, prices appear to be an important factor driving purchasing behavior, and about one-third (not shown) of the SFA directors reported only purchasing local foods when they were competitively priced.

SFAs have varying types of kitchen facilities and meal service systems available at their schools, which affect the options they have for producing nutritious meals and whether the food is

prepared fresh onsite or cooked at a central site with final preparation or reheating at the local site. An SFA's kitchen facilities affect both the number and types (e.g., staff training) of changes that must occur to implement the new regulations stemming from the HHFKA. Table I-4 shows the percentage of SFAs with select operational characteristics. It is noteworthy that 55 percent of SFAs have only onsite kitchens at the individual schools, while 17 percent have only centralized (offsite) kitchens, and the remaining 29 percent have a mixture. Similarly, 21 percent of SFAs used Food Service Management Companies (FSMCs) to manage the food service operations in at least some of their schools.

		Tota	al SFAs
	Percentage of SFAs with select	Weighted	Unweighted
<b>Operational characteristics</b>	operational characteristics	n	n
Gave preference to purchasing local foods			
Most of the time	8.3%		
Some of the time	42.7	14,540	1,393 <sup>1</sup>
Never	49.0		
Type of kitchen			
Only offsite	16.5		
Only onsite	54.7	14,422	1,388 <sup>1</sup>
Combination	28.8		
Used food service management company	20.8	14,494	1,389 <sup>1</sup>
Menu planning method			
Food based	71.8		
Nutrient base	12.9		
New or innovative	0.3	14,621	1,397 <sup>1</sup>
Combination	13.2		
Other	1.7		
Competitive foods offered in schools			
À la carte at breakfast	53.2		
À la carte at lunch	70.9		
Vending machines	29.4	14,678	1,401
Snack bar	19.0		
School store	15.4		
Alternative food source	10.8		
Offered potable water with meals			-
Elementary schools	97.3	12,639	1,292 <sup>2</sup>
Middle schools	97.7	9,499	1,106 <sup>2</sup>
High schools	98.5	10,863	1,188 <sup>2</sup>
Other schools	76.9	4,594	551 <sup>2</sup>

#### Table I-4.Percentage of SFAs with Select Operational Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

 $^{2}$  n is less than 1,401 because not all SFAs have each type of school.

Data Source: SFA Director Survey 2011, questions 4.3, 4.10, 4.16, 4.19, 10.1, and 10.12.

Starting in the 2012-13 school year, food-based menu planning was required for the NSLP<sup>1</sup> and in SY 2013-14 it will be extended to the SBP. As Table I-4 shows, 72 percent of the SFAs used the food-based (traditional or enhanced) approach; 13 percent used the nutrient-based (NuMenus or

<sup>&</sup>lt;sup>1</sup> Federal Register, Vol. 77, No. 17, January 26, 2012.

Assisted NuMenus) approach; and 13 percent used a combination of food- and nutrient-based menu planning approaches in SY 2011-12. Overall, traditional food-based menu planning was the most frequently used approach. The fact that the majority of SFAs already were using food-based menu planning or a combination approach should help ease the transition to the new regulations.

Competitive foods are widely offered by most SFAs, and 80 percent (not shown) reported that their schools provided at least one competitive food source venue such as à la carte items at meals, vending machines, or school stores. As Table I-4 shows, the most common competitive food source was offering à la carte items during breakfast (53 percent) and lunch (71 percent); in addition, 29 percent of SFAs reported their schools had vending machines; 19 percent had snack bars; and 26 percent had other competitive food venues, including school stores. Given the widespread practice of offering competitive foods through multiple venues, the new regulations on competitive foods will affect the majority of SFAs. It should be noted, however, that 28 percent (not shown) of SFAs had local policies on à la carte items and vending machines. Similarly, 59 percent (not shown) of the SFAs are in states that had à la carte policies, and 66 percent (not shown) reside in states with vending machine policies. The transition to the new regulations may prove to be easier for SFAs in states and localities with existing policies.

As part of encouraging healthy eating, the HHFKA also dictated that schools need to make potable water available at lunch time. This provision was to be implemented no later than SY 2011-12. For elementary, middle, and high schools, 97 to 98 percent of SFAs said they provided potable water with meals. For the much smaller group of SFAs with other types of schools, only 77 percent said they provided water with meals at these schools.

Starting in SY 2005-06, SFAs were required to implement a food safety program to ensure the meals served in schools were safe. The HHFKA reinforces this focus on food safety by requiring that schools continue to receive two food safety inspections a year and that the food safety program applies to the entire school campus. Table I-5 shows that nearly all SFAs (96 percent) reported that all schools in their district had a written food safety plan based on hazard analysis and critical control points (HACCP) principles by SY 2011-22. Overall, only 4 percent of the all SFAs reported that only some or none of their schools had written plans. About 84 percent of SFAs reported that all of their schools had two or more safety inspections. Eight percent of SFAs reported that none of their schools had two or more safety inspections. Eight percent of SFAs reported that none of their schools had two or more safety inspections. Eight percent of SFAs reported that

# Table I-5.Percentage of SFAs with Various Shares of their Schools having Food Safety<br/>Plans and Regular Inspections, SY 2011-12

	Percentage of	Tota	l SFAs
Food safety plans and inspections	SFAs	Weighted n	Unweighted n <sup>1</sup>
Share of schools with food safety plans			
All schools	95.6%		
Most or some schools	1.8	14,439	1,387 <sup>1</sup>
No schools	2.6		
Share of schools having two or more safety inspections			
annually			
All schools	84.2		
Most or some schools	7.7	14,418	1,386 <sup>1</sup>
No schools	8.1		

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 12.1 and 12.7a.

### **SFA Finances**

SFAs operate under tight financial constraints and within the policy and regulatory boundaries set by the Federal government, their states, and their local education agency (LEA). Four facts heavily dictate SFA's financial operations:

- SFAs must operate on a nonprofit basis.
- They are reimbursed for NSLP and SBP meals at rates set by the Federal government as shown in Table I-6.
- The maximum price they can charge for reduced-price meals is set by Federal regulations.
- The price they can charge for a paid reimbursable meal is set by their LEA.

In many ways an SFA may be viewed as a nonprofit business that produces reimbursable food items as well as a variety of competitive foods and must set the prices for each of its different products so that at the end of the year it breaks even (revenue equals cost).

#### Table I-6.Reimbursement Rates for the NSLP and SBP, SY 2009-10 to SY 2011-12

Income-eligibility		09-10 ment rates		10-11 ment rates		11-12 ment rates
category	Breakfast	Lunch	Breakfast	Lunch	Breakfast	Lunch
Free Reduced-price Paid	\$1.46 1.16 0.26	\$2.68 2.28 0.25	\$1.48 1.18 0.26	\$2.72 2.32 0.26	\$1.51 1.21 0.27	\$2.77 2.37 0.26

#### **Meal Prices**

In addition to updating and strengthening nutrition standards for school meals and other foods sold in schools, the HHFKA requires SFAs to make changes in the pricing structure of all foods sold in schools. A key change is the Paid Meal Equity Provision that requires SFAs to provide the same level of financial support for lunches sold to students who have been approved for F/RP meals and students who must pay full price. This can be accomplished either through gradually raising the prices of paid lunches or through providing the equivalent funds from non-Federal sources. There is an additional provision that requires SFAs to set the prices of competitive foods basically at levels no less than the cost of these foods.<sup>2</sup>

The Paid Meal Equity Provision that went into effect in July 2011 is expected to result in an increase in prices for a paid school lunch over time. Under the HHFKA rules, SFAs have to raise their prices over time on school lunches so they match the Federal reimbursement for free lunch minus and the Federal reimbursement for paid lunches. Table I-7 presents the status of meal pricing and reimbursements in SY 2010-11, the year just prior to the Paid Meal Equity Provision going into effect. As the table shows, on average, SFAs (specifically their LEAs) set the price of a paid meal at levels below the Federal reimbursement rates for free meals. Considering the prices charged for a paid meal along with the reimbursement rates for paid and free meals, Table I-7 reveals that, on average, SFAs receive about the same per unit revenues on free and paid breakfasts but get more revenue on free lunches as compared to paid lunches.

# Table I-7.SFA's Average Meal Prices, Reimbursement Rates, and Revenues per Meal for<br/>the NSLP and SBP by Grade Level, SY 2010-11

	SFA's average meal pric	es, reimbursement rates meal	s, and revenues per
	Elementary	Middle	High
Breakfast			
Paid meal price	\$1.15	\$1.23	\$1.24
Paid meal reimbursement rate	0.26	0.26	0.26
Paid meal revenues	1.41	1.49	1.50
Free meal reimbursement rate and revenues	1.48	1.48	1.48
Difference in revenue	-0.07	0.01	-0.02
Weighted n <sup>1</sup>	9,792	7,437	8,813
Lunch			
Paid meal price	\$1.91	\$2.14	\$2.14
Paid meal reimbursement rate	0.26	0.26	0.26
Paid meal revenues	2.18	2.40	2.40
Free meal reimbursement rate and revenues	2.72	2.72	2.72
Difference in revenue	-0.54	-0.32	-0.32
Weighted n <sup>1</sup>	11,763	8,888	10,314

<sup>1</sup> *n* is less than 14,678 because not all SFAs participate in the SBP or have each type of school and item non-response.

<sup>&</sup>lt;sup>2</sup> "National School Lunch Program: School Food Service Account Revenue Amendments Related to the Healthy, Hunger-Free Kids Act of 2010," *Federal Register*, Vol. 76, No. 117, June 17, 2011, p. 35301. Available at <u>http://www.fns.usda.gov/cnd/governance/</u> regulations/2011-06-17.pdfRevenue.

Based on the prices charged for a paid meal in SY 2010-11, under the Paid Meal Equity Provision, SFAs were going to have to raise average school lunch prices by about 30 to 50 cents gradually over time or provide off-setting non-Federal subsidies. SFAs could continue to charge different prices across grade levels so long as the average price of paid claimed meals was brought in line with the difference in the reimbursement rates. As this study did not collect data on meals claimed, we cannot precisely estimate the number of SFAs expected to be affected by the price changes. However, the SY 2010-11 price data suggested that the majority of SFAs were going to be affected by the Paid Meal Equity Provision because over 90 percent of SFAs (not shown) had paid lunch prices in elementary schools that were below the target price and over 80 percent (not shown) had paid lunch prices in middle and high schools that were below the target price. In any given year, any required price increase is limited to a maximum of 10 cents, although SFAs may increase their average paid meal prices more than the required amount. The provision allows SFAs to round down the required price increase to the nearest 5 cents for SY 2011-12.

Table I-8 shows the impact that price increases under the Paid Meal Equity Provision in SY 2011-12 have had on closing the gap between the revenue generated by free and paid lunches. The price increases in the first year under the provision have already reduced the price gap by 6 percent. For example, looking at elementary schools in SY 2010-11, on average, SFAs generated 54 cents more revenue from free lunches than from paid lunches. In SY 2011-12, average revenue from free lunches was 51 cents greater than from paid lunches—a decrease in the price gap of 6 percent. Similar reductions in the gap were observed for middle and high schools.

### Table I-8.SFAs' Average Difference in Revenues per Meal, SY 2010-11 versus SY 2011-12

	SFA's average difference in revenue per meal, SY 2010-11 versus SY 2011-12		
	Elementary	Middle	High
Difference in revenue in 2010-11	0.54	0.32	0.32
Difference in revenue in 2011-12	0.51	0.30	0.30
Percent gap has been narrowed	5.6%	6.3%	6.3%
Weighted <i>n</i> 2010-11	11,794	8,808	10,349
Weighted <i>n</i> 2011-12	11,763	8,888	10,314

Data Source: SFA Director Survey 2011, questions 5.4, 5.5a, and 5.5b.

Table I-9 shows that the rise in school meal prices was between 5 and 7 percent since SY 2009-10 which was higher than inflation. During this time period, prices for "food away from home" increased 3.4 percent,<sup>3</sup> and the meal reimbursement rates were increased accordingly. Between SY 2009-10 and SY 2010-11, the rise in meal price tracked tightly with the rise in the reimbursement rate which is tied to the inflation rate. In contrast, between SY 2010-11 and SY 2011-12, meal prices increased at a rate (3 to 4 percent) greater than inflation (2 percent). Although this recent rise in lunch prices above inflation is likely due in part to the Paid Meal Equity Provision, breakfast prices also rose more than inflation between SY 2010-11 and SY 2011-12. Both the recent recession and other HHFKA policy changes may be affecting meal pricing decisions. The recent economic downturn, which placed a great deal of stress on state and local budgets, appears to have also been a contributor to LEAs' increasing school lunch prices, and 28 percent (not shown) of state CN directors said meal prices were affected by their state's budget issues.

<sup>&</sup>lt;sup>3</sup> See <u>www.fns.usda.gov/cnd/menu/menu\_planning.doc</u>).

# Table I-9.NSLP and SBP Reimbursement Rates for Free School Meals and Average Prices<br/>for Paid Meals, SY 2009-10 to SY 2011-12

	2009-10	2010-11	2011-12	% change 2009-10 to 2010-11	% change 2010-11 to 2011-12
	·	Reimbursement	rate for free meals		
Breakfast	\$1.46	\$1.48	\$1.51	1.5%	2.0%
Lunch	2.68	2.72	2.77	1.5	1.8
		Average pa	id meal prices		
Elementary					
Breakfast	\$1.13	\$1.15	\$1.19	1.8%	3.5%
Lunch	\$1.89	\$1.92	\$2.00	1.6	4.2
Middle					
Breakfast	\$1.21	\$1.23	\$1.26	1.7	2.4
Lunch	\$2.10	\$2.14	\$2.21	1.9	3.3
High					
Breakfast	\$1.21	\$1.24	\$1.27	2.5	2.4
Lunch	\$2.11	\$2.14	\$2.21	1.4	3.3

Data Source: <u>http://www.fns.usda.gov/cnd/governance/notices/naps/NAPsHistorical.htm</u> and SFA Director Survey 2011, questions 5.1, 5.2, 5.4, and 5.5.

### **Non-Profit Operations**

SFAs are required to operate on a nonprofit basis. In a given year, an SFA may not break even, but one would expect to see individual SFAs operate near the break-even band over time. In SY 2010-11, less than half of the SFAs were operating at a break-even level (defined as the average ratio of total cash revenues to total cash expenditures is between .95 and 1.05). Table I-10 shows that although over time SFAs may be just breaking even, only 41 percent actually operated within the break-even band in SY 2010-11. Thirty-four percent incurred a deficit, and 25 percent produced a surplus, suggesting that in a given year, there is significant variation around break-even levels. However it is important to note that these break-even levels compare total revenue with total expenditure only and do not take into account operating balances of SFAs at the beginning of the school year.

## Table I-10.Percentage of SFAs by Annual Cash Receipts as a Percentage of Cash<br/>Expenditures, SY 2010-11

Annual SFA cash receipts as a percentage of annual cash expenditures	Percentage of SFAs
≤85%	19.0
86% to 90%	5.4
91% to 95%	9.6
96% to 100%	23.6
101% - 105%	17.8
106% to 110%	12.2
111% to 115%	4.0
≥116%	8.4
Total	100.0
Total SFAs: Weighted n	10,680
Total SFAs: Unweighted n	1,082 <sup>1</sup>

<sup>1</sup>*n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 6.1a and 7.1a.

### **State Policies and Support**

The states play an important role in administering the NSLP and SBP. While FNS sets policies for the school meals programs, the programs are administered at the state level. States provide oversight and guidance to help ensure that SFAs are in compliance with the program requirements, and in many cases provide additional financial assistance.

Some states provided a subsidy to SFAs beyond the Federal reimbursement that SFAs received for the F/RP meals served to income eligible students. Table I-11 shows that about two-thirds of the states reported that they provided subsidies for breakfast or lunch. Forty-two percent of states provided a subsidy for breakfast and lunch; 9 percent provided a subsidy for breakfast only; 11 percent provided a subsidy for lunch only. Just over one-third of states did not provide subsidies to their SFAs.

A key policy area for which states provided oversight to SFAs is NSLP and SBP program eligibility and verification. Table I-11 shows that a substantial number of states reported having SFAs that use Provisions 2 and 3 and direct verification to lessen the administrative burden associated with determining students' program eligibility. Overall, many more states (77 percent) had at least some SFAs using Provision 2 as compared to Provision 3 (28 percent), and just about half (48 percent) of the states reported having at least one SFA using direct verification.

State policies	Percentage of states with select policies
Provide subsidies ( $n = 53^{1}$ )	
Lunch and breakfast	41.5%
Lunch only	11.3
Breakfast only	9.4
No subsidy	37.7
Percentage of SFAs in Provision 2 (n = 53 <sup>1</sup> )	
More than 20 percent	7.5
>5-20 percent	26.4
>0-5 percent	43.4
None	22.6
Percentage of SFAs in Provision 3 ( <i>n</i> = 53 <sup>1</sup> )	
More than 20 percent	1.9
>5-20 percent	1.9
>0-5 percent	24.5
None	71.7
At least one SFA using direct verification ( <i>n</i> = 52 <sup>1</sup> )	
Currently using	48.1
Used in past	1.9
Never used	50.0

### Table I-11. Percentage of States with Select Policies, SY 2011-12

 $^{1}n$  is less than 54 due to item non-response.

Data Source: State CN Director Survey 2011, questions C1, C2, D1 and D2.

States vary substantially in their policies on charter schools. As the number of charter schools grows, there is significant variation as to how they are served. The number of charter schools in the country, their participation in the NSLP and SBP, and whether they operate as a separate SFA have implications for the programs' coverage of students in need and the efficiency of operations. Table I-12 shows that 74 percent of states had charter schools in SY 2011-12, and 23 percent of the states had more than 100 charter schools. Table I-12 also shows that 12 percent of the states had all their charter schools participating in the NSLP, while 33 percent had less than 70 percent participating. Overall, 53 out of 54 state CN directors reported a total of 4,762 charter schools (not shown), with 69 percent (not shown) participating in NSLP and 59 percent (not shown) participating in SBP.<sup>4</sup> The participation rate among charter schools was considerably less than the participation rate among all schools, which was over 90 percent for both the SBP and NSLP.

<sup>&</sup>lt;sup>4</sup> According to the National Alliance for Public Charter Schools, there were 5,618 public charter schools in operation during SY 2011-12 (http://dashboard.publiccharters.org/dashboard/schools/page/overview/year/2012). The reason for the discrepancy is unknown. One state CN director did not respond to this survey item. Additionally, the number of charter schools can fluctuate from year to year due to new schools opening and schools closing due to non-compliance with their charters. The number of states without charter school legislation according to the Alliance is smaller than the number of states without charter schools reported by state CN directors. Differences in how terms such as "operating" are defined, the speed with which change of status is reported to an advocacy organization vs. to state officials, and different time frame window may also have contributed to the differences.

# Table I-12.Percentage of States with Charter Schools and their NSLP Participation Levels,<br/>SY 2011-12

Number and participation of charter schools	Percentage of states
harter schools (n = 53 <sup>1</sup> )	
None	26.4%
Less than 20 schools	17.0
21-100 schools	34.0
More than 100 schools	22.6
harter school participation in NSLP ( $n = 52^{1,2}$ )	
100 percent	11.5
70-99 percent	28.8
Less than 70 percent	32.7
Did not have charter schools	26.9

 $^{1}n$  is less than 54 due to item non-response.

<sup>2</sup> One state reported the number of charter schools but did not provide the number participating in NSLP.

Data Source: State CN Director Survey 2011, questions C11a and C11b.

State agencies provide programmatic training and technical assistance on numerous NSLP and SBP topics, ranging from the safe handling of food to program regulations and procedures. These trainings can be provided through written documents such as manuals or through various forms of verbal communication. As Table I-13 shows, states provided some level of training or technical assistance in many of the topics, with program regulations, recordkeeping, and menu planning being the most frequent training topics. A third of the states provided training on topics that were not listed in the questionnaire, and these included a wide range of subjects such as a back-to-basics course, students with special dietary needs, farm to school, and salad bars.

# Table I-13.Percentage of States Providing School Meal Training and Technical Assistance<br/>by Topic and Frequency, SY 2011-12

	Percentage of states providing training and technical assistance			
Торіс	At least annually	Less than annually	Only when requested	Not provided
Food safety plans	63.0%	9.3%	24.1%	3.7%
Other food sanitation and safety	57.4	3.7	25.9	13.0
Food purchasing	51.9	1.9	27.8	18.5
Menu planning	83.4	5.6	9.3	1.9
Food preparation	51.9	1.9	29.6	16.7
Contracting procedures	46.4	3.7	31.5	18.5
Recordkeeping	87.1	1.9	11.1	0.0
Merchandising	40.8	3.7	27.8	27.8
Program regulations and procedures	100.0	0.0	0.0	0.0
Use of commodities	74.1	0.0	9.3	16.7
Other	27.8	0.0	5.6	66.7
Total States: n	54			

Data Source: State CN Director Survey 2011, question E1.

## Conclusions

In many areas, SFAs appear to be well positioned to implement the regulations and policies stemming from the HHFKA. Several of the provisions included in the HHFKA were reported to have already been met, including near universal provision of potable water at lunch and the promulgation of school food safety plans. Similarly, SFAs reported high compliance with conducting at least two annual food safety inspections at each school. In light of the current operations and processes in place in many SFAs, there are some areas that may prove to be more challenging to implement and will require substantial changes on the part of SFAs. Specific to schools implementing the updated food-based meal patterns, nearly three-quarters of the SFAs used foodbased menu planning systems, which should make the transition to the updated patterns easier than if they had been using other menu planning options. Regarding competitive foods, although a majority of SFAs reported they offered competitive foods, many SFAs have operated under local and state policies that regulate these items to some degree. Additionally, the data show that many SFAs began to raise the prices in SY 2011-12 of paid lunches to comply with the Paid Meal Equity Provision of the HHFKA that went into effect in July 2011. Staff professional education and training may prove challenging, as a substantial share of SFAs did not previously require specific certifications or licenses. Finally, all the states responded that they provided training and technical assistance at least annually on program regulation and procedures. Most states also regularly provided training on other topics critical to implementing various provision of the HHFKA, which should help facilitate implementation.

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## **Section II: Study Overview**

The NSLP and the SBP are the two largest school-based CN programs providing meals and snacks to millions of school-age students every day. During the 2011-12 school year, the NSLP provided lunch and afterschool snacks to about 31.8 million students each day in over 100,000 public and nonprofit private schools nationwide.<sup>5</sup> The SBP provided breakfast to about 12.18 million students each day in over 89,000 schools.<sup>6</sup>

Since their inception in 1946 when malnourishment was a nationwide concern, the Federal government has used the CN programs as a major resource for safeguarding the health and wellbeing of the Nation's children. More recently, concern has shifted from malnutrition to childhood obesity and the nutritional quality of school meals. Researchers examined school food environments and policies (Finkelstein et al., 2008)<sup>7</sup> and found that less than one-half of the schools had a nutrition policy and less than one-quarter of schools had a nutrition or health advisory council. The authors also found a majority of secondary schools sold items à la carte in the cafeteria and through vending machines that were low-nutrient, energy-dense foods and beverages, commonly referred to as junk food. Another study found that most high school students can access soft drinks through both vending machines (88 percent) and in the school cafeteria at lunch (59 percent), with middle schools providing somewhat less access (Johnston et al., 2007).

Similarly, findings from the 2006 School Health Policies and Practices Study indicate that while significant increases were observed between 2000 and 2006 in the percentage of states that required schools to prohibit the sale of junk food à la carte, room for improvement still exists (O'Toole et al., 2007). The authors reported that in 2006 less than half of states (42 percent) and almost 40 percent of districts (39 percent) required that schools prohibit the sale of junk food à la carte during breakfast or lunch. Delva (2007) and colleagues found indisputable evidence that less-healthy foods are more available than more-healthy foods in the majority of secondary schools across the country, especially so for youth who are racial or ethnic minorities or of lower socioeconomic status. In a survey administered by the School Nutrition Association (SNA), school nutrition directors reported major challenges in finding affordable products that meet policy nutrition standards and acceptance by students.<sup>8</sup> This body of research led to calls from the public for improvements in the quality of school meals through the establishment of stricter nutritional requirements.

The USDA commissioned the IOM to convene a committee to recommend revised standards and requirements to make school meals healthier. In its 2009 report, *School Meals: Building Blocks for Healthy Children*, the committee recommended that USDA adopt standards for menu planning, including (1) increasing the amount and variety of fruits, vegetables, and whole grains; (2) setting minimum and maximum levels of calories; and (3) focusing more on reducing saturated fat, trans fat, and sodium. Given the number of students participating in NSLP and SBP, there is a realization that the quality and nutrient content of school meals is one way to improve children's

<sup>&</sup>lt;sup>5</sup> http://www.fns.usda.gov/pd/slsummar.htm, http://www.fns.usda.gov/cnd/Lunch/AboutLunch/NSLPFactSheet.pdf.

<sup>&</sup>lt;sup>6</sup> http://www.fns.usda.gov/pd/sbsummar.htm. http://www.fns.usda.gov/cnd/breakfast/AboutBFast/SBPFactSheet.pdf.

<sup>7 &</sup>lt;u>http://pediatrics.aappublications.org/cgi/content/full/122/1/e251</u>.

<sup>8 &</sup>lt;u>http://docs.schoolnutrition.org/newsroom/jcnm/08spring/mcdonnell/index.asp.</u>

diets and potentially affect the obesity problem while providing additional food security and ensuring that children are ready to learn.

These recommendations were incorporated into the HHFKA in 2010 and resulted in USDA revising the CN program requirements. While the HHFKA is a very comprehensive bill that includes over 70 sections divided among four titles, several of the provisions are particularly important for school food operations and include:

- School meal pattern standards: the HHFKA required USDA to issue a proposed rule within 18 months to update meal pattern requirements for the NSLP and the SBP.
- Competitive foods standards: the HHFKA provided USDA the authority to set nutrition standards for all foods regularly sold in schools during the school day, including vending machines, the à la carte lunch lines, and school stores.
- Professional standards: the HHFKA required USDA to establish a program of required education, training, and certification for various categories of school food service staff.
- School lunch and competitive foods pricing: the HHFKA required USDA to administer a number of provisions related to school lunch pricing and competitive foods pricing. SFAs must bring paid lunch prices in line with subsidized school lunch levels and price competitive foods at or above the cost to avoid cross subsidization of funds from reimbursable meals.
- Standards for local school wellness policies: the HHFKA required that local school wellness policies have input from diverse stakeholders, reflect the new nutrition standards set by USDA and set goals for nutrition promotion, include a plan for measuring and reporting on effectiveness, and are communicated to the public.

The implementation timeline for the new requirements began in late 2010 and continue over 10 years, with the meal pattern changes being phased in starting in SY 2012-13. FNS requires information, not already provided through state reporting, that will assist in understanding characteristics and administration of the state and local CN programs. This information will help FNS identify training and technical assistance needs and opportunities, as well as assess achievement of the new legislative goals.

At the Federal level, FNS administers the NSLP and the SBP programs. FNS develops program eligibility requirements, benefits, and application processes and provides guidance to SFAs on implementing the NSLP and SBP. At the state level, the two programs are usually administered by state education agencies (SEAs), which administer the program through agreements with SFAs. SFAs are semi-autonomous nonprofit entities established by LEAs for the sole purpose of operating the school meals programs. State agencies monitor and supervise SFA compliance with Federal financial management standards, review SFA contracts with food service management companies, conduct training programs, provide onsite technical assistance, and assist SFAs with the operation of computerized nutrient menu planning systems and direct certification of students' eligibility. However, differences in demographics, staffing, financial status, and other school- and district-level circumstances result in considerable variability in program implementation.

### **Study Purpose**

The SN-OPS is a multiyear study involving several surveys designed to provide the USDA, FNS with a snapshot of current state and SFA policies and practices and a baseline for observing improvements resulting from the implementation of the HHFKA. The study provides FNS with key information about the characteristics, ongoing efficiency, and effectiveness of the CN program so FNS has a better understanding of what is happening at the state and local levels and can then address program policy needs, develop informed regulations and guidance, and provide needed technical assistance.

The design of SN-OPS combines elements of cross-sectional and longitudinal research with the goal of maximizing the utility of data while conserving resources and reducing burden on states and SFAs. The general plan was to explore options for data collection over the initial study years and then settle on a carefully constructed (refined) set of data points or modules to collect information periodically or annually with minimal burden or disruption to state administrative offices and SFAs. SN-OPS comprises two core surveys initially: one targeting directors of state CN programs and one targeting directors of local SFAs. At the outset, the State CN Director Survey included directors from all states and five territories. FNS assumed that variability among state policies was unknown, and thus warranted a complete accounting from all states and territories.

The initial round of data collection attempted to gain a full census of the 50 states, the District of Columbia, and the five U.S. territories. The survey of SFA directors used a stratified sample of SFAs serving at least one school participating in NSLP from the entire list of 14,797 public school SFAs (as of 2010). A second round of surveys with state and SFA directors is being conducted for SY 2012-13. A third source, also conducted for SY 2012-13 consists of onsite visits to a sample of SFAs and schools. The purpose of these visits is to gain more depth of understanding of SFA operations by observing breakfast and lunch service and collect information about the availability of competitive foods. The schedule for these onsite observations is Year 2 of the study, and thus they are not reflected in this report. The SN-OPS study will provide USDA with up-to-date information about the nature of current CN program implementation, administration, and operations, to better inform future policy development.

## **Study Design**

The following sections describe the various dimensions of the SN-OPS design. The first section describes the State CN Director and SFA Director Surveys, including their focus, content, and key variables. The next sections elaborate the sample design for the SFA Director Survey and the data collection procedures for both surveys. The remaining sections present relevant statistical information, including survey completion rates, data preparation, and adjustments (weighting).

### **Data Sources**

This report of SN-OPS base-year activities comprises data collected from the survey of all state CN directors and data collected from a stratified sample of SFA directors. The two surveys provide a cross-sectional snapshot of state and local program characteristics and establish baseline estimates for year-to-year changes in operations with implementation of the HHFKA. Data

collected from the same samples during Years 2 and 3 of the study provide a basis for assessing change. Both surveys focus on three general topic areas, including: (1) descriptive characteristics of CN programs, (2) program administration, and (3) program operations.

### **State Child Nutrition Director Survey**

FNS sets policies for federally supported school meals programs. However, each state identifies an agency that is accountable to the Federal government for administering the programs. A state CN director who is responsible for applying Federal policies administers the state agency, developing supplementary state policies where needed, ensuring program implementation, and filing required reports with FNS. It is the state, rather than FNS, that has a direct connection with SFAs.<sup>9</sup>

States report to the Federal government (i.e., FNS) basic characteristics of their ongoing implementation of CN programs, including such data as numbers of students eligible and numbers of meals served under the F/RP lunch categories. However, with recent Federal policy developments (e.g., the Community Eligibility Provision) and new developments for CN programs over the next several years stemming from the HHFKA, FNS requires a more involved understanding of evolving state policies, practices, and local implementation of the nutrition programs. Such information will assist FNS in understanding the facilitators and barriers to efficient and effective program implementation and identifying state training and technical assistance needs.

The 2011 State CN Director Survey consisted of 6 sections and 52 questions. Table II-1 provides an overview of these topics, component subsections, and the number of items associated with each component. The six sections included standards, resources and finances, program administration, operations, training and technical assistances, and state CN director background. Each section and its components addressed issues of particular interest to FNS. A copy of the State CN Director Survey is provided in Appendix A. For example, the section on standards seeks information about how states interpret the Federal guidelines for food and beverages offered in schools. Of particular interest is whether states implement stricter guidelines (than the Federal guidelines), the extent to which the state has and enforces guidelines for various food sources (à la carte items, school stores, vending machines, etc.), the perceived impact of these guidelines, and whether or not the state promulgates policies for feeding students who were not certified for F/RP meals and were unable to pay for school meals.

<sup>&</sup>lt;sup>9</sup> FNS uses a tiered approach in communicating with states and SFAs. Headquarters first contacts the directors of the seven FNS Regional Offices who then contact the state CN directors in their region. It is the state CN directors who maintain contact with SFA directors within each state.

Section	Component	Number of items
Standards	State standards of practice	4
Resources and finances	Food subsidies	1
	Support for food service operations	1
	Budget issues	1
	State level staffing (FTEs)	4
	State warehouse arrangements	2
	Charging SFA fees	3
Program administration	Direct verification	10
-	Charter schools	1
Operations	Provision 2 or 3	2
	Use of external food service firms	2
	Contracting provisions	1
	Food recall procedures	7
	Communication with SFAs	1
Training and technical assistance (TA)	TA topic areas	1
	Delivery of TA	6
CN director background	Experience	2
	Education	3

### Table II-1. State Director Questionnaire Content

### **SFA Director Survey**

The 2011 SFA Director Survey consisted of 14 sections and 102 questions. The sections included SFA characteristics, school participation, student participation, food service characteristics, meal prices, revenues, expenditures, alternative meals/recouping credits for unpaid meals, meal counting and claiming, procurement issues, involvement in other programs, food safety program, communication issues, and SFA director background. Table II-2 provides an overview of these topics, component subsections, and the number of items associated with each component. A copy of the SFA Director Survey is provided in Appendix B.

Table II-2.	SFA Director	Questionnaire	Content
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Section	Section Component		
SFA characteristics	Composition	1	
	Pre-K student access to school meals	2	
School participation	School-level participation in SBP and NSLP	1	
	Severe need schools	1	
Student participation	Student access to/participation in meals	1	
Food service characteristics	Meal service delivery	1	
	Eating locations, duration, and recess	6	
	Menu planning and food selection	3	
	Policies for school meals	2	
	Nutrition information and free potable water	6	
	Types and uses of kitchen facilities	4	
Meal prices	Breakfast prices for 3 years	3	
	Lunch prices for 3 years Steps taken to minimize price increases	3	
Revenues	Total income and sources	1	
Revenues	State and school district subsidies received	1	
Expenditures	Categories of expenditures	1	
Alternative meals	Unpaid meals	4	
Meal counting and claiming	Meal counting and payment methods	2	
6 6	Cashier training and onsite monitoring	3	
Procurement issues	Geographic preference	4	
	Nutrition information requirements	6	
	Purchasing and using food service firms	3	
Other programs	Other USDA programs	9	
Food safety program	Food safety plans, inspections/violations	14	
	Food safety training	4	
Communication	Communications with state agencies, households, and school staff	5	
SFA director background	Experience	2	
	Education and certifications	2	
	Responsibilities	1	
	District position requirements	2	
Tota	al	102	

## **SFA Sample Selection**

The goal of the 2011 SFA Director Survey was to collect data from a representative sample of SFAs from which to generate a nationally representative picture of SFA program characteristics, administrative practices, and food service operations. The 2009-10 Verification Summary Report data (Form FNS-742) provided the data needed to build a sample frame from which to select SFAs for the survey.

Table II-3 presents an overview of SFAs with at least one school participating in the NSLP in the U.S. during the 2009-10 academic school year. In total, 18,634 SFAs with at least one school participating in the NSLP were reported to FNS on Form FNS-742 during that school year. Of those, 79 percent (14,797) represented public schools participating in the NSLP. Importantly, public school SFAs represent 94 percent of schools participating in the NSLP in the U.S. during that year

and 98 percent of the students participating in the program. The public school SFAs with at least one school participating in the NSLP comprised the sampling frame for the survey.

Table II-3.	Sample Frame Coverage of SFAs, Schools, and Students in SY 2009-10
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SFA type	SFAs	Schools	Students
All SFAs with at least one school participating in NSLP	18,634	97,274	49,803,000
Public school SFAs with at least one school participating in the NSLP	14,797 (79.4%)	91,066 (93.6%)	48,544,000 (97.5%)

Before sampling, public school SFAs were organized into strata based on enrollment (seven levels), percentage of students eligible for F/RP lunch (three levels), and FNS region (seven levels). The 26 largest SFAs were included in the sample with certainty (i.e., a sampling rate of 1.0). Selection of the remaining SFAs followed rates roughly proportional to the average square root of the enrollment of SFAs in the stratum to which the SFA belonged. This allocation gives large SFAs relatively higher selection probabilities than smaller ones while producing acceptable sampling precision for both prevalence estimates and numeric measures correlated with enrollment. Note that while both poverty level and FNS region defined the detailed sampling strata, the actual sampling rates used to select the sample depended only on the size class of the SFA. Before sample selection, the sampling frame was sorted by selected district-level characteristics available from the 2008-09 National Center for Education Statistics (NCES) Common Core of Data (CCD) LEA universe file. The CCD variables used in the sorting were urbanicity (locale) and categories of percentage minority enrollment. The sorting in effect created implicit strata within each detailed sampling stratum to ensure appropriate representation of the different types of SFAs within strata under systematic sampling.

Table II-4 presents a summary of the sample selection by the seven student enrollment categories. The table shows the number of SFAs in each of the seven enrollment categories, the sampling rate associated with the category, and the number of SFAs sampled. The final sample, including the 26 largest SFAs sampled with certainty, was 1,768.

Data collection activities brought to light the fact that two of the sampled SFAs represented six entities (school district), thus serving as if they were actually more than one SFA. These two cases required the study to collect data multiple times from the SFA director as if he/she were multiple directors. This situation effectively increased the sample size to 1,774. A detailed description of the sampling strategy for selecting the SFAs appears in Appendix C.

SFA enrollment	Number of SFAs in sampling frame	Sampling rate	Number of SFAs selected for sample <sup>1</sup>
Under 1,000	7,632	0.0589	447
1,000 to 2,499	3,297	0.1101	366
2,500 to 4,999	1,945	0.1612	310
5,000 to 9,999	1,043	0.2280	237
10,000 to 24,999	594	0.3483	210
25,000 to 99,999	260	0.6582	172
100,000 or more	26	1.0000	26
Total	14,797		1,768

### Table II-4. SFA Sample by Enrollment

<sup>1</sup> The numbers sampled only approximate the rate times the number on the frame due to adjustments made by including the two additional sorting variables (type of locale and minority status).

## **Data Collection Procedures**

The following sections describe the data collection procedures for the two surveys. The discussion includes a description of the survey mode, data collection period, and prompting strategies.

### **State Child Nutrition Director Survey**

The data collection period for the State CN Director Survey stretched from a planned 3 to 4<sup>1</sup>/<sub>2</sub> months, from October 1, 2011, through February 13, 2012. State CN directors in all 50 states, the District of Columbia, and the 5 U.S. territories received a packet of information about the survey. The packet included a letter, Frequently Asked Questions (FAQ) and answers sheet, a copy of the 22-page questionnaire, and instructions for its completion. The letter explained the survey, its purpose, and its importance to FNS. The only option for completing the questionnaire was the hard copy, paper/pencil version. There was no availability for completing the questionnaire online.

Throughout the data collection period, a series of communications attempted to improve the number of responding state directors. For example, a little more than a week following the initial mailing, a second letter to state directors described answers to questions received during the first week. Non-responding state directors continued to receive email messages and phone calls periodically throughout the data collection period. Finally, in mid-January 2012, non-responding state directors received a FedEx envelope containing a final request to complete the survey along with a new copy of the questionnaire. The final cutoff data for the survey was set at February 13, 2012.

Fifty-four State CN directors completed the questionnaire, for a response rate of 96 percent. Survey responses included all 50 states, the District of Columbia, and 3 U.S. territories.

### **SFA Director Survey**

The data collection period for the SFA Director Survey went from September 30, 2011, through February 17, 2012. The SFA Director Survey was a web-enabled, password-protected questionnaire. However, SFA directors had the option to complete the questionnaire on paper. SFA directors could download and print a paper version of the questionnaire or request to have one sent by mail.

With contact information provided by FNS, a letter and supplementary materials sent to SFA directors introduced the survey and gave information about its purpose and importance to FNS. The packet of materials included the study's Web address and the SFA's unique *username* and *password*. Also included with the mailing were instructions for *getting started*, FAQs and answers, and an endorsement letter from the SNA.

The initial request gave SFA directors a month to complete the questionnaire. However, to meet minimum response rate requirements set by FNS, several extensions carried the data collection through February 17, 2012. In an effort to assist a few SFA directors, staff completed some questionnaires over the telephone. Throughout the data collection period, SFA directors received a number of contacts to encourage completion of the questionnaire. These contacts included letters, phone calls, emails, and reminder postcards as well as encouragement from the state office.

### **SFA Director Survey Response Rate**

Table II-5 shows the final disposition of the SFA sample. Of the 1,774 SFAs in the sample, 1,328 completed the survey in its entirety. Another 73 SFA directors completed 7 or more sections of the questionnaire, enough to consider the questionnaire complete. Nine SFAs were ineligible for a variety of reasons, however, mainly due to having gone out of business. The remaining 364 (21 percent) SFA directors did not respond at all to the questionnaire, or they opened it but did not complete enough of the survey to consider it a response. The final response rate was 79 percent.

### Table II-5. Response Rate for the SFA Survey

Sample disposition	Number				
Sample	1,774				
Complete (all sections)	1,328				
Partial complete (7 or more sections)	73				
Total available for analysis	1,401				
Incomplete (6 or fewer sections)	179				
No response	185				
Ineligible	9				
Response rate (complete + partial complete) ÷ (total sample – ineligibles)	79.4%				

### Weighting and Adjustments

This section describes the procedures for weighting and variance estimation and the general approach to the analysis of the base-year SFA survey data.

### **Base Weights**

Following data collection, a base weight was computed for each sampled SFA. Weights compensate for differential probabilities of selection and non-response. Since the data collection involved only one wave of data, a set of cross-sectional weights was created to produce nationally representative estimates of public school SFAs for the base year. The base weight,  $w_{bb}$  for SFA *i* in sampling stratum *h* was computed as  $w_{bi} = 1/P_{bb}$  where  $P_{bi}$  is the corresponding probability of selecting the SFA from the stratum. Given SFAs sampling at varying rates under the stratified sampling scheme, the base weights varied accordingly.  $P_{bi}$  varied from 0.06 to 1.0 as shown in Table II-4, depending on enrollment size category. The base weights are theoretically unbiased in the absence of survey non-response. However, as noted in Table II-5, non-response did occur. Therefore, to minimize the potential for non-response bias, intentional adjustments to the base weights compensated for differential non-response.

### **Non-Response Weights**

The conduct of a non-response bias analysis helped to (1) determine characteristics that are correlated with non-response, (2) inform construction of the sampling weights, and (3) determine the extent to which weighting adjustments were effective in reducing possible non-response bias. The requirement for a responding SFA was completion of at least seven questionnaire sections. Therefore, non-responding SFAs were those with zero to six completed sections. The non-response bias analysis resulted in the specification of appropriate weighting classes within which to carry out weight adjustments. The base weights were adjusted for non-response within adjustment cells with similar response propensity. The non-response adjustment cells were defined using SFA-level characteristics available from the FNS database and data from the most current CCD. Within these cells, a weighted response rate was computed and applied to the SFA base weights to obtain the corresponding non-response-adjusted weights. The non-response bias analysis in Appendix D shows that these weighting adjustments were effective in reducing non-response bias.

### **Variance Estimation**

In addition to the full sample weights described above, a series of jackknife replicate weights were created and attached to each data record for variance estimation. Replication methods provide a relatively simple and robust approach to estimating sampling variances for complex survey data (Rust and Rao, 1996). Jackknife replication has some advantages over Taylor series approximation in reflecting statistical adjustments used in weighting such as non-response and post-stratification. Under the replication approach used, 100 jackknife replicates were formed by deleting selected cases from the full sample and adjusting the base weights of the retained cases accordingly. The entire weighting process developed for the full sample was then applied separately to each jackknife replicate, which produced a series of replicate weights. The replicate weights were imported into variance estimation software (i.e., SAS) to calculate standard errors of the survey-based estimates and to conduct significance tests on key variables.

## **Table Variables**

A majority of the tables in this report contain crosstabs of relevant topical variables by three key characteristics of the SFA. The three variables are SFA size (student enrollment levels in the SFA), urbanicity, and poverty level. Table II-6 provides an overview of the unweighted and weighted sample sizes for the SFA survey cross-sectional estimates for each of the three variables.

SFA characteristics	Percentage of SFAs	Weighted n <sup>1</sup>	Unweighted n
All SFAs	100.0%	14,678	1,401
	100.070	14,070	1,401
SFA size			
Small (1-999)	50.2	7,374	332
Medium (1,000-4,999)	36.7	5,390	536
Large (5,000-24,999)	11.1	1,629	364
Very large (25,000+)	1.9	284	169
Urbanicity			
City	11.1	1,630	256
Suburban	19.7	2,885	380
Town	19.0	2,794	266
Rural	50.2	7,369	499
Poverty level			
Low (0-29% F/RP)	23.2	3,407	348
Medium (30%-59% F/RP)	46.5	6,828	650
High (60% or more F/RP)	30.3	4,443	403

# Table II-6.Unweighted and Weighted Sample Sizes for the Base-Year Cross-Sectional<br/>Estimates, by SFA Size, Urbanicity, and Poverty Level

<sup>1</sup>SFA size group sums to 14,677 rather than 14,678 due to rounding.

Table II-6 shows that:

- Half of all SFAs (50 percent) are small districts; 37 percent are medium-size districts; 11 percent are large districts; and 2 percent are very large districts. Looked at another way, only 13 percent of SFAs are districts with at least 5,000 students.
- Fifty percent of SFAs are in areas categorized as rural; 39 percent are located in towns and suburban areas; and 11 percent are in cities.<sup>10</sup>
- Urbanicity and SFA size are strongly related. Cities are large population centers, which tend to have large or very large school districts. Because only 13 percent of SFAs have at least 5,000 students, it is not surprising that 11 percent of SFAs are in cities. Conversely, rural areas have low population densities and relatively small schools. Because 50 percent of SFAs have fewer than 1,000 students, it is not surprising that 50 percent of SFAs are also located in rural areas. Further examination of the cross relationship between urbanicity and size revealed that 69 percent (not shown) of small SFAs are rural and that 91 percent (not shown) of the very large SFAs are in cities or suburbia.

<sup>&</sup>lt;sup>10</sup> Urbanicity levels are from the NCES CCD.

In terms of SFAs' poverty level, 23 percent of SFAs are in low-poverty areas; 30 percent are in high-poverty areas; and 47 percent are in medium-poverty areas.

### **Significance Tests**

Significance tests were conducted on the crosstabs to determine if SFA characteristics (e.g., SFA size) are associated with the variables of interest (e.g., student participation in NSLP). Most of the variables of interest are proportions. In these cases a Chi-Square test was used to determine if observed differences were statistically significant or the result of normal sampling error. Using the percentage of students participating in NSLP and SFA size as an example, the Chi-Square test was run to determine whether the student participation percentages were different across the SFA size categories or equal. Similarly, when the variable of interest was a mean (e.g., average meal prices) an F-test<sup>11</sup> was used to determine if observed differences between SFA subgroups were statistically significant or the result of normal sampling error. Finally, when the variable of interest was a median, a Kruskall-Wallis test was used to determine whether SFA subgroup differences were statistically significant.

Because of the descriptive nature of this report, tests of pairwise differences between subgroups for the analyses of SFA characteristics were not conducted. For example, a Chi-Square test of the association between the percentage of students participating in NSLP and SFA size indicates whether student participation percentages differ by SFA size categories but not which subgroups differ from each other (i.e., whether very large SFAs are different from large SFAs). Only very large differences between specific subgroups are likely to be statistically significant and pairwise comparisons should be viewed with caution.

### **Missing Data**

There are two sources of missing data. First, not all questions pertained to all respondents and, second, respondents skipped questions or groups of questions. Analyses that only pertain to a subset of respondents are noted in the table or figure title. To address the fact that the sample sizes vary between analyses due to item non-response, the relevant sample sizes have been included as a footnote to all tables and figures.

<sup>&</sup>lt;sup>11</sup> Regression was used to conduct the F-test. For example, average meal prices were regressed on SFA size represented by three dummy variables for medium, large, and very large SFAs (base case is small SFAs). The F-test shows whether the variation in average prices among SFAs in these size categories is statistically significant.

# Section III: Participation in NLSP, SBP, and Other Nutrition Programs

The socio-economic characteristics of the population the SFAs serve are important factors associated with students' nutritional needs, program eligibility, and ultimately program participation. In turn, the degree of need in the schools is likely to affect SFA participation in the NSLP and SBP as well as participation in other nutrition-related programs.

School and student participation are critical to the economic viability of SFAs and for SFAs to meet the goal of improving students' diets and health outcomes (including reducing childhood obesity). The levels of participation and the factors influencing student decisions about eating school meals are therefore important to both FNS and the broader school nutrition community. Examining participation rates from numerous perspectives provides a baseline for assessing the changes that are coming with implementation of the new regulations stemming from the HHFKA that are likely to affect NSLP and SBP participations rates.

This section presents estimates of SFA, public school, and student participation in the NSLP and SBP during SY 2011-12. It also examines SFA participation in other nutrition-related programs.

## Background

Since its inception in 1946, participation in the NSLP has grown. Figure III-1 shows the program served about 20 million students in 1969, of which only 15 percent received F/RP lunches. In contrast, by 2012, about 32 million students participated in the NSLP with 68 percent of students receiving F/RP meals. The NSLP is a very different program today than it was 30 years ago. In 1969, the NSLP was available in only 65 percent of the nation's public schools (USDA, 1971). As current administrative data reveal, today the program is nearly universally available with an estimated 95 percent of public schools participating in the program (FRAC, 2013), and about 75 percent of all public and private schools participate in the program.<sup>12</sup> As Figure III-1 shows, although student participation in the program has grown steadily since the early 1980s, the increase is entirely attributable to increases in participation among students approved for F/RP meals, while participation among students in the paid income-eligibility category has declined.

Looking to the future, many of the provisions of the HHFKA are likely to bring about changes in the way SFAs do business. Specifically, the HHFKA is intended to improve the quality of the foods offered and requires SFAs to make significant changes in the pricing structure of all foods sold in schools, both of which could significantly affect participation rates.

Participation levels, especially among students certified for F/RP meals, measure the degree to which the school meals programs are successful in reaching low-income students. In addition, because NSLP and SBP reimbursements are tied to the number of meals served, student participation data are important for Federal budgeting and planning purposes. This first-year report

<sup>&</sup>lt;sup>12</sup> Calculated from data from the FNS National Data Bank (2013) and from NCES data on the total number of schools in the U.S.

serves as a baseline for comparing participation levels from SY 2011-12 to levels from subsequent school years as implementation of the HHFKA provisions proceeds.

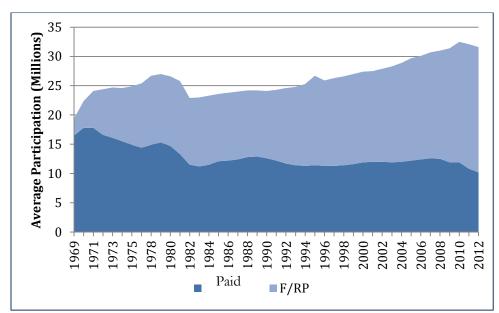


Figure III-1. NSLP Student Participation, 1969-2012

Data Source: National Data Bank (<u>http://www.fns.usda.gov/pd</u>).

SFAs vary on a number of important characteristics that may affect both school and student participation in the school meals programs. The major subgroups included in the analysis include SFA size, urbanicity, and school district poverty level. Finally, because it can have an effect on students' diets and health outcomes as well as on SFA finances, this section also examines participation in other FNS school-based nutrition assistance programs.

## **Research Questions**

The research questions associated with program participation include:

- What is the level of public school participation in the NSLP and SBP?
- What are the characteristics of public schools participating in NSLP and SBP compared with those that are not?
- What percentage of SFAs have schools that are identified as "severe need"?
- What percentage of SFAs have schools that provide access to school meals for prekindergarten (pre-K) students?
- What percentage of students are approved for F/RP meals?
  - Does the percentage vary by type of SFA?
  - Does the percentage vary for elementary and secondary schools?

- Do SFAs participate in other USDA programs such as Fresh Fruit and Vegetable Program, Afterschool Snack Program, Summer Food Service Program, or Child and Adult Care Food Program At-Risk Afterschool Snack or Supper Program?
- Do SFAs participate in the Department of Defense Fresh Program? How satisfied are SFAs with the program?
- Do SFAs participate in the farm to school activities? What types of activities?
- How many SFAs have schools that are recognized as HealthierUS Schools? At what level have these schools been recognized? What areas give you the most problems in attaining this recognition?

## **Results**

## SFA and School Participation in the NSLP and the SBP

Although the sample selection criteria for the study only required at least one school in an SFA to be participating in the NSLP, the vast majority of SFAs reported that all schools in their districts participated in the program. In fact, as Table III-1 shows, in SY 2011-12, 97 percent of SFAs had all their schools participating in the NSLP. Translating this to the school level, 99 percent (not shown) of all public schools participated in the NSLP in SY 2011-12. While no major differences were observed in this measure by urbanicity and poverty level, size of the SFAs is associated with the percentage of SFAs with all their schools participating in the NSLP. While 98 percent of SFAs in small districts reported full participation of schools, only 84 percent of SFAs in very large districts had full participation of all schools in the district in NLSP.

Table III-2 shows that participation in the SBP was high, but it is not as high as participation in NSLP. Specifically, 79 percent of SFAs reported that all their schools participated in SBP, while 10 percent (not shown) reported having no participating schools. Similarly, at the school level, 90 percent (not shown) of all schools participated in the SBP. In smaller SFAs, there were higher rates of universal participation in SBP relative to large school districts. In terms of urbanicity, suburban districts had lower rates of "all schools participating in SBP" relative to others. Also, SFAs in lowpoverty areas reported lower full participation by all schools in the district compared with SFAs in a medium or high poverty level.

				Percentage	of SFAs	with all so	hools with	in each g	rade leve	l participat	ting in t	he NSLP			
	El	ementar	.À	Ν	/iddle			High			Other		Al	l schools	5
	Percent	Wgtd	Unwgtd	Percent of	Wgtd	Unwgtd	Percent	Wgted	Unwgtd	Percent	Wgtd	Unwgtd	Percent of	Wgtd	Unwgtd
SFA characteristics	of SFAs	n	n	SFAs	n	n	of SFAs	n	n	of SFAs	n	n	SFAs	n	n
All SFAs	99.1%	12,495	1,281	99.7%	9,410	1,097	99.0%	10,828	1,182	92.7%	4,569	547	96.6%	14,533	1,389 <sup>1</sup>
SFA size <sup>2</sup>															
Small (1-999)	99.1	5,518	256	100.0	3,179	148	99.0	4,205	195	97.8	2,040	90	98.4	7,269	328
Medium (1,000-4,999)	99.1	5,115	509	99.4	4,435	450	99.5	4,790	476	90.4	1,525	149	96.2	5,360	532
Large (5,000-24,999)	99.6	1,590	354	99.7	1,533	342	97.9	1,554	345	86.4	796	186	91.7	1,623	362
Very large (25,000+)	97.5	273	162	99.1	263	157	95.3	280	166	83.7	208	122	84.3	281	167
Urbanicity <sup>3</sup>															
City	99.1	1,240	229	99.4	913	208	98.8	906	211	90.4	532	128	96.1	1,597	252
Suburban	97.9	2,450	351	99.3	2,056	322	98.8	2,191	329	89.2	936	159	94.1	2,848	377
Town	99.5	2,404	247	100.0	2,174	231	99.0	2,303	238	90.0	1,101	105	94.8	2,773	264
Rural	99.5	6,401	454	99.7	4,267	336	99.0	5,427	404	96.5	2,000	155	98.4	7,316	496
Poverty level <sup>4</sup>															
Low (0-29% F/RP)	98.3	2,818	310	98.7	2,229	279	97.9	2,569	303	94.4	819	104	96.5	3,381	346
Medium (30%-59% F/RP)	100.0	6,104	609	100.0	4,690	522	99.9	5,424	565	91.6	2,368	272	97.0	6,786	645
High (60% or more F/RP)	98.3	3,574	362	99.9	2,491	296	98.1	2,835	314	93.6	1,382	171	96.0	4,366	398

# Table III-1.Percentage of SFAs with All Schools within each Grade Level Participating in the NSLP by SFA Characteristics, SY<br/>2011-12

<sup>1</sup> n is less than 1,401 because not all SFAs have each type of school, and 12 SFAs provided implausible school count data.

<sup>2</sup> Percentage of SFAs with schools participating in the NSLP for high, other, and all schools differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs with schools participating in the NSLP for other and all schools differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs with schools participating in the NSLP for elementary and middle schools differed significantly by poverty level at the .05 level. Data Source: SFA Director Survey 2011, question 2.1.

				Percentag	e of SFA	s with all	schools wi	thin each	n grade le	vel particip	oating ir	the SBP			
	Ele	ementai	r <b>y</b>	ľ	Middle			High			Other			All Schoo	ols
	Percent	Wgtd	Unwgtd	Percent	Wgtd	Unwgtd	Percent	Wgted	Unwgtd	Percent	Wgtd	Unwgtd	Percent	Wgtd	Unwgtd
SFA characteristics	of SFAs	n	n	of SFAs	n	n	of SFAs	n	n	of SFAs	n	n	of SFAs	n	n
All SFAs	85.9%	12,495	1,281	88.2%	9,410	1,097	88.1%	10,828	1,182	77.8%	4,569	547	78.8%	14,533	1,389 <sup>1</sup>
SFA size <sup>2</sup>															
Small (1-999)	84.9	5,518	256	87.3	3,179	148	86.5	4,205	195	80.3	2,040	90	80.4	7,269	328
Medium (1,000-4,999)	87.0	5,115	509	87.5	4,435	450	89.1	4,790	476	77.5	1,525	149	79.0	5,360	532
Large (5,000-24,999)	86.4	1,590	354	91.5	1,533	342	90.4	1,554	345	71.7	796	186	73.4	1,623	362
Very large (25,000+)	80.0	273	162	91.7	263	157	83.7	280	166	74.3	208	122	64.7	281	167
Urbanicity <sup>3</sup>															
City	84.5	1,240	229	92.6	913	208	90.6	906	211	83.4	532	128	80.6	1,597	252
Suburban	69.9	2,450	351	79.3	2,056	322	82.6	2,191	329	63.8	936	159	61.2	2,848	377
Town	93.8	2,404	247	93.0	2,174	231	91.7	2,303	238	73.6	1,101	105	81.1	2,773	264
Rural	89.3	6,401	454	89.2	4,267	336	88.5	5,427	404	84.8	2,000	155	84.4	7,316	496
Poverty level <sup>4</sup>															
Low (0-29% F/RP)	64.2	2,818	310	67.6	2,229	279	73.1	2,569	303	59.8	819	104	54.0	3,381	346
Medium (30%-59% F/RP)	91.8	6,104	609	93.9	4,690	522	92.0	5,424	565	74.4	2,368	272	83.5	6,786	645
High (60% or more F/RP)	92.8	3,574	362	95.9	2,491	296	94.4	2,835	314	93.7	1,382	171	90.8	4,366	398

# Table III-2.Percentage of SFAs with All Schools within each Grade Level Participating in the SBP by SFA Characteristics, SY<br/>2011-12

<sup>1</sup> n is less than 1,401 because not all SFAs have each type of school, and 12 SFAs provided implausible school count data.

<sup>2</sup> Percentage of SFAs with schools participating in the SBP for all schools differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs with schools participating in the SBP for elementary, middle, other, and all schools differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs with schools participating in the SBP for elementary, middle, high, other, and all schools differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 2.1.

### **Severe-Need Schools**

Schools with a high percentage of low-income students may qualify as "severe need" and receive higher reimbursements for the F/RP breakfasts served in their schools. To apply for severe-need reimbursement, a school must currently be participating in or initiating the SBP, and at least 40 percent of the lunches served 2 years before the school's application must have been counted as F/RP meals.

Table III-3 shows that among the SFAs that participated in the SBP during SY 2011-12, a total of 73 percent reported that one or more of their schools received SBP severe-need reimbursement. Not surprisingly, the percentage of SFAs that reported the presence of severe-need eligible schools was higher among the high-poverty SFAs compared with the more affluent SFAs (90 percent versus 40 percent). Although high-poverty SFAs participating in the SBP should have schools that are eligible for severe-need reimbursement, it is possible that some SFAs may not apply for the additional reimbursement, which would explain the reported 90 percent participation rate. Among the large and very large SFAs, 87 to 100 percent of the SFAs had at least one school eligible for severe-need eligible schools were most likely to be located in cities and towns (87 percent and 82 percent, respectively) and less likely to be found in suburban and rural areas (70 percent and 68 percent, respectively).

		Tota	l SFAs
SFA characteristics	Percentage of SFAs	Weighted n	Unweighted n
All SFAs	73.2%	13,227	1,315 <sup>1</sup>
SFA size			
Small (1-999)	69.4	6,292	286
Medium (1,000-4,999)	72.1	5,047	501
Large (5,000-24,999)	86.6	1,603	359
Very large (25,000+)	100.0	284	169
Urbanicity <sup>2</sup>			
City	87.4	1,482	250
Suburban	70.4	2,454	347
Town	81.5	2,637	256
Rural	67.7	6,654	462
Poverty level <sup>2</sup>			
Low (0-29% F/RP)	40.0	2,647	297
Medium (30%-59% F/RP)	75.7	6,339	624
High (60% or more F/RP)	90.2	4,241	394

# Table III-3.Among SFAs that Participate in the SBP, Percentage of SFAs with Schools that<br/>Received SBP Severe-Need Reimbursement by SFA Characteristics, SY 2011-12

 $^{1}n$  equals the 1,315 SFAs that had any of their schools participating in the SBP.

<sup>2</sup> Percentage of SFAs with schools eligible for SBP severe-need reimbursement differed significantly by urbanicity and poverty level at the .05 level. Because all very large SFAs had schools eligible for SBP severe-need reimbursement, a significance test for SFA size was not conducted. Data Source: SFA Director Survey 2011, question 2.2.

### **Prekindergarten Programs**

Some school districts offer comprehensive programs for 3-year-olds (preschool) and 4-yearolds (pre-K) that provide stimulating activities and learning experiences to help prepare children for success in kindergarten and beyond. Depending on the type of pre-K program, school meals may or may not be provided. For example, children enrolled in a federally funded Head Start program or a comparable state-funded Head Start program or pre-K program are automatically eligible for free meal benefits.

Although approximately 70 percent (not shown) of SFAs had a pre-K program, only 56 percent of SFAs had pre-K programs that provided school meals to students, as shown in Table III-4.<sup>13</sup> Looking at SFAs by size of enrollment, 95 percent of very large SFAs and 71 percent of large SFAs provided meals to students in pre-K programs, compared with 60 percent of medium SFAs and 49 percent of small SFAs. High-poverty SFAs were more than twice as likely as low-poverty SFAs to provide school meals to pre-K students within the district (65 percent versus 31 percent).

## Table III-4.Percentage of SFAs with Pre-K Programs that Provide Access to School Meals,<br/>SY 2011-12

	Percentage of SFAs with pre-K programs that	Total S	SFAs
SFA characteristics	provide access to school meals	Weighted <i>n</i>	Unweighted n
All SFAs	56.0%	14,383	1,371 <sup>1</sup>
SFA size <sup>2</sup>			
Small (1-999)	48.6	7,301	329
Medium (1,000-4,999)	59.7	5,228	522
Large (5,000-24,999)	71.0	1,569	351
Very large (25,000+)	94.5	284	169
Urbanicity <sup>2</sup>			
City	44.7	1,570	249
Suburban	46.2	2,832	372
Town	58.9	2,708	257
Rural	61.2	7,272	493
Poverty level <sup>2</sup>			
Low (0-29% F/RP)	30.6	3,276	333
Medium (30%-59% F/RP)	62.7	6,765	641
High (60% or more F/RP)	64.7	4,342	397

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs with pre-K programs that provide access to school meals differed significantly by SFA size, urbanicity, and poverty level at the .05 level.

Data Source: SFA Director Survey 2011, questions 1.2 and 1.3.

<sup>&</sup>lt;sup>13</sup> The survey asked only if meals were provided. It did not include a specific question about Head Start.

## Student Participation in the NSLP and the SBP

The proportions of students certified for free, reduced-price, and paid meals are vital statistics for the school meals programs, as these counts affect reimbursements. Estimates of these statistics for SY 2011-12 were based on the number of students reported by SFAs as approved for F/RP meals and the total number of students reported as enrolled in the school.<sup>14</sup>

Eligibility to participate in the NSLP and the SBP is based on the combination of household size and income. Students living in families earning at or below 130 percent of poverty qualify for free meals. In addition, students are categorically eligible for free school meals if: (1) they or any member of the household receives benefits from certain assistance programs (e.g., Supplemental Nutrition Assistance Program, Temporary Assistance for Needy Families, or the Food Distribution Program on Indian Reservation); (2) they are living in families designated as homeless, migrant, runaway, or foster; or (3) they are enrolled in a federally funded or comparable state-funded Head Start program or pre-K program or an Even Start program. Students living in families with incomes between 131 percent and 185 percent of poverty qualify for reduced-price meals.

As shown in Table III-5, SFA directors reported that over half of students were approved for either F/RP meals during SY 2011-12 (51 percent in total or 44 and 7 percent, respectively). Forty-four percent of students in all schools (49 percent of students in elementary schools, 43 percent in middle schools, 37 percent in high schools, and 42 percent in other schools) were approved to receive free meals during SY 2011-12. Also, SFAs reported that the percentage of students approved to receive reduced-price meals was much smaller than the percentage approved for free meals. Overall, SFAs reported that 7 percent of students were approved for reduced-price meals. This percentage was fairly consistent across school type.

## Table III-5.Percentage of Students Approved for Free or Reduced-Price Meals and<br/>Percentage of Students without Access to the SBP and NSLP, SY 2011-12

		Perce	entage of stude	nts	
Student group	Elementary	Middle	High	Other	Total
Approved to receive free meals	48.8%	42.6%	36.9%	41.5%	43.9%
Approved to receive reduced-price meals	7.0	7.5	6.7	6.9	7.0
Students without access to the SBP	7.2	6.5	5.7	14.5	6.9
Students without access to the NSLP	2.1	1.7	2.5	5.7	2.3
Total student enrollment: Weighted n	23,049,561	9,106,558	13,786,311	2,132,498	48,074,928
Total SFAs: Weighted <i>n</i> <sup>1</sup>	12,269	9,158	10,488	4,450	14,281

<sup>1</sup>*n* is less than 14,678 weighted (1,401 unweighted) because not all SFAs have each type of school and item non-response. Data Source: SFA Director Survey 2011, question 3.1.

<sup>&</sup>lt;sup>14</sup> Year 1 data were collected on total enrollment and numbers of students approved for F/RP meals. In Year 2, data will be collected on the number of meals claimed for reimbursement by income-eligibility status of students.

While access to school meals in public schools was high, it was not universal: 7 percent of students did not have access to the SBP, and 2 percent did not have access to the NSLP during SY 2011-12. Students did not have access to the programs either because their school did not participate or they were attending half-day kindergarten and did not eat meals at school. Students enrolled in schools with nontraditional grade spans ("Other" schools) were least likely to have access to the SBP (15 percent were without access) and the NSLP (6 percent were without access) compared with elementary, middle, and high schools.

More than half of the students enrolled in public-school SFAs are approved for either F/RP meals. Specifically, free meals are intended for students at the lowest income levels. Table III-6 shows that a higher percentage of students in very large SFAs as compared to small ones were approved for free meals (50 percent versus 42 percent). Similarly, a higher percentages of students in city areas than in suburban areas were approved for free meals (54 percent versus 35 percent). In contrast to free meals, smaller SFAs and those located in rural areas or towns reported relatively higher percentage of students approved to receive reduced-price meals.

## **SFA Participation in Other Programs**

SFA Directors were also asked about their participation in other FNS-administered programs or initiatives that complement the NSLP and the SBP. These include extending meal service beyond lunch and breakfast (NSLP Afterschool Snack Program and the CACFP At-Risk Afterschool Snack or Supper program), offering meal service in the summer (SFSP), providing access to fruits and vegetables during the school day (DoD Fresh Program, FFVP, and farm to school activities), and creating healthier school environments (HUSCC). A short description of each of these programs or initiatives is provided here.

*Afterschool Snacks:* The NSLP offers cash reimbursement to help schools serve snacks to students in afterschool activities aimed at promoting the health and well-being of children and youth. To be eligible, a school must provide students with regularly scheduled afterschool activities in an organized, structured, and supervised environment, including educational or enrichment activities.

*The Child and Adult Care Food Program:* Schools that sponsor community-based programs that offer enrichment activities for at-risk children and youth, age 18 years and under, after the regular school day ends, can provide free meals and snacks through CACFP. Programs must be offered in areas where at least 50 percent of the children are eligible for F/RP meals based on the local school attendance area.

*Summer Food Service Program:* The SFSP was established to ensure that low-income children continue to receive nutritious meals when school is not in session. Free meals that meet Federal nutrition guidelines are provided to all children at approved SFSP sites in areas with significant concentrations of low-income children. The Seamless Summer Option has similar goals and is streamlined for SFAs participating in the NSLP or the SBP.<sup>15</sup>

<sup>&</sup>lt;sup>15</sup> <u>http://www.fns.usda.gov/cnd/seamless\_summer.htm</u>.

							Percer	ntage of stu	dents						
	E	lementary			Middle			High			Other			All schools	
SFA characteristics	Percent of students	Wgtd students (millions)	Wgtd SFAs <sup>1</sup>	Percent of students	Wgtd students (millions)	· · ·	Percent of students	Wgtd students (millions)	Wgtd SFAs <sup>1</sup>	Percent of students	Wgtd students (millions)	Wgtd SFAs <sup>1</sup>	Percent of students	Wgtd students (millions)	Wgtd SFAs <sup>2</sup>
						Fre	e meals								
All SFAs	48.8%	23.0	12,269	42.6%	9.1	9,158	36.9%	13.8	10,488	41.5%	2.1	4,450	43.9%	48.1	14,281
SFA size															
Small (1-999)	46.1	1.6	5,472	36.3	0.4	3,026	36.6	0.9	4,024	44.0	0.5	2,022	42.1	3.3	7,207
Medium (1,000-4,999)	43.3	5.5	5,021	37.4	2.5	4,415	31.3	3.6	4,710	39.4	0.5	1,474	38.4	12.0	5,257
Large (5,000-24,999)	46.8	7.6	1,512	40.3	3.1	1,461	34.6	4.5	1,484	44.1	0.5	754	41.9	15.7	1,545
Very large (25,000+)	54.6	8.4	264	49.6	3.1	256	43.3	4.8	270	39.4	0.7	200	50.0	17.0	272
Urbanicity															
City	58.3	8.1	1,230	53.1	2.8	855	47.8	4.3	890	47.5	0.8	541	54.1	16.0	1,614
Suburban	39.2	8.0	2,405	34.0	3.5	2,025	28.6	5.1	2,125	33.4	0.5	876	34.8	17.1	2,791
Town	52.0	2.7	2,356	45.4	1.2	2,137	37.5	1.7	2,262	40.8	0.3	1,102	45.9	6.0	2,724
Rural	46.2	4.2	6,278	40.6	1.6	4,141	35.0	2.6	5,210	41.1	0.6	1,930	41.6	9.0	7,151
	I					Reduce	d-price mea	s							
All SFAs	7.0%	23.0	12,269	7.5%	9.1	9,158	6.7%	13.8	10,488	6.9%	2.1	4,450	7.0%	48.1	14,281
SFA size															
Small (1-999)	9.1	1.6	5,472	9.4	0.4	3,026	8.8	0.9	4,024	8.5	0.5	2,022	9.0	3.3	7,207
Medium (1,000-4,999)	7.3	5.5	5,021	7.7	2.5	4,415	6.9	3.6	4,710	7.9	0.5	1,474	7.3	12.0	5,257
Large (5,000-24,999)	7.2	7.6	1,512	7.7	3.1	1,461	6.5	4.5	1,484	7.4	0.5	754	7.1	15.7	1,545
Very large (25,000+)	6.2	8.4	264	6.9	3.1	256	6.3	4.8	270	4.6	0.7	200	6.3	17.0	272
Urbanicity															
City	6.4	8.1	1,230	7.3	2.8	855	6.5	4.3	890	5.3	0.8	541	6.5	16.0	1,614
Suburban	6.6	8.0	2,405	6.9	3.5	2,025	6.0	5.1	2,125	5.5	0.5	876	6.5	17.1	2,791
Town	8.1	2.7	2,356	8.7	1.2	2,137	7.7	1.7	2,262	7.6	0.3	1,102	8.1	6.0	2,724
Rural	8.0	4.2	6,278	8.2	1.6	4,141	7.7	2.6	5,210	9.9	0.6	1,930	8.1	9.0	7,151

# Table III-6.Percentage of Students, in Each Grade Level, Approved to Receive Free Meals and Reduced-Price Meals by SFA<br/>Characteristics, SY 2011-12

Percentages were calculated by summing the number of students approved for F/RP meals across all SFAs and dividing by the number of students served by each SFA. Table does not show the relationship between the percentage of students approved for F/RP meals and SFA poverty level because the SFA poverty level variable, itself, is based on the percentage of students approved for F/RP meals.

n is less than 14,678 because not all SFAs have each type of school and item non-response.

 $^{2}n$  is less than 14,678 due to item non-response.

38

Data Source: SFA Director Survey 2011, question 3.1.

*DoD Fresh Fruit and Vegetable Program*: The DoD Fresh Program allows schools to use USDA Foods entitlement dollars to buy fresh produce. The program is available to all schools and operated by the Defense Logistics Agency at DoD.

*USDA Fresh Fruit and Vegetable Program:* The FFVP reimburses selected elementary schools with high rates of F/RP meal enrollment for providing fresh fruits and vegetables to students during the school day outside of normal school breakfast and lunch meals. The goal of the FFVP is to improve students' overall diet and create healthier eating habits.<sup>16</sup>

*Farm to School:* The USDA Farm to School Program is operated by FNS through its seven regional offices around the country; in each is a farm to school regional lead who is available to provide farm to school-related support to state agencies and other entities in that region. USDA awards up to \$5 million in grants to help schools connect with local producers and teach students where their food comes from. Funds support activities ranging from training, planning, and developing partnerships, to purchasing equipment, planting school gardens, and organizing field trips.

*HealthierUS Schools*. Established in 2004, HUSSC is a voluntary certification initiative recognizing those schools enrolled in Team Nutrition and participating in the NSLP that have created healthier school environments through promotion of nutrition and physical activity. The certification initiative includes four award levels—Bronze, Silver, Gold, and Gold Award of Distinction. In 2010, as part of the Let's Move initiative, First Lady Michelle Obama called on stakeholders to double the number of HUSSC schools and to continue to add 1,000 schools per year for 2 years after that. When the data for the study were collected in SY 2011-12, an estimated 4,030 schools had received certification. As of March 2013, USDA reported that 5,524 schools in 49 states and the District of Columbia have received certification.<sup>17</sup>

SFAs and their schools may simultaneously participate in several FNS nutrition programs. Table III-7 indicates that 35 percent of SFAs have at least one school that took part in the FFVP (which is only available to elementary schools); 32 percent of SFAs have at least one school that participated in the NSLP Afterschool Snack Program; 30 percent of SFAs participate in the SFSP; and 26 percent of SFAs participate in DoD Fresh. DoD Fresh and FFVP both target increasing the quantities of fresh fruits and vegetables in students' diets. About 45 percent (not shown) of SFAs had schools participating in at least one of these programs. Because the CACFP At-Risk Afterschool Snack or Supper Program was only available in a limited number of states before the enactment of the HHFKA, it is not surprising that only 4 percent of SFAs reported participating in the program when the survey data were collected.

<sup>&</sup>lt;sup>16</sup> In March 2013 FNS released an evaluation of the Fresh Fruit and Vegetable Program: <u>http://www.fns.usda.gov/Ora/menu/Published/CNP/cnp.htm</u>.

<sup>&</sup>lt;sup>17</sup> http://www.fns.usda.gov/hussc, accessed April 26, 2013. Beginning in 2010, monetary incentives were available for HUSSC schools as follows: \$2,000, Gold Award of Distinction; \$1,500, Gold; \$1,000, Silver; and \$500, Bronze.

# Table III-7.Percentage of SFAs with One or More Schools Participating in Other Nutrition<br/>Programs, SY 2011-12

Program	Percentage of SFAs
USDA FFVP	34.7%
NSLP Afterschool Snack Program	31.9
SFSP	30.0
DoD Fresh	26.0
CACFP At-Risk Afterschool Snack or Supper Program	4.4
Total SFAs: Weighted n	14,544
Total SFAs: Unweighted n	1,392 <sup>1</sup>

<sup>1</sup>*n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 11.1 and 11.2.

## **Special Initiatives to Improve Nutrition and the School Environment**

Because this is an SFA-focused study, questions about the USDA FFVP were limited to whether or not SFAs had participating schools. However, given increasing interest in promoting fruits and vegetables, improving the school environment, and promoting more local/regional foods, the survey requested additional information on satisfaction with DoD Fresh, participation in farm to school activities, and level of recognition in the HUSSC.

### **DoD Fresh**

Although the DoD Fresh Program was widely available, only about one-quarter of SFAs reported participating in it during SY 2011-12. Among SFAs participating in the program, more than 91 percent were satisfied or very satisfied with major aspects of the program as shown in Table III-8. Among the small group of SFA directors who commented on other aspects of the program, 83 percent were dissatisfied or very dissatisfied. The most common "other" responses given by SFA directors focused on the quality and freshness of the items (48 percent, not shown), the variety of items offered (26 percent, not shown), and the availability of items (10 percent, not shown). Additionally, respondents who were dissatisfied with any aspect of DoD Fresh were asked to expand on the reasons. Common reasons included the level of difficulty of the online ordering system, the high price of produce, and concerns that the produce was not fresh, took too long to ship, or arrived spoiled.

# Table III-8.Among DoD Fresh Program Participants, the Percentage of SFAs Satisfied with<br/>the Program, SY 2011-12

	Among SFAs	that participate i SF	percentage of	Total SFAs		
Aspects of the program	Very satisfied	Satisfied	Dissatisfied	Very dissatisfied	Weighted n	Unweighted n <sup>1</sup>
Price for fruits and vegetables	35.2 %	56.0%	6.7%	2.1%	3,661	456
Online ordering	41.5	50.3	6.6	1.6	3,488	436
Overall customer service	41.5	52.7	3.6	2.1	3,624	451
Other <sup>2</sup>	10.8	6.5	52.3	30.5	360	55

<sup>1</sup> *n* is less than the 470 SFAs that participated in the DoD Fresh Program due to item non-response.

<sup>2</sup> Other responses included: quality and freshness, variety of items offered, availability of items, ability to adjust orders or return items, timing of ordering, and delivery issues.

Data Source: SFA Director Survey 2011, question 11.3.

As shown in Table III-9, among DoD Fresh participants, the percentage of SFAs satisfied with the price for fruits and vegetables varied by SFA characteristics. Virtually all small SFAs (98 percent) were satisfied, but only 76 percent of very large SFAs were satisfied. Similarly, as SFA size and urbanicity are closely related (larger SFAs tend to be urban or suburban), these differences in satisfaction with price may reflect the fact that larger, urban, and suburban SFAs may be used to lower prices due to their volume purchasing, making the DoD Fresh Program relatively less attractive. Ninety-five percent of SFAs were satisfied with the price for fruits and vegetables in rural areas, but only 84 percent of SFAs in a city reported satisfaction. In terms of online ordering, there were no significant differences in satisfaction by SFA characteristics, with satisfaction ranging from 87 to 97 percent. Similarly, SFAs report high satisfaction with overall customer service, with 94 percent satisfied and no significant difference by SFA characteristics.

### **Farm to School Activities**

Farm to school activities can be varied, ranging from culinary classes to visits to farms. Farm to school activities generally center around procurement of local or regional foods and food, 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 (snacks, taste tests, educational tools);
- Conducting educational activities related to local foods such as farmers in the classroom and culinary education focused on local foods; field trips to farms, farmers' markets, or food processing facilities; and educational sessions for parents and community members; and
- Creating and tending school gardens (growing edible fruits and vegetables).

# Table III-9.Among DoD Fresh Program Participants, the Percentage of SFAs Satisfied with Various Aspects of Program by SFA<br/>Characteristics<sup>1</sup>, SY 2011-12

	Prices of	fruits & vege	tables	Or	nline ordering		Overall	customer serv	/ice
		Tota	al SFAs		Tota	al SFAs		Tota	l SFAs
	Percentage of	Weighted	Unweighted	Percentage of	Weighted	Unweighted	Percentage of	Weighted	Unweighted
SFA characteristics	SFAs	n	n	SFAs	n	n	SFAs	n	n
All SFAs	91.1%	3,661	456 <sup>1</sup>	91.8%	3,488	436 <sup>1</sup>	94.2%	3,624	451 <sup>1</sup>
SFA size <sup>2</sup>									
Small (1-999)	98.0	1,128	53	87.5	1,100	52	98.0	1,128	53
Medium (1,000-4,999)	88.9	1,711	176	94.7	1,596	165	93.4	1,682	173
Large (5,000-24,999)	88.1	705	157	91.8	680	152	90.5	696	155
Very large (25,000+)	76.1	118	70	90.9	112	67	90.6	118	70
Urbanicity <sup>3</sup>									
City	84.4	464	105	91.9	467	103	89.1	475	106
Suburban	94.0	813	129	96.2	768	122	92.9	814	128
Town	85.8	920	93	93.5	833	86	96.1	893	90
Rural	95.1	1,464	129	88.3	1,420	125	95.4	1,442	127
Poverty level									
Low (0-29% F/RP)	89.6	763	108	97.4	730	104	93.8	758	107
Medium (30%-59% F/RP)	92.2	1,745	209	92.6	1,645	199	95.0	1,711	205
High (60% or more F/RP)	90.6	1,154	139	86.9	1,122	133	93.3	1,154	139

<sup>1</sup> *n* is less than the 470 SFAs that participate in the DOD Fresh Program due to item non-response.

<sup>2</sup> Percentage of SFAs satisfied with the prices of fruits and vegetables differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs satisfied with the prices of fruits and vegetables differed significantly by urbanicity at the .05 level.

Data Source: SFA Director Survey 2011, question 11.3.

As shown in Table III-10, about 20 percent of SFA directors reported that their districts were involved in some form of farm to school activities. However, 51 percent (not shown) of SFAs reported giving preference to purchasing locally sourced unprocessed foods for school meals programs at least "some of the time" in SY 2011-12, suggesting that many SFA directors excluded this activity when reporting their districts' involvement in farm to school activities. SFA participation in farm to school activities varies with SFA size, urbanicity, and poverty level. Although 45 percent of very large SFAs are involved with farm to school, only 14 percent of small SFAs are involved. Suburban SFAs participate about twice as often as city or town SFAs (31 percent versus 15 and 17 percent, respectively). Only 19 percent of SFAs in rural areas reported participation in the program. Low-poverty SFAs were more than twice as likely to participate as high-poverty SFAs (29 versus 14 percent).

		Tota	l SFAs
SFA characteristics	Percentage of SFAs	Weighted n	Unweighted <i>n</i>
All SFAs	20.4% <sup>1</sup>	14,530	1,391 <sup>2</sup>
SFA size <sup>3</sup>			
Small (1-999)	13.7	7,283	328
Medium (1,000-4,999)	24.9	5,338	531
Large (5,000-24,999)	31.8	1,625	363
Very large (25,000+)	44.7	284	169
Urbanicity <sup>3</sup>			
City	14.9	1,599	254
Suburban	31.1	2,855	378
Town	16.7	2,763	263
Rural	18.9	7,312	496
Poverty level <sup>3</sup>			
Low (0-29% F/RP)	28.6	3,371	345
Medium (30-59% F/RP)	20.7	6,761	645
High (60% or more F/RP)	13.8	4,398	401

# Table III-10.Percentage of SFAs that Participate in the Farm to School Activities by SFA<br/>Characteristics, SY 2011-12

<sup>1</sup> Although only 20 percent of SFAs said they participated in farm to school activities, 51 percent of SFA directors indicated that they gave geographic preference to locally grown food, which is typically considered a farm to school activity.

<sup>2</sup> *n* is less than 1,401 due to item non-response.

<sup>3</sup> Percentage of SFAs participating in farm to school activities differed significantly by SFA size, urbanicity, and poverty level at the .05 level. Data Source: SFA Director Survey 2011, question 11.5.

SFA directors who reported participating in farm to school activities were asked to indicate which activities (aside from buying locally sourced foods) their schools participated in during SY 2011-12. Table III-11 shows that with 80 percent of SFAs participating, taste testing was the most commonly reported activity. Nutrition education at school was a very close second at 79 percent. Almost half of the SFAs reported having agriculture-related lessons and curriculum (47 percent) and school or community gardens (45 percent). Over a third of SFAs (37 percent) reported participation in farm tours. Parent and community educational lessons were less common activities (28 percent and 19 percent, respectively).

# Table III-11.Among Farm to School Participants, the Percentage of SFAs that Participate in<br/>Various Specific Activities, SY 2011-121

Farm to school activity	Percentage of SFAs		
Taste testing	80.0%		
Nutrition education at school	78.8		
Agriculture-related lessons and curriculum	47.0		
School or community gardens	44.8		
Farm tours	36.9		
Parent educational lessons	28.0		
Community educational lessons	19.3		
Total SFAs: Weighted n	2,971		
Total SFAs: Unweighted n	366 <sup>2</sup>		

<sup>1</sup> In the list of farm to school activities, the questionnaire did not include giving preference to locally grown foods but rather asked about these procurement preferences separately in questions 10.1 to 10.4. Fifty-one percent of SFAs reported giving preference to locally grown, raised, or produced foods.

 $^{2}$  n equals the 366 SFAs that reported participating in farm to school activities.

Data Source: SFA Director Survey 2011, question 11.6.

While the intent of the nutrition education category was to distinguish between activities inside and outside of school, given the varied definitions and interpretations of nutrition education, it is likely that many directors selected this as a broad category and also selected other specific activities as part of their overall education efforts. Table III-12 indicates that this was likely the case given the high degree of overlap between nutrition education and other activities.

# Table III-12.Among SFAs Providing Nutrition Education, the Percentage of SFAs that TookPart in Other Farm to School Activities, SY 2011-12

Farm to school activities	Among SFAs providing nutrition education, the percentage of SFAs that took part in other farm to school activities				
Agricultural related lessons and curriculum	56.8%				
School or community gardens	47.4				
Farm tours	44.2				
Taste testing	87.9				
Parent educational lessons	33.1				
Community educational lessons	23.5				
Total SFAs: Weighted n	2,340				
Total SFAs: Unweighted n	292 <sup>1</sup>				

<sup>1</sup>*n* equals the 292 SFAs that reported providing nutrition education. Data Source: SFA Director Survey 2011, question 11.6.

## HealthierUS Schools Challenge

Table III-13 shows the percentage of SFAs with schools that received the HUSSC recognition in SY 2011-12 by level of award received. Over the past several years, there have been a number of changes to the HUSSC certification criteria to reflect the importance of the SBP as well as program and policy changes resulting from passage of the HHFKA. The data in this report reflect

recognitions before the new criteria for applications submitted to state agencies went into effect.<sup>18</sup> Approximately 6 percent of SFAs indicated that they had one or more schools that received one of the four award levels. Very large SFAs received the most awards, but the percentage of SFAs receiving awards is small for all other subgroups.

	Percentage of SFAs with schools recognized with:				with:	Total SFAs	
SFA characteristics	Gold award of distinction	Gold	Silver	Bronze	Any award <sup>1</sup>	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs	1.3%	1.2%	1.3%	2.8%	5.6%	14,678	1,401
SFA size <sup>1</sup> Small (1-999) Medium (1,000-4,999) Large (5,000-24,999) Very large (25,000+) Urbanicity <sup>2</sup> City Suburban Town	0.9 1.6 1.9 4.4 2.6 2.1 1.3 0.8	0.4 1.8 1.7 6.7 2.8 2.0 1.7 0.3	0.3 1.6 3.6 8.9 2.0 2.2 1.6 0.7	1.5 4.1 3.4 11.1 3.7 4.3 2.1 2.4	2.8 7.9 7.5 21.2 9.3 7.8 6.2 3.6	7,374 5,390 1,629 284 1,630 2,885 2,794 7,369	332 536 364 169 256 380 266 499
Rural <b>Poverty level<sup>3</sup></b> Low (0-29% F/RP) Medium (30%-59% F/RP) High (60% or more F/RP)	3.0 0.6 1.3	0.5 0.8 2.2	1.0 1.4 1.4	3.3 2.8 2.5	6.5 4.9 5.9	3,407 6,828 4,443	348 650 403

# Table III-13.Percentage of SFAs Recognized as a HealthierUS School by SFA Characteristics,<br/>SY 2011-12

<sup>1</sup>Percentage of SFAs with schools recognized with gold, silver, bronze, or any award differed significantly by SFA size at the .05 level.

<sup>2</sup> Percentage of SFAs with schools recognized with gold or any award differed significantly by urbanicity at the .05 level.

<sup>3</sup> Percentage of SFAs with schools recognized with the gold award of distinction or gold differed significantly by poverty level at the .05 level. Data Source: SFA Director Survey 2011, question 11.7.

All SFAs were asked to list the challenges their schools faced in trying to obtain HUSSC certification. A total of 11,005 (weighted) SFA directors responded to this question (not shown). Although the responses were diverse, the most frequent types of challenges reported involved finances and budget. SFA directors frequently cited the cost of food and labor and budgetary constraints as challenges in achieving HUSSC certification. They also reported that they did not have the time or staff to complete the required paperwork. Other challenges included getting students to eat healthier foods, obtaining the support of parents, and meeting requirements for whole grains, beans, or sodium. Some SFAs mentioned that the program simply was not a priority.

<sup>&</sup>lt;sup>18</sup> The new criteria are summarized in an FNS FAQ: <u>http://www.fns.usda.gov/tn/HealthierUS/faq.pdf</u>, accessed April 26, 2013. Major changes include new breakfast criteria and updated lunch criteria, a new "other criteria for excellence" category, a change in how average daily participation is calculated, and modifications to nutrition education requirements and Local Wellness Policy criteria to be consistent with HHFKA.

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### **Section IV: SFA Operations**

Under the supervision of their states, SFAs operate their school-meal programs at the local level to provide nutritional meals to students at an affordable price. SFAs also process applications and certify students as being eligible for free or reduced-price lunches and maintain program data for reporting and reimbursement claims. How SFAs go about these activities likely affects the nutritional quality and appeal of the meals as well as production costs and efficiency.

At the most basic level, SFAs produce school meals through a production process that uses labor (staff), capital (kitchen facilities), and consumables (food). Many of the inputs in meal production are the result of long-term capital investments, such as kitchen equipment, and are essentially fixed in the short run and cannot be quickly changed. Also, an SFA's socio-economic characteristics (size, urbanicity, etc.) are likely to affect the feasibility of production options as well as staffing, facilities and equipment, and purchasing. Therefore, how SFAs operate in terms of the inputs and procedures they use to produce school meals will likely affect how quickly they can adapt to changes such as the new regulations stemming from the HHFKA. Exploring SFA operations provides insights into how SFAs are currently conducting business and how well aligned their operations are with the goals of the HHFKA. Ultimately, this can be informative for identifying potential transition issues.

This section examines the different attributes of SFA operations, including the variation in SFA staffing in terms of credentials and responsibilities, the use of alternative kitchen and meal service systems, food safety, food procurement, menu planning, and SFAs use of non-USDA meal alternatives. In addition to describing the variation of these attributes in SFAs across the country, this section also considers how they may affect school meal production.

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# IV-1. Staff Credentials and Responsibilities Background

Administering the school-meal programs and delivering high-quality meals on a consistent basis require a skill set covering a range of food service operation components. SFA directors are usually responsible for planning menus that meet or exceed nutritional requirements; procure, store, and prepare meals on a timely basis; oversee the administrative efforts to ensure that eligibility for free and reduced-price meals is determined correctly; and ensure the accuracy of the meal counts and submission of claims for reimbursement. Directors must also make certain that health and sanitation standards for storage, preparation, and service of food are maintained.

Section 306 of the HHFKA explicitly recognizes the importance of establishing professional standards for school food service personnel. The Act requires USDA to establish a program of required education, training, and certification for all school food service directors at SFAs. The components of this program were under development at the time of data collection. The findings below, therefore, constitute a baseline for future assessment of the impact of FNS professional standards requirements for SFA directors.

### **Research Questions**

This chapter describes the education and certification requirements for SFA directors and answers research questions listed below.

- What are the minimum educational and certification requirements for SFA directors?
- What are the education, certification, and work experience of current SFA directors?

### Results

#### **Experience and Tenure**

In general, SFA directors have a considerable amount of experience in the field of schoolfood service.<sup>19</sup> As seen in Table IV-1.1, summing across years of experience one can see that 89 percent of SFA directors had more than 5 years of food service experience; nearly half (47 percent) had more than 20 years of total experience. Similarly, 61 percent of SFA directors had been in their current position for over 5 years.

<sup>&</sup>lt;sup>19</sup> Total experience is calculated as years as SFA director (tenure) plus years of prior experience in food service.

# Table IV-1.1.Percentage of SFAs with Directors with Various Levels of Food Service and JobTenure Experience, SY 2011-12

	Percentage of SFA	Total SFAs				
Type of experience	Less than 5 years	5-10 years	11-20 years	Weighted <i>n</i>	Unweighted <i>n</i>	
In food service In SFA director position	11.4% 38.7	12.8% 24.0	28.4% 25.2	47.4% 12.1	14,098 14,284	1,367 <sup>1</sup> 1,380 <sup>1</sup>

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 14.1 and 14.2.

While total food service experience and tenure in the current position could make a difference in an SFA director's effectiveness, tenure more directly corresponds to a director's familiarity with his or her SFA and knowledge of how to accomplish improvements given the local environment. The mean number of years of tenure for SFA directors was 9.7 (not shown).<sup>20</sup> The mean number of years in food service, including tenure as an SFA director, was 21.8 (not shown). Table IV-1.2 reveals that about one-third (37 percent) of SFA directors were relatively new to their position at the time of the survey and had less than 5 years of tenure. Examination of tenure level by SFA characteristics reveals no significant differences.

	Percentage o	of SFAs with dire	ectors whose ter	ure in positions is:	Tota	al SFAs
SFA characteristics	Less than 5 years	5-10 years	11-20 years	More than 20 years	Weighted n	Unweighted <i>n</i>
All SFAs	36.5%	20.6%	27.8%	15.1%	14,284	1,380 <sup>1</sup>
SFA size						
Small (1-999)	39.2	23.9	26.4	10.5	7,053	319
Medium (1,000-4,999)	39.8	24.9	23.1	12.1	5,330	530
Large (5,000-24,999)	33.7	20.8	26.9	18.6	1,616	362
Very Large (25,000+)	33.3	26.8	25.4	14.6	284	169
Urbanicity						
City	42.7	23.6	26.5	7.2	1,543	252
Suburban	42.4	21.5	25.1	11.1	2,798	374
Town	38.0	22.6	22.8	16.5	2,760	264
Rural	36.7	25.6	25.9	11.8	7,183	490
Poverty level						
Low (0-29% F/RP)	40.9	19.4	25.7	14.0	3,266	339
Medium (30%-59% F/RP)	37.4	26.2	24.5	11.9	6,665	642
High (60% or more F/RP)	39.0	24.1	26.0	10.9	4,352	399

#### Table IV-1.2. Percentage of SFAs with Directors with Various Tenure Levels by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, question 14.2.

<sup>&</sup>lt;sup>20</sup> SNDA IV Table 2.21 reports that the mean number of years of tenure for SFA directors was 10.

#### **Education**

#### Level of Education Required for SFA Directors

The educational requirements for SFA directors are typically set by the LEA. Table IV-1.3 shows how the educational requirements for SFA directors vary by SFA characteristics. Approximately three-quarters (74 percent) of all SFAs do not require the director to have a bachelor's degree. About one-fifth (22 percent) of SFA directors reported that a bachelor's degree was required, and only a very small portion (5 percent) reported a graduate degree as a requirement.

The educational requirements for SFA directors appear to be associated with SFA size and urbanicity. Most small SFAs (88 percent) do not require a bachelor's degree as compared to only 13 percent of very large SFAs. Larger SFAs are much more likely to require a higher minimum level of education for SFA directors. Whereas 69 percent of very large SFAs required a bachelor's degree, less than 9 percent of small SFAs did. A graduate degree was required in 17 percent of very large SFAs, 8 percent of large SFAs, and 4 percent of medium and small SFAs. Not surprisingly, the same pattern holds when examining SFAs by urbanicity, where a minimum of a bachelor's degree is required in 43 percent of the SFAs located in cities but only 11 percent of SFAs located in rural areas.

		SFAs where distric FA director educa	t requirements for tion:	Total SFAs		
SFA characteristics	Require less than BA	Require BA	Require graduate degree	Weighted <i>n</i>	Unweighted <i>n</i>	
All SFAs	73.7%	21.6%	4.6%	14,013	1,365 <sup>1</sup>	
SFA size <sup>2</sup>						
Small (1-999)	87.8	8.7	3.5	6,855	311	
Medium (1,000-4,999)	69.4	26.2	4.4	5,257	523	
Large (5,000-24,999)	38.9	53.1	8.0	1,616	362	
Very Large (25,000+)	13.4	69.3	17.3	284	169	
Urbanicity <sup>2</sup>						
City	50.9	42.8	6.3	1,442	248	
Suburban	58.3	36.2	5.5	2,709	368	
Town	71.9	23.4	4.7	2,705	261	
Rural	84.9	11.2	4.0	7,157	488	
Poverty level <sup>2</sup>						
Low (0-29% F/RP)	71.8	26.2	1.9	3,272	338	
Medium (30%-59% F/RP)	77.8	18.0	4.2	6,531	634	
High (60% or more F/RP)	68.8	23.7	7.5	4,210	393	

#### Table IV-1.3. Percentage of SFAs with Differing Director Education Requirements by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs with various director education requirements differed significantly by SFA size, urbanicity, and poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 14.5.

#### **Education Level of Current SFA Directors**

Table IV-1.4 displays the educational degrees of SFA directors by SFA characteristics. More than three-quarters of SFA directors have some college education. Only 23 percent have a high school degree or less, another 25 percent have some college; 11 percent have an associate's degree; 24 percent have a bachelor's degree; and 17 percent have a graduate degree.<sup>21</sup> Overall, this is a relatively high level of education given that 74 percent of the districts do not require SFA directors to have a bachelor's degree. Directors who attained higher levels of education tend to be found at larger SFAs. Over 90 percent of directors at very large SFAs had a bachelor's or graduate degree, and over 70 percent of directors at large SFAs had at least a bachelor's degree, but only 30 percent of directors at small SFAs had attained a bachelor's or graduate degree. Although not as pronounced, the education level of the SFA directors also significantly varies with urbanicity and poverty level.

	Per	centage of S	FAs with dired	tors who hav	e:	Tota	l SFAs
SFA characteristics	High school degree or less	Some college	Associate's degree	Bachelor's degree	Graduate degree	Weighted <i>n</i>	Unweighted n
All SFAs	22.7%	25.2%	11.1%	24.0%	16.9%	14,417	1,385 <sup>1</sup>
SFA size <sup>2</sup>							
Small (1-999)	31.6	29.3	9.6	14.3	15.2	7,184	324
Medium (1,000-4,999)	17.7	23.7	14.1	29.7	14.8	5,332	530
Large (5,000-24,999)	3.6	16.2	9.3	44.7	26.2	1,616	362
Very large (25,000+)	1.4	3.6	3.6	44.2	47.3	284	169
Urbanicity <sup>2</sup>							
City	7.6	22.4	7.9	34.7	27.4	1,553	253
Suburban	9.0	19.9	12.1	37.9	21.1	2,845	375
Town	18.5	28.2	12.1	27.6	13.7	2,787	265
Rural	33.0	26.8	11.1	14.8	14.3	7,231	492
Poverty level <sup>2</sup>							
Low (0-29% F/RP)	16.7	22.5	16.3	32.0	12.6	3,280	339
Medium (30%-59% F/RP)	27.3	23.4	11.0	22.6	15.8	6,720	644
High (60% or more F/RP)	20.3	30.2	7.5	20.2	21.9	4,416	402

# Table IV-1.4. Percentage of SFAs with Directors with Different Levels of Education by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs with directors with varying levels of education differed significantly by SFA size, urbanicity, and poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 14.3.

<sup>&</sup>lt;sup>21</sup> These data were collected October 2011-March 2012 and are broadly similar but slightly higher than the corresponding data in SNDA IV Table 2.21, which were collected in January-June 2010. It is unlikely that the difference represents an increase in educational level among SFA directors. Rather, it is likely the result of sampling variation and the fact that the SFA sample sizes and designs of both studies are slightly different.

Table IV-1.5 shows the relationship between SFA director's education levels and their years of experience. In general, SFA directors with fewer than 11 years of experience had higher levels of education than those with more experience. For example, 39 percent of directors with fewer than 5 years total food service experience have graduate degrees compared to about 12 percent of directors with more than 20 years total food service experience. Similarly, over half (54 percent) of directors with 11 or more years of total experience have only a high school degree or less compared to a quarter (26 percent) of directors with less than 11 years of total experience. Looking to the future, it is likely that the education level of SFA directors will increase as incumbents retire and new directors are selected to replace them. This change in education levels over time is well aligned with the development of professional standards for SFA directors as required by the HHFKA.

## Table IV-1.5.Percentage of SFAs with Directors with Different Highest Level of Education by<br/>Total Years of Directors' Experience, SY 2011-12

	Percentage of	Percentage of SFA's with directors whose highest levels of education is:								
SFA director's total years of food service experience	High school degree or less	Some college	Associate's degree	Bachelor's degree	Graduate degree	Weighted <i>n</i>	Unweighted <i>n</i>			
All SFAs	22.7%	25.7%	11.1%	24.1%	16.4%	14,076	1,366 <sup>1</sup>			
Less than 5 years	10.8	17.4	5.3	28.0	38.5	1,613	115			
5-10 years	14.7	31.5	9.4	23.1	21.2	1,800	135			
11-20 years	32.0	25.4	8.8	20.4	13.5	3,997	367			
More than 20 years	22.1	26.3	14.4	25.7	11.5	6,666	749			

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 14.1, 14.2, and 14.3.

### **Certification and Responsibilities**

Section 306 of the HHFKA requires that FNS establish a program of required education, training, and certification for all school food service directors. FNS is expected to issue regulations implementing Section 306 by the end of 2013. The following is a description of the certifications required of and attained by SFA directors as of SY 2011-12. This information will provide a valuable point of comparison for similar data gathered after implementation of the professional standards regulations.

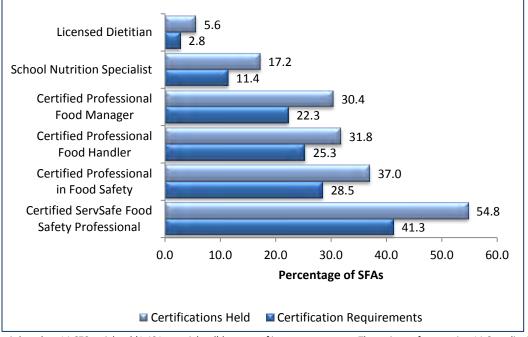
#### **Certification Requirements for SFA Directors**

Often SFA directors are required to have certifications in addition to their education requirements. The SFA Director Survey included questions on both the requirements and credentials of the SFA director. Respondents selected from a comprehensive list of credentials with the expectation that an individual may hold multiple certifications. The credentials included licensed

dietitian,<sup>22</sup> school nutrition specialist, certified professional food manager, certified professional in food safety, certified professional food handler, and certified ServSafe Food Safety professional.<sup>23</sup>

Figure IV-1.1 shows the percentage of SFAs with certification requirements as compared to the percentage of SFA directors holding these qualifications. The most commonly reported district requirement to be an SFA director was certification in ServSafe Food Safety; this was also the most commonly held credential among SFA directors. The least common requirement was licensed dietician (3 percent). However, nearly 6 percent of the SFA directors held this certification. Interestingly, about 42 percent (not shown) of the SFA directors indicated that their district did not have any of the listed certification requirements; about 14 percent (not shown) required the SFA director to be certified in all four areas (food manager, food safety, food handler, and ServSafe Food Safety) and about 15 percent (not shown) of the districts required the SFA directors did not have any of the listed certifications; 19 percent (not shown) were certified in all four areas (food manager, food safety, food handler, and ServSafe Food Safety), and about 20 percent (not shown) were only certified ServSafe Food Safety Professionals.

#### Figure IV-1.1. Percentage of SFA with Certification Requirements as Compared to the Percentage of SFA Directors Holding the Qualification, SY 2011-12



*n* is less than 14,678 weighted (1,401 unweighted) because of item non-response. The estimate for question 14.6 on district requirements is based on 14,250 weighted (1,376 unweighted) responses, and the estimates for question 14.7 on certifications held by current SFA directors is based on 14,267 total (1,378 unweighted). Multiple responses were allowed. Data Source: SFA Director Survey 2011, questions 14.6 and 14.7.

<sup>&</sup>lt;sup>22</sup> A licensed dietitian is a registered dietitian, but a registered dietitian may not be a licensed dietitian.

<sup>&</sup>lt;sup>23</sup> Training and certification for professional food handlers, food safety professionals, and professional food managers are provided by the National Registry of Food Safety Professionals, the National Environmental Health Association, and NSF International (formerly the National Sanitation Foundation). Training for ServSafe Food Safety is provided by the National Restaurant Association.

As Figure IV-1.1 shows, overall, a greater percentage of SFA directors held each certification relative to the percentage of SFAs requiring the certification. For example, about 3 percent of the districts required licensed dietitians but twice as many SFA directors were licensed. Similarly, while about 41 percent of districts required certification in ServSafe Food Safety, about 55 percent of SFA directors were certified.

Table IV-1.6 shows the district requirements for SFA director licensure and certification as compared to the actual qualifications of the SFA directors by SFA characteristics. Consistent with the overall findings, across all types of SFAs, more SFA directors held licenses and certifications than districts that required them. The table also reveals that requirements vary substantially by SFA characteristics. For example, larger SFAs tended to have higher training requirements with 12 percent of very large SFAs and 7 percent of large SFAs requiring that SFA directors be licensed dietitians compared to 2 percent of small SFAs. It appears that the requirements to be a licensed dietitian or school nutrition specialist often take the place of some other food handling certifications, and a smaller percentage of the larger SFAs require their directors to be food managers/handlers or certified in professional food safety, as compared to smaller SFAs. However, it is not surprising that SFA directors of large and very large SFAs are not required to be certified in these areas as it is unlikely that they are involved with food service preparation. Additionally, SFA directors in large and very large SFAs are more likely to have licensures and certifications above the typical requirements than those in small and medium SFAs.

		Percenta	age of SF	As licensu	re/certific	cation requ	irements	s (A) versu	is percent	age of SF/	A directo	rs who h	ave requir	ed certific	ation (B)	
												ified		Total	SFAs	
	Lies	nsed	Seheel	nutrition		tified onal food		tified sional in		ified sional	ServSa	fe food etv				
SFA characteristics		titian		ialist	•	nager		safety	food h		profes		Weigh	ited n	Unwei	ghted n
	А	В	А	В	А	В	А	В	А	В	А	В	Α	В	Α	в
All SFAs	2.8%	5.6%	11.4%	17.2%	22.3%	30.4%	28.5%	37.0%	25.3%	31.8%	41.3%	54.8%	14,250	14,267	1,376 <sup>1</sup>	1,378 <sup>1</sup>
SFA size <sup>2,3</sup>	2.070	010/0		17.1270		0011/0		0,10,0	2010/0	0110/0	121070	0.1070	1,100		2,070	2,070
Small (1-999)	1.6	0.6	9.2	10.3	22.0	27.9	29.3	33.3	25.8	29.6	35.3	41.8	7,056	7,079	319	320
Medium (1,000-4,999)	2.5	7.5	12.6	20.4	24.0	34.5	29.5	42.6	26.0	34.3	47.3	66.3	5,293	5,282	526	526
Large (5,000-24,999)	7.2	17.3	16.9	33.0	19.1	28.9	24.0	36.1	22.8	34.7	48.1	71.5	1,616	1,622	362	363
Very large (25,000+)	12.1	29.5	10.1	35.4	15.5	28.6	18.1	30.4	14.4	23.0	41.1	69.1	284	284	169	169
Urbanicity <sup>4,5</sup>																
City	8.6	13.0	13.8	20.1	20.5	25.8	23.1	23.9	22.9	25.9	43.1	49.3	1,543	1,543	252	252
Suburban	4.2	9.1	13.7	22.3	24.4	33.6	37.2	46.0	30.6	39.6	54.4	68.5	2,767	2,759	372	372
Town	2.0	6.7	11.6	21.3	24.7	34.0	27.5	41.9	23.9	32.8	35.6	53.6	2,741	2,746	263	263
Rural	1.3	2.3	9.9	12.9	20.9	28.9	26.8	34.5	24.3	29.6	38.1	51.3	7,198	7,219	489	491
Poverty level <sup>6,7</sup>																
Low (0-29% F/RP)	2.6	7.0	10.6	20.1	21.0	29.1	32.9	44.0	24.6	31.2	46.2	65.6	3,280	3,250	339	338
Medium (30%-59% F/RP)	2.9	6.3	9.3	16.8	21.5	33.3	24.6	35.5	21.7	31.6	38.4	54.4	6,618	6,653	638	641
High (60% or more F/RP)	2.8	3.6	15.1	15.5	24.5	27.1	31.2	34.2	31.4	32.5	42.2	47.4	4,352	4,364	399	399

# Table IV-1.6. Percentage of SFAs with Licensure Requirements as Compared to Percentage of SFA Directors who have the Qualifications by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFA directors required to be licensed dietitians, school nutrition specialists, and certified ServSafe food safety professionals differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFA directors holding different certifications differed by SFA size for all six certifications at the .05 level.

<sup>4</sup>Percentage of SFA directors required to be licensed dietitians, certified professionals in food safety, and certified ServSafe food safety professionals differed significantly by urbanicity at the .05 level.

<sup>5</sup> Percentage of SFA directors being licensed dietitians, school nutrition specialists, certified professionals in food safety, certified professional food handlers, and certified ServSafe food safety professionals differed significantly by urbanicity at the .05 level.

<sup>6</sup> Percentage of SFA directors required to be school nutrition specialists, certified professionals in food safety, and certified professional food handlers differed significantly by poverty level at the .05 level. <sup>7</sup> Percentage of SFA directors being licensed dietitians, certified professionals in food safety, and certified ServSafe food safety professionals differed significantly by poverty level at the .05 level. Data Source: SFA Director Survey 2011, questions 14.6 and 14.7.

#### **District-Level Responsibilities**

Table IV-1.7 shows that nearly two-thirds (64 percent) of SFA directors reported that they held their positions full-time and did not have any other responsibilities; about 22 percent are full-time with other responsibilities, and 15 percent of SFA directors were engaged part-time. As one might expect, in very large SFAs, 93 percent of directors were full-time with no other responsibilities. Even in small SFAs, however, about half (48 percent) of directors were full-time with no other responsibilities. The differences in SFA directors' work status and responsibilities by urbanicity or poverty level were not statistically significant.

The most frequently reported "Other" responsibilities were superintendent, school cook, and wellness coordinator. Additional "Other" responsibilities noted by part-time SFA directors were principal, warehouse supervisor, cafeteria manager, teacher, treasurer, administrative assistant, maintenance worker, and purchasing manager.

	Percentage of	Percentage of SFAs with directors who are:						
SFA characteristics	Full-time directors, no other responsibilities	Full-time directors with other responsibilities	Part-time directors	Weighted n	Unweighted <i>n</i>			
All SFAs	63.5%	21.6%	14.9%	14,329	1,381 <sup>1</sup>			
SFA size <sup>2</sup>								
Small (1-999)	48.2	30.2	21.6	7,106	321			
Medium (1,000-4,999)	75.4	14.4	10.1	5,322	529			
Large (5,000-24,999)	86.5	10.2	3.3	1,616	362			
Very Large (25,000+)	92.5	4.7	2.8	284	169			
Urbanicity								
City	64.6	21.7	13.6	1,543	252			
Suburban	70.5	19.5	10.0	2,845	375			
Town	68.4	20.6	11.0	2,787	265			
Rural	58.6	22.8	18.6	7,154	489			
Poverty level								
Low (0-29% F/RP)	69.1	15.7	15.2	3,252	338			
Medium (30-59% F/RP)	64.4	22.5	13.1	6,698	643			
High (60% or more F/RP)	58.0	24.6	17.4	4,378	400			

## Table IV-1.7. Percentage of SFAs with Directors who are Full-Time or Part-Time by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs with directors with various district-level responsibilities differed significantly by SFA size at the .05 level.

Data Source: SFA Director Survey 2011, question 14.4.

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### **IV-2.** Kitchens and Meal Service

### Background

Food service facilities vary between SFAs and schools. Additionally, the experience students have each day—where they eat, how much time they have to eat, what happens before and after their meals—also varies. These factors are important to the health of students and have been shown to affect obesity (SNDA III: Volume I, 2007).

SFAs vary in the types of kitchen facilities and meal service systems available at schools. Onsite school kitchens both prepare and serve the meals for the school in which they are located. Base school kitchens are school kitchens that prepare and serve meals in the school in which they are located, but also produce food items or whole meals that are sent to other schools and served to the students in the receiving (satellite) schools. A base kitchen may have one or many satellites for which it prepares meals. Central kitchens are not located in schools. No food is served to students directly from a central kitchen. Rather, these are production facilities (and in many ways are similar to commercial food production facilities). To be economically viable, a central kitchen must produce a very large volume of meals for the schools that it serves. Satellite school kitchens primarily serve food items produced elsewhere. Although some satellite kitchens may produce a small amount of their meals onsite, for the most part they receive and serve foods produced in a central or base kitchen. The findings included in this section use the following categories for kitchen facilities:

- Onsite production only: this includes SFAs that use only onsite kitchens to prepare and serve meals;
- Off-site production only (base and central): this includes SFAs that use base or central kitchens to prepare and serve meals (as opposed to using onsite kitchens) and may send to a receiving satellite kitchen;
- Combination or other: this includes SFAs that use a variety of kitchen types where some food is prepared onsite for consumption and some food is received fully or partially prepared from an off-site location.

Meal service systems such as cafeteria configurations also vary. The types of kitchen facilities and meal service systems dictate the staffing needs, qualifications of the food service staff, food purchasing practices, and meal prices.

### **Research Questions**

In this study, the following research questions relate to where school meals are prepared, how the meals are served, and what students do once they have their meals.

What types of kitchen facilities (e.g., central kitchen, satellite) do SFAs utilize?

- Are SFA food service facilities used to prepare foods for purposes other than the NSLP and the SBP? Are the facilities used to prepare reimbursable meals for other programs (Child and Adult Care Food Program [CACFP], Summer Food Service Program [SFSP], Elderly Nutrition Program, Head Start, other schools or school systems, disaster feeding, etc.)?
- Are the facilities used to prepare food for other nonreimbursable purposes (events such as athletic events, Parent-Teacher Association [PTA] meetings, school staff meals, etc.)?
- What types of meal service systems (e.g., cafeteria configuration, meal kiosks) do SFAs utilize?
- Where do students eat lunch (eating locations, open versus closed campus)?
- Do students have sufficient time to eat their school breakfast and lunch?
- In elementary schools, is lunch provided before or after recess?

### Results

#### **Kitchen Facilities**

There are primarily two types of kitchens used by SFAs to prepare school meals: (1) onsite kitchens and (2) base or central kitchens with satellite or receiving kitchens. Onsite kitchens are located at the school where students are served their meals and offer the simplest, most direct means for preparing and serving food; all food is prepared onsite. SFAs using base or central kitchens, on the other hand, prepare food for shipment to multiple schools that may have satellite or receiving kitchens that handle the final stages of preparing the meals. These types of base or central kitchen facilities are referred to in the tables as offsite kitchens. SFAs may also have a combination of types of kitchens in the various schools they serve (i.e., a mix of onsite and offsite kitchens), which may reflect decisions made by the local school system over many years regarding school construction and renovations. A very small percentage of SFAs (1.4 percent, not shown separately) reported using some other type of kitchen.

SFA directors were asked to identify the types of kitchen facilities used across the schools they serve. During SY 2011-12, just over half of the SFAs (55 percent) operated exclusively with onsite kitchens where all food is prepared and served onsite as shown in Table IV-2.1. Only 17 percent of SFAs reported using only base or central kitchens to prepare meals for distribution to satellite or receiving kitchens (i.e., offsite kitchens). Additionally, 29 percent of SFAs reported using a combination of onsite and offsite kitchens or some other type of kitchen facility. Thus, the most common type of kitchen used is the onsite kitchen.

The types of kitchen facilities significantly varied by SFA size and urbanicity, but not by poverty level. Small SFAs were more likely to operate exclusively with onsite kitchens. Sixty-two percent of small SFAs used only onsite kitchens, whereas just over half (53 percent) of medium SFAs and 36 percent of large SFAs reported using only onsite kitchens. Only 18 percent of very large SFAs used onsite kitchens only. However, a majority (65 percent) of very large SFAs used a combination of onsite and offsite kitchens or used some other type of kitchen facility.

# Table IV-2.1. Percentage of SFAs Using Different Types of Kitchen Facilities by SFA Characteristics, SY 2011-12

	J J	f SFAs using the fo of kitchen facilities	0	Tota	al SFAs
	Offsite	Onsite	Combination	-	Unweighted
SFA characteristics	kitchen only	kitchen only	or other	n	n
All SFAs	16.5%	54.7%	28.8%	14,422	1,388 <sup>1</sup>
SFA size <sup>2</sup>					
Small (1-999)	16.6	61.8	21.7	7,160	324
Medium (1,000-4,999)	17.7	53.1	29.2	5,350	532
Large (5,000-24,999)	11.8	35.6	52.6	1,629	364
Very Large (25,000+)	16.6	18.0	65.4	283	168
Urbanicity <sup>2</sup>					
City	10.4	26.7	62.9	1,511	251
Suburban	20.0	41.6	38.3	2,810	375
Town	22.9	47.6	29.5	2,767	265
Rural	13.9	68.2	17.8	7,335	497
Poverty level					
Low (0-29% F/RP)	16.3	57.6	26.1	3,358	345
Medium (30%-59% F/RP)	17.5	53.5	29.0	6,712	644
High (60% or more F/RP)	14.9	54.5	30.6	4,352	399

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs using different types of kitchen facilities differed significantly by SFA size and urbanicity at the .05 level. Data Source: SFA Director Survey 2011, question 4.19.

### **Use of Food Service Facilities by Other Programs**

In addition to using food service facilities for student-related activities during the school day or after school, schools can make the facilities available for other programs or activities depending on the policies set by the local school district. For example, the school food service facilities may be used to prepare meals for other reimbursable meal programs, such as CACFP or SFSP, as well as for nonreimbursable meal programs such as catering school and non-school functions. The school principal, the facilities director, or the SFA director (or the cafeteria manager) is usually responsible for overseeing policies and regulations for facility use adopted by the local school board.

For SY 2011-12, 62 percent of SFAs indicated that the school food service facilities were used only to prepare food for the SBP and NSLP as shown in Table IV-2.2. Twenty-three percent used the facilities to prepare both reimbursable and nonreimbursable meals for other programs in addition to the SBP and NSLP. Another 2 percent used their facilities to prepare only reimbursable meals for other programs (e.g., CACFP, SFSP, Head Start, etc.), and 13 percent used the facilities to prepare only nonreimbursable meals for other programs (e.g., athletic events, PTA meetings, school staff meals, etc.). The smaller the size of the SFA, the more likely was the SFA to use facilities for SBP and NSLP only. Similarly, SFAs with medium and high poverty levels and offsite kitchens also tended to use their kitchens only for the SBP and NSLP relative to others.

# Table IV-2.2.Percntage of SFAs that Used Food Service Facilities for Various Types of<br/>Reimbursable and Nonreimbursable Meals by SFA Characteristics, SY 2011-12

	Percent	age of SFAs that used fc	Tota	Il SFAs		
	SBP	The	<u>nd</u> :			
SFA characteristics	and NSLP meals only	Other reimbursable and nonreimbursable meals	Other reimbursable meals only	Other nonreimbursable meals only	Weighted <i>n</i>	Unweighted n
All SFAs	61.6%	23.4%	2.0%	13.1%	14,566	1,394 <sup>1</sup>
SFA size <sup>2</sup>						
Small (1-999)	72.2	11.8	2.7	13.3	7,302	329
Medium (1,000-4,999)	53.7	30.8	1.2	14.4	5,351	532
Large (5,000-24,999)	43.6	45.4	1.5	9.5	1,629	364
Very Large (25,000+)	40.9	53.8	2.1	3.2	284	169
Urbanicity						
City	63.3	24.6	6.4	5.7	1,630	256
Suburban	55.9	26.4	0.1	17.6	2,885	380
Town	55.6	32.8	0.7	10.9	2,775	264
Rural	65.8	18.2	2.2	13.8	7,276	494
Poverty level <sup>2</sup>						
Low (0-29% F/RP)	57.7	15.9	0.4	26.0	3,376	346
Medium (30%-59% F/RP)	62.9	25.0	1.3	10.9	6,747	645
High (60% or more F/RP)	62.6	26.6	4.3	6.5	4,443	403
Type of kitchen <sup>2</sup>						
Onsite kitchen only	59.4	26.9	4.2	9.5	2,343	218
Offsite kitchen only	62.4	20.0	0.6	16.9	7,860	638
Combination or other	59.4	28.6	3.5	8.5	4,106	525

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs using their food service facilities for various types of reimbursable and nonreimbursable meals differed significantly by SFA size, urbanicity, poverty level, and type of kitchen at the .05 level.

Data Source: SFA Director Survey 2011, questions 4.20, 4.21, and 4.22.

Table IV-2.3 shows that for SFAs that allowed food service facilities to be used to prepare reimbursable meals for other programs or events, 39 percent of the SFAs supported SFSP meals. Other reimbursable programs commonly using SFA food service facilities were Head Start (28 percent) and disaster feeding (19 percent); the latter is generally provided through the Red Cross. An estimated 12 percent of SFAs reported preparing food for CACFP, which provides meals and snacks to children and elderly adults. Eleven percent of SFAs that use their facilities for other reimbursable meals reported they supported other schools or school systems programs, and only 3 percent provided reimbursable meals for the Elderly Nutrition Program. Finally, 4 percent of respondents wrote in the Afterschool Snack Program as a specific additional program for which they provided reimbursable meals. The use of school food service facilities for preparing reimbursable meals served for other programs varied with SFA size, which is not surprising as it is likely that the availability of these programs in the schools is driven by SFA size. Similarly, the use of food service facilities to prepare foods for other programs that served reimbursable meals varied by the poverty level of the SFAs; those with high poverty levels reported higher use of facilities for almost all of these programs than those with low poverty levels.

# Table IV-2.3. Among SFAs that Allow Food Service Facilities to be Used for more than SBP<br/>and NSLP, the Percentage of SFAs Using those Facilities for Other Reimbursable<br/>Meals by SFA Characteristics, SY 2011-12

			Percentage	of SFAs usi	ng facilities	for:		Tota	al SFAs
SFA characteristics	CACFP	SFSP	Elderly nutrition program	Head Start	Other school or school systems	Disaster feeding	Afterschool snack	Weighted	Unweighted n
All SFAs	12.1%	38.9%	2.5%	28.1%	11.4%	19.4%	4.2%	5,691	651 <sup>1</sup>
SFA size <sup>2</sup>								,	
Small (1-999)	8.8	22.2	4.8	16.0	6.5	10.5	2.6	2,100	92
Medium (1,000-4,999)	10.6	39.9	0.5	33.9	10.0	22.1	4.0	2,505	251
Large (5,000-24,999)	20.2	67.1	3.0	35.6	23.2	27.6	7.6	918	209
Very large (25,000+)	32.6	78.5	1.9	53.2	29.3	46.1	9.7	168	99
Urbanicity <sup>3</sup>									
City	28.3	60.1	1.4	34.9	31.1	18.0	5.7	598	139
Suburban	11.9	32.8	1.0	22.6	12.6	17.3	4.5	1,273	186
Town	10.9	49.6	0.0	29.6	14.1	29.6	5.4	1,239	129
Rural	9.1	31.9	4.7	28.5	5.0	15.9	3.2	2,582	197
Poverty level <sup>4</sup>									
Low (0-29% F/RP)	3.4	9.2	1.6	17.0	9.7	18.5	1.1	1,459	168
Medium (30%-59% F/RP)	11.8	42.7	2.3	35.0	11.1	17.2	5.2	2,571	290
High (60% or more F/RP)	20.3	59.1	3.7	27.3	13.5	23.8	5.4	1,662	193
Type of kitchen⁵									
Onsite kitchen only	8.4	30.8	2.6	22.3	3.5	19.2	3.9	2,987	278
Offsite kitchen only	12.7	50.1	1.6	34.8	14.0	15.9	6.7	980	95
Combination or other	18.7	46.0	2.9	34.7	23.9	22.0	3.5	1,702	275

<sup>1</sup> *n* equals the 651 SFAs that allow their food service facilities to be used for other programs.

<sup>2</sup> Percentage of SFAs using their food service facilities for all types of other reimbursable meals with the exception of afterschool snack differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs using their food service facilities for CACFP, SFSP, other school or school systems, and disaster feeding differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs using their food service facilities for CACFP, SFSP, Head Start, and afterschool snack differed significantly by poverty level at the .05 level.

<sup>5</sup> Percentage of SFAs using their food service facilities for CACFP, SFSP, Head Start, and other school or school systems differed significantly by type of kitchen at the .05 level.

Data Source: SFA Director Survey 2011, questions 4.20 and 4.21.

As seen in Table IV-2.4, school food service facilities were also used to prepare foods for a range of nonreimbursable purposes, with many SFAs using these facilities to support more than one activity. The most common nonreimbursable uses of school food service facilities were school staff meals (76 percent), catering (64 percent), and athletic events (63 percent). More than one-third of these SFAs (36 percent) reported using food service facilities for PTA events. Eleven percent of these SFAs used food service facilities for daycare. In general, a higher percentage of large and very large SFAs than small or medium SFAs used the food service facility to prepare meals for PTA meetings, daycare, and catering. In some cases, the facility is the site for many other events, including fundraisers, community activities and events, banquets and dinners, meetings, outside organizations renting, before- and afterschool programs, and summer activities. Of those citing other events (23 percent, not shown), banquets and dinners (18 percent, not shown), meetings (8 percent, not shown), outside organizations renting (7 percent, not shown), before- and afterschool programs (5 percent, not shown), summer activities (3 percent, not shown), and other (8 percent, not shown).

# Table IV-2.4.Among SFAs that Allow Food Service Facilities to be Used for More Than SBP and<br/>NSLP, the Percentage of SFAs Using those Facilities for Nonreimbursable Purposes<br/>by SFA Characteristics, SY 2011-12

		Percen	tage of SFAs us	sing facilities	s for:		Tota	al SFAs
SFA characteristics	Athletic events	PTA meetings	School staff meals	Daycare	Catering	Other	Weighted n	Unweighted <i>n</i>
All SFAs	63.4%	35.8%	76.2%	11.3%	64.1%	20.0%	5,654	647 <sup>1</sup>
SFA size <sup>2</sup>								
Small (1-999)	56.0	23.2	71.7	6.4	34.7	31.3	2,078	91
Medium (1,000-4,999)	71.8	38.3	80.6	10.5	78.1	14.3	2,497	250
Large (5,000-24,999)	59.6	53.3	74.1	21.4	87.6	10.8	911	207
Very large (25,000+)	51.2	59.9	78.0	27.6	92.4	16.1	168	99
Urbanicity <sup>3</sup>								
City	41.6	37.2	56.6	14.3	69.7	15.2	594	138
Suburban	59.1	38.6	77.8	14.8	88.9	21.0	1,270	185
Town	64.4	36.7	83.0	14.3	71.6	19.2	1,239	129
Rural	70.1	33.7	76.6	7.3	46.8	21.1	2,551	195
Poverty level <sup>4</sup>								
Low (0-29% F/RP)	59.4	42.9	83.0	10.4	79.7	19.7	1,425	165
Medium (30%-59% F/RP)	68.4	32.0	78.6	11.4	63.9	20.4	2,571	290
High (60% or more F/RP)	59.0	35.5	66.6	11.8	51.1	19.8	1,659	192
Type of kitchen⁵								
Onsite kitchen only	71.6	35.3	81.1	8.7	63.6	18.3	2,961	276
Offsite kitchen only	54.9	31.5	66.7	14.8	53.7	24.5	976	94
Combination or other	54.0	39.5	72.7	13.9	70.6	20.8	1,694	274

<sup>1</sup> *n* is less than 651 SFAs that allow their food service facilities to be used for other programs due to item non-response.

<sup>2</sup> Percentage of SFAs using their food service facilities for all types of other nonreimbursable purposes with the exception of school staff meals differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs using their food service facilities for athletic events, school staff meals, and catering differed significantly by urbanicity at the .05 level.

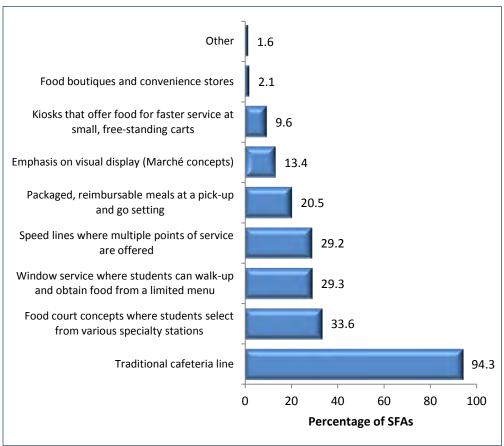
<sup>4</sup> Percentage of SFAs using their food service facilities for school staff meals and catering differed significantly by poverty level at the .05 level.

<sup>5</sup> Percentage of SFAs using their food service facilities for athletic events and school staff meals differed significantly by type of kitchen at the .05 level.

Data Source: SFA Director Survey 2011, questions 4.20 and 4.22.

#### **Types of Meal Service Systems**

Schools use different types of meal service systems when providing meals to students, with many including a blend of self-service and operator service. Figure IV-2.1 shows that many SFAs used more than one approach to serving meals, but the most common type of meal service system used by SFAs during SY 2011-12 was the traditional cafeteria line (94 percent), where students line up to be served their food by cafeteria staff. Most meals served in the SBP and the NSLP are prepared and served to students as they pass through a cafeteria line.



#### Figure IV-2.1. Percentage of SFAs Using Different Types of Meal Service Systems, SY 2011-12

*n* is less than 1,401 due to item non-response. Responses based on a weighted *n* = 14,656, unweighted *n* = 1,399. Data Source: SFA Director Survey 2011, question 4.1.

Figure IV-2.1 also shows the types and frequency of other meal service arrangements:

- Food courts (34 percent)—Students select food from various specialty stations, such as a grill bar, salad bar, or pizza bar.<sup>24</sup>
- Window service (29 percent)—Students walk up to a window to obtain food from a limited menu, which often includes prepackaged food.
- Speed lines (29 percent)—Multiple points of service are offered to allow students to receive faster service. Timeliness of service is more important when students have limited time to buy and eat their lunch. Some speed lines incorporate cashless/prepay lines or require students to use a PIN.
- Packaged reimbursable meals at a pick-up and go setting (21 percent)—This service includes prepackaged food such as sandwiches or fruit.
- Marché concepts (13 percent)—This approach is based on European open-air marketplaces where the emphasis is on visual display and fresh foods prepared to order in full view of customers at a variety of themed stations.

<sup>&</sup>lt;sup>24</sup> <u>http://www.fns.usda.gov/tn/Resources/equip02.pdf</u>

- Kiosks (10 percent)—For faster service, food is offered at small, freestanding carts. Kiosks or carts with specialty foods give cafeterias the look and feel of a food court in shopping malls.
- Food boutiques (2 percent)—These boutiques resemble retail activity areas where specialized foods and meal components are served.

#### **Policies and Practices Regarding Location and Timing of School Meals**

Food service operations are affected by policies and practices that do not fall under the control of food service staff. Typically the school principal, under the guidance of district policies, determines allowable locations for students to eat, when meals will be served, how much time students will have to eat their meals, and the timing of recess. District policies also govern whether students are permitted to leave the school property during meals.

#### **Eating Locations**

Where students may eat their meals varies across SFAs. Table IV-2.5 shows that although SFAs reported more than one eating location across the schools they served, not surprisingly the cafeteria was the most common setting for breakfast (88 percent) and lunch (96 percent). Almost one-third of SFAs (29 percent) allowed students to eat breakfast in classrooms; 17 percent of SFAs reported that students were permitted to eat breakfast at outside tables; and 3 percent of SFAs had students eating breakfast in other locations, such as gymnasiums and hallways. A similar pattern was observed for lunch, but with a higher percentage of SFAs reporting that students ate lunch at outside tables (35 percent). Classrooms were used by fewer SFAs during lunch (19 percent).

There are some notable differences in the locations where students eat based on the size, urbanicity, and poverty level of the SFA. For lunch and breakfast, the larger the SFA size, the more likely that students eat at outside tables or in classrooms. In addition, SFAs in rural areas or towns were less likely to have breakfast or lunch at outside tables, and SFAs in rural areas were less likely to allow breakfast in classrooms. SFAs in rural and suburban areas were less likely to allow the use of classrooms for lunch. SFAs with medium and high poverty levels were less likely than those with low poverty levels to allow lunch at outside tables.

	Percer	tage of SFAs	s with schools u	ising:	Tota	al SFAs
SFA characteristics	Cafeterias	Outside	Classrooms	Other	Weighted n	Unweighted n
		В	reakfast			1
All SFAs	87.9%	17.3%	28.6%	3.4%	14,666	1,400 <sup>1</sup>
SFA size <sup>2</sup>						
Small (1-999)	81.9	11.0	21.1	4.5	7,374	332
Medium (1,000-4,999)	92.9	20.0	32.5	2.3	5,378	535
Large (5,000-24,999)	97.2	30.7	43.1	1.8	1,629	364
Very large (25,000+)	94.8	54.0	67.8	4.0	284	169
Urbanicity <sup>3</sup>						
City	80.3	28.5	44.0	5.6	1,630	256
Suburban	84.8	24.7	30.9	3.7	2,885	380
Town	90.9	18.0	31.8	3.6	2,782	265
Rural	89.7	11.7	23.1	2.6	7,369	499
Poverty level <sup>4</sup>						
Low (0-29% F/RP)	77.5	17.1	24.3	3.3	3,407	348
Medium (30%-59% F/RP)	92.6	15.9	28.2	2.8	6,816	649
High (60% or more F/RP)	88.7	19.7	32.6	4.3	4,443	403
			Lunch			
All SFAs	96.2%	34.6%	19.2%	3.5%	14,666	1,400 <sup>1</sup>
SFA size <sup>5</sup>						
Small (1-999)	94.0	23.4	18.4	4.3	7,374	332
Medium (1,000-4,999)	98.5	41.9	19.1	2.7	5,378	535
Large (5,000-24,999)	98.7	53.8	20.4	2.3	1,629	364
Very large (25,000+)	95.5	76.3	35.7	4.6	284	169
Urbanicity <sup>3</sup>						
City	89.3	39.0	31.7	6.4	1,630	256
Suburban	97.9	43.1	16.3	3.1	2,885	380
Town	96.0	35.6	22.0	3.8	2,782	265
Rural	97.2	30.0	16.6	2.9	7,369	499
Poverty level <sup>6</sup>						
Low (0-29% F/RP)	98.1	43.5	16.0	3.9	3,407	348
Medium (30%-59% F/RP)	97.0	32.8	20.5	3.2	6,816	649
High (60% or more F/RP)	93.5	30.5	19.7	3.6	4,443	403

# Table IV-2.5.Percentage of SFAs with Schools Using Various Types of Eating Locations by SFA<br/>Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs using all types of eating locations for breakfast differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs using all types of eating locations with the exception of other for breakfast and lunch differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs using all types of eating locations for breakfast differed significantly by poverty level at the .05 level.

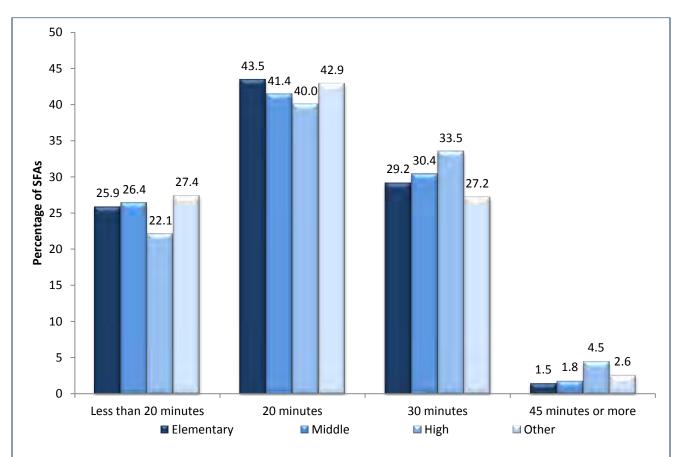
<sup>5</sup> Percentage of SFAs using all types of eating locations with the exception of classrooms for lunch differed significantly by SFA size at the .05 level.

<sup>6</sup> Percentage of SFAs using all types of eating locations with the exception of classrooms for lunch differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 4.4.

#### **Time Allotted for Meals**

The scheduling of school meals has a major influence on food service operations, and how quickly students can be served is affected by the type of meal service system used. How much time students have to eat their meal is a concern particularly with the changes in the new meal patterns, as certain foods such as fresh fruit may take longer for students to eat, especially if it needs to be peeled (e.g., an orange). As shown in Figure IV-2.2, the most commonly reported amount of time allotted for breakfast was 20 minutes (about 40 percent of SFAs). This varied little across type of school (elementary, middle, high, or other). However, high schools were less likely to have less than 20 minutes for breakfast than the other types of schools and more likely to have 30 minutes or more for breakfast.



# Figure IV-2.2. Percentage of SFAs with Various Average Times Allotted for Breakfast by Type of School, SY 2011-12

For elementary schools, n is less than the 1,292 SFAs that reported having elementary schools due to item non-response, and weighted n = 11,836 and unweighted n = 1,239.

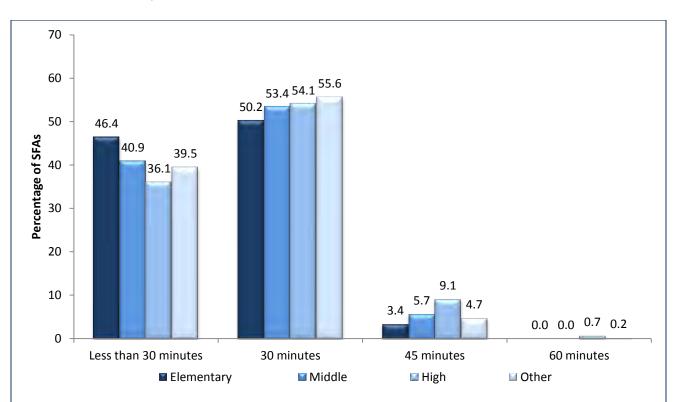
For middle schools, n is less than the 1,106 SFAs that reported having middle schools due to item non-response, and weighted n = 8,806 and unweighted n = 1,055.

For high schools, n is less than the 1,188 SFAs that reported having high schools due to item non-response, and weighted n = 10,264 and unweighted n = 1,148.

For other school types, n is less than the 551 SFAs that reported having other schools due to item non-response, and weighted n = 3,774 and unweighted n = 464.

Data Source: SFA Director Survey 2011, question 4.6.

Figure IV-2.3 shows that 30 minutes was the most frequently reported amount of time allotted for lunch for all types of schools (at least 50 percent). Elementary schools were most likely to have less than 30 minutes for lunch and high schools the least likely. High schools were most likely to allow at least 45 minutes for lunch (9 percent).





For elementary schools, n is less than the 1,292 SFAs that reported having elementary schools due to item non-response, and weighted n = 12,499 and unweighted n = 1,284.

For middle schools, n is less than the 1,106 SFAs that reported having middle schools due to item non-response, and weighted n = 9,347 and unweighted n = 1,097.

For high schools, n is less than the 1,188 SFAs that reported having high schools due to item non-response, and weighted n = 10,741 and unweighted n = 1,181.

For other school types, n is less than the 551 SFAs that reported having other schools due to item non-response, and weighted n = 4,342 and unweighted n = 529.

Data Source: SFA Director Survey 2011, question 4.7.

Policies governing whether students can leave the school campus during the meal service vary by school district and school and are determined by the school district superintendent and the local board of education or the school principal. Reasons for allowing an off-campus policy may include lack of food service/cafeteria space and meal preparation and serving capabilities and providing more flexibility and responsibility to high school students. In geographic areas where local food outlets are available near school, off-campus lunch options are considered important revenue streams for local businesses. Although the primary driver for open-campus policies tends to be space and time constraints, such policies are thought to increase truancy, pose safety risks for students who travel off campus, and stigmatize students who eat at school (Miura, 2009).

Analysis of the 2006 School Health Policies and Programs Study data indicated that 71 percent of the high school districts and 73 percent of high schools had a closed-campus policy (O'Toole, Anderson, Miller, and Guthrie, 2007). In SY 2009-10, about 81 percent of high schools had a closed-campus policy; of the 19 percent that had an off-campus policy, the schools were located in proximity to supermarkets, convenience stores, or other stores and fast food restaurants (SNDA-IV Vol. 1). The school food service characteristics section of the SFA Director Survey asked whether any of their high schools allowed students to go off-campus during lunch. SFAs that did not have a high school were excluded from this analysis. As seen in Table IV-2.6, in SY 2011-12, about two-thirds (68 percent) of responding SFAs had a closed-campus policy during lunch, but 25 percent of the SFAs allowed all high school students to go off campus for lunch. SFAs that allowed all high school students to go off campus for lunch. SFAs that allowed all high school students to go off campus for lunch stress in rural or city), and allotted 45 minutes or more for lunch (versus allotting 30 minutes or less).

		s with high schools o off campus for lu	Total SFAs		
SFA characteristics	All schools	Some schools	No schools	Weighted n	Unweighted n
All SFAs	25.0%	7.4%	67.7%	10,592	1,165 <sup>1</sup>
SFA size <sup>2</sup>					
Small (1-999)	27.4	8.0	64.7	4,106	191
Medium (1,000-4,999)	24.6	4.7	70.7	4,679	467
Large (5,000-24,999)	20.0	11.4	68.6	1,526	340
Very large (25,000+)	21.8	21.2	57.0	281	167
Urbanicity <sup>2</sup>					
City	21.3	17.9	60.7	889	211
Suburban	25.1	4.4	70.5	2,149	324
Town	30.0	7.9	62.1	2,294	237
Rural	23.3	6.6	70.1	5,260	393
Poverty level					
Low (0-29% F/RP)	25.6	6.8	67.7	2,505	297
Medium (30%-59% F/RP)	26.6	8.0	65.4	5,339	560
High (60% or more F/RP)	21.1	6.8	72.1	2,748	308
Time allotted for lunch in high school <sup>2</sup>					
Less than 30 minutes	19.6	8.2	72.2	6,174	720
30 minutes	31.9	5.6	62.5	3,383	352
45 minutes or more	45.6	12.1	42.3	448	54
Number of schools recognized as HealthierUS Schools <sup>2</sup>					
None	24.5	7.2	68.3	9,908	1,061
1-5	36.5	10.0	53.5	554	70
6 or more	7.4	8.9	83.8	130	34

## Table IV-2.6. Among SFAs that have High Schools, the Percentage of SFAs with High Schoolsthat Allow Students to Eat Off Campus by SFA Characteristics, SY 2011-12

 $^{1}n$  is less than the 1,188 SFAs that reported having high schools due to item non-response.

<sup>2</sup> Percentage of SFAs that allow students to eat off campus differed significantly by SFA size, urbanicity, time allotted for lunch, and the number of schools recognized as HealthierUS schools at the .05 level.

Data Source: SFA Director Survey 2011, questions 4.5, 4.7, 11.7, and 14.7.

#### **Student Mobility**

Some schools allow students to leave the cafeteria (or location where they are eating) before the lunch period is over, provided they have finished eating. It is up to the school principal and district policy, rather than the food service staff, to decide whether students can move around.

High school students are more likely than elementary or middle school students to be allowed to leave the cafeteria before the end of the lunch period. About 58 percent of SFAs reported that high school students could leave, but only 25 percent of SFAs reported that elementary school students were allowed to leave; 39 percent reported that middle school students could leave before the end of the lunch period as shown in Table IV-2.7. A small percentage of SFA directors were unsure of the school policies or practices in this regard.

# Table IV-2.7. Among SFAs that Have Elementary, Middle, High, or Other Schools, thePercentage of SFAs with Different After Lunch Student Mobility Policies bySchool Type, SY 2011-12

	Percentage of SFAs reporti	Total SFAs			
School type	Students are allowed to leave the cafeteria	Students must remain in the cafeteria	Weighted <i>n</i>	Unweighted <i>n</i>	
Elementary	25.3%	72.4%	2.4%	12,555	1,286 <sup>1</sup>
Middle	39.1	57.2	3.7	9,404	1,098 <sup>2</sup>
High	57.7	38.1	4.2	10,766	1,181 <sup>3</sup>
Other	29.0	60.2	10.9	3,619	427 <sup>4</sup>

 $^{1}n$  is less than the 1,292 SFAs that reported having elementary schools due to item non-response.

 $^{2}$  *n* is less than the 1,106 SFAs that reported having middle schools due to item non-response.

 $^{3}$  n is less than the 1,188 SFAs that reported having high schools due to item non-response.

 $^{4}$  *n* is less than the 551 SFAs that reported having other schools due to item non-response.

Data Source: SFA Director Survey 2011, question 4.9.

#### Recess

Engaging in physical activity at any time of day is important to the health and well-being of students, but research has shown that there may be added benefits to students if they have recess before lunch as opposed to after lunch. Several studies found that students ate more food and nutrients and wasted less food when recess occurred before lunch (Bergman, Buergel, England, and Femrile, 2004; Getlinger et al., 1996; Read and Moosburner, 1985; Ruppenthal and Hogue, 1977). The Montana Team Nutrition Program found that the average amount of food and beverage waste decreased after working with four schools to implement recess before lunch (Rainville et al., 2006). Some other benefits noted in the study were:

- Quieter and more relaxed atmosphere in the cafeteria during lunch that was more conducive to eating;
- A dramatic decrease in discipline problems on the playground, in the lunchroom, and in the classroom; and
- Students returning to their classroom more settled, calmer, and ready to learn.

As shown in Table IV-2.8, elementary schools provide lunch before recess in 45 percent of SFAs and provide lunch after recess in only 12 percent of SFA. The remaining 43 percent of SFAs indicated that the timing of lunch and recess varied, with some elementary schools having recess before lunch and some after lunch. The smaller the SFA size, the more likely that lunch was provided before recess. Conversely, the larger the SFA size, the more likely that lunch was provided in some schools before recess and in other schools after recess.

Table IV-2.8.	Among SFAs that Have Elementary Schools, the Percentage of SFAs with
	Elementary Schools Following Various Lunch and Recess Schedules by SFA
	Characteristics, SY 2011-12

	-	SFAs with most of chools providing lu		Total SFAs	
SFA characteristics	Before recess	After recess	Before recess in some schools and after recess in other schools	Weighted <i>n</i>	Unweighted n
All SFAs	44.5%	12.2%	43.3%	11,777	1,187 <sup>1</sup>
SFA size <sup>2</sup>					
Small (1-999)	52.4	12.1	35.5	5,283	244
Medium (1,000-4,999)	41.2	12.0	46.8	4,808	480
Large (5,000-24,999)	29.4	13.5	57.1	1,451	325
Very large (25,000+)	28.2	12.0	59.7	235	138
Urbanicity <sup>2</sup>					
City	39.4	9.4	51.3	1,164	209
Suburban	35.3	17.2	47.5	2,303	323
Town	45.2	9.2	45.6	2,248	232
Rural	48.7	12.0	39.3	6,062	423
Poverty level <sup>2</sup>					
Low (0-29% F/RP)	34.1	16.5	49.5	2,745	296
Medium (30%-59% F/RP)	45.8	8.7	45.5	5,651	555
High (60% or more F/RP)	50.8	14.7	34.5	3,381	336
Once elementary school students finish eating they <sup>2</sup> Are allowed to leave the	61.4	7.0	27.6	2 1 9 2	225
cafeteria	61.4	7.8	27.6	3,182	325
Must remain in the cafeteria	35.5	12.4	45.5	9,157	932

 $^{1}n$  is less than 1,292 SFAs that reported having elementary schools due to item non-response.

<sup>2</sup> Percentage of SFAs following various lunch and recess schedules differed significantly by SFA size, urbanicity, poverty level and after lunch student mobility policy at the .05 level.

Data Source: SFA Director Survey 2011, question 4.8.

### **IV-3. Food Safety and Training**

### Background

Food safety is a critical aspect of daily life in the home and in public venues. In 2000, the Centers for Disease Control and Prevention (CDC) reported that foodborne disease caused approximately 76 million illnesses, 325,000 hospitalizations and 5,000 deaths nationally. At that time, there was concern that throughout the food industry the most basic food safety precautions, such as washing hands, storing leftovers properly, and cooking food to required temperatures, were not being taken when cooking, preparing, and consuming food products.

Although NSLP and SBP are permanently authorized, Congress reviews the child nutrition programs every 5 years through the reauthorization process. When Congress passed the Child Nutrition and WIC Reauthorization Act (PL 108-265) in 2004, it required all SFAs to implement a food safety program by the beginning of SY 2005-06 to ensure the meals served in schools were safe. The law stipulated that the food safety program must be based on hazard analysis and critical control point (HACCP) principles and conform to all guidance issued by USDA. Additionally, the HHFKA reinforces the focus on food safety by requiring that schools continue to receive two food safety inspections a year and that the food safety program applies to the entire school campus.

### **Research Questions**

This section presents data on a variety of issues related to food safety in SFAs, including the availability of a written food safety plan and food safety training, types of food safety program components implemented in the schools, use of food defense practices, policies and procedures in place to accommodate students with special diets, safety inspections and violations, and hold or recall procedures for the USDA Foods program. Specifically, this section addresses the following research questions.

- What percent of SFAs have written food safety plans?
- What food safety program components have been implemented?
- What percent of schools have a food service supervisor or manager with a food safety certification?
- What topics did food service employees receive training on during the prior year? What USDA materials were used?
- How many students with non-allergy special diets are served in your district?
- What food defense practices are being done in states and school districts?
- What percent of SFAs had two or more safety inspections for all schools? Who conducted these inspections? If some schools did not have at least two inspections, what were the reasons?
- What types of violations were schools cited?
- How are SFAs alerted about food recalls? How do SFAs alert schools about food recalls?

What procedures do states and school districts use to ensure traceability of USDA Foods in the event of a hold or recall?

### Results

### **Food Safety Plans and Staff Certifications**

Following enactment of PL 108-265, the USDA provided guidance to SFAs on preparing written food safety plans.<sup>25</sup> By SY 2011-12 nearly all SFAs (96 percent) reported that all schools in their district had a written food safety plan based on HACCP principles. This represents a substantial increase over the percentage of SFAs reported before the enactment of the legislation when only 35 percent reported having formal HACCP plans in place (SNDA-III, 2007). Table IV-3.1 shows the percentage of SFAs with schools that have written food safety plans by SFA characteristics. In SY 2011-12, about 4 percent of small SFAs reported that none of their schools had written plans, while less than 1 percent of the very large SFAs fell into this category. Overall, 3 percent of the all SFAs reported this situation. A review of open-ended responses provided by SFA directors suggests that some of the reasons for not having a written plan included the plan is in process, no time to develop a plan, no "working kitchen," or meal preparation is a satellite operation.

	-	e of SFAs wi plan based o	Total SFAs			
SFA characteristics	All schools	Most schools	Some schools	No schools	Weighted n	Unweighted <i>n</i>
All SFAs	95.6%	1.0%	0.8%	2.6%	14,439	1,387 <sup>1</sup>
SFA size						
Small (1-999)	93.8	1.0	0.7	4.4	7,207	325
Medium (1,000-4,999)	97.1	1.4	0.9	0.6	5,331	531
Large (5,000-24,999)	97.5	0.0	1.2	1.3	1,616	362
Very large (25,000+)	99.6	0.0	0.0	0.4	284	169
Urbanicity						
City	94.5	1.7	0.6	3.1	1,581	254
Suburban	95.2	0.3	2.1	2.4	2,809	376
Town	97.3	1.4	0.9	0.4	2,763	263
Rural	95.3	1.0	0.3	3.4	7,286	494
Poverty level						
Low (0-29% F/RP)	96.0	1.2	0.4	2.3	3,339	343
Medium (30-59% F/RP)	96.1	1.1	0.6	2.3	6,743	645
High (60% or more F/RP)	94.5	0.8	1.4	3.3	4,357	399

# Table IV-3.1.Percentage of SFAs with Written Food Safety Plan Based on HACCP Principles in<br/>Schools by SFA Characteristics, Food Safety Program Components, and SFA<br/>Director Certification, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, question 12.1.

<sup>25</sup> http://www.fns.usda.gov/fns/safety/pdf/HACCPGuidance.pdf

As Table IV-3.2 shows, most SFA directors reported the following three primary components to food safety were implemented in the schools:

- Written standard operating procedures for food safety (93 percent),
- Annual review and updating of food safety plans (88 percent), and
- Menu items grouped by processes (79 percent) such as same day service or complex or no cooking involved.

Another aspect to food safety is taking and recording temperatures of the food at set points starting when the SFA receives the raw products through serving the meal to students. As shown in Table IV-3.2, most SFAs took temperatures and recorded them when receiving the food (84 percent). Ninety to 96 percent of SFAs recorded temperatures at the other stages of food production and service.

#### Table IV-3.2. Percentage of SFAs that Followed Various Food Safety Practices, SY 2011-12

Food safety practice	Percentage of SFAs
Components of food safety program	
Written standard operating procedures	92.5%
Annual review and updating of food safety plan	88.4
Menu items groups by process	78.8
Temperatures taken and recorded for:	
Foods at receiving	84.1
Foods in storage	90.3
End-point cooking temperatures	95.3
Holding temperatures	95.2
Serving temperatures	96.0
Cooling temperatures	90.6
Total SFAs: Weighted n	14,422
Total SFAs: Unweighted n	1,384 <sup>1</sup>

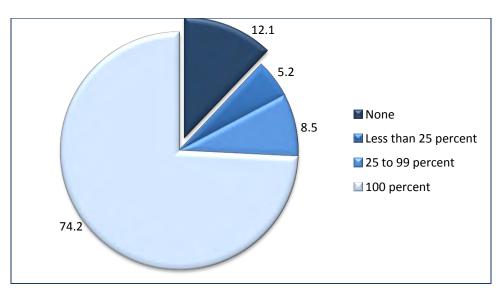
 $^{1}n$  is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 12.1 and 12.3.

### **Food Safety Certification**

A key aspect of understanding the elements of food safety is having staff trained and certified to carry out the written plans for handling food for the school-meal programs. Figure IV-3.1 shows the percentage of SFAs with varying proportions of schools having at least one food safety supervisor or manager with a food safety certification. Seventy-four percent of SFAs reported that all of their schools had at least one food service supervisor or manager with a food safety certification. About 12 percent of SFAs said that none of their schools had supervisors or managers who hold a food safety certification. However, further analysis of the characteristics of these 111 SFAs reporting that none of their schools have supervisors or managers holding a food safety certification reveals that this group of SFAs mostly includes small SFAs (75 percent, not shown) located in rural areas (65 percent, not shown). Furthermore, almost 95 percent (not shown) of these SFAs reported having fewer than 10 schools in their districts.

Figure IV-3.1. Percentage of SFAs with Differing Proportion of Schools that Have at least One Food Service Supervisor or Manager with Food Safety Certification, FY 2011-12



*n* is less than 1,401 due to item non-response. Percentages based on a weighted response of 14,346 (unweighted 1,376). Data Source: SFA Director Survey 2011, question 12.15.

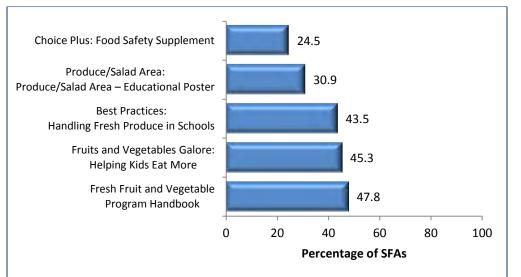
#### Safety Topics Covered in Trainings

Because of the importance of preventing foodborne illness, all food service employees are expected to follow guidelines to maintain a safe food service environment in schools. When asked about food safety training topics during the school year (SY 2010-11), the vast majority of SFAs reported that food service employees were trained on all the major food safety topics. Furthermore, Appendix E, Figure E-1 shows that the percentage of SFAs ranged from 88 percent of SFAs training staff on proper equipment use and maintenance to 98 percent of SFAs reporting that they trained employees on personal hygiene and proper hand washing techniques. Safe food handing at different points in the food preparation process was reported by 94 to 96 percent of SFAs.

#### **USDA Materials**

As part of its assistance to SFAs, the USDA develops and makes available materials on a variety of topics. SFA directors were asked about their use of these materials. Almost three-fourths (not shown) of SFAs reported using some of the USDA materials to assist in food safety. The most frequently cited material was the "Fresh Fruit and Vegetable Program Handbook," where 48 percent of SFAs reported using it to assist them in food safety, as shown in Figure IV-3.2.<sup>26</sup> Although the majority of the handbook focuses on the operations of the program and which schools are eligible to participate, it does contain a section on food safety within the USDA FFVP program.

<sup>&</sup>lt;sup>26</sup> http://www.fns.usda.gov/cnd/ffvp/handbook.pdf.



#### Figure IV-3.2. Percentage of SFAs Using USDA Materials to Assist in Food Safety, FY 2011-12

*n* is less than 1,401 due to item non-response. Percentages based on a weighted response of 14,225 (unweighted 1,372). Data Source: SFA Director Survey 2011, question 12.17.

### **Food Defense Plan or Practices**

Another element in food safety is the food defense plan—a written plan that describes steps that school cafeterias can make to minimize the risk of food product contamination and ensure safe working environments for staff.<sup>27</sup> The measures are periodically assessed to see if adjustments to the plan are needed. Although the plan should be in place at all times, it is particularly helpful during emergencies. During a crisis, when stress is high and response time is at a premium, a documented set of procedures improves a school's ability to respond quickly. A food defense plan also helps maintain a safe working environment for staff, provide a quality product to students, and protect the SFA's bottom line. A functional food defense plan must be:

- In writing,
- Put into place and used as intended,
- Tested or drilled periodically to see if it is being followed and the measures work,
- Assessed periodically to see if production procedures have changed or new equipment has been put into place that may require adjustment to the plan, and
- Maintained by training new employees and ensuring provisions required by the plan are available.

Table IV-3.3 shows that less than half (44 percent) of all SFAs reported they used either a food defense plan or food defense practices; so 56 percent of SFAs do not use them. A higher percentage of the very large SFAs reported having food defense plans or practices in place compared to other SFAs. Sixty percent of very large SFAs reported having a plan or practice, while

<sup>&</sup>lt;sup>27</sup> http://www.fsis.usda.gov/pdf/guidance\_document\_warehouses.pdf.

39 percent of the small SFAs indicated they had a plan or practice. Compliance with having a plan did not differ significantly by SFA urbanicity or poverty level.

		Total SFAs		
SFA characteristics	Percentage of SFAs	Weighted n	Unweighted n	
All SFAs SFA size <sup>2</sup>	43.5%	14,206	1,368 <sup>1</sup>	
Small (1-999)	38.5	7,080	320	
Medium (1,000-4,999)	48.4	5,250	523	
Large (5,000-24,999)	46.6	1,596	358	
Very large (25,000+)	59.7	280	167	
Urbanicity				
City	38.4	1,531	249	
Suburban	46.9	2,747	370	
Town	42.6	2,733	260	
Rural	43.6	7,196	489	
Poverty level				
Low (0-29% F/RP)	40.9	3,262	337	
Medium (30%-59% F/RP)	43.6	6,677	639	
High (60% or more F/RP)	45.3	4,267	392	

#### Table IV-3.3. Percentage of SFAs Using a Food Defense Plan or Food Defense Practice by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs using a food defense plan or food defense practices differed significantly by SFA size at the .05 level. Data Source: SFA Director Survey 2011, question 12.18a.

Table IV-3.4 shows that during SY 2011-12, 89 percent of SFAs that used defense plans or practices reported their food service operations included a plan to prevent the intentional contamination of food, and 84 percent reported that school food service operators are involved in the school district emergency plan. Almost one-third of these SFAs (31 percent) used a biosecurity checklist.

#### **Special Diets**

Some students require a special diet. These students include those with food allergies as well as those with non-allergy-related special diets, such as students with certain disabilities. While most people are aware of safety concerns surrounding students with food allergies, fewer may understand the extent of providing meals to students with non-allergy-related special diets. Table IV-3.5 shows that the vast majority of SFAs (91 percent) stated that they have policies and procedures to accommodate students with special diets. However, when asked about the number of students having non-allergy-related special diets, 43 percent (not shown) of SFAs stated they did not know the number of students with non-allergy-related special diets. The remaining 57 percent (not shown) reported serving over 100,000 students (weighted) with non-allergy-related special diets.

# Table IV-3.4.Among SFAs that Used a Food Defense Plan or Practices, the Percentage of<br/>SFAs Using Various Food Defense Practices by SFA Characteristics, SY 2011-12

	Percen	Tota	al SFAs			
SFA characteristics	Plan to prevent food contamination	School district emergency plan	Biosecurity checklist	Other practices	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs	88.9%	83.8%	30.7%	3.2%	6,155	651 <sup>1</sup>
SFA size <sup>2</sup>						
Small (1-999)	92.4	79.8	31.5	3.1	2,726	125
Medium (1,000-4,999)	86.9	84.6	28.2	2.7	2,525	257
Large (5000-24,999)	83.6	93.6	35.9	3.9	738	169
Very Large (25,000+)	85.6	93.8	34.8	11.4	166	100
Urbanicity						
City	87.8	83.1	29.3	6.7	586	127
Suburban	83.9	91.1	30.0	3.4	1,268	181
Town	91.4	79.8	36.5	3.6	1,165	120
Rural	90.3	82.5	29.2	2.4	3,135	223
Poverty level <sup>3</sup>						
Low (0-29% F/RP)	89.0	84.4	20.8	5.3	1,329	146
Medium (30-59% F/RP)	87.9	82.9	30.0	2.5	2,896	303
High (60% or more F/RP)	90.3	84.8	38.7	2.8	1,930	202

<sup>1</sup> *n* is less than the 654 SFAs that used food defense plan or practices due to item non-response.

<sup>2</sup> Percentage of SFAs having a school district emergency plan differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs having a biosecurity checklist differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 12.18b.

# Table IV-3.5. Percentage of SFAs with Policies and Procedures to Accommodate Students with Special Diets by SFA Characteristics, SY 2011-12

		Tota	l SFAs	
SFA characteristics	Percentage of SFAs	Weighted n	Unweighted n	
All SFAs	91.4%	13,762	1,346 <sup>1</sup>	
SFA size <sup>2</sup>				
Small (1-999)	89.9	6,713	304	
Medium (1,000-4,999)	91.9	5,163	515	
Large (5,000-24,999)	95.1	1,606	360	
Very large (25,000+)	98.6	281	167	
Urbanicity				
City	92.1	1,440	247	
Suburban	92.0	2,653	365	
Town	92.9	2,675	256	
Rural	90.5	6,993	478	
Poverty level				
Low (0-29% F/RP)	88.2	3,238	336	
Medium (30-59% F/RP)	93.7	6,514	627	
High (60% or more F/RP)	90.4	4,010	383	

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs with policies to accommodate students with special diets differed significantly by SFA size at the .05 level. Data Source: SFA Director Survey 2011, question 12.4.

There was very little variation across SFA characteristics in terms of those with policies and procedures to accommodate students with special diets. As shown in Table IV-3.5, nearly 90 percent of the smallest SFAs had such policies compared to 95 and 99 percent of the large and very large SFAs. Differences among levels of urbanicity and poverty were not statistically significant.

Table IV-3.6 shows the most frequent practices to protect students with special diets cited by SFAs included obtaining a signed prescription from a child's physician (88 percent) and having the cashier check the student's tray (66 percent). The percentage of SFA directors reporting requiring a signed prescription increased with the size of the SFA. Eighty-one percent of small SFAs required a signed prescription from a physician, while 99 percent of the very large SFAs had this requirement.

	Percentage of SFAs with the following policies and procedures to accommodate students with special diets:					Total SFAs		
SFA characteristics	Signed prescription from physician	Cashier has child names to check trays	Consultation with registered dietitian to plan menus	Other	Weighted <i>n</i>	Unweighted <i>n</i>		
All SFAs	87.5%	65.7%	26.4%	8.5%	14,344	1,381 <sup>1</sup>		
SFA size <sup>2</sup>								
Small (1-999)	80.7	54.3	14.7	10.9	7,146	322		
Medium (1,000-4,999)	93.5	74.5	32.7	6.1	5,296	528		
Large (5,000-24,999)	96.0	82.8	48.4	6.0	1,618	362		
Very large (25,000+)	98.9	88.6	76.3	9.9	284	169		
Urbanicity <sup>3</sup>								
City	87.0	67.7	36.4	13.2	1,541	252		
Suburban	87.4	72.5	30.4	8.4	2,823	376		
Town	93.1	70.5	29.9	4.8	2,744	262		
Rural	85.5	60.8	21.4	9.0	7,225	491		
Poverty level <sup>4</sup>								
Low (0-29% F/RP)	83.6	65.1	24.4	5.9	3,265	340		
Medium (30-59% F/RP)	91.2	70.0	25.9	9.1	6,709	642		
High (60% or more F/RP)	84.7	59.5	28.6	9.7	4,370	399		

# Table IV-3.6.Percentage of SFAs that Use Various Types of Food Service Procedures to<br/>Protect Students with Special Diets by SFA Characteristics, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs that use a signed prescription from physician, have cashier check child names against trays, consult with registered dietitians, and implement other policies to accommodate students with special diets differed significantly by SFA size at the .05 level.

<sup>3</sup>Percentage of SFAs that have cashier check child names against trays and consult with registered dietitians to accommodate students with special diets differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs that use a signed prescription from physician and have cashier check child names against trays to accommodate students with special diets differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 12.6.

### **Components of Food Safety**

#### **Safety Inspections**

About 84 percent of SFAs reported that all of their schools had two or more safety inspections during SY 2010-11 as shown in Table IV-3.7.28 Another 4 percent said that most schools had two or more safety inspections. Eight percent of SFAs reported that none of their schools had two or more safety inspections during SY 2010-11, and this was more likely among smaller SFAs than larger SFAs. Furthermore, Appendix E, Table E-2 shows that the percentage of SFAs that had all schools inspected for SY 2010-11 is similar to those reported in SY 2008-09 (84 percent) and SY 2009-10 (85 percent).

	Percentage of SFAs with two or more safety inspections in SY 2010-11 at:				Total SFAs	
SFA characteristics	All schools	Most schools	Some schools	No schools	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs	84.2%	4.1%	3.6%	8.1%	14,418	1,386 <sup>1</sup>
SFA size <sup>2</sup> Small (1-999) Medium (1,000-4,999) Large (5,000-24,999) Very large (25,000+) Urbanicity <sup>2</sup> City Suburban Town Rural	84.9 84.7 80.7 75.3 74.5 84.7 83.6 86.2	2.4 4.0 10.1 14.7 11.1 4.7 5.5 1.8	2.9 4.2 4.2 7.3 5.8 4.6 4.8 2.3	9.8 7.2 4.9 2.7 8.6 6.0 6.1 9.6	7,179 5,337 1,618 284 1,539 2,860 2,769 7,250	324 531 362 169 252 378 263 493
Poverty level Low (0-29% F/RP) Medium (30-59% F/RP) High (60% or more F/RP)	85.5 83.2 84.6	3.0 3.3 6.2	2.8 4.2 3.3	8.6 9.3 6.0	3,341 6,757 4,319	344 645 397

#### Table IV-3.7. Percentage of SFAs with All, Most, Some, or No Schools having Two or More Safety Inspections by SFAs Characteristics, SY 2010-11

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs with schools having two or more safety inspections differed significantly by SFA size and urbanicity at the .05 level.

Data Source: SFA Director Survey 2011, question 12.7a.

<sup>&</sup>lt;sup>28</sup> http://www.fns.usda.gov/fns/safety/pdf/inspections\_09-10.pdf.

For those 8 percent of SFAs reporting that schools did not have two or more safety inspections, Table IV-3.8 shows the reasons, which included lack of local public health inspectors (54 percent), insufficient funding at state and local public health agencies (51 percent), public health agencies setting a low priority for such inspections (35 percent), and schools in general being a low priority for inspections (27 percent).

# Table IV-3.8. Among SFAs that reported their Schools Did Not Have Two Safety Inspections,<br/>the Percentage of SFAs Citing Various Reasons, SY 2010-11

Reasons	Among SFAs with less than two school inspections, the percentage of SFAs citing various reasons
Insufficient funding at state and local public health agencies	51.0%
Lack of local public health inspectors	53.8
Schools are a low priority	27.0
Public health agencies prioritize inspections according to risk	35.4
Insufficient funding in the school district to pay for two or more inspections	7.0
Other <sup>1</sup>	29.5
SFAs with schools that did not have two inspections: Weighted n	1,188
SFAs with schools that did not have two inspections: Unweighted <i>n</i>	86 <sup>2</sup>

<sup>1</sup> The other responses were: requested two inspections but only received one (12 percent), only one inspection per year required (7 percent), and don't know reason (6 percent) and other (4 percent).

 $^{2}$  n is equal to the 86 SFAs in which no schools had at least two safety inspections in SY 2010-11.

Data Source: SFA Director Survey 2011, question 12.9.

Both state and local agencies may conduct school food safety inspections, and some SFAs are inspected by multiple agencies. The predominant government agencies conducting school food safety inspections were state agencies, such as public health agencies (76 percent). Forty percent of SFAs indicated that local government agencies conducted inspections in SY 2010-11 as shown in Table IV-3.9. The agency that conducted the safety inspections varied by SFA size, urbanicity, and poverty level. For example, local government inspections were more likely for large and very large SFAs.

# Table IV-3.9.Percentage of SFAs that Reported Food Safety Inspections are Conducted by<br/>Various Types of Agencies by SFA Characteristics, SY 2010-11

	Percentage o	of SFAs reporting insp	Tot	al SFAs	
SFA characteristics	State governmental agency	Local governmental agency	Some other agency	Weighted n	Unweighted <i>n</i>
All SFAs	75.6%	40.2%	3.8%	13,243	1,300 <sup>1</sup>
SFA size <sup>2</sup>					
Small (1-999)	82.7	30.4	2.5	6,474	293
Medium (1,000-4,999)	71.3	45.2	4.3	4,954	495
Large (5,000-24,999)	64.6	59.7	7.7	1,538	347
Very large (25,000+)	47.1	70.8	6.2	277	165
Urbanicity <sup>2</sup>					
City	63.9	53.4	2.9	1,407	240
Suburban	60.0	61.4	7.4	2,688	357
Town	81.1	35.3	6.0	2,599	249
Rural	82.4	30.5	1.7	6,548	454
Poverty level <sup>3</sup>					
Low (0-29% F/RP)	64.0	49.7	4.7	3,053	317
Medium (30-59% F/RP)	77.8	36.5	3.8	6,128	601
High (60% or more F/RP)	81.1	38.6	3.2	4,061	382

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs reporting inspections by state government, local government, and other agencies differed significantly by SFA size and urbanicity at the .05 level.

<sup>3</sup> Percentage of SFAs reporting inspections by state government and local government agencies differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, question 12.8.

#### **Schools Cited for Food Safety Violations**

Eighty-three percent of SFAs reported that none of the schools under their purview were cited for food safety violations, while 17 percent had one or more schools cited during SY 2009-10 as shown in Table IV-3.10. There was virtually no difference by poverty level of SFAs reporting food safety violations among their schools, but there was substantial variation based on the size of the SFAs and urbanicity. An estimated 40 percent of large SFAs and 59 percent of very large SFAs reported having at least one school cited for violations. By contrast, only 9 percent of small SFAs reported having schools cited for food safety violations. Twenty-seven percent of SFAs located in urban areas reported schools with violations, while only 14 percent of SFAs in rural areas reported violations.

During SY 2010-11, an estimated 7,968 elementary schools were cited for food safety violations.<sup>29</sup> Approximately 2,793 middle/junior high schools and 2,837 high schools were also cited for violations. Among "other" schools not classified as elementary, middle or high school, 1,163 received citations for food safety violations.<sup>30</sup>

<sup>&</sup>lt;sup>29</sup> Weighted numbers of students based on responses to question 12.11 of the 2011 SFA Director Survey.

<sup>&</sup>lt;sup>30</sup> These numbers are weighted numbers and represent estimates of the number of schools with food safety violations in the states and territories.

# Table IV-3.10. Percentage of SFAs with One or More Schools Cited for Food Safety Inspection Violations by SFA Characteristics, SY 2010-11

		Tota	
SFA characteristics	Percent of SFAs	Weighted n	Unweighted <i>n</i>
All SFAs	17.3%	14,407	1,384 <sup>1</sup>
SFA size <sup>2</sup>			
Small (1-999)	9.4	7,181	324
Medium (1,000-4,999)	19.0	5,337	531
Large (5,000-24,999)	40.2	1,605	360
Very large (25,000+)	58.6	284	169
Urbanicity <sup>2</sup>			
City	26.7	1,566	253
Suburban	21.2	2,847	376
Town	17.8	2,769	263
Rural	13.6	7,224	492
Poverty level			
Low (0-29% F/RP)	17.7	3,329	342
Medium (30-59% F/RP)	17.5	6,757	645
High (60% or more F/RP)	16.7	4,321	397

<sup>1</sup> *n* is less than 1,401 due to item non-response.

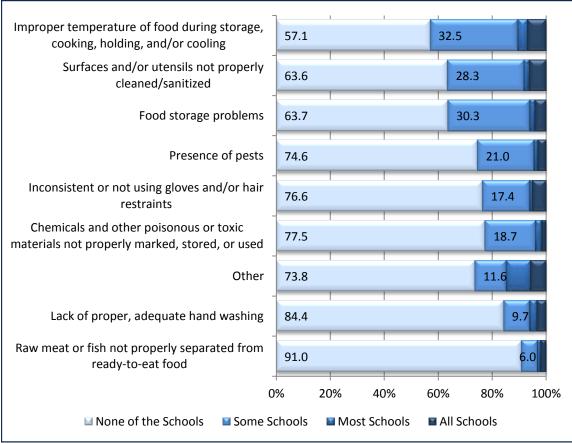
<sup>2</sup> Percentage of SFAs with one or more schools cited for food safety inspection violations differed significantly by SFA size and urbanicity at the .05 level.

Data Source: SFA Director Survey 2011, question 12.10.

#### **Types of Violations**

Figure IV-3.3 shows that among SFAs that had schools cited for food safety violations, the most common reasons were improper food temperature (43 percent), unsanitary surfaces or utensils (36 percent), food storage problems (36 percent), pests (25 percent), and inconsistent use of gloves and/or hair restraints (23 percent).

# Figure IV-3.3. Among SFAs with Schools Cited for Food Safety Violations, the Percentage of SFAs with All, Most, Some, and No Schools having Various Types of Violations



n is less than the 389 SFAs that had schools cited for food safety violations due to non-response. Percentages are based on a weighted n of 2,493 (unweighted 388).

Data Source: SFA Director Survey 2011, question 12.12.

### **Food Recall Notification Procedures**

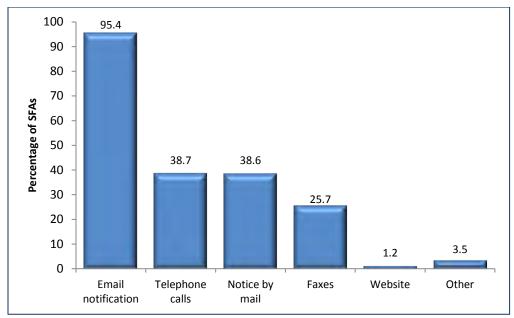
Food recalls protect consumers and are governed by several laws, regulations, and policies. Federal agencies— Food Safety Inspection Service (FSIS), Food and Drug Administration (FDA), or the Centers for Disease Control and Prevention (CDC)—could be informed when a company identifies a problem. When a product and its source are identified, either FSIS or FDA—whichever agency has jurisdiction over the product—works with the company to recall the affected food.

FNS provides information to the states on food recalls and provides instructions on how to dispose of the recalled food. FNS also provides information on how the schools will be reimbursed for recalled products. FNS sends this information to the states, and the states then inform the SFAs and schools.

From the survey of state directors detailed in section VI of this report, the data reveal that over half of the states had formal policies regarding food recalls. Also, nearly all of the states reported contacting SFA directors primarily by email when recalls occur. The states provide the SFA director with the hold or recall notice along with information about the product. In nearly all states, the SFA director receives disposal instructions and contact information for any questions. Most states also indicated they provide SFAs with press releases about the hold or recall.

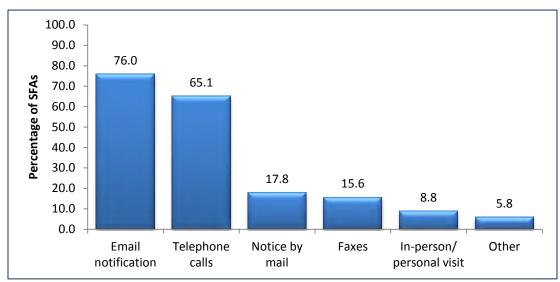
SFA directors were asked to provide information about how they receive information about food holds and recalls. As Figure IV-3.4 shows, the vast majority of SFAs (95 percent) said they were informed through email. Twenty-six percent of the SFA directors received faxes, 39 percent received telephone calls, and 39 percent received notices by mail. Clearly, some SFA directors received notices via multiple means.

#### Figure IV-3.4. Percentage of SFAs that Receive Alerts about Food Recalls via Various Methods, SY 2011-12



*n* is less than 1,401 due to item non-response. Percentages based on a weighted response of 14,426 (unweighted 1,386). Data Source: SFA Director Survey 2011, question 12.13.

After receiving information about food holds and recalls, it is the SFA's responsibility to disseminate the information to schools. Figure IV-3.5 shows that SFAs typically sent emails (76 percent) or made telephone calls (65 percent) to notify schools about holds or food recalls. Given the relationship between the SFA and the schools it serves, as well as the physical proximity of offices in some cases, it is not surprising that about 9 percent reported notifying the schools in person.



### Figure IV-3.5. Percentage of SFAs that Use Various Methods to Alert Schools about Holds or Food Recalls, SY 2011-12

*n* is less than 1,401 due to item non-response. Percentages based on a weighted response of 14,396 (unweighted 1,385). Data Source: SFA Director Survey 2011, question 12.14.

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## **IV-4. Food Procurement**

## Background

The procurement process and practices for school foods are influenced by a number of factors, including the following:

- Procurement regulations and guidance;
- Nutritional requirements and standards set by USDA at the Federal level, as well as those set by state and local agencies that oversee the child nutrition programs;
- The financial resources of the SFA; and
- Constraints and capabilities of the food service operation, including cafeteria layout and kitchen type, storage facilities.

Given the substantial governmental investment in school meals, Federal law requires SFAs to devote at least 51 percent of their school food budget to domestically grown agricultural products. Some states and local governments have additional requirements that exceed the Federal laws regarding food procurements using public funds. The updated nutritional standards for the NSLP and the SBP as required by the HHFKA will affect procurement practices in schools, LEAs, and states across the country. The new meal patterns call for schools to offer more fruits and vegetables, phase in more whole-grain and low-fat and non-fat dairy products, and reduce sodium and sugar content.

## **Research Questions**

This chapter answers the following research questions regarding food procurement processes and practices.

- Are SFAs using geographic preference in their procurement of foods? If yes, how frequently?
- Do SFAs use food purchasing specifications that include specific per-serving nutrient requirements? Are these product specifications required for all foods or just some foods? What nutritional information is requested from potential vendors? Is this information provided?
- What proportion of SFAs utilizes an FSMC?

### **Results**

### **Use of Geographic Preference and Farm to School**

The 2008 amendments to the National School Lunch Act require the Secretary of Agriculture to encourage SFAs to purchase unprocessed<sup>31</sup> locally grown and locally raised agricultural products.<sup>32</sup> To accomplish this, SFAs have the option of including a geographic preference clause when procuring such products. If a geographic preference has been established for procurements, the bidders in a specified geographic area can be awarded additional points or the SFA may prescribe geographic preference in terms of a percentage of the price. The chosen method must be clearly outlined in the procurement scoring criteria. Although a geographic preference is not a procurement set-aside for bidders located in the specified geographic area, it is a tool that gives bidders in a specified geographic area a defined advantage in the procurement process. However, procurements must still be conducted in a manner that allows for maximum free and open competition.

To gain an understanding of how SFAs go about the process of food procurement, directors were asked a series of questions about their preference for purchasing unprocessed foods that were locally grown, raised, or produced. During SY 2011-12, just under half of all SFAs (49 percent) reported never giving preference for purchasing unprocessed foods that have been locally grown, raised, or produced as shown in Table IV-4.1. The use of geographic preference in procurements varied depending on the characteristics of the SFA. Compared with other SFA size categories, a higher percentage of the small SFAs reported never giving preference when purchasing foods (60 percent). Higher percentages of large, very large, and more affluent SFAs gave preference based on geographic proximity compared with other groups. Larger SFAs may be able to secure better pricing from food suppliers based on the sheer volume of their purchases. Although SFAs located in more rural areas may be expected to have greater access to locally grown or raised products, 54 percent reported they never give preference to locally produced products.

When asked about their participation in farm to school activities, only 20 percent (shown previously in Table III-10) of SFAs indicated their involvement in this initiative. This percentage is considerably below the 51 percent of SFAs that gave geographic preference at least some of the time. Because a primary focus of farm to school activities is connecting schools with local or regional producers and bringing locally sourced fresh fruits and vegetables as well as minimally processed foods into schools, the difference is surprising. However, it is possible that the discrepancy stems from some SFA directors perceiving geographic preference as a procurement issue rather than an element of farm to school. For those SFAs that indicated participation in farm to school, 89 percent used geographic preference in procurement decisions at least some of the time.

<sup>&</sup>lt;sup>31</sup> Unprocessed is defined as agricultural products that retain their inherent character.

<sup>&</sup>lt;sup>32</sup> "Geographic Preference Option for the Procurement of Unprocessed Agricultural Products in Child Nutrition Programs," 76 Federal Register ,78, April 22, 2011, p. 22603. Available at http://www.fns.usda.gov/cnd/Governance/regulations/2011-04-22.pdf.

## Table IV-4.1.Percentage of SFAs that Gave Preference to Purchasing Unprocessed Foods<br/>that Have Been Locally Grown, Raised, or Produced, SY 2011-12

	-	SFAs that give prefere unprocessed, local fo	Tota	l SFAs	
SFA characteristics	Most of the time	Some of the time	Never	Weighted n	Unweighted n
All SFAs	8.3%	42.7%	49.0%	14,540	1,393 <sup>1</sup>
SFA size <sup>2</sup>					
Small (1-999)	7.6	32.5	59.9	7,261	327
Medium (1,000-4,999)	8.5	50.4	41.1	5,370	534
Large (5,000-24,999)	10.0	60.3	29.7	1,625	363
Very large (25,000+)	11.3	58.4	30.3	284	169
Urbanicity <sup>2</sup>					
City	10.2	42.0	47.7	1,627	255
Suburban	9.0	57.5	33.5	2,865	379
Town	8.5	37.8	53.7	2,773	264
Rural	7.5	39.0	53.5	7,275	495
Poverty level <sup>2</sup>					
Low (0-29% F/RP)	10.3	51.8	37.9	3,357	346
Medium (30%-59% F/RP)	7.5	42.1	50.4	6,799	647
High (60% or more F/RP)	7.9	36.8	55.3	4,384	400
Particpating in the farm to school initiative	19.2	70.1	10.7	2,971	366

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs giving preference to purchasing unprocessed, local foods differed significantly by SFA size, urbanicity, and poverty level at the .05 level.

Data Source: SFA Director Survey 2011, questions 10.1 and 11.5.

Not surprisingly, given budget constraints and the need to operate at a break-even level, price is an important factor in SFA directors' decisions when purchasing local foods. Table IV-4.2 shows that about one-third of SFA directors who give preference to purchasing local foods reported that they only purchase them when they are priced competitively. Only 10 percent of SFA directors reported that they always purchased or tried to purchase local foods even when similar products could be purchased outside the geographic area for less.

Table IV-4.3 shows that the most commonly preferred local foods by far were fresh fruits and vegetables (97 percent). Other local food items that SFA directors were inclined to purchase were reported by less than one-quarter of the SFAs. This may be related to the location of the SFA and the availability of these foods within the local area. For example, pasteurized milk may not be available within the locally defined area for all SFAs. Definitions of what is "local" varied among SFA directors. Table IV-4.3 also shows the percentage of SFA directors who use different definitions of local. For example, nearly half (41 percent) of SFA directors considered a within-50-mile distance from their schools as their definition to be local, while another 29 percent use 51-100 miles. Fifteen percent considered within 101-200 miles to be local, and the remaining 15 percent consider more than 200 miles or "other" as local.

# Table IV-4.2.Among SFAs Giving Preference to Local Foods, the Percentage of SFAs that DoThis Always, Sometimes, or Only If they are Priced Competitively, SY 2011-12

	Among SFAs giving	Tota	al SFAs		
SFA characteristics	Always purchases or tries to purchase locally	Sometimes purchases or tries to purchase locally	Only purchases locally when priced competitively	Weighted	Unweighted
All SFAs	10.3%	55.2%	34.4%	7,395	812 <sup>1</sup>
SFA size Small (1-999) Medium (1,000-4,999) Large (5,000-24,999) Very large (25,000+) Urbanicity City Suburban Town Rural	11.0 9.8 8.6 19.2 16.4 10.2 11.3 8.5	54.2 57.0 54.4 48.8 52.4 59.7 51.3 55.0	34.9 33.2 37.0 32.0 31.2 30.1 37.4 36.5	2,913 3,141 1,143 198 850 1,904 1,270 3,371	127 310 257 118 167 275 125 245
Poverty level Low (0-29% F/RP) Medium (30%-59% F/RP) High (60% or more F/RP)	10.6 7.8 14.5	56.5 54.1 55.8	32.9 38.1 29.7	2,070 3,364 1,961	239 362 211

 $^{1}$  n is less than the 814 SFAs that gave preference to local foods due to item non-response.

Data Source: SFA Director Survey 2011, questions 10.2, 10.3, and 10.4.

# Table IV-4.3.Among SFAs Giving Preference to Local Foods, the Percentage of SFAs thatPurchase Various Foods and Define Local in Different Ways, SY 2011-12

Action	Percentage of SFAs
Purchased local foods	
Fresh fruits and vegetables	96.5%
Pasteurized milk	23.0
Meat, fish, or poultry	10.9
Breads or grains	1.2
Other foods	2.0
Total SFAs: Weighted n	7,405
Total SFAs: Unweighted n	812 <sup>1</sup>
Defined local as:	
Within 50 miles of schools	41.2
Within 51-100 miles of schools	28.6
Within 101-200 miles of schools	15.4
More than 200 miles	5.7
Within state	4.4
Other	4.8
Total SFAs: Weighted n	7,384
Total SFAs: Unweighted n	811 <sup>1</sup>

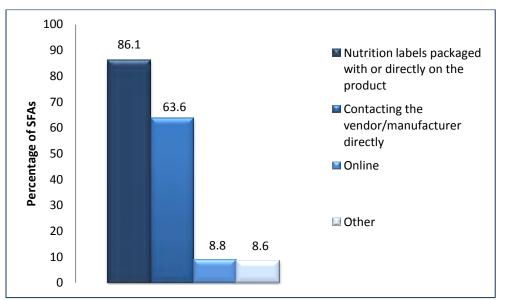
 $^1\,n$  is less than the 814 SFAs that gave preference to local foods due to item non-response. Data Source: SFA Director Survey 2011, questions 10.3 and 10.4.

### **Food Purchasing Specifications**

The HHFKA directed USDA to update the NSLP and SBP meal pattern and nutrition standards and to base the updates on the latest *Dietary Guidelines for Americans* (Schneider et al., 2012). USDA issued a final interim regulation describing the updated standards and the implementation schedule in January 2012. The updated NSLP meal patterns began in SY 2012-13 (though some requirements such as sodium reduction and whole-grain increases are to be phased in over time). SBP meal pattern changes will begin to be implemented in SY 2013-14. The updated meal patterns increase the offering of fruits, vegetables, and whole grains. The updated standards also establish calorie ranges for different age groups to ensure age-appropriate meals for grades K-5, 6-8, and 9-12. Other meal requirements include gradual reductions in the sodium content of meals; specific sodium content targets must be reached by SY 2014-15 and SY 2017-18 and fully implemented by SY 2022-23. Although meal patterns have been updated to reflect current dietary guidelines, decisions about what specific foods to serve, and therefore procure, and how they are prepared and presented continue to be made at the school and SFA levels.

Most SFAs obtained nutrition information about the foods they received in more than one way. Nutritional labels included with the product (86 percent) and contacting the vendor or manufacturer directly (64 percent) were the two most common methods of obtaining product nutrition information, as shown in Figure IV-4.1. Much less common were online searches (9 percent) and "other" (9 percent).

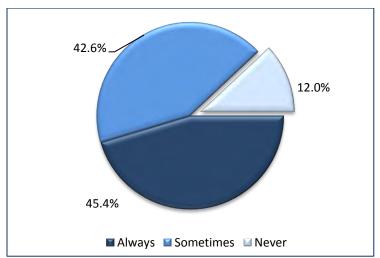




*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,454 (unweighted 1,387). Data Source: SFA Director Survey 2011, question 10.5.

Figure IV-4.2 shows that when ordering food for the school-meal programs, less than half of SFAs (45 percent) always specified nutrient requirements for a single serving of a specific type of food or meal in the bid specifications. Another 43 percent sometimes specified such requirements. Only 12 percent of SFAs never required certain levels of nutrients in school meals or food in bid specifications.





*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,455 (unweighted 1,388). Data Source: SFA Director Survey 2011, question 10.7.

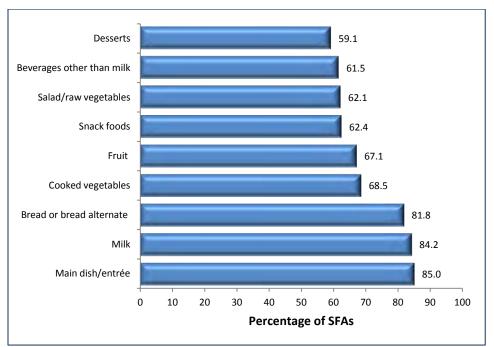
As shown in Figure IV-4.3, the vast majority (96 percent) of SFA directors rated the nutritional information they received as either excellent or satisfactory. Only 4 percent of SFA directors reported not being satisfied with nutritional information they receive.

## Figure IV-4.3. Percentage of SFAs Satisfied with the Availability of Nutrition Information, SY 2011-12



*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,513 (unweighted 1,390). Data Source: SFA Director Survey 2011, question 10.6.

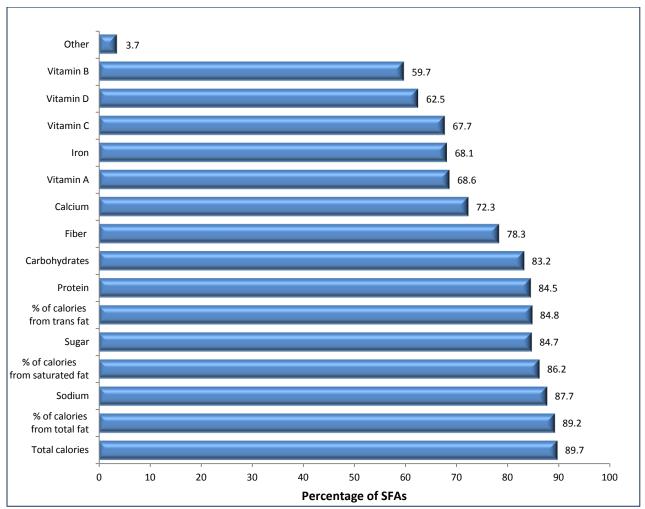
The study asked SFA directors if they specified per-serving nutrient requirements for nine specific food types. Figure IV-4.4 shows, among all SFAs, the percentage of directors who specify nutrient requirements for each of these food types. Nearly 60 percent of SFA directors specify perserving nutrients for at least one food type. More than 80 percent of them use per-serving specifications for bread, milk, and the main dish or entrée. Although 45 percent (Figure VI-4.2) responded that they always specified nutrient requirements per single serving when ordering, only about one-third (not shown) of SFAs specify per-serving nutrients for all nine food types.





*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,435 (unweighted 1,384). Data Source: SFA Director Survey 2011, question 10.8.

Many SFAs require vendors to supply specific types of nutrient information for the foods they purchase. Figure IV-4.5 shows the percentage of SFA directors that require various nutrition information. SFA directors reported that the top three pieces of nutrition information required were total calories (90 percent), percent of calories from total fat (89 percent), and sodium content (88 percent). Only slightly smaller percentages of SFA directors reported requiring information on saturated fat (86 percent), sugar (85 percent), percent of calories from trans fat (85 percent), protein (84 percent), and carbohydrates (83 percent). Fiber was close behind carbohydrates at 78 percent. The remaining nutrients ranged between 60 percent and 72 percent.

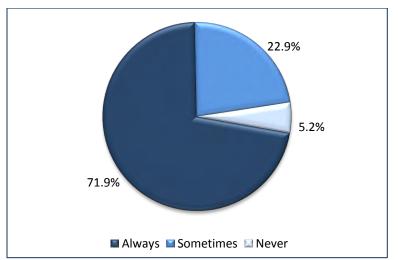


#### Figure IV-4.5. Percentage of SFAs that Require Various Nutrition Information from Food Vendors, SY 2011-12

*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,220 (unweighted 1,371). Data Source: SFA Director Survey 2011, question 10.9.

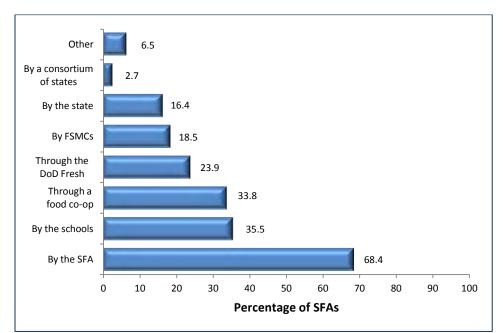
Figure IV-4.6 reveals that 72 percent of SFA directors reported that, over the last year, vendors always supplied the requested nutrition information. Only 5 percent of SFAs indicated they never received the information they requested.

#### Figure IV-4.6. Percentage of SFAs that Received Requested Nutritional Information from Vendors, SY 2011-12



*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,487 (unweighted 1,389). Data Source: SFA Director Survey 2011, question 10.10.

Although SFAs used a variety of methods to purchase foods for the schools they serve, the most common method was to purchase at least some foods directly by the SFA (68 percent), as shown in Figure IV-4.7. In approximately one-third of SFAs, food was purchased by the schools (36 percent) or through a food co-op (34 percent). About one-quarter of SFAs (24 percent) purchased food through the DoD Fresh Program.





*n* is less than 1,401 due to item non-response. Percentages are based on a weighted item response of 14,454 (unweighted 1,388). Data Source: SFA Director Survey 2011, question 10.11.

It is possible for SFAs to increase their purchasing power by forming a consortium or food co-op. Table IV-4.4 presents the use of food co-ops and consortiums by the size category of the SFAs. These methods are most often reported by medium and large SFAs. Small SFAs, which could most benefit from combining their purchasing power with other SFAs, reported using these methods least often, perhaps because their combined size is not enough to obtain increased purchasing power.

Table IV-4.4.	Percentage of SFAs that Used Selected Methods to Purchase Foods by SFA Size,
	SY 2011-12

	Percentage of SFAs tha	Tota	I SFAs	
SFA Size	Through a food co-op	By a consortium of states	Weighted n	Unweighted n
All SFAs	33.8%	2.7%	14,454	1,388 <sup>1</sup>
SFA size <sup>2</sup>				
Small (1-999)	26.8	1.2	7,201	325
Medium (1,000-4,999)	38.3	4.1	5,350	532
Large (5,000-24,999)	49.5	4.9	1,619	362
Very large (25,000+)	37.8	1.3	284	169

<sup>1</sup> *n* is less less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs purchasing food products through a food co-op and by a consortium of states differed significantly by SFA size at the .05 level.

Data Source: SFA Director Survey 2011, question 10.11.

### **Food Service Management Companies**

One option available to SFAs to manage food service operations is to contract with an FSMC. The SFA is still required to comply with existing Federal, state, and local procurement requirements listed at 7 CFR Parts 3016.36 and 3019.40 when contracting with an FSMC.

Table IV-4.5 shows the percentage of SFAs that contracted with an FSMC by SFA characteristics and the type of menu planning system used. Overall, 21 percent of SFAs contracted with an FSMC during SY 2011-12. The use of an FSMC did significantly vary by SFA urbanicity and poverty level. SFAs in rural areas and towns and with medium poverty levels were less likely to contract with an FSMC. Although very large SFAs were also less likely to use an FSMC, they represented a small number of SFAs, and overall SFA size did not result in statistically different FSMC use rates. There were some differences based on the type of menu planning system used. However, these differences are most likely a function of the type of system used by the FSMC rather than selection of the FSMC based on the menu planning system used.

# Table IV-4.5.Percentage of SFAs that Contracted with an FSMC by SFA Characteristics, SY2011-12

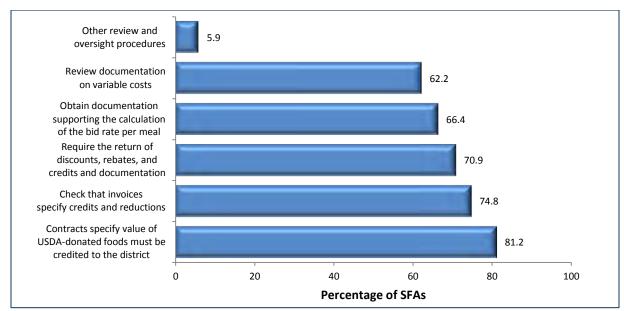
		Total	SFAs
SFA characteristics	Percent of SFAs that use an FSMC	Weighted n	Unweighted n
All SFAs	20.8%	14,494	1,389 <sup>1</sup>
SFA size			
Small (1-999)	20.1	7,255	327
Medium (1,000-4,999)	22.1	5,329	530
Large (5,000-24,999)	21.2	1,625	363
Very large (25,000+)	12.9	284	169
Urbanicity <sup>2</sup>			
City	34.5	1,577	253
Suburban	31.3	2,841	377
Town	21.2	2,777	264
Rural	13.6	7,298	495
Poverty level <sup>2</sup>			
Low (0-29% F/RP)	24.9	3,335	344
Medium (30%-59% F/RP)	17.1	6,758	645
High (60% or more F/RP)	23.4	4,401	400
Menu planning <sup>2</sup>			
Traditional food based	15.5	8,618	808
Enhanced food based	17.2	1,723	174
Nutrient standard menu planning	38.8	1,792	218
Assisted nutrient standard menu planning	51.7	94	8
New or innovative approach	6.7	49	8
Combination	29.2	1,932	157
Other	22.4	256	13

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs contracting with a FSMC differed significantly by urbanicity, poverty level, and menu planning at the .05 level. Data Source: SFA Director Survey 2011, questions 4.10 and 10.12.

SFAs that contracted with an FSMC used multiple methods to track rebates, discounts, or fees. Figure IV-4.8 shows that 81 percent of SFA directors indicated that the contracts they were responsible for specified that the value of USDA-donated foods must be credited to the school district. Other common methods included checking invoices for credits and reductions (75 percent) and requiring the return of discounts, rebates, and credits, and related documentation (71 percent). About 66 percent of SFA directors said that they obtained documentation supporting the calculation of the bid rate per meal, and 62 percent indicated that they reviewed documentation on variable costs.

#### Figure IV-4.8. Among SFAs that Used a FSMC, the Percentage of SFAs that Used Various Methods to Track Rebates, Discounts, or Fees, SY 2011-12



*n* is less than the 279 SFAs that used an FSMC due to item non-response. Percentages are based on a weighted item response of 2,927 (unweighted 272). Data Source: SFA Director Survey 2011, question 10.13.

# IV-5. Menu Planning and Nutritional Analysis Background

The National School Lunch Act mandates that school meals "safeguard the health and wellbeing of the Nation's children,"<sup>33</sup> and local food service professionals are required to prepare and serve meals consistent with Federal school nutrition standards. The current study was conducted to examine school nutrition operations during SY 2011-12; schools used the nutrition standards established under the School Meals Initiative (SMI).<sup>34</sup> The SMI standards are based on the 1995 Dietary Guidelines and the 1989 RDAs and specify that school lunch should provide one-third the RDA and school breakfast should provide one-fourth the RDA for energy, proteins, vitamins A and C, and the minerals calcium and iron. Together, school lunch and breakfast should provide no more than 30 percent of the calories from fat and no more than 10 percent of the calories from saturated fat.<sup>35</sup>

To provide the SFAs with flexibility in meeting the SMI nutrition goals, the USDA established five menu planning approaches, which were in use through SY 2011-12. As described below, two of these menu planning approaches are food based, two are nutrient based, and one is an alternative "reasonable" approach.

#### A. Food-Based Menu Planning (FBMP) Approach

**Traditional Food-Based Menu Planning**—This menu planning approach specifies food component requirements and quantity requirements for each component, as follows:

- School lunch must include five food items from four food components: meat/meat alternate, vegetables and/or fruits, grains/breads, and milk.
- School breakfast must include four food items from four food components: vegetables and/or fruits; milk; meat/meat alternate, grains/breads.
- For school lunch as well as breakfast, minimum portion sizes are set by ages and grade groups.
- **Enhanced Food-Based Menu Planning**—This menu planning approach uses the same meal pattern and age groups as the traditional food-based menu planning approach but specifies an option for grades 7 to 12. This option was added to meet the nutritional needs of children during their critical growth period; it includes a greater number of servings from grains and larger portion size for fruits and vegetables. This approach attempts to increase calories from low-fat food sources to meet the Dietary Guidelines.

<sup>33</sup> http://www.fns.usda.gov/cnd/menu/menu.planning.nslp.htm.

<sup>&</sup>lt;sup>34</sup> In 2010, the nutrition standards for school meals were revised based on the IOM recommendations; these recommendations aligned the school meals with the most recent Dietary Guidelines for Americans and the nutrition requirements specified in the Dietary Reference Intakes (DRIs). In SY 2012-13, all schools were expected to begin implementing the new meal requirements and to use the food-based menu planning approach http://www.fns.usda.gov/cnd/Governance/Legislation/nutritionstandards.htm.

<sup>&</sup>lt;sup>35</sup> School breakfasts must provide, on average over each school week, at least one-fourth of the daily RDAs for protein, iron, calcium, and vitamins A and C.

- For school lunch, the four food components specified in the traditional food-based menu planning approach are retained, but the component quantities for the weekly servings of vegetables and fruits and grains/breads are increased.
- For school breakfast, an optional age/grade group was added for grades 7-12 to better meet the needs of children in that crucial growth period by adding low-fat calories from additional servings of grains/breads.

#### B. Nutrient-Based Menu Planning Approach

- Nutrient Standard Menu Planning (NSMP)—Also known as NuMenus, NSMP is a computer-based menu planning system that uses approved computer software to analyze the nutrient content of school menus during the menu planning stage. It is designed to assist menu planners in choosing food items that create nutritious meals and meet the nutrient standards. SFAs using this approach are directed to offer milk, one entrée, and one side dish, but there are no specifications on portion size or foods.
- **Assisted Nutrient Standard Menu Planning**—This variation of NSMP is also known as Assisted NuMenus. This approach is designed for schools that lack the technical resources to conduct nutrient analysis themselves. It allows schools to use an outside source, such as another school district, state agency, or a consultant, to plan and analyze menus. The outside source also provides schools with recipes and product specifications to support the menus.
- **C.** Alternative "Reasonable" Menu Planning Approach—With approval from the state, SFAs may use other innovative approaches that are similar to the food-based and nutrient-based menu planning approaches, with slight variations. Regardless of the menu planning method, all school meals should meet the nutrition requirements specified in the SMI. The USDA works with state and local food service authorities to provide the food service staff with training and technical support in menu planning and nutritional analysis.

### **Research Questions**

The research questions addressed in this chapter focus on the types of menu planning options used and nutrition analysis conducted during SY 2011-12. Specific questions include:

- What types of menu planning options are being used by SFAs?
- Do SFAs conduct a formal nutritional analysis of their planned menus?

## Results

### **Menu Planning Systems**

As Table IV-5.1 shows, in SY 2011-12, 72 percent of the SFAs used a food-based (traditional or enhanced) approach, 13 percent used the nutrient-based (NuMenus or Assisted NuMenus) approach, and 13 percent used a combination of food- and nutrient-based menu planning approaches. Overall, traditional FBMP was the most frequently used approach. Less than 1

percent of the SFAs used new or innovative approaches to menu planning. The new or innovative approaches included providing flexibility to the schools to plan their own menu rather than a standard menu for the district; some SFA directors also indicated that they engaged students and parents in menu planning, designed theme days and planned menus specifically to fit the theme, or offered taste tasting.

		Percentage of	f SFAs using v	arious menu	planning metho	ods:			
		Percentage of SFAs using various menu planning methods: Food based Nutrient based Other "reasonable" approach		roach	Tota	SFAs			
SFA characteristics	Traditional food-based only	Enhanced food- based only	NuMenus only	Assisted NuMenus only	New or innovative approaches only	Combin- ation	Other	Wgt	Unwgt
All SFAs	59.9%	11.9%	12.3%	0.6%	0.3%	13.2%	1.7%	14,621	1,397 <sup>1</sup>
SFA size Small (1-999) Medium (1,000-4,999) Large (5,000-24,999) Very large (25,000+)	59.5 62.3 55.4 50.1	11.8 11.1 14.3 14.5	10.0 12.7 19.4 25.5	0.8 0.4 0.5 0.0	0.3 0.2 1.0 1.1	14.5 13.0 9.3 8.2	3.1 0.4 0.2 0.5	7,347 5,366 1,623 284	331 534 363 169
Urbanicity City Suburban Town Rural Poverty level Low (0-29% F/RP) Medium (30%-59% F/RP)	62.4 55.2 61.5 60.5 59.7 57.7	7.4 13.7 11.1 12.4 12.4 13.9	16.8 11.3 15.1 10.7 12.2 12.8	0.0 1.1 1.0 0.5 0.0 0.6	0.4 0.3 0.0 0.5 0.3 0.2	5.7 17.5 10.9 14.1 15.1 13.6	7.3 1.0 0.4 1.3 0.3 1.3	1,630 2,867 2,782 7,342 3,361 6,816	256 378 265 498 345 649
High (60% or more F/RP) Number of schools recognized as HealthierUS Schools None 1-5 6 or more	63.2 59.7 61.9 65.8	8.3 12.0 10.5 6.8	11.7 12.2 10.7 24.9	0.7 0.0 0.0	0.6 0.2 3.1 0.0	11.2 13.3 13.9 2.6	3.6 1.9 0.0 0.0	4,443 13,816 618 186	403 1284 73 40
<b>Type of kitchen</b> Onsite production Offsite production Mostly onsite production	62.6 53.3 58.2	10.6 12.7 14.3	11.0 13.0 14.1	0.6 1.8 0.0	0.4 0.5 0.2	14.1 15.1 10.7	0.7 3.6 2.5	7,877 2,373 4,114	638 220 526

# Table IV-5.1.Percentage of SFAs that Used Various Menu Planning Methods by SFA<br/>Characteristics, SY 2011-12

Because some of the categories contain zero values, no significance tests were conducted.

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 4.10, 4.19, and 11.7.

Furthermore, comparing the menu planning methods used over time, the data reveal a trend toward using traditional FBMP and less use of nutrient-based menus. In SY 2009-10, 73 percent of schools used the FBMP approach, with 53 percent using the traditional approach and 20 percent using the enhanced approach; about 27 percent used nutrient-based menu planning (SNDA IV, Volume 1). Although the overall proportion of schools using the FBMP approach appears unchanged between SY 2009-10 and SY 2011-12, the use of the traditional FBMP approach was

about 7 percentage points higher in SY 2011-12 than in SY 2009-10. In contrast, the overall proportion of schools using nutrient-based menus was 14 percentage points lower in SY 2011-12 than in SY 2009-10. It is likely that SFAs began moving toward the FBMP approach in advance of the new changes in meal pattern requirements.

### **Nutrition Analysis of Planned Menus**

SFAs using the FBMP approach or an alternative menu planning approach may choose to analyze planned menus but are not required to do so. The SFAs that use the nutrient-based menu planning approach must conduct nutrient analysis to plan school meals that are age/grade appropriate. SFAs may use USDA-approved nutrient analysis software programs to analyze the nutrients offered over one school week (typically over 5 consecutive days). Regardless of the menu planning approach, all SFAs must ensure that the planned meals meet the SMI nutrition standards. Each state agency is responsible for assessing SFAs' compliance with the SMI nutrition standards every 3 years and to provide guidance to SFAs that are not in compliance.

Table IV-5.2 shows how the percentage of SFAs that conduct formal nutrition analysis of planned menus varies by SFA characteristics and menu planning systems. Overall in SY 2011-12, 45 percent of the SFAs conducted a formal nutrition analysis of the planned menus, and 11 percent of the SFA directors did not know if planned menus were analyzed for their nutritional content. Although SFAs that use the NuMenus approach are required to conduct a formal nutrition analysis, only 72 percent of SFAs using this approach reported doing so. As expected, however, nutritional analysis was still conducted more often by SFAs that used the NuMenus approach (about 72 percent) than by SFAs that used an FBMP approach (approximately 40 percent). In general, nutritional analysis of planned menus was conducted by a greater percentage of SFAs that were large or very large, in cities, and in high-poverty areas as compared to others.

Additionally, the percentage of SFAs conducting nutritional analyses of planned menus appears to be declining over time. The percentage of SFAs using the NuMenus approach that conducted nutritional analysis for planned menus in SY 2011-12 was lower (72 percent as shown in Table IV-5.2)) than in SY 2009-10 as reported in SNDA IV (97 percent). In addition, fewer SFAs using the traditional FBMP approach conducted nutritional analysis than in SNDA IV (40 percent versus 52 percent).

# Table IV-5.2.Percentage of SFAs that Conducted Nutrition Analysis of Planned Menus by SFA<br/>Characteristics and Type of Menu Planning System, SY 2011-12

	-	SFAs that condu sis of planned m		Total SFAs		
SFA characteristics	Yes	No	Don't Know	Weighted n	Unweighted n	
All SFAs	45.3%	43.6%	11.1%	14,617	1,397 <sup>1</sup>	
SFA size <sup>2</sup>						
Small (1-999)	39.8	43.1	17.2	7,348	331	
Medium (1,000-4,999)	46.4	47.1	6.4	5,355	533	
Large (5,000-24,999)	60.1	38.9	1.0	1,629	364	
Very Large (25,000+)	80.5	18.5	0.5	284	169	
Urbanicity <sup>2</sup>						
City	53.4	31.4	15.1	1,616	255	
Suburban	44.8	49.3	5.9	2,876	379	
Town	44.9	46.5	8.6	2,782	265	
Rural	43.8	43.0	13.2	7,343	498	
Poverty level <sup>2</sup>						
Low (0-29% F/RP)	43.9	47.3	8.8	3,399	347	
Medium (30%-59% F/RP)	43.3	46.2	10.5	6,816	649	
High (60% or more F/RP)	49.5	36.7	13.8	4,403	401	
Number of schools recognized as HealthierUS Schools						
None	44.9	43.8	11.4	13,800	1,283	
1-5	47.7	44.1	8.2	630	74	
6 or more	66.4	30.7	3.0	186	40	
Current SFA director is <sup>3</sup>						
Licensed dietitian	57.5	41.0	1.5	14,205	1,373	
School nutrition specialist	58.1	38.0	3.9	14,205	1,373	
Type of menu planning system <sup>2</sup> Food based						
Traditional food-based only	39.9	49.2	10.8	8,744	815	
Enhanced food-based only	39.7	50.5	9.7	1,707	174	
Nutrient based						
NuMenus only	71.6	20.8	7.6	1,804	220	
Assisted NuMenus only	49.3	27.4	23.3	94	8	
Other "reasonable" approach						
New or innovative approaches only	72.8	20.5	6.7	49	8	
Combination	51.7	34.4	14.0	1,917	156	
Other	14.4	54.0	31.6	256	13	

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup>Percentage of SFAs conducting nutrition analysis differed significantly by SFA size, urbanicity, poverty level, and menu planning system at the .05 level.

<sup>3</sup> Significance testing does not apply because the categories are not mutually exclusive. An SFA director can be both a licensed dietitian and a school nutrition specialist.

Data Source: SFA Director Survey 2011, questions 4.10, 4.13, and 11.7.

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## **IV-6.** Meal Counting and Claiming Procedures

## Background

The fiscal integrity of the school meals programs is critically dependent on four factors:

- Accurate determination of students' eligibility for F/RP meals;
- Accurate counting of the number of students in each income-eligibility category taking a reimbursable meal in each school within an SFA;
- A system for accurately aggregating the meal counts from each school into a total for the SFA, and
- Accurately using this information to complete an SFA's monthly claim for reimbursement that is submitted to the state for payment.

Each of these factors is susceptible to a wide range of possible errors that result in erroneous payments. Indeed, because of the potential for a high level of erroneous payments, the NSLP and SBP are subject to the provisions of the Improper Payments Information Act of 2002, which requires USDA to provide Congress with annual estimates of the total and various types of erroneous payments in the school meals program.<sup>36</sup> Previous research has estimated that household misreporting when certifying students' eligibility for F/RP meals as opposed to administrative errors is by far the largest source of erroneous payments in the school meals programs. Additionally, noncertification errors (i.e., errors in reporting the number and type of meals served when preparing or submitting the SFA's claim for reimbursement) are a relatively minor source of erroneous payments, especially for the NSLP. However, erroneous payments due to non-certification errors account for a higher percentage of reimbursements in the SBP, compared to the NSLP (USDA 2004, 2007). Noncertification errors are largely the result of cashier errors at the Point of Service (POS) and have been found to be concentrated among a relatively small number of schools with high levels of cashier errors (USDA, 2007).<sup>37</sup>

Cashiers at the POS are responsible for:

- Determining if what is on a student's tray constitutes a reimbursable meal (i.e., complies with FNS requirements);
- Determining the reimbursement status (free, reduced-price, or paid) for each student who has taken what the cashier has determined to be a reimbursable meal (without overtly identifying students getting F/RP meals);

<sup>&</sup>lt;sup>36</sup> USDA is required to report annually on the extent of erroneous payments in programs (including the NSLP and SBP) that may be susceptible to significant erroneous payments (exceeding \$10 million and 2.5 percent of benefits paid out) and to report annually on the actions they are taking to reduce the erroneous payments.

<sup>&</sup>lt;sup>37</sup> In general, a relatively small number of school cashiers account for a very high number of errors and erroneous (USDA, 2007).

- Ensuring that only one reimbursable meal is recorded for each eligible student (if a student goes through the line a second time and takes a reimbursable meal, that the second meal taken is not included in the total count of reimbursable meals that is submitted for reimbursement);
- Accurately recording and tabulating the total number of reimbursable meals taken in each of the three reimbursement categories; and
- Accurately transmitting these counts to the SFA for inclusion in the SFA's monthly claim for reimbursement.

The SFA is responsible for instituting an internal control system that checks for potential cashier errors and taking corrective action when a pattern of errors is detected. Examples of internal controls include checking to see if a student takes a reimbursable meal every day (regardless of attendance), checking that the total number of F/RP meals claimed on any given day does not exceed the total number of students approved for such meals (after applying an attendance factor), and checking that the total daily participation rates are not out of line with historical patterns.

## **Research Questions**

This chapter focuses on factors at the school level that may lead to erroneous payments. These factors include the types of technology used and the accuracy with which cashiers at the POS use these technologies. This chapter addresses three specific research questions:

- What type of technology is being used at the POS to differentiate and record the number of students in each of the three income-eligibility categories that take reimbursable meals?
- What type of training and oversight is provided to cashiers to ensure that reimbursable meals are properly distinguished from nonreimbursable food sales, and that the income-eligibility status of each reimbursable meal is accurately recorded and totals are accurately tabulated at each meal period?
- What types of payments are accepted at the POS?

## Results

### Technology Used at the Point of Service

USDA does not specify the use of any particular system for meal counting at the POS. It recognizes that there is no "one size fits all" technology for meal counting. Rather, it recognizes that SFAs must consider the cost-effectiveness of the various types of available meal counting technologies and what is right for each of their schools. State administering agencies have materials available to help guide the choice of an SFA's meal counting and claiming system. An SFA may use different systems in different schools.

As Table IV-6.1 shows, by far the most common technology used by SFAs in SY 2011-12 was student personal identification numbers (PINs), which were used by 72 percent of SFAs in at least one of their schools. Swipe cards, which record information about a student's reimbursement

status when swiped through a card reader (much as ATM cards are used in the retail world), were used by 28 percent of SFAs. Student rosters, where a cashier checks off the names of students who take a reimbursable meal and later matches the names that were checked off with their reimbursement status, were used by 13 percent of SFAs in at least one of their schools. All other methods (tickets/tokens, biometric technology, and other systems) combined accounted for only 18 percent of SFAs in at least one of their schools. Although the study did not address the question of why an SFA selected the particular technology used in each of its schools, those technologies that were more costly tended to be used less frequently.

# Table IV-6.1. Percentage of SFAs that Had at least one School that Used Certain Technologiesto Capture Meal Counts at POS, SY 2011-12

Technology at POS	Percent of SFAs that used the technology
Personal Identification Numbers (PINs)	71.6%
Swipe cards	27.8
Rosters or cashier lists	13.4
Tickets or tokens	6.8
Other	5.7
Biometric technology (e.g. fingerprint scanners)	5.5
Total SFAs: Weighted n	14,590
Total SFAs: Unweighted n	1,394 <sup>1</sup>

<sup>1</sup>*n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, question 9.1.

Regardless of how accurately a cashier records the reimbursement status of reimbursable meals taken, none of these methods addresses the accuracy with which a cashier identifies which trays contain a reimbursable meal and which do not. This is still a judgment call that cashiers must make very quickly based on a brief look at what is on each tray as students pass through the line. In a study of erroneous payments in the school meals program (USDA, 2007), it was found that cashier errors in identifying trays containing a reimbursable meal accounted for nearly half of all non-certification errors. This form of counting error is less amenable to the use of better (and more expensive) technology, but it can be addressed through better training of cashiers.

### **Training and Monitoring of Cashiers**

All SFAs provided at least some form of training to their cashiers at various times over the course of a school year. However, which training topics were offered and when they were offered varied across SFAs. Table IV-6.2 shows the percentage of SFAs that provided training on selected topics to their cashiers. More than 90 percent of SFAs provided some training to their cashiers on how to distinguish reimbursable meals from nonreimbursable meals as students pass through the point of service. Because training was not universal and frequency varied, it might explain, in part, why cashier misclassification of meals occurs. Previous studies show that misclassification on student's trays represents about 10 percent of total reimbursements (USDA, 2007). Another factor that may affect misclassification is the quality of the training provided.

Training topic	Percentage of SFAs that provided training		
Method of counting meals	92.8%		
Monitoring student meal selections to ensure reimbursability	92.0		
Managing cash for à la carte and adult meal sales	80.4		
Acceptable types of payments	86.3		
Meal and food pricing	83.6		
Offer vs. served	86.3		
Applications for free or reduced-price meals	61.6		
Operating a POS system	86.1		
Other training topics	3.1		
Total SFAs: Weighted n	14,567		
Total SFAs: Unweighted n	1,392 <sup>1</sup>		

#### Table IV-6.2. Percentage of SFAs that Provided Select Training to Cashiers, SY 2011-12

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, question 9.3.

Monitoring cashier performance is another key factor in determining non-certification errors. USDA provides guidance for states to review SFA performance (USDA, 2012). In addition, the program regulations stipulated that SFAs must conduct no fewer than one onsite review of the accuracy of meal counting procedures for each school in the SFA. The regulations further specify the types of acceptable edit checks such as "comparing the number of each school's daily counts of free, reduced-price, and paid lunches against the product of the number of children in that school currently eligible for free, reduced-price, and paid lunches, respectively, times an attendance factor."<sup>38</sup> Despite this requirement, as shown in Figure IV-6.1, about 18 percent of all SFAs do not conduct such onsite reviews of the accuracy of each school's meal counting procedures. At the other end of the spectrum, 34 percent of SFAs reported conducting three or more onsite monitoring visits of cashiers, and another 17 percent reported conducting two such monitoring visits to schools in SY 2011-12.

<sup>&</sup>lt;sup>38</sup> 64 Federal Register, 50740, Sept. 20, 1999.

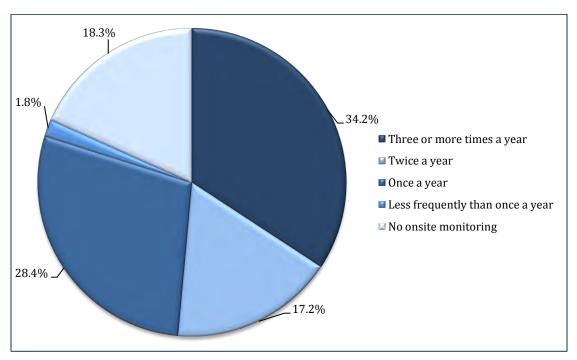


Figure IV-6.1. Percentage of SFAs that Conducted Onsite Monitoring of Cashiers, SY 2011-12

n is less than 1,401 due to item non-response. Responses based on a weighted n = 14,575 (unweighted n = 1,392). Data Source: SFA Director Survey 2011, questions 9.4 and 9.5.

### **Types of Payment Accepted for School Meals**

Not all SFAs accept cash payments for school meals at the POS as shown in Table IV-6.3. Even fewer SFAs accept credit or debit cards at the POS. In SY 2011-12, 80 percent of SFAs reported accepting cash payments for school meals, and only 18 percent reported accepting credit or debit cards at the POS. The most commonly accepted form of payment for school meals was prepayment by check or money order; 93 percent of SFAs accepted this form of payment in SY 2011-12. Other forms of payment accepted include prepayment through the Internet (41 percent) and prepayment by mail, telephone, or fax (20 percent).

#### Table IV-6.3. Percentage of SFAs that Accepted Different Payment Methods, SY 2011-12

Payment method	Percent of SFAs that used the method		
Personal check or money order	92.9%		
Cash at POS	79.9		
Payment via the Internet	41.4		
Payment via phone, email, or fax	20.0		
Credit or debit card	17.7		
Other	4.8		
Other cash	4.6		
Total SFAs: Weighted n	14,581		
Total SFAs: Unweighted n	1,394 <sup>1</sup>		

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, question 9.2

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## IV-7. Availability of Non-USDA Meal Alternatives

### Background

The school food environment encompasses foods and beverages available through the NSLP and the SBP; those sold at outlets such as à la carte, vending machines, snack bars, school stores, and fund raisers/bake sales; as well as those offered in-class (i.e., class parties). The foods offered outside of the NSLP and the SBP are generally referred to as *competitive foods* since they compete with the sale of reimbursable school meals. Besides offering competitive foods on campus, some schools and school districts may permit students to leave the school campus during the meal service to purchase foods elsewhere.

The current study examined the school nutrition operations during SY 2011-12 prior to when USDA updated the nutrition standards for both school meals (NSLP and SBP) and competitive foods.<sup>39</sup> Only the sale of foods of minimal nutritional value (FMNV), i.e. those with less than 5 percent of the RDA for eight key nutrients, were prohibited from being sold in the food service areas during meal periods. A few examples of foods considered FMNV include soft drinks, water ices, chewing gum, and certain candies. Before passage of the HHFKA, the USDA did not have the authority to regulate all other competitive foods such as chips, cookies, ice cream, and fruit and sports drinks. However, several states and localities implemented policies to limit the sale of less healthy options by setting limits on certain nutrients such as fat, saturated fat, sugar, and/or calories for foods and beverages sold à la carte and in school stores and vending machines.

Moving forward in the next few years, Section 208 of the HHFKA, which directed USDA to establish science-based nutrition standards for foods and beverages sold in schools (throughout the school campus and the school day) outside of the school meals program, will affect the competitive foods available to students. In February 2013, USDA issued a proposed regulation specifying minimum standards for foods and beverages sold as competitive foods. The USDA proposal emphasizes foods to encourage, such as fruits, vegetables, whole grains and low-fat dairy products, and places limits on calories, saturated fat, sodium, and sugar. In addition, the regulation codified previously issued guidance on the need for schools to make available free drinking water during the lunch meal service. In June 2013, USDA issued the interim final regulation updating standards for competitive foods, and schools will have at least a year to fully implement the updated standards (National School Lunch Program and School Breakfast Program: Nutrition Standards for All Foods Sold in School as Required by the Healthy, Hunger-Free Kids Act of 2010). Until then, schools can continue to sell a range of competitive foods and beverages throughout the school campus.

<sup>&</sup>lt;sup>39</sup> Competitive foods are items sold in the school during the meal service and compete with the sale of reimbursable meals. These foods are not credited as a component of a reimbursable meal; the revenue from these sales may be utilized by the food service, school, or approved student organization. http://www.fns.usda.gov/cnd/About/faqs.htm#Competitive Foods.

### **Research Questions**

This section focuses on answering the following research questions concerning competitive foods available to students and provides a baseline picture of the local practices before implementation of the new regulations stemming from the HHFKA.

- What types of non-USDA meal alternatives (e.g., vending machines, à la carte, school stores, etc.) are available in SFAs?
- Do SFAs make free potable water available where school lunches are served?

### Results

### **Alternative Meal Practices**

Competitive foods generate \$2.3 billion in annual revenue, with the majority of the revenue generated from sales of à la carte offerings.<sup>40,41</sup> The revenue generated from à la carte offerings were within the domain of the school food services department and were typically used within the food service program, whereas revenue from other venues like vending machines and school stores were more likely to accrue to non-school food service accounts and usually benefit the broader school programs and student activities.<sup>42</sup>

At this time, and until full implementation of updated competitive foods standards related to HHFKA, school districts as well as schools will continue to decide the types of competitive foods available in the schools and when and where they are sold. Thus, considerable variability exists across schools related to the sale of competitive foods. While some schools placed significant limits on the types of competitive foods sold, and the frequency and location of sales, others placed few restrictions on their sale.

The SFA Director Survey requested information about the types of alternatives available in their schools. As seen in Figure IV-7.1, about 20 percent of the SFAs indicated that there were no alternatives to SBP and NSLP meals available in their schools; at the other end of the spectrum 16 percent of the SFAs indicated at least four different types of alternatives were available to students. For purposes of this discussion, "types of alternatives" does not refer to the quantity of foods and beverages available but rather to the venue where the alternatives were sold such as à la carte, vending machines, or school stores.

<sup>&</sup>lt;sup>40</sup> IOM, Nutrition Standards for Foods in Schools. Page 92.

<sup>&</sup>lt;sup>41</sup> USDA, Food and Nutrition Service, School Lunch and Breakfast Cost Study-II, Final Report. CN-08-MCII, April 2008, page 6-1. www.fns.usda.gov/ORA/menu/published/CNP/FILES/MealCostStudy.pdf.

<sup>&</sup>lt;sup>42</sup> IOM, Nutrition Standards for Foods in Schools. Page 95.

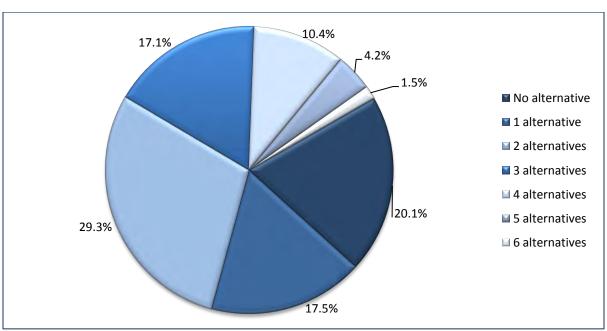


Figure IV-7.1. Percentage of SFAs that Offered Alternatives to SBP and NSLP Meals, SY 2011-12

Percentages based on a weighted response of 14,678 (unweighted 1,401). Data Source: SFA Director Survey 2011, question 4.3.

Table IV-7.1 shows the most common alternate meal option available to students was à la carte items at lunch, and the least common option was food items from school stores. Seventy-one percent of the SFAs reported having schools that provided students with the option to purchase à la carte foods at lunch,<sup>43</sup> and 53 percent of the SFAs had schools that provided the option to purchase à la carte foods at breakfast. Vending machines were available in almost 30 percent of the SFAs, snack bars in 19 percent of the SFAs, and school stores in about 15 percent of the SFAs. The use of à la carte items increased with size of the SFA, with 54 percent of small SFAs using à la carte items during lunch compared to 92 percent of very large SFAs. A similar pattern is observed for à la carte items during breakfast. SFAs in high-poverty areas were least likely to use nearly every meal alternative (except "alternative food source"). Having HealthierUS schools and the type of kitchen facility did not reveal any significant differences in the availability of competitive foods.

<sup>&</sup>lt;sup>43</sup> The estimate for schools offering à la carte items at lunch and at breakfast as well as the availability of vending machines for the current study is about 10 percentage points lower than the estimate from SNDA IV. The reason for this difference in a 1-year time frame is not clear and may be the result of question wording differences.

	Percentage of SFAs that reported the following meal alternatives were offered in their schools:				Total SFAs			
	À la cart							
SFA characteristics	During breakfast	During lunch	Vending machines	Snack bars	School store	Alternate food source	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs	53.2%	70.9%	29.4%	19.0%	15.4%	10.8%	14,678	1,401
SFA size <sup>1</sup>								
Small (1-999)	35.8	53.6	13.4	7.0	4.2	10.5	7,374	332
Medium (1,000-4,999)	68.2	86.7	41.7	28.5	22.5	9.4	5,390	536
Large (5,000-24,999)	77.3	92.8	53.8	36.7	36.9	14.7	1,629	364
Very large (25,000+)	82.3	92.4	70.5	47.0	48.4	23.0	284	169
Urbanicity <sup>2</sup>								
City	39.9	51.0	27.2	16.7	22.2	15.0	1,630	256
Suburban	62.9	82.9	47.6	34.1	24.3	12.7	2,885	380
Town	63.9	78.3	30.9	21.5	16.4	12.8	2,794	266
Rural	48.3	67.7	22.2	12.6	10.0	8.4	7,369	499
Poverty level <sup>3</sup>								
Low (0-29% F/RP)	63.7	86.9	45.4	30.4	20.6	8.6	3,407	348
Medium (30%-59% F/RP)	60.3	77.5	29.5	17.0	14.7	11.8	6,828	650
High (60% or more F/RP)	34.2	48.3	16.9	13.2	12.6	11.0	4,443	403
Number of schools								
recognized as HealthierUS								
schools								
None	52.9	70.7	28.6	19.1	15.3	10.7	13,862	1,287
1-5	59.1	74.9	42.4	17.8	18.0	11.9	630	74
6 or more	56.1	68.0	44.2	15.6	13.0	16.4	186	40
Type of kitchen								
Onsite production only	53.6	71.4	27.5	15.8	12.1	9.0	7,895	640
Offsite production only	56.5	73.5	30.8	20.9	14.9	12.3	2,373	220
Combination or other	52.4	71.2	33.3	24.6	22.9	12.1	4,154	528

#### Table IV-7.1. Percentage of SFAs that Reported Meal Alternatives were Offered in their Schools by SFA Characteristics, SY 2011-12

<sup>1</sup> Percentage of SFAs offering all types of meal alternatives in schools differed significantly by SFA size at the .05 level.

<sup>2</sup> Percentage of SFAs offering all types of meal alternatives in schools with the exception of alternate food source differed significantly by urbanicity at the .05 level.

<sup>3</sup> Percentage of SFAs offering all types of meal alternatives in schools with the exception of alternate food source differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, questions 4.3, 4.19, 11.7, and 14.7.

### **Comparison of State and SFA Nutrition Standards to Federal Requirements**

The State Director Survey requested information about their state's nutrition standards for school meals relative to Federal requirements. Similarly, the SFA Director Survey asked respondents about school district policies for school meals relative to the Federal rules. Table IV-7.2 shows the cross-tabulations between strictness of the states' and SFAs' school nutrition meal polices. The table shows that 8 percent of the SFAs operate under state and school district policies that are stricter than the Federal regulations. In contrast, 50 percent of the SFAs operate under state and local policies that are less strict than the Federal regulations.

# Table IV-7.2.Percentage of SFAs by the Strictness of their SFA and State Nutrition Standards<br/>Policies for School Meals, SY 2011-12

	Percentage of SFAs that reported:			l SFAs
State nutrition policy on school meals	SFA policy on school meals stricter than Federal rules	SFA policy on school meals not stricter than Federal rules	Weighted n	Unweighted n <sup>1</sup>
All SFAs	33.1%	66.9%	13,763	1,344
State policy stricter than Federal rules	8.3	17.2	13,763	1,343
State policy not stricter than Federal rules	24.7	49.7	13,763	1,344

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: State CN Director Survey 2011, question A1 and SFA Director Survey 2011, question 4.11a.

Many states and school districts also have added regulations for competitive foods sold in the school as à la carte items or through vending machines. In the State CN Director Survey 2011, directors reported if they had a policy regarding à la carte and vending machine foods. Table IV-7.3 shows that 59 percent of the SFAs are in states that had a policy on à la carte food, and 66 percent are in states that had a policy on foods sold in vending machines. Twenty-eight percent of SFAs also report that their local policies for foods sold as à la carte and vending machine items are stricter than the Federal rules.

# Table IV-7.3.Percentage of SFAs by whether their State had an À la carte or Vending<br/>Machines Policy and the Strictness of their Local Policies, SY 2011-12

	Percentage of SFAs that reported:			I SFAs
Type of alternative food	State had policy	SFA had a policy that was stricter than Federal rules	Weighted n	Unweighted n <sup>1</sup>
À la carte foods Vending machines	59.1% 65.9	28.0% 27.5	13,763 13,763	1,344 1,344

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: State CN Director Survey 2011, questions A2b and A2e and SFA Director Survey 2011, questions 4.11b and 411c.

### Availability of Free Potable Water Where School Lunches Are Served

Almost all SFA directors responded that water was available to students during both breakfast and lunch. Specifically, 97 percent (not shown) of SFAs said water was available at elementary schools, 98 percent (not shown) reported it was available at both their middle and high schools, and 77 percent (not shown) reported it was provided at their other schools. Table IV-7.4 shows that for those that provided water at breakfast and lunch, water fountains were the most frequently reported source of potable water (at least 88 percent of SFAs) followed by water in pitchers, jugs, and cups. A lower percentage of small SFAs than medium to very large SFAs indicated that water fountains and water in pitchers, jugs, or cups were available during breakfast and lunch. The availability of water in pitchers, jugs, or cups at breakfast and lunch increased with increase in SFA size. Bottled water was offered more often in high-poverty than low- or mediumpoverty SFA and in cities. High-poverty schools offer bottled water more frequently than others.

# Table IV-7.4.Among SFAs that Provide Free Drinking Water during Meals, the Percentage of<br/>SFAs that Had Various Sources of Water by SFA Characteristics, SY 2011-12

	Percentage	of SFAs that had the fo	ollowing sources o	of drinking water:	Tota	al SFAs
	Water	Water in pitchers,	Free bottled		Weighted	Unweighted
SFA characteristics	fountains	jugs, or cups	water	Other	n	n
	1	Breakfa	st	1	1	
All SFAs	87.7%	34.2%	2.6%	0.2%	14,178	1,363 <sup>1</sup>
SFA size <sup>2</sup>						
Small (1-999)	82.3	27.8	3.2	0.0	7,070	319
Medium (1,000-4,999)	92.9	36.2	2.2	0.4	5,223	521
Large (5,000-24,999)	93.7	51.2	1.5	0.3	1,611	359
Very Large (25,000+)	94.7	61.0	1.9	0.0	275	166
Urbanicity <sup>3</sup>						
City	87.9	36.9	6.4	0.0	1,506	245
Suburban	92.4	30.1	0.7	0.0	2,777	371
Town	85.5	39.3	1.8	0.3	2,737	261
Rural	86.8	33.3	2.9	0.3	7,159	486
Poverty level <sup>4</sup>						
Low (0-29% F/RP)	89.9	28.8	1.3	0.0	3,306	341
Medium (30%-59% F/RP)	88.7	35.5	1.7	0.1	6,612	633
High (60% or more F/RP)	84.5	36.5	5.1	0.5	4,261	389
		Lunch			·	
All SFAs	89.0	40.6	3.1	0.2	14,150	1,362 <sup>1</sup>
SFA size <sup>5</sup>						
Small (1-999)	84.4	33.1	4.3	0.0	7,044	318
Medium (1,000-4,999)	93.8	43.8	2.0	0.4	5,220	521
Large (5,000-24,999)	92.5	57.6	2.0	0.3	1,611	359
Very Large (25,000+)	95.2	69.6	3.2	0.7	275	164
Urbanicity <sup>6</sup>						
City	91.0	41.4	9.7	0.1	1,534	246
Suburban	95.6	32.6	1.7	0.0	2,746	370
Town	85.7	47.9	2.0	0.3	2,737	261
Rural	87.4	40.7	2.7	0.3	7,133	485
Poverty level <sup>7</sup>						
Low (0-29% F/RP)	93.8	31.8	2.3	0.0	3,292	340
Medium (30%-59% F/RP)	88.8	42.4	1.8	0.1	6,646	635
High (60% or more F/RP)	85.7	44.5	5.9	0.6	4,213	387

 $^{1}$  *n* is less than the 1,386 SFAs that reported providing potable water due to item non-response.

<sup>2</sup> Percentage of SFAs using water fountains and water in pitchers, jugs, or cups for breakfast differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs using free bottled water for breakfast differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs using free bottled water for breakfast differed significantly by poverty level at the .05 level.

<sup>5</sup> Percentage of SFAs using water fountains and water in pitchers, jugs, or cups for lunch differed significantly by SFA size at the .05 level.

<sup>6</sup> Percentage of SFAs using all sources of drinking water with the exception of other for lunch differed significantly by urbanicity at the .05 level. <sup>7</sup> Percentage of SFAs using all sources of drinking water with the exception of other for lunch differed significantly by poverty level at the .05

level.

# Policies and Practices for Serving Meals to Students Who Are Unable to Pay

Schools vary in their policies for serving meals to students who are not approved for free meals and are not able to pay for meals. School policies range from denying a meal to serving a reimbursable or alternate meal to students for a limited number of days. In most schools, students who are unable to pay get one free lunch in a week; if they are unable to pay in the second week, they get an alternate or courtesy meal. In SY 2011-12, 47 percent of the SFAs reported they served a reimbursable meal to students who were unable to pay for a meal, and 39 percent served an alternate meal as shown in Table IV-7.5). Only 3 percent of the SFAs indicate that they did not serve a meal to students who were unable to pay but not those in middle or high school, or school faculty paying for a student, or borrowing from PTA funds. In general, SFA characteristics were not related to actions taken when a student was unable to pay for a school meal. Very large SFAs were less likely to serve reimbursable meals and more likely to take "other" action.

#### Table IV-7.5. Percentage of SFAs that Take Various Actions When a Student, Not Approved for Free Meals, Does Not Have the Money to Pay by SFA Characteristics, SY 2011-12

	Perce	entage of SFAs	that take th	e following	actions:	Tota	al SFAs
SFA characteristics	Serve reimbursable meal	Serve alternate meal	Do not serve any meal	Other	Serve reimbursable meal initially, then serve alternate meal	Weighted n	Unweighted n
All SFAs	47.3%	38.9%	2.5%	6.2%	5.1%	13,865	1,346 <sup>1</sup>
SFA size <sup>2</sup>							
Small (1-999)	48.2	36.9	3.6	6.6	4.7	6,777	305
Medium (1,000-4,999)	48.0	41.2	1.7	4.4	4.6	5,211	519
Large (5,000-24,999)	44.7	39.1	0.4	8.4	7.4	1,598	356
Very Large (25,000+)	27.4	41.5	2.4	15.7	13.1	279	166
Urbanicity							
City	42.9	35.1	3.9	10.1	8.0	1,457	245
Suburban	50.1	38.7	1.7	6.0	3.5	2,818	373
Town	41.0	42.5	3.5	4.9	8.0	2,598	252
Rural	49.4	38.4	2.2	5.9	4.1	6,991	476
Poverty level							
Low (0-29% F/RP)	51.8	35.7	2.2	5.5	4.7	3,326	343
Medium (30%-59% F/RP)	44.6	41.5	2.9	5.8	5.1	6,697	640
High (60% or more F/RP)	48.0	37.0	2.0	7.4	5.6	3,842	363
State level policy to serve meals to children without funds							
Have policy	50.4	33.0	3.0	8.0	5.6	2,619	293
No policy but standard practice	43.5	41.6	2.5	5.8	6.5	4,045	376
No policy or standard practice	48.3	39.5	2.3	5.7	4.2	7,198	676

<sup>1</sup> *n* is less than 1,401 due to item non-response. <sup>2</sup> Percentage of SFAs taking action when a student cannot pay and is not approved for free meals differed significantly by SFA size at the .05 level.

Data Source: State CN Director Survey 2011, question A3 and SFA Director Survey 2011, question 8.1.

## **Section V: SFA Financials**

SFAs produce reimbursable school meals, for which they receive government subsidization, as well as a variety of nonreimbursable food items (also referred to as competitive foods). An SFA's operating costs include not only the cost of producing reimbursable meals but also the cost of individual food items that school staff may purchase or students may buy instead of, or in addition to, reimbursable meals. In many ways, an SFA may be viewed as a nonprofit business that produces several different products and that must set the prices for each of its different products so that at the end of the year it breaks even (revenue equals cost).

SFAs operate within the policy and regulatory boundaries that are set by the Federal government, their states, and their LEA. Four facts dictate SFAs' financial operations:

- SFAs must operate on a nonprofit basis.
- They are reimbursed for NSLP and SBP meals at rates set by the Federal government.
- The maximum price they can charge for reduced-price meals is set by Federal regulations.
- The price they can charge for a paid reimbursable meal is set (or approved) by their LEA.

In addition to the standard economic relationships, this structure dictates a strong correlation between price and reimbursement rates and reimbursement rates and cost. Furthermore, to operate on a nonprofit basis, revenues (price \* quantity "sold") must equal costs, although there may be small deviations from this in any given year.

Although SFAs operate under common rules, there is variation in price, revenue, cost, and break-even status. In this section, we examine the relationships between each of these financial components and how they vary by SFA characteristics such as size, urbanicity, and poverty levels and the food production processes they use.

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### V-1. Meal Prices

### Background

The prices SFAs charge for the foods they serve are heavily regulated and tied to Federal reimbursement rates for school meals. This chapter examined the pricing patterns of SFAs in terms of their relationship to the reimbursement rates and how they vary among SFAs and over time. In assessing how prices have changed over time, we consider the potential impact economic factors and new policy changes may be having as well as how the new policy changes are likely to affect pricing in the future.

#### **Reimbursement Rates**

During SY 2011-12, students from households with an income at or below 130 percent of the Federal poverty guidelines were eligible to receive nutritious school meals free of any charges; children from households with an income between 131 and 185 percent of the Federal poverty level (FPL) were eligible to receive the school lunch for a price not to exceed 40 cents and breakfasts not to exceed 30 cents. All other students were required to pay the price established by their LEA for a full school meal or alternative food item they choose to purchase. The USDA reimburses SFAs based on the number of full meals served within each income-eligibility category. Table V-1.1 presents the base reimbursement rates for SY 2009-10, SY 2010-11, and SY 2011-12 for the continental United States.<sup>44</sup>

#### Table V-1.1. Reimbursement Rates for the NSLP and SBP, SY 2009-10 to SY 2011-12

SY 2009-10 reimbursement			imbursement	SY 2011-12 reimbursement		
Income-eligibility rates			tes	rates		
category	Breakfast	Lunch	Breakfast	Lunch	Breakfast	Lunch
Free	\$1.46	\$2.68	\$1.48	\$2.72	\$1.51	\$2.77
Reduced-price	1.16	2.28	1.18	2.32	1.21	2.37
Paid	0.26	0.25	0.26	0.26	0.27	0.26

### The Potential for Cross-Subsidization and the New HHFKA Provisions

Previous analyses of production costs (School Lunch and Breakfast Cost Study (SLBCS)-I and -II, USDA 1994 and 2008) revealed that, for the average SFA, reimbursable lunches generated substantial surplus revenues. The SLBCSs showed that when an SFA's indirect and overhead costs were properly allocated across the various foods produced, the reimbursement rate for lunches was greater than the cost of producing the meal. The surplus revenues generated by reimbursable

<sup>&</sup>lt;sup>44</sup> Higher reimbursement rates are provided for Hawaii and Alaska and for SFAs serving a high proportion of school meals to children in the F/RP income-eligibility categories. The complete reimbursement structure is available at <u>http://www.fns.usda.gov/cnd/governance/notices/naps/naps.htm.</u>

lunches were used by SFAs to offset the deficits being generated by reimbursable breakfasts and nonreimbursable food items. Although on average SFAs were operating at a break-even level in SY 2005-06, revenues from reimbursable lunches exceeded the cost of producing these lunches by 16 percent, while revenues from reimbursable breakfasts fell short of the cost of producing breakfasts by 4 percent, and revenues from the sale of nonreimbursable food items fell short of their costs by 29 percent (SLBCS-II, 2008).

As a result of this research, a number of changes to meal pricing and accounting procedures were included in several of the provisions of the HHFKA<sup>2</sup> and will, over time, have a profound impact on the pricing structure, particularly in some SFAs.

The Paid Meal Equity Provision, which went into effect on July 1, 2011, requires SFAs to provide the same level of financial support for lunches sold to students who have not been approved for F/RP meals as that provided to students who must pay full price. This provision is intended to reduce, or eliminate, the implicit subsidization of paid school lunches with revenues derived from Federal reimbursements for F/RP lunches. The regulation requires SFAs to either set the average price of a paid school lunch at no less than the difference between the reimbursement rate for free and paid meals or make up for the revenues lost to the SFA through the "underpricing" of paid lunches with funds from non-Federal sources.

For SFAs that increase the prices of paid lunches, the annual rate of increase is to be 2 percent plus the rate of inflation until the price equity is achieved. The provision allows SFAs to round down the required price increase to the nearest 5 cents for SY 2011-12. The maximum that an SFA is required to increase prices in any given year is 10 cents. This allows SFAs to raise prices gradually over the course of several years to minimize the impact. However, an SFA can chose to raise prices by more than 10 cents in a given year, and such increases will count toward meeting the next year's requirements.

The Nonprogram Food Sale provision requires SFAs to set the prices of competitive foods basically at levels no less than the cost of these foods. This provision is intended to reduce, or eliminate, the implicit subsidization of nonreimbursable foods sold in schools and charged to the food service account (i.e., competitive foods) with revenues derived from Federal reimbursements for F/RP lunches. The regulations now require SFAs to set the prices of competitive foods such that the revenue generated from the sale of such foods is no less than the cost of these foods.<sup>45</sup>

### **Research Questions**

The research questions for this chapter focus on the prices charged by SFAs for SY 2011-12 and how these prices changed over a 3-year period ending in SY 2011-12.

<sup>&</sup>lt;sup>45</sup> "National School Lunch Program: School Food Service Account Revenue Amendments Related to the Healthy, Hunger-Free Kids Act of 2010," 76 Federal Register 117 (June 17, 2011), p. 35301. Available at http://www.fns.usda.gov/cnd/governance/regulations/2011-06-17.pdfRevenue

- What were the average prices charged for reduced-price and paid breakfasts and lunches in SY 2011-12? How do they relate to reimbursement rates? Do average prices vary across different types of SFAs?
- How have meal prices changed over the past 3 years? What is the pattern of price changes across different types of SFAs?
- What factors influence LEAs' decisions about meal pricing? What actions do SFAs take to avoid having to increase meal prices? What actions do SFAs take to minimize the effects of price increases on NSLP and SBP participation?

The answers to these questions take on additional importance when juxtaposed with the pricing provisions included in the HHFKA.

### Results

#### Meal Prices from SY 2009-10 to SY 2011-12

Table V-1.2 presents the average prices charged for full-price, paid breakfasts, and paid lunches from SY 2009-10 through SY 2011-12.<sup>46</sup> On average, SFAs (specifically their LEAs) charged considerably more for paid meals purchased by secondary school students than by elementary school students. The price differentials between elementary and secondary schools for paid student meals were evident across all types of SFAs. While the magnitude of these price differentials varies somewhat, differentials were seen across SFAs of various sizes, urbanicity, and poverty levels. For example, during SY 2011-12, the average price for a paid breakfast was about 6 to 7 percent higher in secondary schools than in elementary schools. Lunch prices showed the same pattern. In SY 2011-12, the average price for a paid lunch in secondary schools was about 11 percent higher than in elementary schools. This may reflect the differences in portion sizes, and hence food costs, between elementary and secondary schools.

#### Impetus for the Paid Meal Equity Provision

Table V-1.2 also reveals that before implementing the Paid Meal Equity Provision in July 2011, SFAs set the price of paid lunches at levels below the difference between the free and paid meal Federal reimbursement rates (calculated as the free lunch reimbursement rate minus the paid lunch reimbursement rate which was \$2.43, \$2.46, and \$2.51 respectively in SY 2009-10, SY 2010-11, and SY 2011-12). The historical pricing pattern resulted in SFAs earning different revenue amounts for F/RP lunches versus paid reimbursable lunches.<sup>47</sup>

<sup>&</sup>lt;sup>46</sup> The weighted and unweighted numbers of SFAs with data on meal prices by grade level and school year are shown in Appendix Tables E-2, E-4, E-6, E-17, E-19, and E-21.

<sup>&</sup>lt;sup>47</sup> FNS regulations place a cap of 30 cents on the price that SFAs can charge for reduced-price breakfasts and a cap of 40 cents on the price of reduced-price lunches. Virtually all SFAs charge the maximum permitted by these price caps.

		Average p	rice charged	l by SFAs by	school grade	e level and y	ear (Weight	ed and unw	eighted <i>n</i> sh	own in Appe	endix E)	
	Elementary Middle High								Other			
SFA characteristics	<b>'09/10</b>	<b>'10/11</b>	<b>'11/12</b>	<b>'09/10</b>	<b>'10/11</b>	<b>'11/12</b>	<b>'09/10</b>	<b>'10/11</b>	<b>'11/12</b>	<b>'09/10</b>	<b>'10/11</b>	<b>'11/12</b>
					Breakfa	ast						
All SFAs	\$1.13	\$1.15	\$1.19	\$1.21	\$1.23	\$1.26	\$1.21	\$1.24	\$1.27	\$1.13	\$1.18	\$1.23
SFA size <sup>1</sup>												
Small (1-999)	1.12	1.14	1.17	1.20	1.23	1.24	1.17	1.20	1.22	1.09	1.18	1.24
Medium (1,000-4,999)	1.15	1.17	1.21	1.21	1.23	1.27	1.24	1.25	1.30	1.18	1.20	1.26
Large (5,000-24,999)	1.12	1.14	1.17	1.21	1.24	1.26	1.24	1.26	1.28	1.13	1.16	1.17
Very large (25,000+)	1.10	1.13	1.16	1.19	1.23	1.25	1.21	1.24	1.27	1.15	1.18	1.21
Urbanicity <sup>2</sup>												
City	1.24	1.23	1.31	1.26	1.27	1.29	1.27	1.29	1.32	1.15	1.40	1.46
Suburban	1.16	1.21	1.23	1.27	1.31	1.32	1.34	1.39	1.41	1.20	1.24	1.26
Town	1.16	1.18	1.21	1.20	1.21	1.25	1.21	1.22	1.26	1.16	1.18	1.24
Rural	1.09	1.11	1.14	1.18	1.20	1.23	1.16	1.17	1.21	1.09	1.12	1.16
Poverty level <sup>3</sup>												
Low (0-29% F/RP)	1.21	1.26	1.28	1.32	1.36	1.38	1.35	1.39	1.42	1.29	1.50	1.52
Medium (30%-59% F/RP)	1.13	1.15	1.19	1.21	1.23	1.27	1.20	1.23	1.26	1.12	1.14	1.20
High (60% or higher F/RP)	1.07	1.07	1.10	1.12	1.12	1.13	1.11	1.12	1.13	1.07	1.09	1.11
					Lunch	ı						
All SFAs	\$1.89	\$1.92	\$2.00	\$2.10	\$2.14	\$2.21	\$2.11	\$2.14	\$2.21	\$2.01	\$2.06	\$2.15
SFA size <sup>4</sup>												
Small (1-999)	1.85	1.89	1.96	2.04	2.08	2.14	2.00	2.03	2.09	2.01	2.11	2.20
Medium (1,000-4,999)	1.92	1.94	2.02	2.14	2.16	2.25	2.17	2.20	2.29	1.99	2.02	2.11
Large (5,000-24,999)	1.93	1.96	2.03	2.15	2.18	2.25	2.20	2.23	2.31	2.01	2.04	2.13
Very large (25,000+)	1.87	1.90	1.96	2.12	2.14	2.21	2.16	2.19	2.25	2.07	2.10	2.17
Urbanicity <sup>5</sup>												
City	2.12	2.17	2.22	2.24	2.27	2.29	2.26	2.30	2.34	2.05	2.33	2.41
Suburban	2.09	2.13	2.21	2.33	2.36	2.44	2.38	2.42	2.51	2.26	2.30	2.40
Town	1.87	1.88	1.96	2.07	2.08	2.15	2.13	2.14	2.21	2.01	2.03	2.13
Rural	1.78	1.80	1.88	1.99	2.03	2.12	1.98	2.00	2.08	1.90	1.92	2.01
Poverty level <sup>5</sup>												
Low (0-29% F/RP)	2.11	2.15	2.22	2.34	2.38	2.48	2.34	2.38	2.45	2.14	2.28	2.37
Medium (30%-59% F/RP)	1.88	1.90	1.98	2.09	2.12	2.19	2.10	2.13	2.20	2.01	2.04	2.13
High (60% or higher F/RP)	1.71	1.73	1.81	1.90	1.91	1.97	1.91	1.93	2.01	1.92	1.94	2.02

#### Table V-1.2. Average Price Charged by SFAs for a Paid Student Breakfast and Lunch, SY 2009-10 to SY 2011-12

<sup>1</sup> The average price charged for breakfast in other schools in '11/12 differed significantly by SFA size at the .05 level.

<sup>2</sup> The average price charged for breakfast in elementary, middle, and high schools in '09/10 and in all schools in '10/11 and '11/12 differed significantly by urbanicity at the .05 level.

<sup>3</sup> The average price charged for breakfast in all schools in '09/10, '10-/1, and '11/12 differed significantly by poverty level at the .05 level.

<sup>4</sup> The average price charged for lunch in middle and high schools in '09/10, in high schools in '10/11, and in middle and high schools in '11/12 differed significantly by SFA size at the .05 level.

<sup>5</sup> The average price charged for lunch in all schools in '09/10, '10-/1, and '11/12 differed significantly by urbanicity and by poverty level at the .05 level.

Data Source: SFA Director Survey 2011, questions 5.1, 5.2a, 5.2b., 5.4, 5.5a, and 5.5b.

Table V-1.3 shows that in the year just before the implementation of the Paid Meal Equity Provision (SY 2010-11), prices were such that SFAs typically got about the same per unit revenues on free and paid breakfasts but received more on free lunches as compared to paid lunches. For every paid breakfast provided, SFAs on average charged between \$1.15 and \$1.24 and received a reimbursement of \$0.26 per meal for total revenue per breakfast of \$1.41 to \$1.50. For free breakfasts, they received the reimbursement rate of \$1.48. Thus, the total revenue per paid breakfast was highly similar to the free breakfast reimbursement rate, resulting in basically equal per-meal revenues across the reimbursement eligibility categories. In contrast, for every paid lunch provided in SY 2010-11, SFAs on average charged between \$1.91 and \$2.14 and received a reimbursement of \$0.26 per meal for total revenue per lunch of \$2.18 to \$2.40, which was substantially below the \$2.72 reimbursement rate they receive for a free lunch. This pattern of SFAs earning more revenue per meal on free lunches than on paid lunches was partly the impetus for the Paid Meal Equity Provision.

	SFA's average meal price	SFA's average meal prices, reimbursement rates, and revenues per meal					
	Elementary	Middle	High				
Breakfast							
Paid meal price	\$1.15	\$1.23	\$1.24				
Paid meal reimbursement rate	0.26	0.26	0.26				
Paid meal revenues	1.41	1.49	1.50				
Free meal reimbursement rate and revenues	1.48	1.48	1.48				
Difference in revenue	-0.07	0.01	-0.02				
Weighted n <sup>1</sup>	9,792	7,437	8,813				
Lunch							
Paid meal price	\$1.92	\$2.14	\$2.14				
Paid meal reimbursement rate	0.26	0.26	0.26				
Paid meal revenues	2.18	2.40	2.40				
Free meal reimbursement rate and revenues	2.72	2.72	2.72				
Difference in revenue	-0.54	-0.32	-0.32				
Weighted n <sup>1</sup>	11,763	8,888	10,314				

### Table V-1.3.SFA's Average Meal Prices, Reimbursement Rates, and Revenues per Meal for<br/>the NSLP and SBP by Grade Level, SY 2010-11

<sup>1</sup> n is less than 14,687 because not all SFAs participate in the SBP or have each type of school and item non-response.

Based on the prices charged for a paid meal in SY 2010-11, SFAs were going to have to raise average paid lunch prices by about 30 to 50 cents over time or provide offsetting non-Federal subsidies. SFAs could continue to charge different prices across grade levels so long as the average price of paid claimed meal was brought in line with the difference in the reimbursement rates. As this study did not collect data on meals claimed, we cannot precisely estimate the number of SFAs expected to be affected by the price changes. However, the SY 2010-11 price data suggested that the majority of SFAs were going to be affected by the Paid Meal Equity Provision because over 90 percent of SFAs had paid lunch prices in elementary schools that were below the target price (which was \$2.46), and over 80 percent had paid lunch prices in middle and high schools that were below the target price (see Appendix Tables E-4, E-6, and E-8).

#### **Effect of Paid Meal Equity Provision**

Beginning in SY 2011-12, SFAs that were not in compliance with the Paid Meal Equity Provision were required to either begin increasing paid lunch prices or provide additional non-Federal funds to offset their low prices. As Table V-1.4 shows, the majority of SFAs raised prices after the implementation of the Paid Meal Equity Provision, and the typical increase was 10 cents. As expected, a higher percentage of SFAs increased paid lunch prices in SY 2011-12 as compared to SY 2010-11. For example, in elementary schools, only 16 percent of SFAs raised prices for SY 2010-11, whereas 55 percent raised prices for SY 2011-12. A similar pattern was observed for middle, high, and other schools. The required annual price rise is capped at 10 cents, and Table V-1.4 shows that the modal (or most frequent) price increase was 10 cents. However, the average price increases were higher, ranging from \$.14 to \$.17 across grade levels, indicating that some SFAs chose to raise prices more than the required amount. Although not subject to Paid Lunch Equity Provision, a higher percentage of SFAs also increased breakfast prices in SY 2011-12 as compared to SY 2010-11. However, far fewer SFAs increased breakfast prices in SY 2011-12 than increased lunch prices.

	'09/10 to '10/11 (Year 1 to Year 2)					'10/11 to '11/12	(Year 2 to Year 3)	
	Elementary	Middle	High	Other	Elementary	Middle	High	Other
				Lunch				
Percentage of SFAs that increased prices <sup>1</sup>	15.5%	16.6%	16.1%	15.9%	55.2%	55.4%	55.9%	55.1%
Mean increase <sup>2</sup>	\$.19	\$.17	\$.18	\$.33	\$.14	\$.14	\$.14	\$.17
Median increase <sup>2</sup>	.15	.15	.15	.25	.10	.10	.10	.10
Modal increase <sup>2</sup>	.25	.25	.25	.25	.10	.10	.10	.10
			Ві	reakfast				
Percent of SFAs that increased prices <sup>1</sup>	12.3%	12.9%	12.9%	13.5%	26.2%	25.8%	24.8%	29.2%
Mean increase <sup>2</sup>	\$.16	\$.15	\$.17	\$.36	\$.15	\$.14	\$.15	\$.17
Median increase <sup>2</sup>	.10	.10	.10	.15	.10	.10	.10	.10
Modal increase <sup>2</sup>	.25	.25	.25	.25	.05	.05	.05	.25

#### Table V-1.4. Price Increases for Paid Student Breakfasts and Lunches, SY 2009-10 to SY 2011-12

Data Source: SFA Director Survey 2011, questions 5.4, 5.5a, 5.5b, 5.1, 5.2b, 5.4, and 5.4b.

<sup>1</sup>Based on SFAs that provided price data in a given pair of years.

<sup>2</sup> Based on SFAs that increased prices.

If an SFA increases paid lunch prices under the Provision, it is up to the SFA to decide how to distribute the price increases to meet the requirements. An SFA may choose to increase prices across all grade levels, or to increase prices only for some grade levels but not for others (e.g., increase prices for middle and high schools but not elementary schools). Table V-1.5 shows the percentage of SFAs that followed the same price increase behavior for elementary, middle, and high schools, versus those that increased prices for some grade levels but not for others. SFA pricing behavior is consistent across grade levels. That is, whether an SFA decides to raise prices or not, the majority of SFAs (91 percent) apply the direction of the increases consistently across all grade levels. The table shows the details of price changes for SFAs where all grade levels followed the same pattern. The most common pattern was to increase prices only once in elementary, middle, and high schools from SY 2010-11 to SY 2011-12 (44 percent of SFAs). Despite the large percentage of SFAs increasing prices in the second period, 34 percent of SFAs did not raise prices in elementary, middle, or high schools in either year. Only 9 percent of SFAs applied price increases differently across elementary, middle, and high schools, increasing prices for some grades levels but not for others. Price increases for breakfast followed a similar pattern, with SFAs applying the same decisions about the direction of changes across all grade levels.

Table V-1.5.	Patterns of Price Change in the NSLP and SBP across Two Periods: SY 2009-10
	to SY 2010-11 and SY 2010-11 to SY 2011-12

Type of price change	Lunch	Breakfast
Elementary, middle, and high schools follow the	91.2	97.5
same price increase behavior		
No increase in either of 2 years	33.7	64.3
Increase in 1 of 2 years	48.3	29.0
SY 2009-10 to SY 2010-11	4.8	7.9
SY 2010-11 to SY 2011-12	43.5	21.1
Increase in both years	9.2	4.2
Elementary, middle, and high schools do <u>not</u> follow the same price increase behavior	8.8	2.5
Total SFAs: Weighted n	8,050	6,381
Total SFA: Unweighted n <sup>1</sup>	987	791

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 5.4, 5.5a, 5.5b, 5.1, 5.2b, 5.4, and 5.4b.

Table V-1.6 shows the impact that price increases under the Paid Meal Equity Provision in SY 2011-12 have had on closing the gap between the revenue generated by free and paid lunches. The price increases in the first year under the provision have already reduced the price gap by 6 percent. For example, looking at elementary schools in SY 2010-11, on average, SFAs generated 54 cents more revenue from free lunches than from paid lunches. In SY 2011-12, average revenue from free lunches was 51 cents greater than from paid lunches—a decrease in the price gap of 6 percent. Similar reductions in the gap were observed for middle and high schools.

	SFA's average difference in revenue per meal, SY 2010-11 versus SY 2011-12				
	Elementary	Middle	High		
Difference in revenue in 2010-11	0.54	0.32	0.32		
Difference in revenue in 2011-12	0.51	0.30	0.30		
Percent gap has been narrowed	5.6%	6.3%	6.3%		
Weighted <i>n</i> <sup>1</sup> 2010-11	11,794	8,808	10,349		
Weighted <i>n</i> <sup>1</sup> 2011-12	11,763	8,888	10,314		

#### Table V-1.6. SFAs' Average Difference in Revenues per Meal, SY 2010-11 versus SY 2011-12

<sup>1</sup> *n* is less than 14,678 because not all SFAs have each type of school and item non-response. Data Source: SFA Director Survey 2011, questions 5.4, 5.5a, 5.5b.

#### **Adult Meal Prices**

In addition to students, school meals are available to teachers and other adults in the school. However, program regulations specify that Federal subsidies (both cash reimbursements and USDA Foods received) may not be used for the benefit of adults. As such, the regulations require that the price charged for a school meal served to adults may be no less than the cost of producing those meals. Because it is extremely difficult for an SFA to determine the actual cost of producing individual school breakfasts and lunches, the National Food Service Management Institute (NFSMI), funded by USDA, has provided SFAs with guidance for pricing adult meals.

- Adult lunches: The minimum price charged for an adult lunch is equal to the reimbursement rate for free lunches plus the value of entitlement commodities<sup>48</sup> (approximately \$0.20/school lunch in SY 2011-12). This formula produces a minimum price for adult lunches of \$2.97 plus any applicable sales tax.
- Adult breakfasts: The minimum price charged for an adult breakfast is equal to the reimbursement rate for a free breakfast plus any applicable sales tax, or \$1.51 during SY 2011-12.

Table V-1.7 presents a comparison of the average price of adult meals and the minimum price derived from the NFSMI guidance. On average, in SY 2011-12, SFAs charged adults about 13 to 15 percent more than the recommended minimum for a school breakfast and charged 3 to 4 percent more than the minimum for a school lunch. These results suggest that many SFAs follow the guidance when charging for adult meals.

<sup>&</sup>lt;sup>48</sup> As commodities are allocated based on reimbursable lunches, their value is included in the adult lunch price formula but not in the adult breakfast price formula.

## Table V-1.7.Comparison of the Average Price Charged by SFAs for Adult Meals to the<br/>Minimum Price Guidance by Grade Level, SY 2011-12

	Average Price Charged by SFAs by School Grade Level									
Meal	Elementary	Wgt <i>n</i> (Unwgt) <sup>1</sup>	Middle	Wgt <i>n</i> (Unwgt) <sup>1</sup>	High	Wgt n (Unwgt) <sup>1</sup>				
Breakfast										
Adult	\$1.71	10418 (1105)	\$1.74	7736 (934)	\$1.74	9075 (1020)				
Minimum price	<u>\$1.51</u>		<u>\$1.51</u>		<u>\$1.51</u>					
Percent difference	+13.2%		+15.2%		+15.2%					
Lunch										
Adult	\$3.05	12004 (1228)	\$3.09	9076 (1053)	\$3.07	10365 (1129)				
Minimum price	<u>\$2.97</u>		<u>\$2.97</u>		<u>\$2.97</u>					
Percent difference	+2.7%		+4.0%		+3.4%					

<sup>1</sup> *n* is less than 1,401 because not all SFAs have each type of school and item non-response. Data Source: SFA Director Survey 2011, questions 5.1 and 5.4.

### **Factors that May Have Influenced Meal Pricing Decisions**

In addition to the Paid Meal Equity Provision, there are several other factors that likely contributed to the variation in school meal prices. First, nutritional requirements and portion sizes vary by grade, which likely resulted in cost differences between elementary and secondary school meals. Second, both inflation and the recent recession likely influenced meal pricing decisions over time. Finally, other HHFKA provisions that have not yet been implemented may also be affecting pricing as SFAs get ready for these anticipated changes.

#### **Nutritional Requirements by Grade**

Although USDA has since issued guidance lifting the weekly limits on servings of meats and grains,<sup>49</sup> at the time of the survey the nutritional requirements and portion sizes for school meals were higher for secondary grades than elementary grades. Table V-1.8 shows the NSLP minimum nutrient and calorie requirements for secondary schools as compared to elementary schools under the Nutrient Standard Menu Planning approach that SFAs used during SY2009-10 to SY 2011-12 (which is before the new regulations stemming from the HHFKA were implemented). The differences in portion sizes required under the Traditional Food-Based Menu Planning system are more complex, varying not only by grade level but also by food components and food items. For example, in the meat or meat alternate category, the requirement may be met by serving the following amounts of lean meat, poultry or fish (or alternate protein products or cheese): for grades K-3, 1<sup>1</sup>/<sub>2</sub> ounces; for grades 4-12, 2 ounces; with SFAs having an option to serve larger portions (3 ounces) for grades 7-12.<sup>50</sup> These higher nutritional requirements for the upper grades increase the cost of the food and contribute to the tiered pricing strategy typically used in which secondary school meal prices are higher than elementary school prices.

<sup>&</sup>lt;sup>49</sup> SP 26-2013, Extending Flexibility in the Meat/Meat Alternate and Grains Maximums for School Year 2013-14, <u>http://www.fns.usda.gov/cnd/governance/regulations/7cfr210\_09.pdf</u>

<sup>&</sup>lt;sup>50</sup> See <u>www.fns.usda.gov/cnd/menu/menu\_planning.doc</u>).

# Table V-1.8. NSLP Minimum Nutrient and Calorie Requirements: Nutrient Standard Menu Approaches (School Week Averages)

	Minimum r	Minimum requirements			
Nutrients and energy allowances	Grades K-6	Grades 7-12	Grades K-3		
Energy allowances (calories)	664	825	633		
Total fat (as a percentage of actual total food energy)	a, b	b	a, b		
Saturated fat (as a percentage of actual total food energy)	a, c	с	a, c		
RDA for protein (g)	10	16	9		
RDA for calcium (mg)	286	400	267		
RDA for iron (mg)	3.5	4.5	3.3		
RDA for vitamin A (RE)	224	300	200		
RDA for vitamin C (mg)	15	18	15		

<sup>a</sup> The Dietary Guidelines recommend that after 2 years of age "children should gradually adopt a diet that, by about 5 years of age, contains no more than 30 percent of calories from fat."

<sup>b</sup> Not to exceed 30 percent over a school week.

<sup>c</sup> Less than 10 percent over a school week.

Source: Menu Planning in the National School Lunch Program, available at www.fns.usda.gov/cnd/menu/menu planning.doc.

#### Inflation

Inflation likely contributed to the price changes over time. The National School Lunch Act requires FNS to adjust the NSLP and SBP reimbursement rates to reflect changes in the "food away from home" series of the Consumer Price Index for All Urban Consumers (CPI-U). As shown in Table V-1.9, recent increases have been quite modest with prices, and therefore the reimbursement rates, rising by 1.5 percent between SY 2009-10 and SY 2010-11 and by about 2 percent between SY 2010-11 and SY 2012.<sup>51</sup> In SY 2010-11, SFAs raised prices for paid meals on average less than 2 percent, or about equal to inflation. In SY 2011-12, prices increased at a rate greater than inflation. On average, SFAs increased prices 3 to 4 percent or about 1 or 2 percent more than inflation. Although this recent rise in lunch prices above inflation is likely due in part to the Paid Meal Equity Provision, breakfast prices also rose more than inflation between SY 2010-11 and SY 2011-12. Both the recent recession and other HHFKA policy changes may be affecting meal pricing decisions.

<sup>&</sup>lt;sup>51</sup> Reimbursement rates for reduced-price breakfasts are set at 30 cents below the free rate. Similarly, the reduced-price lunch rate is set at 40 cents below the free rate. SFAs are permitted to charge students approved for reduced-price meals no more than the difference in reimbursement rates between F/RP meals.

# Table V-1.9.NSLP and SBP Reimbursement Rates for Free School Meals and Average Prices<br/>for Paid Meals, SY 2009-10 to SY 2011-12

	<b>'09/10</b>	<b>'10/11</b>	'11/12	% change '09/10 to '10/11	% change '10/11 to '11/12						
Reimbursement rate for free meals											
Breakfast	\$1.46	\$1.48	\$1.51	1.5%	2.0%						
Lunch	2.68	2.72	2.77	1.5	1.8						
	Average paid meal prices										
Elementary											
Breakfast	\$1.13	\$1.15	\$1.19	1.8%	3.5%						
Lunch	1.89	1.92	2.00	1.6	4.2						
Middle											
Breakfast	1.21	1.23	1.26	1.7	2.4						
Lunch	2.10	2.14	2.21	1.9	3.3						
High											
Breakfast	1.21	1.24	1.27	2.5	2.4						
Lunch	2.11	2.14	2.21	1.4	3.3						

Data Source: http://www.fns.usda.gov/cnd/governance/notices/naps/NAPsHistorical.htm and SFA Director Survey 2011, questions 5.1, 5.2, 5.4, and 5.5.

#### **The Recent Recession**

The recent economic downturn, which placed a great deal of stress on state and local budgets, may have contributed to LEAs' increasing school lunch prices. Although the recession began in December 2007 and lasted 18 months, the post-recession economy has continued to perform poorly, which has affected the tax base of states and localities. This austere financial environment has likely put pressure on LEAs and SFAs to ensure they fully cover the costs of their school food services through the revenues generated. In fact, 28 percent (not shown) of state CN directors noted that meal prices were affected by their state's budget issues.

#### **HHFKA Policy Changes**

It is likely that some of the price increases that occurred between SY 2009-10 and SY 2011-12 were due to changes based on the new meal pattern requirements stemming from the HHFKA. The new NSLP and SBP standards stemming from the HHFKA require schools to increase the availability of fruits, vegetables, whole grains, and fat-free and low-fat fluid milk in school meals; reduce the levels of sodium, saturated fat, and trans fat in meals; and meet the nutrition needs of school children within their age/grade calorie requirements. Although these new nutritional standards did not go into effect until SY 2012-13, it is possible that SFAs have already begun to move in the direction of serving healthier foods in anticipation of the requirements and increased meal prices with SY 2011-12 to cover the costs of more nutritious offerings. Beginning on October 1, 2012, the HHFKA provided SFAs that comply with the new meal standards an additional Federal reimbursement (6 cents per reimbursable meal) and offers provisions for generating revenues to offset expected increased costs.

SFAs will also have to raise the prices of nonreimbursable food items by a considerable amount. As discussed above, both SLBCS-I and SLBCS-II reported that revenues derived from the sale of nonreimbursable food items were considerably less than the cost of these food items.

These two changes in pricing structure act in opposite directions with regard to participation of students who are paying full-price. Increasing the prices of paid lunches could act to reduce NSLP participation, but the increase in the prices of competitive foods makes the purchase of these foods a less desirable alternative to buying a school lunch and should act to increase NSLP participation. The net effect of these two provisions will become clearer over the next few years as they continue to be implemented.

# Actions Taken to Avoid Raising Meal Prices and Minimize the Effects on Participation

Both LEAs and SFAs seek to minimize price increases. While an SFA is responsible for running its LEA's school food service programs, decisions about meal prices are made by LEAs (and sometimes require the approval of the school board). Historically, LEAs have been reluctant to change meal prices each year. Rather than have a series of small annual increases, LEAs typically hold their meal prices constant for several years and then raise prices by a larger amount (St. Pierre et al. 1991).

LEAs and SFAs rely on many different approaches to minimize or avoid increasing prices charged to students paying full price for school meals, and in general their strategies have not changed in over 20 years. Table V-1.10 compares the top four strategies used in SY 2011-12 with those used in SY 1988-89. Although the order of importance has changed, the top four strategies were the same in the two time periods. Interestingly, all four strategies for avoiding raising prices in one way or another involve reducing the direct cost of producing reimbursable meals and were used with more frequency in SY 2011-12 than in SY 1988-89.

# Table V-1.10. Top Four Strategies SFAs Report Their LEA Used to Avoid Increasing the Price of<br/>Paid NSLP and SBP Student Meals, SY 2011-12 versus SY 1988-89

	Percentage of SFAs reporting strategy used:			
Strategies used to avoid price increases	SY 2011-12	SY 1988-89		
Increase use of USDA-donated foods	63.4%	29%		
Improve food staff efficiency	60.3	16		
Switch to lower-priced foods	41.9	33		
Reduce kitchen staff hours	38.4	21		
Total SFAs: Weighted <i>n</i>	12,121	14,259		
Total SFAs: Unweighted n	1,224 <sup>1</sup>	1,401		

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Sources: SFA Director Survey 2011, question 5.8, and St. Pierre et al. 1991.

When prices are increased, SFAs typically experience a decline in the participation of students who are not approved for F/RP meals, because it is only this group of students who experience price increases. Somewhat surprisingly, only 55 percent (not shown) of SFAs that increased meal prices in SY 2011-12 took any special steps to maintain student participation. Ninety-two percent (not shown) of these SFAs tried to increase parent awareness of the school meals program; 90 percent (not shown) offered more popular foods; and 89 percent (not shown) tried to improve meals.

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## V-2. Expenditures, Revenues, and Unpaid Meals

### Background

The current regulations stipulate that an SFA must operate on a nonprofit basis and abide by a series of financial rules.<sup>52</sup> In this context, we looked at an SFA's cash receipts and cash expenditures to examine the extent to which SFAs operate on a nonprofit basis and provide some insight into the relative efficiency of their production processes. Additionally, we examined the extent to which LEAs charge their SFAs for indirect costs versus absorbing these costs in the local school budget. Finally, we examined the financial implications to the SFAs of covering the cost of meals for children who have not been approved for free meals but who are unable to pay for school meals during the school year.

#### **Measuring Expenditures versus Costs**

Ideally, to assess if SFAs are operating on a nonprofit basis, all SFAs revenues and costs would need to be measured. However, there are several challenges associated with calculating the cost of school food service operations (Child Nutrition Meal Cost Methodology Study, USDA 1992). First, not all resources used are reported as part of SFAs costs; this is particularly true for indirect costs such as overhead functions that may be covered by the LEA to support school food service operations. Second, in addition to cash reimbursements for school meals, USDA provides in-kind support to SFAs in the form of donated foods. In SY 2011-12, SFAs were entitled to receive approximately 18 cents in USDA Foods plus all of the available bonus commodities that could be used without waste. SLBCS-II reported that the total value of USDA Foods accounted for an average of about 5 percent of total SFA revenues (SLBCS-II, USDA 2008). However, donated USDA Foods appear on both sides of the ledger, as both a cost item and revenue item, and are therefore a wash when considering the relationship between costs and revenues. Finally, there is often interest in examining the costs and revenues associated specifically with reimbursable meals as this is the component of food service production that is subsidized by the Federal government. However, because reimbursable and non-reimbursable foods are often prepared by the same staff with ingredients that are used in common, it is difficult to identify the inputs, and therefore costs, used to produce reimbursable meals. As it was not within the scope of SN-OPS to measure unreported costs or to allocate food service costs between reimbursable and non-reimbursable meals, the cost of producing a reimbursable meal was not estimated. Instead, the study examined cash expenditures and revenues that provide insight into total production cost and revenues and whether the SFA is operating on a nonprofit basis.

<sup>&</sup>lt;sup>52</sup> 7CFR210.9b(1), January 1, 2009 edition. Available at <u>http://www.fns.usda.gov/cnd/governance/regulations/7cfr210\_09.pdf</u>

#### **Operational Definition of Breaking Even**

As with any business, in some years an SFA may have a year-end surplus, and in other years, it may incur a deficit. Although an SFA's year-end operating balance may be expected to fluctuate from year to year, over time it is expected that the deficits incurred in some years will be offset by surpluses generated in other years, so that over time, an SFA operates on a nonprofit basis (i.e., at a *break-even level*, with revenues equaling expenditures).<sup>53</sup>

Defining breaking even as ending the school year with revenues equaling expenditures does not work operationally when trying to examine if SFAs are operating on a nonprofit basis. With any cross-sectional sample of SFAs, many SFAs will end the year with an operating deficit, while many others will end the year with an operating surplus. The proportion of SFAs operating at exactly the break-even level will be extremely small. For analytic purposes, it is necessary to define "operating at a break-even level" more broadly, that is, to define it as operating within a narrow range around the point where the ratio of revenues to expenditures is equal to 1. The narrower the range selected, the fewer SFAs will be found to be operating at the break-even level; the wider the range, the more SFAs will be found to be operating at the break-even level. While admittedly arbitrary, the operational definition of breaking even used is in this study is ending a school year with a ratio of revenues to expenditures equal to  $1.0\pm0.05$ .

#### **Unpaid Meals**

SFAs may incur costs for providing unpaid meals to students who have not been approved for free meals and who are unable to pay for these school meals. Although FNS does not require schools to provide a school meal or an alternative meal to these students, it does encourage them to do so.<sup>54</sup> The School Nutrition Association (SNA) has issued guidance to its members on dealing with this issue, and it notes that the cost of unpaid meals is not reimbursable and must often be borne by the SFA (SNA 2008). In a 2009 survey of its membership, SNA reported that 21 percent of SFA directors indicated that unpaid meals "… were one of the top three most pressing issues facing their school nutrition program" (SNA 2009).<sup>55</sup> However, the SNA report does not address the actual fiscal implications of revenues lost because of unpaid meals.

### **Research Questions**

The research questions in this section focus on SFA costs and revenues for SY 2010-11 and whether SFAs are operating at a break-even level. The research questions also address the issue of unpaid meals and the effect of unpaid meals on an SFA's ability to operate on a nonprofit basis.

<sup>&</sup>lt;sup>53</sup> FNS limits an SFA's net cash resources to an amount that does not exceed 3 months of operating expenditures. Previous studies (SLBCS-II; USDA 2008) reported that, on average, in SY 2005-06, SFAs maintained cash balances that were about one-half of the allowable maximum, and only about 25 percent of SFAs had an end-of-year cash balance that exceeded 3 months of expenses.

<sup>&</sup>lt;sup>54</sup> USDA, FNS. "About School Meals: FAQs." Available at http://www.fns.usda.gov/cnd/About/faqs.htm

<sup>&</sup>lt;sup>55</sup> SNA conducted a Web survey of 2,250 SFA directors and received 310 responses, for a response rate of 13.8 percent.

- What is the magnitude of SFA cash expenditures? What is the composition of SFA cash expenditures?
- How many LEAs charge their SFA for indirect cost?
- What is the magnitude of cash revenues?
- How do total SFA cash expenditures compare with total SFA cash revenues?
- Are SFAs operating on a nonprofit basis?
- What actions are taken when a child who has not been approved for free meals cannot pay for a school meal?
- What steps are taken to recover revenues lost because of unpaid meals?
- What percent of SFAs have lost revenues because of unpaid meals?
- Are SFAs able to recover any of the revenues lost from unpaid meals?
- What is the relative magnitude of lost revenues because of unpaid meals when compared with SFAs' total revenues?
- How do unpaid meals affect an SFA's ability to operate on a nonprofit basis?

### Results

For the financial analyses in this chapter, several constructed variables were created, and many of these constructs have a high degree of dispersion. As such, the median rather than mean was used as the main measure of central tendency for the financial data, as it is less sensitive to outliers. The median is the 50th percentile (or middle) of the distribution, with half of the cases having values above this amount and half of the case having values below this amount.

#### **Expenditures and Revenues**

Many environmental factors affect an SFA's total expenditures and revenues. Among those factors are the number and reimbursement status of students participating in the school meals programs and the appeal and quantity of nonreimbursable foods. However, a major factor affecting an SFA's total expenditures and revenues is simply the size of the SFA, both in the number of schools and the number of students served (and hence the amount of food that must be prepared and served). It makes little sense to compare the annual expenditures and revenues of the Los Angeles Unified School District, which has an enrollment of nearly 700,000 children in grades K-12 in over 1,000 schools, to, say, the Mora, New Mexico, Independent School District, which has 4 schools with a total enrollment of about 500 students. To account for the very large differences in SFA size, this study used total annual daily expenditures (and revenues) per average daily attendance (ADA) to examine expenditures and revenues.<sup>56</sup> This measure was calculated by dividing the annual

<sup>&</sup>lt;sup>56</sup> An alternative measure to account for differences in SFA size in the number of reimbursable meals served. These data were not collected in Year 1.

expenditure and revenue measures by 180 days<sup>57</sup> (typical number of school days per year) to get an approximation of an SFA's daily expenditures and revenues. This daily expenditure (revenue) measure was then divided by ADA to get expenditure (revenue) per ADA, which captures the expenditure per student in attendance per day.

#### **Cash Expenditures**

Table V-2.1 shows the distribution of SFAs by their daily expenditures per ADA day. About 41 percent of all SFAs spent daily between \$2.01 and \$3.00 per ADA; 39 percent spent more than \$3.00; and 20 percent spent \$2.00 or less.

Table V-2.1.	Percentage of SFAs by Daily Food Service Expenditures per ADA, SY 2010-11
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SFA daily cash expenditures per ADA	Percentage of SFAs
≤1.50	5.7%
\$1.51-\$2.00	14.5
\$2.01-\$2.50	20.8
\$2.51-\$3.00	20.1
\$3.01-\$3.50	11.6
≥ \$3.51	27.3
Total	100.0
Total SFAs: Weighted n	11,005
Total SFA: Unweighted n	1,114 <sup>1</sup>

<sup>1</sup> *n* is less than 1,401 because of item non-response.

Data Source: SFA Director Survey 2011, question 7.1a.

Table V-2.2 shows that the median daily expenditure per ADA was \$2.68. SFAs' median daily expenditure per ADA varies significantly by SBP participation status and SFA size. SFAs that participated in both the NSLP and the SBP spent more (\$2.74) than SFAs that participated only in the NSLP (\$1.89). Small SFAs (with an enrollment of fewer than 1,000 students) also spent more (\$3.00) than medium (\$2.54), large (\$2.53), and very large SFAs (\$2.35). Daily spending per ADA varied significantly as the percentage of students approved for F/RP meals increased; high-poverty SFAs spent more than low-poverty SFAs (\$3.30 vs. \$2.12). There was also significant variation by urbanicity level, by the use of a FSMC, and by type of kitchen used.

<sup>&</sup>lt;sup>57</sup> The National Center for Education Statistics reports that the average number of operating days for school district is 180. <u>http\91</u> the distributiontp://nces.ed.gov/surveys/pss/tables/table\_15.asp

# Table V-2.2.SFAs' Daily Food Service Cash Expenditure per ADA by SFA Characteristics, SY2010-11

		Т	otal SFAs
SFA characteristics	SFAs' median daily expenditure per ADA	Weighted n	Unweighted <i>n</i>
All SFAs	\$2.68	11,004	1,114 <sup>1</sup>
Participation in SBP <sup>2</sup>			
NSLP and SBP	2.74	10,092	1,059
NSLP only	1.89	913	55
SFA size <sup>2</sup>			
Small (1-999)	3.00	5,288	241
Medium (1,000-4,999)	2.54	4,096	411
Large (5,000-24,999)	2.53	1,361	308
Very large (25,000+)	2.35	260	154
Urbanicity <sup>2</sup>			
City	2.43	1,131	218
Suburban	2.09	1,974	293
Town	2.79	2,273	215
Rural	2.94	5,627	388
Poverty level <sup>2</sup>			
Low (0-29% F/RP)	2.12	2,501	269
Medium (30%-59% F/RP)	2.67	5,233	519
High (60% or higher F/RP)	3.30	3,270	326
Type of kitchen <sup>2</sup>			
Onsite kitchen only	2.63	1,811	176
Offsite kitchen only	2.79	6,111	508
Combination or other	2.54	2,909	420
Use of a FSMC <sup>2</sup>			
SFA uses a FMSC	2.43	2,023	202
SFA does not use a FMSC	2.78	8,923	908

<sup>1</sup> n is less than 1,401 because of item non-response.

<sup>2</sup> Median daily expenditure per ADA significantly differs by participation in SBP, SFA size, urbanicity, poverty level, type of kitchen, and use of an FSMC at the .05 level.

Data Source: SFA Director Survey 2011, question 7.1a.

Table V-2.3 shows the components of cash expenditures. As expected, food and labor account for most food service costs, with food accounting for an average of 41 percent of SFAs' reported costs, and labor accounting for 43 percent of SFAs' reported costs. This is consistent with previous studies (SLBCS-I and -II, USDA 1994, 2008).<sup>58</sup> SFA size was significantly related to how SFAs allocated their resources. For small SFAs, labor accounted for 40 percent of total expenditures but accounted for 45 to 46 percent of total expenditures for larger SFAs. By contrast, contract services accounted for a larger percentage of total reported cost in small SFAs (12 percent) compared with larger SFAs, where contracted services accounted for between 4 percent and 7 percent of reported costs.

<sup>&</sup>lt;sup>58</sup> SLBCS-I and SLBCS-II found that food accounted for 48 to 47 percent of SFAs' total reported costs, but these studies included the assigned value of USDA Foods as part of an SFA's reported costs, while the present study does not. In SY 2005-06, USDA Foods accounted for 12 percent of the total food cost of an average SFA (USDA 2008).

		On average, the percentage of SFA cash expenditures spent on:										
		Food			Labor		Contracted services		Other expenditures			
	Mean	Wtd	Unwtd	Mean	Wtd	Unwtd	Mean	Wtd	Unwtd	Mean	Wtd	Unwtd
Type of SFA	%	n	n	%	n	n	%	n	n	%	n	n
All SFAs	41.0%	10,987	1,116 <sup>1</sup>	42.6%	10,807	1,102 <sup>1</sup>	9.3%	10,835	1,103 <sup>1</sup>	7.8%	10,712	1,095 <sup>1</sup>
Participation in SBP												
NSLP and SBP	40.7	10,074	1,061	42.8	9,920	1,048	9.2	9,947	1,049	7.9	9,824	1,041
NSLP only	43.4	913	55	40.0	888	54	11.0	888	54	6.3	888	54
SFA size <sup>2</sup>												
Small (1-999)	42.0	5,261	240	40.3	5,163	236	12.1	5,167	236	6.5	5,090	233
Medium (1,000-4,999)	40.6	4,096	411	44.5	4,032	405	6.8	4,060	408	8.4	4,020	404
Large (5,000-24,999)	38.3	1,367	309	44.9	1,348	305	7.2	1,347	304	9.9	1,340	303
Very large (25,000+)	38.8	263	156	45.7	263	156	3.5	262	155	12.0	262	155
Meal Production System <sup>3</sup>												
On-site kitchens only	41.6	2,197	254	42.4	2,170	252	7.3	2,154	250	8.8	2,154	2,450
Base/Central with	42.4	6,113	508	43.8	6,038	501	6.6	6,025	501	7.4	5,987	498
satellites only												
Combination kitchens	37.2	2,677	354	40.0	2,600	349	17.1	2,655	352	7.6	2,571	347

#### Table V-2.3. On Average, the Percentage of SFAs' Cash Expenditures Spent on Various Inputs, SY 2010-11

n is less than 1,401 because of item non-response.

<sup>2</sup> Percentage of expenditures on food, labor, contracted services, and other expenditures significantly differs by SFA size at the .05 level.
 <sup>3</sup> Percentage of expenditures on contracted services and other expenditures significantly differs by meal production system at the .05 level.

Data Source: SFA Director Survey 2011, question 7.1a.

#### **Indirect Costs**

As school budgets have become much tighter, LEAs have sought ways to increase revenues without raising taxes. One potential source of revenue for an LEA is to charge the school food service accounts for the indirect costs attributable to its food service program. Historically, LEAs have not charged their SFAs for indirect costs, even though the regulations permit them to do so (USDA 2010).<sup>59</sup> Between SY 1992-93 and SY 2005-06, there were very large increases in the percentage of LEAs that charged some, or all, of the indirect costs attributable to their food service program to their SFA (SLBCS-I and II, USDA 1994 and 2008). Even so, in SY 2005-06, only 16 percent of LEAs charged their SFAs for any indirect costs. The SNA surveyed its membership and reported that in SY 2004-05, a total of 52 percent of the 972 SFA directors who responded to the Web survey were being charged for indirect costs (SNA 2006).<sup>60</sup>

In SY 2010-11, a total of 22 percent of SFAs reported being charged for indirect costs by their LEA as shown in Table V-2.4. This is similar to the SLBCS-II estimate. The percentage of SFAs charged for indirect costs varied significantly with SFA size. Only 13 percent of small SFAs were charged for indirect costs in SY 2010-11, compared to 28 percent of medium size, 42 percent of large, and 71 percent of very large SFAs.

	Percentage of SFAs reporting that they	Tota	l SFAs	
SFA characteristics	were charged for indirect costs <sup>1</sup>	Weighted <i>n</i>	Unweighted n	
All SFAs	22.4%	14,678	1,401	
Participation in SBP <sup>2</sup>				
NSLP and SBP	23.8	13,253	1,315	
NSLP only	9.5	1,424	85	
SFA size <sup>2</sup>				
Small (1-999)	12.5	7,374	332	
Medium (1,000-4,999)	27.5	5,390	536	
Large (5,000-24,999)	42.4	1,629	364	
Very large (25,000+)	70.7	284	169	
Type of kitchen <sup>2</sup>				
Onsite kitchen only	25.3	2,373	220	
Offsite kitchen only	19.3	7,895	640	
Combination or other	27.8	4,154	528	
Use of a FSMC				
SFA uses a FMSC	20.3	3,014	279	
SFA does not use a FMSC	23.3	11,479	1,110	

### Table V-2.4. Percentage of SFAs Reporting they were Charged for Indirect Costs by SFA Characteristics, SY 2010-11

<sup>1</sup>SFAs were asked to report total SY 2010-11 expenditures by category with one of the choices being indirect/overhead costs.

<sup>2</sup> Percentage of SFAs reporting that they were charged for indirect costs significantly differs by participation in SBP, SFA size, and type of kitchen at the .05 level.

Data Source: SFA Director Survey 2011, question 7.1a.

<sup>&</sup>lt;sup>59</sup> Charging an SFA for indirect costs is equivalent to billing the SFA for these costs. Many LEAs charge their SFAs for indirect costs, but do not actually recover these costs, which involves actually getting paid.

<sup>&</sup>lt;sup>60</sup> The SNA estimate of the percentage of SFAs being charged for indirect costs should, however, be viewed with some caution because the SNA survey response rate was only 23 percent.

#### **Cash Revenues**

Table V-2.5 shows the distribution of SFAs by their revenues per ADA. As one would expect, given that SFAs are supposed to operate at a break-even level, the distribution of SFAs by their receipts per student attending per day looks very much like the distribution of SFAs by expenditures. About 44 percent of all SFAs received between \$2.01 and \$3.00 daily per student attending; 34 percent received more than \$3.00 daily per student attending; and 23 percent received \$2.00 or less daily per student attending.

Annual SFA cash receipts per student (attending) per day	Percentage of SFAs
≤1.50	8.2%
\$1.51-\$2.00	14.7
\$2.01-\$2.50	22.8
\$2.51-\$3.00	20.9
\$3.01-\$3.50	11.6
≥\$3.51	21.9
Total	100.0
Total SFAs: Weighted n	10,982
Total SFAs: Unweighted n	1,106 <sup>1</sup>

#### Table V-2.5. Percentage of SFAs by Daily Cash Receipts per ADA, SY 2010-11

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data source: SFA Director Survey 2011, question 6.1a.

As Table V-2.6 shows, the median daily cash receipt per student attending was \$2.59. As with expenditures, there were some differences in median daily cash receipts per student attending among different types of SFAs. The differences in daily cash receipts per student attending follow the same pattern as the differences in daily expenditures per student in attendance. Daily cash receipts per ADA significantly differ by SBP participation, SFA size, and poverty level. For example, SFAs that participate in both the NSLP and the SBP had higher daily cash receipts per ADA (\$2.64) than SFAs that participate only in the NSLP (\$1.80). Small SFAs had higher receipts (\$2.68) than medium (\$2.51), large (\$2.47), and very large SFAs (\$2.45). Daily receipts per ADA were higher in high-poverty SFAs (\$3.03) than in medium-poverty level SFAs (\$2.61), and low-poverty level SFAs (\$2.07). There were also significant differences by urbanicity level and use of an FSMC.

Appendix Tables E-33 through E-36 provide a breakdown of SFA revenues by source. The tables reveal that in SY 2011-12, 52 percent (not shown) of SFA revenues came from USDA subsidies, making it the largest single source of SFA revenues. USDA subsidies include subsidies for reimbursable meals as well as other Federal subsidies. Another 26 percent (not shown) of SFA revenues came from student payments for paid and reduced-price meals. Only 12 percent (not shown) of SFA revenues came from state and local funds, and 9 percent of revenues came from non-reimbursable sales.

		Total	Total SFAs		
SFA characteristics	SFA's median daily cash receipt per ADA	Weighted <i>n</i>	Unweighted <i>n</i>		
All SFAs	\$2.59	10,982	1,106 <sup>1</sup>		
Participation in SBP <sup>2</sup>					
NSLP and SBP	2.64	10,005	1,049		
NSLP only	1.80	978	57		
SFA size <sup>2</sup>					
Small (1-999)	2.68	5,317	242		
Medium (1,000-4,999)	2.51	4,081	408		
Large (5,000-24,999)	2.47	1,323	300		
Very large (25,000+)	2.45	262	156		
Urbanicity <sup>2</sup>					
City	2.46	1,199	221		
Suburban	2.09	1,961	289		
Town	2.77	2,265	214		
Rural	2.70	5,557	382		
Poverty level <sup>2</sup>					
Low (0-29% F/RP)	2.07	2,487	266		
Medium (30%-59% F/RP)	2.61	5,182	516		
High (60% or higher F/RP)	3.03	3,313	324		
Type of kitchen					
Onsite kitchen only	2.58	1,758	173		
Offsite kitchen only	2.66	6,092	502		
Combination or other	2.47	2,967	422		
Use of an FSMC <sup>2</sup>					
SFA uses an FMSC	2.26	2,100	206		
SFA does not use an FMSC	2.66	8,820	895		

#### Table V-2.6. SFA's Daily Cash Receipts per ADA by SFA Characteristics, SY 2010-11

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Median daily revenues per ADA significantly differ by participation in SBP, SFA size, urbanicity, poverty level, and use of an FSMC at the .05 level.

Source: SFA Director Survey 2011, question 6.1a.

### **Operating as a Nonprofit**

Consistent with previous studies, the data suggest that in SY 2010-11, SFAs, on average, were operating at a break-even level; the median ratio of total cash revenues to total cash expenditures was equal to 1.0 (USDA 1992, 1994, 2008; St. Pierre 1991). However, as discussed earlier in this chapter, it would be highly unlikely for this ratio to equal 1.0 for any individual SFA in a particular year. Breaking even is more properly viewed as a phenomenon that happens over time rather than every year. Over time, one would expect an SFA that is operating at a break-even level to experience year-to-year fluctuations in both revenues and expenditures, but one would also expect that over a period of years, its average ratio of revenues to expenditures would equal approximately 1.0.<sup>61</sup> The results from a cross-section of SFAs in any given year should approximate the results of a time series for a single "typical" SFA.

<sup>&</sup>lt;sup>61</sup> Technically, as a consequence of the law of large numbers, an SFA's ratio of revenues to expenditures should asymptotically approach 1.0. The longer the period of time included in calculating the ratio, the closer the ratio will be to 1.0.

Table V-2.7 shows the distribution of SFAs by the ratio of annual cash receipts as a percentage of annual cash expenditures. Although on average SFAs are breaking even, only 41 percent actually operated at a break-even level, with the ratio of revenues to expenditures between 0.95 and 1.05. One third (34 percent) incurred a deficit, and 25 percent produced a surplus.<sup>62</sup> As indicated earlier in this chapter, the percentage of SFAs operating at the break-even level is dependent on the operational definition of breaking even. Narrowing the operational definition of breaking even to a ratio of revenues to expenditures between 0.975 and 1.025 reduces the percentage of SFAs that would be considered as breaking even from 41 to 28 (not shown). Similarly, widening the definition to a ratio between 0.90 and 1.10 increases the percentage of SFAs that would expect to see movement of individual SFAs in and out of the break-even band over time.

Annual SFA cash receipts as a percentage of annual cash expenditures	Percentage of SFAs
≤85%	19.0
86% to 90%	5.4
91% to 95%	9.6
96% to 100%	23.6
101% - 105%	17.8
106% to 110%	12.2
111% to 115%	4.0
≥116%	8.4
Total	100.0
Total SFAs: Weighted n	10,680
Total SFAs: Unweighted n	1,082 <sup>1</sup>

# Table V-2.7.Percentage of SFAs by Annual Cash Receipts as a Percentage of Cash<br/>Expenditures, SY 2010-11

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey 2011, questions 6.1a and 7.1a.

Table V-2.8 shows the median cash receipts as a percentage of expenditures and the percentage of SFAs operating at the break-even level by SFA characteristics. As the table shows, the median ratio of cash receipts as a percentage of expenditures is 1.0, suggesting that most SFAs were breaking even. Sixty-six percent of SFAs operated at or above the break-even level (ratio of cash receipts to expenditures of .95 or greater). Several SFA characteristics were significantly associated with breaking even, including SBP participation, SFA size, poverty level, and being charged with indirect costs. For example, SFAs that participated in both the NSLP and SBP were more likely to break even than those that operated only a lunch program (68 percent versus 49 percent). Similarly, very large SFAs were more likely to break even than small SFAs (90 percent versus 58 percent). The type of kitchen used by SFAs and use of FSMCs were unrelated to breaking even.

<sup>&</sup>lt;sup>62</sup> The analysis of breaking even relied on a comparison of total cash receipts to total cash expenditures for SY 2010-11. SFAs are allowed to carry up to 3 months of operating expenses in their nonprofit school food service accounts. The Year 1 data collection did not obtain information on SFAs' 3-month operating balance, so the analysis could not consider any operating balance (or deficit) that an SFA had going into the school year. Because the Year 2 survey will again collect data on revenues and expenditures for SY 2011-12, it will be possible to analyze break-even status over a longer (2-year) period and take into account any surplus or deficit from Year 1 when analyzing break-even status in Year 2.

# Table V-2.8.Percent of SFAs Operating At or Above the Break-Even Level by SFA<br/>Characteristics, SY 2010-11

			Tot	al SFAs
	Median ratio of cash	Percentage of SFAs ≥	Weighted	Unweighted
SFA characteristics	receipts/expenditures	break-even level <sup>1</sup>	n	n
All SFAs	1.00	65.9%	10,678	1,082 <sup>2</sup>
Participation in SBP <sup>3</sup>				
NSLP and SBP	1.00	67.5	9,801	1,030
NSLP only	0.95	48.8	878	52
SFA size <sup>4</sup>				
Small (1-999)	0.99	58.1	5,142	234
Medium (1,000-4,999)	1.00	70.0	3,974	397
Large (5,000+)	1.02	79.8	1,303	296
Very large (25,000+)	1.03	90.4	261	155
Type of kitchen				
Onsite kitchen only	1.00	66.1	1,707	168
Offsite kitchen only	1.00	65.5	5,987	494
Combination or other	1.00	69.5	2,821	411
Use of an FSMC				
SFA uses an FMSC	1.00	65.9	1,952	195
SFA does not use an FMSC	1.00	66.0	8,669	883
Poverty level <sup>5</sup>				
Low (0-29% F/RP)	1.00	67.2	2,411	260
Medium (30%-59% F/RP)	1.00	70.3	5,083	505
High (60% or higher F/RP)	0.99	57.9	3,185	317
Indirect Costs <sup>6</sup>				
SFA is charged for indirect costs	1.00	71.7	7,448	616
SFA is not charged for indirect costs	1.00	63.4	3,231	466
			-,	

<sup>1</sup>Operating at or above the break-even level is defined as a ratio of revenues to expenditures of greater than .95.

 $^{2}$  *n* is less than 1,401 due to item non-response.

<sup>3</sup>Median ratio of cash receipts/expenditures and percentage of SFAs breaking even significantly differs by participation in SBP at the .05 level.

<sup>4</sup> Median ratio of cash receipts/expenditures and percentage of SFAs breaking even significantly differs by SFA size at the .05 level.

<sup>5</sup> Percentage of SFAs breaking even significantly differs by poverty at the .05 level.

<sup>6</sup> Median ratio of cash receipts/expenditures and percentage of SFAs breaking even differs by indirect costs at the .05 level. Data Source: SFA Director Survey 2011, questions 6.1a, 7.1a, and 8.3.

#### **Lost Revenues from Unpaid Meals**

Although not required to do so by FNS regulations, SFAs are, in fact, providing meals to children who cannot pay for them. SFAs were asked to report the total amount of money owed to them from unpaid meals before any attempts were made to recover any of these lost revenues and the total amount of money recovered. More than half of the SFAs (58 percent) reported that they incurred unpaid meal costs (before recovery attempts) in SY 2010-11 (not shown). Table V-2.9 shows that among SFAs that reported unpaid meal costs in SY 2010-11, 88 percent regularly provided either a reimbursable school meal or some form of alternative meal to children who were not approved for a F/RP meal and who could not pay for a meal. Common types of alternative meals include peanut butter and jelly sandwiches and cheese sandwiches (SNDA 2008). Half of

SFAs with unpaid meal costs provide children who cannot pay a full school meal, and another 38 percent provide an alternative meal.

## Table V-2.9.Among SFAs with Unpaid Meal Costs, the Percentage of SFAs with VariousPractices for Providing a Meal to Students Who Cannot Pay, SY 2010-11

SFA practice	Percentage of SFAs
Serve a reimbursable meal	50.4%
Serve an alternative meal	38.0
Serve a reimbursable meal for a limited number of times and then serve an alternative meal	5.4
Do not serve the child a reimbursable or alternative meal	1.3
Other	4.9
Total	100.0
Total SFAs: Weighted <i>n</i>	8,533
Total SFAs: Unweighted n	912 <sup>1</sup>

<sup>1</sup>*n* equals the 912 SFAs that reported unpaid meal costs before recovery attempts in SY 2011-12. Data Source: SFA Director Survey 2011, question 8.1.

While the initial cost of providing unpaid meals is charged to the SFA, the LEA, or the school, not all SFAs keep track of the monies owed for unpaid meals or try to recover the costs of unpaid meals. In SY 2011-12, 13 percent of SFAs did not keep track of these unpaid meal costs. Of those SFAs that reported unpaid meal costs, nearly all (over 99 percent) took some actions to recover these costs. Table V-2.10 shows the steps taken by SFAs to recover unpaid meal costs. Most often, SFAs billed the parents (94 percent). Other common approaches included providing the student with an alternative meal until the debt is paid (60 percent), taking some administrative action such as withholding a student's grades (36 percent), and trying to retroactively approve the student for F/RP meals (25 percent).

# Table V-2.10. Among SFAs with Unpaid Meal Costs, the Percentage of SFAs that Took Various Actions to Recover Costs from Unpaid Meals, SY 2011-12

Actions taken to recover lost revenues	Percentage of SFAs	
Bill the parents		94.1%
Provide student with an alternative meal until the debt is paid		60.1
Administrative actions (e.g., withhold grades)		35.5
Try to have student retroactively approved for free meals		25.0
Use a debt collection agency		5.9
Other steps		9.2
No steps taken to recover lost revenues		0.4
	Total SFAs: Weighted n	8,518
	Total SFAs: Unweighted n	911 <sup>1</sup>

<sup>1</sup>*n* is less than the 912 SFAs that reported unpaid meal costs before recovery attempts in SY 2011-12 due to item non-response. Data Source: SFA Director Survey 2011, question 8.4.

Regardless of the approaches used, only 14 percent (not shown) of SFAs recovered all of the revenues initially lost due to unpaid meals. At the other end of the spectrum, 51 percent (not shown) of SFAs that had unpaid meal costs did not recover any of these lost revenues.<sup>63</sup> On average, SFAs recovered 31 percent (not shown) of the revenues initially lost from unpaid meals. Although less than half of SFAs with unpaid meal costs recover some of these lost revenues, the net revenues lost (i.e., after recoveries) is quite small compared with the total expenditures incurred by an SFA. Table V-2.11 shows that for 89 percent of SFAs with lost revenues from unpaid meals after recovery attempts, the net revenues lost amounted to no more than 1 percent of their annual expenditures. For another 10 percent, the revenue lost was more than 1 percent but less than 10 percent of their annual expenditures. Less than 1 percent of SFAs with lost revenues reported that the losses exceeded 10 percent of annual expenditures. On average, for all SFAs that lost some revenue as a result of unpaid meals, the net revenue lost was less than 1 percent (0.51 percent) of total expenditure for the year.

### Table V-2.11. Among SFAs with Unrecovered Lost Revenue from Unpaid Meals, the Percentage of SFAs with Various Magnitudes of Losses, SY 2010-11

Unrecovered lost revenues from unpaid meals as a percentage of total annual SFA cash expenditures	Of those with lost revenue, the percentage of SFAs by the magnitude of the loss	
≤1.0%	89.4%	
1.1% to 10.0%	10.0	
≥10.1%	0.7	
Total all SFAs with lost revenues for unpaid meals	100.0	
Average percentage (lost revenues/expenditures)	0.51	
Total SFAs: Weighted n	6,148	
Total SFAs: Unweighted n	688 <sup>1</sup>	

 $\frac{1}{n}$  is less than the 801 SFAs that reported unpaid meal costs and did not recover all of the money due to item non-response. Data Source: SFA Director Survey 2011, questions 7.1a, 8.2, and 8.3.

Lost revenue from unpaid meals did not appear to have a meaningful effect on the ability of an SFA to operate at the break-even level. Table V-2.12 shows that 31 percent of SFAs with lost revenue after recoveries from unpaid meals incurred a deficit in SY 2010-11. Even if these SFAs had recovered all of the revenue initially lost from unpaid meals, it would not have substantially reduced the percentage of SFAs that incurred a deficit in SY 2010-11 (30 percent would still have incurred a deficit).

<sup>&</sup>lt;sup>63</sup> About 50 percent (not shown) of all SFAs experience some revenue losses due to unpaid meals.

# Table V-2.12. Among SFAs with Unrecovered Lost Revenues from Unpaid Meals, thePercentage of SFAs by Break-Even Status given Actual Lost Revenues versus theAssumption All Unpaid Revenues were Recovered, SY 2010-11

	Percentage of SFAs by break-even level given:	
Annual SFA cash receipts as a percentage of		Assuming all lost revenue
annual cash expenditures (break-even status)	Actual losses	recovered
≤95%	30.9%	29.5%
96% to 100%	22.8	22.5
101% - 105%	20.5	21.2
>105%	25.8	26.8
Total all SFAs with lost revenue for unpaid meals	100.0	100.0
Median ratio (receipts/expenditures)	1.00	1.01
Total SFAs: Weighted n	5,990	
Total SFAs: Unweighted n	669 <sup>1</sup>	

<sup>1</sup> *n* is less than the 801 SFAs that reported unpaid meal costs and did not recover all of the money due to item non-response. Data Source: SFA Director Survey 2011, questions 6.1, 7.1, 8.2, and 8.3.

## Section VI: State Policies and Administration of the NSLP and SBP

The states play an important role in administering the NSLP and SBP. While FNS sets policies for the school meals programs, state agencies are responsible for administering the programs. The state CN director is responsible for applying Federal policies, developing supplementary state policies where needed, and administering the program through agreements with the local SFAs. States' administration role includes managing fiscal elements of the program, monitoring SFA performance, providing SFAs with technical assistance, and making required reports back to FNS. As such, to fully understand the SFA operating environment, state program procedures and policies should be examined.

This section presents findings from the State CN Director Survey. The findings include data from 54 directors in 50 states, the District of Columbia, and three territories that completed the State CN Director Survey.<sup>64</sup> Some findings from the SFA Director Survey are also included where they are relevant to the topics discussed. The topics discussed in each chapter include state communication with SFAs, state finances and budget, state policies, and training and technical assistance provided by states to SFAs.

<sup>&</sup>lt;sup>64</sup> Questionnaires were sent to directors in all 50 states, the District of Columbia and the five territories. Responses were received from 54 of the 56 directors for a response rate of 96 percent. Only two of the territories did not respond to the survey.

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### **VI-1.** Communication Issues

### Background

It is the state, rather than FNS, that has a direct connection with SFAs. FNS uses a tiered approach in communicating with states and SFAs. Headquarters first contacts the directors of the seven FNS Regional Offices who then contact the state CN directors in their Region. It is the state CN directors who maintain contact with SFA directors within each state. In turn, SFA directors contact schools and households in their districts.

The ability of states and SFAs to communicate with each other and with parents is always crucial but was perhaps of particular importance in SY 2011-12 when the study data were collected, approximately 1 year after the enactment of the HHFKA. During this time period, USDA focused on developing the HHFKA regulations and beginning implementation. Accomplishments included the proposal of new meal patterns, issuance of common-sense guidance for revenue, nationwide expansion of at-risk afterschool meals, the implementation of categorical eligibility for foster children, bolstering farm to school connections, and actions on direct certification and community eligibility. All of these activities required communication among states, SFAs, school staff, and, sometimes, parents. This chapter presents an overview of the methods of communication used in SY 2011-12 and the broad types of topics communicated. It focuses both on the state director and local SFA directors, who are responsible for effectively communicating various aspects of the school food service program to students, parents, and school staff. Both state and SFA directors can use an array of communication channels, including newsletters, emails, videos, and in-person meetings and presentations, to share information on planned menus, food recalls, new policies and procedures, and other topics with various stakeholders.

### **Research Questions**

FNS is interested in answering the following research questions about communication:

- How do state agencies communicate with SFAs (written correspondence, blanket emails, etc.)?
- Does the method of communication vary by type of information communicated (policy memos, announcements, commodity recalls, etc.)?
- How do SFAs communicate with school staff in their districts?
- How do SFAs communicate with households? Do they utilize a website? What information is provided to households (menus, nutritional information, etc.)?

Data collected from both the State CN Director Survey and the SFA Director Survey are examined to present a comprehensive picture of communication at various levels regarding the NSLP and SBP.

## **Results**

### **Communication between State Agencies and SFAs**

The State CN Director Survey asked state directors about the methods they used to communicate with SFAs in their state and the topics communicated. State directors reported having used a variety of methods to communicate with SFAs depending on the topic or issue. Table VI-1.1 shows the typical ways that state directors reported communicating with SFAs on policy-related matters, for various types of announcements, about commodity recalls, and for other matters. State directors were asked about the extent to which they used regular mail, email, a web posting, automated phone or fax, or some other method to communicate on each of these topics.

Regardless of the topic, email was the most frequently used form of communication reported by state directors, with over 85 percent of states using email for policy memos, announcements, and commodity recalls. Web postings were used well over half the time for policy memos and announcements and nearly half the time for commodity recalls. Regular mail was used by some states as a follow-up to ensure that a particular communication was on record. Thirteen to 20 percent of states sent all three types of messages by mail. Automated phone or fax was a fairly uncommon form of communication.

	Percentage of states that used various methods to communicate							
Торіс	Regular mail	Email	Web posting	Automated phone or fax	Other			
Policy memos	20.4%	85.2%	75.9%	1.9%	3.7%			
Announcements	16.7	88.9	63.0	3.7	1.9			
Commodity recalls	13.0	85.2	46.3	14.8	13.0			
Other	3.7	5.6	5.6	3.7	0.0			
Total states: n			54					

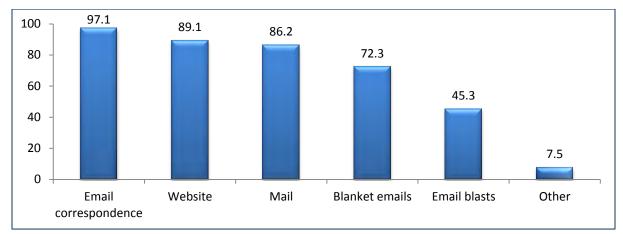
# Table VI-1.1. Percentage of States that Used Various Methods to Communicate with SFAs by<br/>Topic, SY 2011-12

Data Source: State CN Director Survey 2011, question D13.

In the SFA Director Survey, SFA directors were also asked about the various methods state agencies used to communicate with them and whether the method varied by topic. As expected, the methods that SFA directors reported state agencies used to communicate with them were similar to the methods that state directors reported using to communicate with SFAs. The vast majority of SFA directors reported that state agencies used email to communicate with them. As seen in Figure VI-1.2, 86 to 97 percent of SFA directors reported that state agencies communicate with them using email correspondence, posting information on their website, and postal mail.<sup>65</sup>

<sup>&</sup>lt;sup>65</sup> Respondents selected among email correspondence, blanket emails, and email blasts. The choices were not defined in the questionnaire and therefore may have been interpreted differently between respondents. Blanket emails were reported by 72 percent of SFA directors, and email blasts were reported by 45 percent of directors.

## Figure VI-1.1. Percentage of SFAs that Reported their State Communicated to them by Various Methods, SY 2011-12



Unweighted *n*=1,395 (weighted *n*=14,540) is less than 1,401 due to item non-response. Data Source: SFA Director Survey, question 13.1.

### **Communication between SFAs and School Staff**

The SFA Director Survey also asked about the methods the directors used to communicate with school staff in their districts. Overall, email and text messages were the most common method used by SFA directors to communicate with school staff in their districts. Table VI-1.2 shows that 84 percent of SFAs reported using email and text messages to communicate with school staff. Other common methods are websites and letters/memos; each of these methods was used by about three-quarters or more of all SFAs (73 percent used a website, and 75 percent sent letters/memos). There were differences in the use of email or text messages, letters/memos, and websites by SFA size and poverty level. Fewer small SFAs, as compared to very large SFAs, used all of the communication methods specified. Compared with low- or medium-poverty-level SFAs, fewer high-poverty-level SFAs used letters/memos.

# Table VI-1.2.Percentage of SFAs that Used Various Methods to Communicate to School Staff<br/>by SFA Characteristics, SY 2011-12

		Percentag	e of SFAs that:		Tota	l SFAs
SFA characteristics	Use website to provide information	Send letters/ memos	Send periodic newsletters	Send emails or text messages	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs	73.4%	74.9%	34.7%	84.4%	14,514	1,394 <sup>1</sup>
<b>SFA size<sup>2</sup></b> Small (1-999)	62.6	73.8	38.6	80.6	7,220	326
Medium (1,000-4,999)	83.5	73.8	29.4	87.6	5,381	535
Large (5,000-24,999)	84.6	81.2	33.1	88.9	1,629	364
Very large (25,000+)	90.7	88.9	45.3	92.1	284	169
Urbanicity <sup>3</sup>						
City	60.4	78.8	32.4	85.7	1,576	254
Suburban	78.0	72.8	30.8	88.6	2,848	378
Town	81.0	74.7	30.8	85.6	2,794	266
Rural	71.5	75.0	38.2	82.0	7,297	496
Poverty level <sup>4</sup>						
Low (0-29% F/RP)	78.6	70.2	30.0	88.6	3,370	346
Medium (30-59% F/RP)	76.7	73.9	37.3	87.0	6,754	647
High (60% or higher F/RP)	64.4	80.2	34.2	77.1	4,390	401

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs that use a website, letters/memos, periodic newsletters, and emails or text messages differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs that use a website differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs that use a website, letters/memos, and emails or text messages differed significantly by poverty level at the .05 level. Data Source: SFA Director Survey, question 13.5.

### **Communication between SFA and Participating Households**

The SFA Director Survey included items related to how SFAs communicated with individual households in the school district and what information was provided to those households. In SY 2011-12, SFAs used a variety of methods to communicate with households in their school districts. The most common method was to send letters or memos home with students; the next most common method was posting updates on a website. Newsletters as well as email or text messages were each used by about one-half of the SFAs. Table VI-1.3 shows that the percentage of SFAs that used each communication method varied by SFA characteristics. For example, websites were used to provide information to households by over 91 percent of medium to very large SFAs but by only 70 percent of small SFAs. Similarly, over 86 percent of SFAs classified as low- or medium-poverty status used websites, compared with about 65 percent of SFAs classified as high-poverty status.

# Table VI-1.3.Percentage of SFAs that Used Various Methods to Communicate with<br/>Individual Households by SFA Characteristics, SY 2011-12

		Percent	age of SFAs that	•		Tota	l SFAs
SFA characteristics	Use website to provide information	Send letters/ memos home with students	Send periodic newsletters	Send emails or text messages	Other	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs	81.3%	90.4%	51.3%	43.8%	19.7%	14,547	1,394 <sup>1</sup>
SFA size <sup>2</sup>							
Small (1-999)	70.0	87.7	52.6	38.4	15.8	7,273	328
Medium (1,000-4,999)	91.2	93.5	50.5	49.6	20.2	5,360	533
Large (5,000-24,999)	96.3	92.2	49.0	49.7	31.4	1,629	364
Very large (25,000+)	96.8	91.0	47.5	40.0	42.0	284	169
Urbanicity <sup>3</sup>							
City	73.8	89.6	55.3	45.0	22.8	1,576	254
Suburban	85.5	88.4	50.6	49.6	23.8	2,875	379
Town	88.1	92.2	51.6	38.3	16.9	2,773	264
Rural	78.6	90.7	50.7	43.4	18.5	7,323	497
Poverty level <sup>4</sup>							
Low (0-29% F/RP)	91.7	84.6	53.3	58.6	17.8	3,370	346
Medium (30-59% F/RP)	86.7	92.4	55.6	44.5	20.5	6,775	647
High (60% or higher F/RP)	64.9	91.8	43.3	31.3	20.0	4,402	401

<sup>1</sup> *n* is less than 1,401 due to item non-response.

<sup>2</sup> Percentage of SFAs that use a website, letters/memos, and emails or text messages differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs that use a website differed significantly by urbanicity at the .05 level.

<sup>4</sup> Percentage of SFAs that use a website, letters/memos, period newsletters, and emails or text messages differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey, question 13.3.

Table VI-1.4 shows that nearly all SFAs (98 percent) include breakfast and/or lunch menus when communicating information to parents. Communication about other topics is much lower: approximately 42 percent of SFAs communicate nutritional information, and about 18 to 21 percent communicate information regarding cafeteria inspections or insecticide sprayings. There is little variation by SFA characteristics on the frequency with which information about insecticide sprayings are communicated. The percentage of SFAs communicating nutritional information, however, varies by SFA size: 72 percent of large and 83 percent of very large SFAs communicate nutritional information, compared with 30 percent of small SFAs. Reports of cafeteria inspections are also more likely to be communicated by larger SFAs than smaller SFAs (42 percent of very large SFAs).

# Table VI-1.4.Percentage of SFAs that Communicated to Households on Various Topics by<br/>SFA Characteristics, SY 2011-12

	Percentage of SFAs that communicated to households on:						al SFAs
SFA characteristics	Breakfast and/or lunch menus	Nutritional information	Inspections of cafeteria	Insecticide spraying	Other	Weighted <i>n</i>	Unweighted <i>n</i>
All SFAs SFA size <sup>2</sup>	97.8%	42.0%	21.1%	17.8%	8.8%	14,396	1,388 <sup>1</sup>
Small (1-999)	96.4	29.8	18.4	15.1	6.7	7,121	322
Medium (1,000-4,999)	99.0	46.9	21.3	22.5	8.0	5,362	533
Large (5,000-24,999)	99.6	72.0	29.1	15.9	16.5	1,629	364
Very large (25,000+)	99.3	83.2	41.8	16.2	31.3	284	169
Urbanicity <sup>3</sup>							
City	95.5	57.4	22.8	15.1	15.6	1,576	254
Suburban	96.6	57.6	17.8	19.8	13.4	2,820	377
Town	97.7	39.4	22.6	19.5	7.0	2,726	262
Rural	98.8	33.6	21.5	16.2	6.2	7,275	495
Poverty level <sup>4</sup>							
Low (0-29% F/RP)	99.1	48.2	20.2	19.5	9.2	3,336	344
Medium (30-59% F/RP)	99.6	38.5	21.8	17.5	7.4	6,747	646
High (60% or higher F/RP)	94.0	42.8	20.8	16.8	10.7	4,313	398

<sup>1</sup>*n* is less than 1,401 due to item non-response.

<sup>2</sup>Percentage of SFAs that communicated about breakfast and/or lunch menus, nutritional information, inspections of cafeteria, and other information differed significantly by SFA size at the .05 level.

<sup>3</sup> Percentage of SFAs that communicated about nutritional information and other information differed significantly by urbanicity at the .05 level.
<sup>4</sup> Percentage of SFAs that communicated about breakfast and/or lunch menus and nutritional information differed significantly by poverty level at the .05 level.

Data Source: SFA Director Survey, question 13.4.

### **Communicating About Food Holds or Recalls**

Communications about food holds or recalls are among the most important communications for parents. SFA directors were asked how they are notified about food holds or recalls and how they, in turn, notify schools in their districts. Consistent with earlier findings that email is the dominant method of communication for states and SFAs, Table VI-1.5 shows that email is the most common way that SFAs receive and pass on information about food holds and recalls (95 percent and 76 percent, respectively). Telephone calls were the second most common method by which SFAs were notified and, in turn, notified schools about food holds and recalls (39 percent and 65 percent, respectively).<sup>66</sup>

<sup>&</sup>lt;sup>66</sup> The surveys did not ask why states or SFAs choose one method over another. It is possible that states supplement emails with phone calls primarily on items of severe risk and/or time sensitivity.

# Table VI-1.5.Percentage of SFAs that Received and Communicated Information about Food<br/>Holds/Recalls by Various Methods, SY 2011-12

	Percentage of SFAs that:					
Communication method	Are alerted to food holds/recalls through indicated media	Alert schools about food holds/recalls through indicated media				
Email notification	95.4%	76.0%				
Telephone call	38.7	65.1				
Fax	25.7	15.6				
Postal mail	38.6	17.8				
Other	4.7	14.6				
Total SFAs: Weighted n	14,426	14,396				
Total SFAs: Unweighted n	1,386 <sup>1</sup>	1,385 <sup>1</sup>				

<sup>1</sup> *n* is less than 1,401 due to item non-response.

Data Source: SFA Director Survey, questions 12.13 and 12.14.

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## VI-2. State Finances and Budget

### Background

In FY 2009, the Federal government spent \$16 billion on the SBP and NSLP, making school meals the second largest food and nutrition assistance program in the United States.<sup>67</sup> While most of the assistance to schools and school districts is in the form of Federal cash reimbursements for meals served, there are other sources of support. A second source of support from USDA is donated USDA Foods, also called commodity "entitlements." The amount is determined on a yearly basis. Schools can receive additional "bonus" commodities as they become available from surplus agricultural stocks.

States may provide subsidies to SFAs for the school meals programs. The subsidy could be on a per meal basis, on a per meal basis based on the number of F/RP meals rather than all meals, on a per student basis, or an annual lump sum based on a formula set by the state.

## **Research Questions**

This chapter addresses the following research questions:

- Do states provide financial resources for school meals to SFAs in the form of per-meal subsidies?
- Do states provide support for aspects of the school food service operations other than meal reimbursement?
- What areas of the food service program were affected by state budget issues?
- Do states have adequate staffing resources?
- Are states using contracted staff for any functions?
- Are states operating under a hiring freeze?

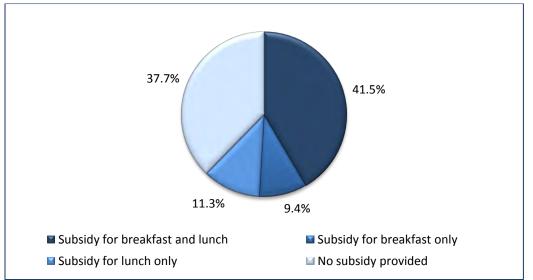
### Results

### **State Subsidies to SFAs**

The state agencies are responsible for managing the finances of the SLP at the state level. SFAs receive an advance of funds to support operations or are reimbursed through their state agency at various rates, depending on whether the student was served a free, reduced-price, or fullprice meal.

<sup>&</sup>lt;sup>67</sup> Budget of the United States Government: Fiscal Year 2010: Appendix, p. 163.

Some states provided a subsidy to SFAs beyond the Federal reimbursement that SFAs received for the F/RP meals served to income-eligible students. As Figure VI-2.1 shows, about two-thirds of the states reported that they provided subsidies for breakfast or lunch. Forty-two percent of states provided a subsidy for breakfast and lunch; 9 percent provided a subsidy for breakfast only; 11 percent provided a subsidy for lunch only; and 38 percent of states provided no subsidies to SFAs.





*n* is 53 due to item non-response.

Data Source: State CN Director Survey, question B2.

As Table VI-2.1 shows, of the states subsidizing breakfast or lunch, about half (46 percent breakfast; 52 percent lunch) provided the subsidy on a per-meal basis. About a quarter of the states reported using supplements for specific costs or lump sum payments; another 22 to 23 percent of the states said they used another method; and less than 4 percent said they subsidized based on the percentage of low-income students. Beyond providing meal subsidies, all states were asked if they provide financial or personnel support to SFAs for school service operations. Over a quarter of states (28 percent) reported providing support for the preparation of reimbursable meals at schools. Over 20 percent of states provided support for preparing claims or for storage.

#### Table VI-2.1. Percentage of States Providing Different Types of Subsidies and Support for School Meals, SY 2010-11

Subsidies	Percentage of states
Among states providing a breakfast subsidy ( <i>n</i> = 26), it is provided through: <sup>1</sup>	
Per-meal reimbursement	46.2
Supplement to cover specific costs	11.5
Annual lump sum	15.4
Based on percentage of low-income students	3.9
Other	23.1
Among states providing a lunch subsidy ( $n = 27$ ), it is provided through: <sup>2</sup>	
Per-meal reimbursement	51.9
Supplement to cover specific costs	14.8
Annual lump sum	11.1
Based on percentage of low-income students	0.0
Other	22.2
Among all states ( $n = 54$ ), support for aspects of school food service operations other than	
meal reimbursements	
Reimbursable meal preparation	27.8
Preparing claims	22.2
Storage	22.2
Contracted services	18.5
Overhead/indirect costs	16.7
Non-reimbursable meal preparation	13.0
Equipment	24.1

n is less than the 27 states that provided a breakfast subsidy due to item non-response.

 $^{2}$  *n* is less than the 28 states that provided a lunch subsidy due to item non-response.

Data Source: State CN Director Survey 2011, questions B1a and B2.

### **Budget Issues**

Over the past several years, states have faced major budget crises. Although the severity of the crises has varied by state, the pressure of the budget generally has been felt across all sectors. The State CN Director Survey asked state CN directors in what ways budget issues in their state had affected their school meals programs. State directors could choose more than one response. Table VI-2.2 shows that 59 percent of the states indicated that state budget issues affected their ability to hire and retain staff. Thirty-nine percent of states said the purchasing and upgrading of equipment had been affected. Similarly, 35 to 32 percent said that procuring and contracting services was affected, and 28 and 24 percent said meal prices and food purchases were affected, respectively.

States are required to conduct monitoring visits to SFAs to ensure compliance with regulations. Less than one-third of state CN directors (30 percent) reported that their state had adequate staffing in place to conduct monitoring activities for the SBP and NSLP programs. In contrast, 20 percent of state directors reported that staffing was not adequate, and 50 percent said it was somewhat adequate.<sup>68</sup>

<sup>&</sup>lt;sup>68</sup> State directors were also asked about the number of FTE staff they have for monitoring. There was very little variation in the number of FTE monitoring staff, with 95 percent of states reporting less than 1 FTE per 1,000 students.

# Table VI-2.2. Percentage of States that Reported Various Food Service Program Areas were Affected by State Budget Issues, SY 2011-12

Impacts	Percentage of states
Areas affected by state budget issues ( $n = 54$ )	
Hiring/retaining staff	59.3%
Purchasing/upgrading equipment	38.9
Procuring contracted services	35.2
Contracted services	31.5
Meal prices	27.8
Food purchases	24.1
Other	9.6
Adequacy of current staffing for monitoring program operations ( <i>n</i> = 54)	
Adequate	29.6
Somewhat adequate	50.0
Not adequate	20.4
Functions for which state is using contracted staff ( <i>n</i> = 54)	
Nutrition education	40.7
Technical assistance	37.0
Monitoring	33.3
Claims processing	5.6
Other	29.6
States currently operating under a state-mandated hiring freeze for child nutrition/school program staff (n = 54)	24.1
Among states with a hiring freeze ( $n = 12$ ), length of time hiring freeze has been in effect <sup>1</sup>	
Less than 1 year	8.3
1 year	8.3
2 years	33.3
3 or more years	50.0

<sup>1</sup>*n* is less than the 13 states that were operating under a hiring freeze for child nutrition/school program staff due to item non-response. Data Source: State CN Director Survey 2011, questions B3, B5, B6, and B7.

One strategy for containing costs is to outsource monitoring and other operational responsibilities. States were asked if contracted staff were being used for these functions. Table VI-2.2 shows that while 33 to 41 percent of the states reported using contracted staff for monitoring, technical assistance, or nutrition education, only 6 percent reported contracting out tasks related to claims processing.

As a result of budget cuts, some states were operating under state-mandated hiring freezes, which have affected the offices operating the school CN programs. According to state CN directors, 24 percent of states were operating under a hiring freeze. Among the states that were under a hiring freeze, half reported that the hiring freeze had been in effect for 3 or more years, and one-third said their freeze had been in effect for 2 years.

## VI-3. State Policies and Practices

## Background

States manage the school meals program by developing certain policies and practices that SFAs and schools must follow. They also provide assistance to SFAs on how to implement both their state policies as well as the Federal policies. NSLP and SBP program eligibility and verification is a key policy area for which states provide implementation oversight to SFAs. Also, states often provide assistance and guidance on providing alternative meals to students who are not certified for F/RP meals and do not have the funds to pay. Additionally, states play a significant role in guiding and supporting local SFA school meal operations. State agencies are responsible for ordering USDA food products and ensuring that they are delivered to school districts, often playing a critical role in contract oversight of FSMCs, and typically developing school meal policies regarding food recalls or nutritional standards. Finally, as the number of charter schools grows, significant variation in the number of charter schools across states and how they are served could affect program access and efficiency. Each of these topics—eligibility and alternative meals, school meal operations, and charter schools—is examined in more detail in the sections below.

### **Eligibility and Alternative Meals**

The burden of paperwork on parents has long been perceived to be a barrier to applying for the NSLP. School districts may also experience significant burden processing applications and meeting administrative requirements. FNS has introduced a number of policies to reduce paperwork and burden for both parents and school districts, including Provisions 2 and 3 and direct verification. These policies reduce burden on parents and on school districts by reducing application requirements and automating the process of verifying eligibility using extant data. States may provide assistance to SFAs on how to implement these policies.

Provision 2 requires schools to serve meals to participating students at no charge but reduces the application burden to once every 4 years and simplifies meal counting and claiming procedures. Schools can obtain additional 4-year extensions if the SFA documents that the economic conditions of the district have not changed significantly. Schools must pay the difference between the Federal reimbursement and the cost of providing all meals at no charge, using a source other than Federal funds. This provision has been available to school districts since 1980.

Provision 3 similarly requires schools to serve meals to participating students at no charge. It allows a school to receive a comparable level of Federal cash and commodity assistance as it received in the last year in which F/RP eligibility determinations were made, for a period up to 4 years, adjusted to reflect changes in enrollment and inflation. The school may be approved for a 4-year extension if the income level of the school's population remains stable. Under this provision, school districts agree to pay the meal cost not covered by program income from a source other than Federal funds. This provision has been available to school districts since 1995.

In 2007, research on the accuracy of certification for F/RP meals indicated that Provisions 2 and 3 base year schools had more erroneous payments than schools not using these provisions.<sup>69</sup> The number of SFAs and schools using Provisions 2 and 3 is therefore of interest both for its implications for certification accuracy and for its ability to reduce burden on schools and families.

Direct verification is designed to lessen the burden on schools when verifying application information. Because households self-report their income and family size, schools have long been required to select a sample of households, contact them, and verify that students approved for F/RP meals were, in fact, eligible for those subsidized meals, which is burdensome for both school districts and families. Under the 2004 *Child Nutrition and WIC Reauthorization Act*, LEAs can directly verify information provided on F/RP meal applications for the NSLP and SBP, instead of contacting households to confirm student eligibility. LEAs can obtain income and program participation information from public agencies administering the Supplemental Nutrition Assistance Program (SNAP), Food Distribution Program on Indian Reservations (FDPIR), Temporary Assistance for Needy Families (TANF), state Medicaid programs under Title XIX of the Social Security Act, and similar means-tested programs. Although the decision whether to use direct verification falls to LEAs, state agencies must work with LEAs to determine the best method for carrying out direct verification. States must also assist in facilitating contacts with other state agencies to establish the procedures for conducting direct verification.

In addition to their role in facilitating the application and verification process for F/RP meals, states are instrumental in setting the policies and practices for providing alternative meals to students who are not certified for a free meal but cannot pay for their meal. These situations arise daily and create challenges for the student, for the school officials who must decide how to handle the situation, and, increasingly, for policy makers. Most schools provide some type of alternate meal, however, this requires additional labor and materials from schools, is embarrassing for students, allegedly leads to negative opinion of cafeteria staff, effects the schools' ability to provide a healthy meal, and may discourage students from even coming to lunch (if they know they don't have money in their account).<sup>70</sup>

### **School Meal Operations**

Although SFAs are responsible for implementing the SBP and NSLP at the local level, state agencies oversee several important aspects of school meal operations and policies. State agencies are responsible for ordering USDA food products and ensuring that they are delivered to school districts. When SFAs contract with FSMCs to assist with meal service operations in the districts, states often play a critical role in contract oversight and management with the FSMCs. In addition to these responsibilities, states also develop new policies for school meal operations that SFAs are expected to follow. Two important areas of school meal operations in which states may set policies are food recalls and nutritional standards.

<sup>&</sup>lt;sup>69</sup> NSLP/SBP Access, Participation, Eligibility, and Certification Study—Erroneous Payments in the NSLP and SBP—November 2007, <u>http://www.fns.usda.gov/Ora/menu/Published/CNP/FILES/APECSummaryofFind.pdf</u>.

<sup>&</sup>lt;sup>70</sup> "The Perpetual Problem of Unpaid Meal Charges," Margie Bowers, Child Nutrition Director, Rogers Public Schools, Rogers Arkansas. Presented at the March 2013 Legislative Action Conference of the SNA. <u>http://docs.schoolnutrition.org/meetingsandevents/lac2013/presentations.asp</u>.

Most of the new requirements stemming from the HHFKA began to be implemented after the first year of data collection for the study (SY 2011-12) Therefore, the 2011-12 school year could be considered as a baseline for the changes, but, perhaps more accurately, a transition year in which states and SFAs were adjusting to the changes to come. Policy makers have long recognized that states can serve as a laboratory for social policy, with some having had policies that were more stringent than the potential Federal rules and others less so. Given this fact and the temporal proximity of SY 2011-12 to implementation of the final school meal standards, it is instructive to examine the degree to which states had regulations that exceeded Federal standards and whether they had tackled some of the more controversial issues in HHFKA such as nutrition and pricing standards for competitive food products.

### **Charter Schools**

The growth of charter schools in recent years raises new policy questions for both FNS and the states. Charter schools are publically funded schools that provide an alternative to the traditional public school and operate autonomously. Charter schools are not required to operate under the SBP or NSLP, and many charter schools may choose to opt out of these programs due to their more autonomous nature. As their numbers become substantial, their participation in the SBP and NSLP is important to ensure the program is available to all students in need. States vary in the number of charter schools they have and how those charter schools are treated when it comes to school food services. States may grant charter schools that participate in the SBP or NSLP SFA status or facilitate having them served by a larger SFA that hosts them. These practices have implications for the future size of SFAs and potentially could lead to further growth of very small SFAs, which has implications for efficiency, training, and oversight.

## **Research Questions**

This chapter addresses the following topics and research questions:

#### **Eligibility Provisions**

- How many SFAs/ schools are operating under Provision 2 or 3 in each state?
- Are state agencies currently conducting direct verification using SNAP, TANF, FDPIR, Medicaid, or SCHIP data?
- How is direct verification being implemented by states?
- Do states anticipate conducting direct verification in the future?

#### **Alternative Meals**

What are the current state policies and practices regarding providing students who are without funds a school meal?

#### **School Meal Operations**

- USDA Foods
  - How are state warehouses for USDA Food funded?
  - What additional charges do state agencies assess SFAs for the delivery of USDA Foods on a per case basis (administrative fees, storage fees, delivery fees, etc.)?
  - Has the increase in processing USDA Foods over the years resulted in a reduction in the warehouse fees states collect?
  - Do states purchase food products for all, most, some, or no SFAs?
- Food service management companies
  - How many SFAs/schools are using food service management companies? How many of these are national companies? Regional companies? Local companies?
  - Do state agencies require the use of a state-developed prototype contract?

#### ■ Food recalls

- Do states have policies governing food recalls? What are these policies?
- How do states notify schools and districts about food recalls? What types of information do states provide?
- What procedures do states expect schools and districts to follow in the event of a food recall? How much time do states give to schools and districts to respond to a food recall? What types of information are schools and districts expected to report to states in the event of a food recall?
- Nutrition standards
  - Do states have nutrition standards that exceed Federal requirements for foods and beverages offered in school meals?
  - Do states have nutrition standards for foods and beverages offered in competition with the school meals?
  - What is the impact of states' nutritional standards on participation?

#### **Charter Schools**

- How many charter schools are participating in the NSLP/SBP in each state?
- For purposes of school food operations, are charter schools treated as a separate SFA, as part of an existing SFA, or a combination of both? Does this vary by state?

## **Results**

### **Eligibility Provisions**

A substantial number of states reported having SFAs that use Provisions 2 and 3 and direct verification to lessen the administrative burden associated with determining students' program eligibility. Overall, many more states had SFAs using Provision 2 (41 states) as compared to Provision 3 (15 states), and just about half (25) of the states reported having at least one SFA that was using direct verification.

State directors were asked to report the number of SFAs and schools in their states that were operating under Provision 2 and Provision 3. Table VI-3.1 shows the number of SFAs and schools operating under Provision 2 or Provision 3 in each state during SY 2011-12. Although the majority of states reported at least one SFA was operating under Provision 2, many had only a few SFAs using the Provision. As such, a total of 1,095 SFAs (6 percent of all SFAs) and 6,922 schools (7 percent of all schools) operated under Provision 2 in SY 2011-12. Additionally, compared to Provision 2, far fewer states used Provision 3, and only 62 SFAs and 254 schools operated under Provision 3.

				In Provi	ision 2			In Prov	vision 3	
State	Number of SFAs in state <sup>1</sup>	Number of schools in state <sup>2</sup>		er of SFAs entage)		of schools intage)	-	ber of SFAs crentage)		r of schools centage)
Alabama	189	1,600	6	(3.2)	30	(1.9)	0	(0.0)	0	(0.0)
Alaska	73	509	0	(0.0%)	0	(0.0%)	14	(19.2%)	106	(20.8%)
Am. Samoa		28	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
Arkansas	289	1,110	19	(6.6)	93	(8.4)	0	(0.0)	0	(0.0)
Arizona	458	2265	58	(12.7)	220	(9.7)	9	(2.0)	18	(0.8)
California	1,094	10,124	150	(13.7)	1,418	(14.0)	3	(0.3)	5	(0.1)
Colorado	226	1,796	4	(1.8)	47	(2.6)	0	(0.0)	0	(0.0)
Connecticut	185	1,157	5	(2.7)	110	(9.5)	0	(0.0)	0	(0.0)
Delaware	42	214	5	(11.9)	12	(5.6)	0	(0.0)	0	(0.0)
Dist. of Columbia	61	228	1	(1.6)	66	(29.0)	0	(0.0)	0	(0.0)
Florida	223	4,131	19	(8.5)	556	(13.5)	0	(0.0)	0	(0.0)
Georgia	232	2449	69	(29.7)	375	(15.3)	0	(0.0)	0	(0.0)
Hawaii	35	289	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
Idaho	148	748	85	(57.4)	325	(43.5)			0	(0.0)
Illinois	1,132	4,361	2	(0.2)	26	(0.6)	2	(0.2)	3	(0.1)
Indiana	499	1,936	11	(2.2)	96	(5.0)	1	(0.2)	25	(1.3)
lowa	480	1,436	10	(2.1)	26	(1.8)	2	(0.4)	2	(0.1)
Kansas	400	1,378	2 3	(0.5)	4 21	(0.3)	0	(0.0)	0	(0.0)
Kentucky	189	1,554	3 0	(1.6)	0	(1.4)	0	(0.0)	0	(0.0)
Louisiana	113	1,471	6	(0.0)	6	(0.0)	0	(0.0)	0	(0.0)
Maine Maryland	189 73	631 1,449	0 1	(3.2) (1.4)	207	(1.0) (14.3)	1	(0.0) (1.4)	5	(0.0) (0.4)
Massachusetts	429	1,449	16	(3.7)	107	(14.5)	0	(0.0)	0	(0.4)
Michigan	882	3,877	10	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
Minnesota	697	2,392	5	(0.0)	63	(0.0)	3	(0.0)	8	(0.0)
Mississippi	197	1,083	20	(10.2)	54	(2.0)	0	(0.4)	0	(0.0)
Missouri	785	2,410	20	(10.2)	0	(0.0)	2	(0.3)	2	(0.1)
Montana	241	827	26	(10.8)	75	(0.0)	0	(0.0)	0	(0.1)
Nebraska	378	1,096	8	(2.1)	104	(9.5)	0	(0.0)	0	(0.0)
Nevada	32	645	3	(9.4)	46	(7.1)	0	(0.0)	0	(0.0)
New Hampshire	100	480	0	(0.0)	0	(0.0)	ŏ	(0.0)	Ő	(0.0)
New Jersey	697	2,607	5	(0.7)	23	(0.9)	Õ	(0.0)	Ő	(0.0)
New Mexico	220	862	118	(53.6)	405	(47.0)	Ō	(0.0)	0	(0.0)
New York	1,105	4,757	125	(11.3)	750	(15.8)	0	(0.0)	0	(0.0)
North Carolina	162	2,567	0	<b>`</b> (0.0)	0	(0.0)	0	(0.0)	0	(0.0)
North Dakota	215	516	22	(10.2)	28	(5.4)	1	(0.5)	4	(0.8)
Ohio	1,222	3,758	46	(3.8)	344	(9.2)	0	(0.0)	0	(0.0)
Oklahoma	574	1,785	24	(4.2)	48	(2.7)	14	(2.4)	22	(1.2)
Oregon	245	1,296	39	(15.9)	194	(15.0)	0	(0.0)	0	(0.0)
Pennsylvania	853	3,233	6	(0.7)	6	(0.2)	0	(0.0)	0	(0.0)
Puerto Rico	38	1,473	11	(29.0)	NR		2	(5.3)	NR	
Rhode Island	54	317	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
South Carolina	106	1,214	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
South Dakota	211	710	40	(19.0)	142	(20.0)	5	(2.4)	45	(6.3)
Tennessee	201	1,784	1	(0.5)	1	(0.1)	1	(0.5)	5	(0.3)
Texas	1,259	8,732	94	(7.5)	695	(8.0)	0	(0.0)	0	(0.0)
Utah	85	1,016	2	(2.4)	6	(0.6)	2	(2.4)	4	(0.4)
Vermont	226	320	7	(3.1)	19	(5.9)	0	(0.0)	0	(0.0)
Virgin Islands		32		(0 7)	32	(100.0)	0	.(0.0)	0	(0.0)
Virginia	161	2,175	6	(3.7)	115	(5.3)	0	(0.0)	0	(0.0)
Washington	327	2,338	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
West Virginia	73	757	0	(0.0)	0	(0.0)	0	(0.0)	0	(0.0)
Wisconsin	848	2,238	11	(1.3)	17	(0.8)	0	(0.0)	0	(0.0)
Wyoming	58	360	4	(6.9)	10	(2.8)	0	(0.0)	0	(0.0)
Total all states	19,011	100,350	1,095	(5.8)	6,922	(6.9)	62	(0.3)	254	(0.3)

# Table VI-3.1.Number and Percentage of SFAs and Schools in Each State Operating under<br/>Provision 2 or Provision 3, SY 2011-12

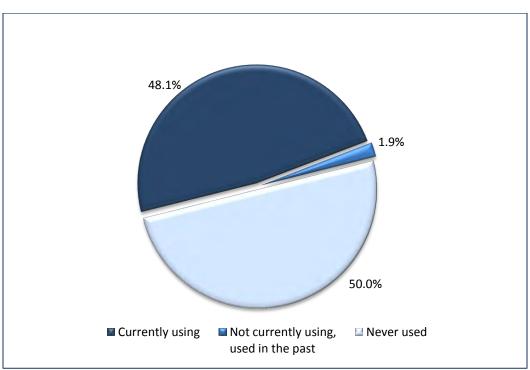
<sup>1</sup> Data on number of SFAs in each state comes from USDA Administrative data form FNS-742. The file did not include data for American Samoa or Virgin Islands. Idaho and the Virgin Islands reported some inconsistent data on the number of Provision 2/3 SFAs and schools and therefore are not shown in those cases.

<sup>2</sup> NCES CCD 2010-11 <u>http://nces.ed.gov/pubs2012/pesschools10/tables/table\_02.asp</u>.

NR = non-response; state did not report number of SFAs or schools.

Data Source: State CN Director Survey 2011, questions D1 and D2.

A recent policy to lessen the administrative burden associated with determining students' program eligibility is direct verification. Figure VI-3.1 shows that just under half (48 percent) of the states reported that at least one of their SFAs used direct verification in SY 2011-12. However, despite encouragement from FNS, half of the states (50 percent) reported that none of the SFAs in their states had ever used direct verification.<sup>71</sup>



# Figure VI-3.1. Percentage of States with at Least One SFA that Used Direct Verification, SY 2011-12

*n* is 52 due to item non-response.

Data Source: State CN Director Survey 2011, questions C1 and C2.

Table VI-3.2 shows that among the 25 states conducting direct verification, SNAP and TANF were identified most often (23 and 22 states, respectively) as the source of data for verifying student data provided on applications. Direct verification with Medicaid was reported by 10 states.<sup>72</sup> Fifteen states (60 percent) reported that the school district was the entity responsible for matching the student records to program records to verify information included in the household application for NSLP and SBP. Most of the states reported that verification was conducted only once during each school year. Eleven of the 25 states that used direct verification reported that SFAs in the state had access to a web-based lookup system to search the records of individual students. Of the 25 states using direct verification, over half (56 percent) reported having difficulties matching student records while implementing direct verification. Other difficulties experienced included staff not

<sup>&</sup>lt;sup>71</sup> One state reported that SFAs in the state had used direct verification in the past but had discontinued using it (questions C.1 and C.2). The survey included question C.3 on "reasons why you are not currently using direct verification." As this question is best asked at the LEA level, it is not surprising that only two states responded to it.

<sup>&</sup>lt;sup>72</sup> At the end of school year 2009-10, FNS reported that seven states were implementing direct verification with Medicaid and six more states were in development ("Feasibility of Wider Implementation of Direct Verification with Medicaid: A Summary" <u>http://www.fns.usda.gov/Ora/menu/Published/CNP/FILES/DirectVerificationw\_Medicaid\_Summary.pdf</u>).

having sufficient time (28 percent), inadequate computer systems or needing to upgrade computer systems (24 percent), and difficulty gaining cooperation of the program providing data (20 percent).

#### Table VI-3.2. Among the States that Used Direct Verification, the Percentage of States that Used Various Implementation Procedures, SY 2011-12

Implementation procedures	Among states that used direct verification <sup>1</sup> , the percentage of states that use different implementation procedures
Source of program record data used when conducting direct	
verification $(n = 25)^{1}$	02.00/
Supplemental Nutrition Assistance Program (SNAP)	92.0%
Temporary Assistance for Needy Families (TANF) Medicaid	88.0 40.0
Food Distribution Program in Indian Reservations (FDPIR)	12.0
State Children's Health Insurance Program (SCHIP)	8.0
State unemployment office	0.0
Other	4.0
Program records are matched to the student records by: (n = 25)	
The district	60.0
The state	20.0
A third party (e.g., TANF, SNAP, or other program office)	12.0
Both state and district	8.0
Frequency of direct verification $(n = 24)^2$	
Once each school year	62.5
Once each semester or quarter	0.0
On a monthly basis	16.7
Other	20.0
States where SFAs have access to web-based lookup system to	
search individual student records (n = 25)	44.0
Types of problems encountered when implementing direct verification ( $n = 25$ )	
Difficulties matching student records	56.0
Staff did not have time for direct verification	28.0
Had to upgrade computer systems	24.0
Difficulty gaining cooperation of program providing data	20.0
Students known to be eligible were determined ineligible	12.0
Other	0.0

<sup>1</sup> *n* equals the 25 states or territories that use direct verification.

 $^{2}$  *n* is less than the 25 states that use direct verification due to item non-response.

Data Source: State CN Director Survey 2011, question C5, C6, C7, C8, and C9.

All state CN directors were asked whether the state anticipated conducting direct verification during the 2012-13 and 2013-14 school years as shown in Table VI-3.3. Of the 23 states that reported using direct verification at the time of the survey and responded to the question about future plans, 74 percent indicated that they anticipated continuing to use direct verification during the subsequent two school years. Twenty-six percent of these states plan to discontinue using direct verification (with half citing problems with matching student records, two reporting issues with computers, and one citing staff time for conducting the verification as the problem). Of the 22 states that were not using direct verification and answered the question about future plans, 45 percent (10

states) plan to start during SY 2012-13 or SY 2013-14, while the remaining 55 percent of these states (12 states) had no plans to use direct verification.

Current use and future plans	Percentage of states
Currently using direct verification (n = 25 <sup>1</sup> )	
Plan to continue using	68.0%
Plan to stop using	32.0
Not currently using direct verification (n = 27 <sup>2</sup> ) Plan to start using	44.4
No plans to start	55.6

<sup>1</sup> *n* equals the 25 states that used direct verification.

 $^{2}$  *n* is less than the 28 states that were not using direct verification due to item non-response.

Data Source: State CN Director Survey 2011, questions C1, C2, and C10.

### **Alternative Meals**

The State CN Director Survey included two questions relevant to the issue of alternative meals: whether the state had a policy or standard practice for providing breakfast or lunch to students who were not certified for F/RP meals and were unable to pay for school meals, and, if they did, what the policy was. In general, states either (1) left these decisions to the SFAs or (2) required or recommended that SFAs provide meals.

For the most part, during SY 2011-12, states did not prescribe a course of action on whether to provide either breakfast or lunch to students without the funds to pay for school meals or how meals should be provided if the schools are providing meals. Table VI-3.4 shows that nearly 65 percent of states had neither a policy nor a standard practice for providing such meals. Only 15 percent of states had a policy, and an additional 20 percent had a standard practice regarding providing meals to students who cannot pay for their meal. Of the states with policies and standard practices, 65 percent indicated that they let the SFA determine whether and how to provide a meal to students who are unable to pay; 6 percent required or recommended that the SFA provide the full reimbursable meal; 6 percent required or recommended that the SFA provide an alternative meal; and 12 percent (2 states) had some other policy or practice.

# Table VI-3.4.Percentage of States with Policies for Providing Meals When Students Are<br/>Unable to Pay, SY 2011-12

Policy	Percentage of states
State's approach to providing breakfast or lunch when students are unable to pay ( $n = 54$ )	
Has policy	14.8%
No policy but standard practice	20.4
No policy or standard practice	64.8
Among states with policy or standard practice for providing meals <sup>1</sup> ( <i>n</i> = 17) State requires SFA provide full reimbursable meal	5.9
State requires SFA provide alternative meal	5.9
State recommends SFA provide full reimbursable meal	5.9
State recommends SFA provide alternative meal	5.9
State leaves it up to SFA to determine how to handle	64.7
Other	11.8

<sup>1</sup> *n* is less than the 19 states that have a policy or standard practice with regard to providing school breakfasts or lunches to students who are without funds for breakfast or lunch due to item non-response.

Data Source: State CN Director Survey 2011, questions A3 and A4.

### **School Meal Operations**

Although SFAs oversee the daily serving of school meals, state agencies are responsible for several important aspects of school meal operations such as the ordering and delivery of USDA food products and overseeing the contracting of FSMCs. Also, many states have set additional rules and standards for the school meals programs. As both procedures and policies vary by state, there is variation in how the school meals programs operate at the local level.

#### **USDA Food Products**

As Table VI-3.5 shows, deliveries of USDA food products are shipped to warehouses owned by the state or under contract with the state. Three-quarters (76 percent) of states indicate that their warehouse space was contracted, and another 10 percent said that some of their warehouse space was contracted, and some was owned by the state. Only 14 percent of states said that their warehouse space was owned by the state. Most states (64 percent) charged a fee to school districts to fund their warehouses. State budgets covered these costs in 23 percent of states.

Costs are also incurred when states deliver USDA Foods from warehouses to the SFAs, as shown in Table VI-3.5. In 64 percent of the states, SFAs are expected to pay for some or all of these costs. The costs associated with food delivery may or may not be charged to the SFAs on a per case basis. Of the states that charged for food delivery, 82 percent charged for delivery fees by the case. Over 60 percent of states charged for storage fees per case; 43 percent of states charged for warehouse fees on a per-case basis; and 39 percent charged for administrative fees, for each case. Eighteen percent of states indicated that they charged other fees to the SFAs on a per-case basis in addition to these four types.

# Table VI-3.5.Percentage of States that Used Various Warehouses Practices for USDA Foods,<br/>SY 2011-12

Warehouse practice	Percentage of states
Ownership of state warehouse $(n = 49)^{1}$	
Owned by state	14.3%
Contracted	75.5
Some owned/some contracted	10.2
Method of funding state warehouse (n = 49) <sup>1</sup>	
School districts are charged a fee	63.6
Funded in state budget	22.5
Other	14.3
Among states that charged SFAs for the delivery of USDA Foods, fees	
charged to SFAs on a per case basis $(n = 28)^2$	
Delivery fees	82.1
Storage fees	60.7
	60.7 42.9
Storage fees	0011
Storage fees Warehouse fees	42.9
Storage fees Warehouse fees Administrative fees Other fees	42.9 39.3
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to	42.9 39.3
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to SFAs over the last 3 years (n = 49) <sup>1</sup>	42.9 39.3
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to SFAs over the last 3 years (n = 49) <sup>1</sup> Increased storage fees	42.9 39.3 17.9
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to SFAs over the last 3 years (n = 49) <sup>1</sup>	42.9 39.3 17.9
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to SFAs over the last 3 years (n = 49) <sup>1</sup> Increased storage fees Decreased storage fees No change in storage fees	42.9 39.3 17.9 14.3 12.2
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to SFAs over the last 3 years (n = 49) <sup>1</sup> Increased storage fees Decreased storage fees No change in storage fees State purchases food products for SFAs (n = 49) <sup>1</sup>	42.9 39.3 17.9 14.3 12.2
Storage fees Warehouse fees Administrative fees Other fees Effect of increased processing of USDA Foods on warehouse fees charge to SFAs over the last 3 years (n = 49) <sup>1</sup> Increased storage fees Decreased storage fees No change in storage fees	42.9 39.3 17.9 14.3 12.2 73.5

<sup>1</sup> *n* is less than 54 due to item non-response.

 $^{2}$  n equals the 28 states that charged SFAs for the delivery of USDA Foods.

Data Source: State CN Director Survey 2011, questions B8, B9, B10, B10a, B11, and B12.

Increases in the processing of USDA Foods may have an impact on the warehouse fees charged to SFAs. USDA Foods may be shipped directly to the processor to produce more user-friendly products. These end-products may be sent directly to the SFAs, eliminating the need to be stored in state warehouses. Nearly three-fourths of states (74 percent) indicated that they had not changed storage fees in the past 3 years, regardless of the increased processing of foods. In fact, 12 percent have actually decreased their fees during this time period. Fourteen percent of states, however, did increase storage fees.

Additionally, 62 percent (sum of last rows in table) of states engaged in purchasing food products for their SFAs. One in four states (25 percent) purchased these products for all of their SFAs, with an additional one-third purchasing food products for most of their SFAs.

#### Food Service Management Companies (FSMCs)

State directors were asked to provide the number of SFAs and schools in their states that used FSMCs. Nearly all of the states (85 percent or 46 states) indicated that some SFAs in their

states used FSMCs. As Table VI-3.6 shows, according to state directors, a total of 2,697 SFAs used FSMCs. About half (51 percent) of the SFAs that used FSMCs used national companies operating in over three-fourths of the schools that used FSMCs (77 percent). Regional and local companies served 27 and 23 percent of SFAs, respectively. Appendix E, Table E-50 shows the number of SFAs and the number of schools in each state that used FSMCs during SY 2011-12. More than half of the SFAs that used FSMCs were found in seven states (New Jersey, Pennsylvania, Michigan, New York, Illinois, Missouri, and California).

## Table VI-3.6. Among SFAs that Used FSMCs, the Percentage of SFAs and Schools by the type of FSMC used as Reported by State Directors, SY 2011-12

	Among SFAs that used FSMCs, the number schools as reported by state directors that u				
Type of FSMC	Number of SFAs	Percentage of SFAs	Number of schools	Percentage of schools	
National companies Regional companies Local companies	1,365 713 619	50.6% 26.4 22.9	7,645 1,481 777	77.2% 15.0 7.8	
Total SFAs and schools: n	n Total SFAs = 2,697 Total schools = 9		ools = 9,903		
Total states: n		49	41		

Percentages are based on the number of SFAs and schools that use FSMC as reported by state directors. The analysis is restricted to 49 states that provided complete information regarding the number of SFAs using national, regional, or local companies and 41 states that provided complete information regarding schools.

Data Source: State CN Director Survey 2011, question D3.

Table VI-3.7 shows that among SFAs that used national FSMCs, Chartwells was used in about one-third of SFAs (34 percent). Another 29 percent used Sodexo; 23 percent used Aramark; 7 percent used Preferred Meal Systems; and 7 percent used other companies.

# Table VI-3.7. Among SFAs that Used National FSMCs, the Percentage of SFAs and Schoolsthat Used Specific Companies as Reported by State Directors, SY 2011-12

	Among SFAs that used national FSMCs, the number and percentage of SFAs and school as reported by state directors that used specific companies				
Specific FSMC used	Number of SFAs	Percentage of SFAs	Number of schools	Percentage o schools	
Aramark	318	23.3%	1,932	25.3%	
Chartwells	470	34.4	2,293	30.0	
Preferred Meal Systems	91	6.7	236	3.1	
Sodexo	391	28.7	2,785	36.4	
Other companies	95	7.0	399	5.2	
Total SFAs and schools: n	Total SFAs = 1,365		Total sch	ools = 7,645	
Total states: n		49	41		

For some states, the number of SFAs or schools using the four national companies was less than the total number of SFAs or schools using national companies. The number of SFAs/schools using other companies is the difference between the total number using national companies and the number using the four national companies in the questionnaire. Data Source: State CN Director Survey 2011, question D3.

Table VI-3.8 shows that while contracts with FSMCs were generally executed between the company and the SFA, states may have played a role in setting standards or providing oversight.

Ninety percent of states reviewed the contracts before they were signed to ensure that appropriate clauses were included regarding the return of rebates, discounts, and credits. Over 62 percent of states developed a prototype contract that they expected SFAs to follow when negotiating with an FSMC. All 30 states with prototype contracts provided oversight of the contract provisions.

# Table VI-3.8. Use and Review of State-Developed Prototype Contracts for Food Service Management Companies (SY 2011-12)

Policy/Action	Percentage of states
Provisions of FSMC contracts that states review in advance of execution $(n = 49)^{1}$	
Return of rebates	89.8%
Discounts	89.8
Credits	89.8
Require use of a state-developed prototype contract for food service management $(n = 49)^1$	62.1
Among states that require a prototype contract, states with oversight of the provisions in the contract $(n = 30)^2$	100.0

 $^{1}n$  is less than 54 due to item non-response.

 $^{2}$  n equals the 30 states that require a prototype contract.

Data Source: State CN Director Survey 2011, questions D4 and D5.

#### **Food Recalls**

When a recall was announced, nearly all states (96 percent) notified food service directors directly as shown in Table VI-3.9. Some states notified others as well—almost half (48 percent) notified distributors, and more than a third (37 percent) notified further processors. Notifications were always sent by email (100 percent). In addition, over half of states also made phone calls to relevant parties. Regular mail was reported by 9 percent of states only.

States conveyed details about food recalls to schools and districts using multiple methods. Nearly all (96 percent) of the states provided copies of the USDA hold or recall notice in their communications. Most (89-91 percent) also included more than one of the following in their notifications: the name of the product and other information about it, instructions on how to dispose of the food item, and contact information if there were any questions about the recall. Eighty percent of states also included a press release if one was available.

Seventy-four percent of states have state food recall guidelines or procedures.<sup>73</sup> Over half of states reported that their school districts had procedures or guidelines for USDA recalls, and nearly a third of states said they had other procedures. Additionally, states generally expected schools and districts to respond quickly to information about a food recall and to report back to the state about the results of their actions. Two-thirds of states expected a response within 24 hours, and about one-fourth of states allowed a response to take up to 48 hours. More than 80 percent of the states wanted districts and schools to provide information about the location and quantity of the product

<sup>&</sup>lt;sup>73</sup> Somewhat surprisingly, when asked if the state had a policy about food recalls (QD.6), only about half of the states responded that they did. However, 74 said they had state-established procedures and guidelines (QD.10) The reason for the discrepancy is not known. It may reflect the different interpretations of the phrasing of the two questions. The term "policy" implies a written plan produced in advance of an actual recall; the phrase "state-established procedures" (QD.10) could refer either to a policy or to directions given in connection with a specific recall (rather than something developed in advance).

in storage and actions already taken to ensure the recall was handled properly; 70 percent of them also wanted to know how much of the food had already been consumed.

#### Table VI-3.9. Percentage of States with Different Policies Governing Food Recalls and Notification of District-Level Personnel, SY 2011-12

Policy/action	Percentage of states
School/district-level personnel notified by the state about holds or food recalls ( <i>n</i> = 52) <sup>1</sup>	
Food services directors	96.3%
Distributors	48.2
Further processors	37.0
Food safety coordinator	29.6
Someone else	22.9
Method of notification	
Email notification	100.0
Phone calls	53.7
Fax	22.2
Regular mail	9.3
Some other way	25.9
Information provided to the schools and districts about holds or food recalls ( $n = 54$ )	
USDA Foods hold/recall notice	96.3
Product name and information	90.7
Contact information for questions	88.9
Product disposition/disposal instructions	88.9
Press release regarding the hold or recall	79.6
Other	16.7
Procedures or guidelines for when there is a USDA Foods recall ( <i>n</i> = 54)	
State-established procedures or guidelines	74.1
School district-established procedures or guidelines	57.4
Other	31.5
Time frame schools and districts are expected to respond to a USDA Foods recall ( $n = 52$ ) <sup>1</sup>	
On the day the notice is received (within 24 hours)	67.3
Within 2 days (24 to 48 hours)	26.9
Within 1 week	1.9
Other	3.9
Information schools and districts are expected to report to the state when there is a	
USDA Foods recall $(n = 53)^1$	
Location and quantity of the product in storage	81.1
Actions taken	81.1
Amount of the product already consumed	69.8
Reimbursable costs	56.6
	15.1

 $^{1}n$  is less than 54 due to item non-response.

Data Source: State CN Director Survey 2011, questions D6, D7, D8, D9, D10, D11 and D12.

#### **Nutritional Standards**

Increased

Decreased No impact

Although states can mandate stricter nutrition standards for school meals, in SY 2011-12 less than a third of them reported having standards that were more stringent than those established by the Federal government, as shown in Table VI-3.10.<sup>74</sup> Among the 16 states that claimed to have stricter standards and responded to the questions about those standards, 9 had standards regarding dietary fat; and 8 each had standards for sugar, sodium, and some other nutrient. Additionally, 11 of these states reported having a maximum number of calories for snack and à la carte items.

Standards	Percentage of states
Among all states, states that have nutrition standards for school meals that are stricter than Federal standards (n = 54)	31.5%
Among the states with stricter school meal standards than Federal, the areas where state standards are stricter were ( $n = 16$ ): <sup>1</sup>	
Dietary fat	56.3
Calories from sugar	50.0
Sodium content for snack items	50.0
Other	50.0
Maximum calories for snack and à la carte items	68.8
Among all states, states that have nutritional standards for food and beverages	
in ( <i>n</i> = 54):	
Vending machines	57.4
À la carte items	53.7
School stores	51.9
Snack bars	50.0
Bake sales	42.6

## Table VI-3.10. Nutritional Standards for Food and Beverages Offered in School Meals, SY 2011-12

<sup>1</sup>n is less than the 17 states that had nutritional standards that were stricter than Federal standards due to item non-response. Data Source: State CN Director Survey 2011, questions A1 and A1a, A2, A2a.

Although only a small share of states believed their standards for school meals were stricter than Federal standards, over half of the state CN directors reported that their state had standards for foods and beverages sold in school stores and other places besides the breakfast and lunch programs. Fifty-seven percent of states had nutritional standards for food sold in vending machines. Almost as many states had standards for à la carte choices in the cafeteria (54 percent), food items offered for sale in school stores (52 percent), and snack bars (50 percent). Fewer than half the states (43 percent) had standards for bake sales.

38.7

9.7

51.6

<sup>&</sup>lt;sup>74</sup> The question wording did not provide guidance on whether to compare state standards to then current Federal standards or to proposed standards.

Among the states that indicated that they had standards for foods sold on school premises that were not formally part of the school meals program, most perceived that these standards did not have any impact on participation in the school meals program itself (52 percent). However, 39 percent believed that the presence of state standards for competitive foods has actually increased participation in the school meals program. Only 10 percent of states believed that such standards encouraged a decrease in participation.

### **Charter Schools**

The number of charter schools in the country, their participation in the NSLP and SBP, and whether they operate as a separate SFA, have implication for the programs' coverage of students in need and the efficiency of operations. According to the state CN directors, 37 states had charter schools participating in the NSLP, and 35 states had charter schools participating in SBP.<sup>75</sup> About half of the charter schools are located in five states (Arizona, California, Florida, Pennsylvania, and Ohio.) Only Connecticut and Nevada had charter schools that did not also participate in the SBP. Table VI-3.11 provides the number of charter schools operating in each state and the number participating in NSLP and SBP.

Overall, 53 out of 54 state CN directors reported a total of 4,762 charter schools. Of the 52 states that also provided charter school program participation numbers, 68 percent participated in NSLP and 58 percent participated in SBP.<sup>76,</sup> The participation rate among charter schools is considerably less than the participation rate among all schools, which is over 90 percent for both the SBP and NSLP. Six states (Arizona, Georgia, Maryland, Rhode Island, South Carolina, and Tennessee) reported that all charter schools participated in NSLP, and four states (Maryland, Rhode Island, South Carolina, and Tennessee) reported that all charter schools participated in SBP.

<sup>&</sup>lt;sup>75</sup> Although Wisconsin reported the number of charter schools in operation, it did not provide the number of charter schools participating in NSLP or SBP. Although Pennsylvania reported the number of charter schools participating in NSLP or SBP, it did not report the number of charter schools in operation. Hence, the percentages reported in the text above are based on only those states that reported the total number of charter schools operating in their state and the total number of charter schools in their state participating in NSLP or SBP.

<sup>&</sup>lt;sup>76</sup> According to the National Alliance for Public Charter Schools, there were 5,618 public charter schools in operation during SY 2011-12 (http://dashboard.publiccharters.org/dashboard/schools/page/overview/year/2012). The reason for the discrepancy is unknown. The number of charter schools can fluctuate from year to year due to new schools opening and schools closing due to non-compliance with their charters. The number of states without charter school legislation according to the Alliance is smaller than the number of states without charter schools reported by state child nutrition directors. Differences in how terms such as "operating" are defined, in speed with which change of status is reported to an advocacy organization versus state officials, and different time frame windows may also have contributed to the differences.

	Number of charter	Charter schools pa	articipating in NSLP	Charter schools p	articipating in SBP
State	schools in operation	Number	Percent	Number	Percent
Alabama	0	0	0%	0	0%
Alaska	27	9	33	7	26
American Samoa	0	ő	0	Ó	0
Arizona	513	389	76	310	60
Arkansas	13	13	100	10	77
California	983	625	64	478	49
Colorado	175	30	17	19	11
Connecticut	1/5	15	94	0	0
Delaware	22	15	73	14	64
District of Columbia	53	50	94	50	94
Florida	517	375	73	353	68
Georgia	34	34	100	26	76
Hawaii	31	24	77	19	61
Idaho	43	24	56	8	19
	23	18	78		74
Illinois	65	55	85	17 52	80
Indiana					
lowa	6 17	3	50 47	3	50 47
Kansas Kantuaku <sup>1</sup>	0	0	47	0	47
Kentucky <sup>1</sup>	78	47	60	46	59
Louisiana Maine <sup>⊥</sup>	0	47	0	40	0
Maryland	42	42	100	42	100
Massachusetts	72	70	97	70	97
	256	-	72	-	59
Michigan		185		151 100	68
Minnesota	148 0	121	82 0	001	0
Mississippi Missouri	41	39	95	39	95
Montana <sup>+</sup>	41 0	0	0	0	0
Nebraska <sup>1</sup>	0	0	0	0	0
Nevada	30	7	23	0	0
New Hampshire	18	3	17	1	6
New Jersey	75	68	91	64	85
New Mexico	88	57	65	43	49
New York	196	109	56	106	54
North Carolina	100	43	43	43	43
North Dakota	0	0	0	0	0
Ohio	355	242	68	231	65
Oklahoma	22	18	82	18	82
Oregon	115	66	57	52	45
Pennsylvania	NR	200		200	
Puerto Rico	0	0	0	0	0
Rhode Island	14	14	100	14	100
South Carolina	12	12	100	12	100
South Dakota	0	0	0	0	0
Tennessee	45	45	100	45	100
Texas	194	143	74	152	78
Utah	82	46	56	27	33
Vermont	0	0	0	0	0
Virgin Islands	0	0	0	0	0
Virginia	2	0	0	0	0
Washington	0	0	0	0	0
West Virginia <sup>+</sup>	0	0	0	0	0
Wisconsin	235	NR		NR	
Wyoming	4	0	0	0	0
Total all states	4,762	3,265	68% <sup>2</sup>	2,830	58% <sup>2</sup>

#### Table VI-3.11. Number of Charter Schools Operating in Each State and Participating in NSLP and SBP, SY 2011-12

The number of charter schools reported by several states differed substantially from the numbers reported by the National Alliance of Public Charter Schools. In all cases the SFA reported a smaller number of public charter schools than identified by the National Alliance.

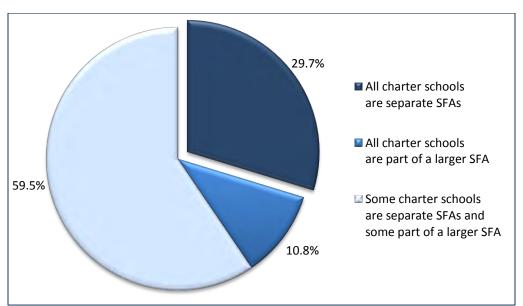
<sup>1</sup>These states do not have legislation permitting charter schools. Maine enacted a law allowing charter schools in 2011.

<sup>2</sup>This percentage is based on only those states that reported the total number of charter schools operating in their state and the total number of charter schools in their state participating in NSLP or SBP.

Data Source: State CN Director Survey 2011, question C11a and C11b.

NR = non-response.

States reported a mixture of organizational arrangements for charter schools in their state. Figure VI-3.2 shows that over half (59 percent) of the states reported that some charter schools within the state operated as a separate SFA for purposes of school food operations, while others operated as part of a larger SFA. Some of this difference may be explained by the provisions in the state charter school law. In some states, charter schools are required by law to be a part of the LEA; they are not permitted to operate independent of the chartering authority. Thirty percent of states reported that all of their charter schools operated as separate SFAs with respect to school food operations, while 11 percent indicated that all charter schools operated as part of a larger SFA.



#### Figure VI-3.2. Among Those that Have Charter Schools that Participated in NSLP or SBP, the Percentage of States by Various Charter School-SFA Relationships, SY 2011-12

*n* equals the 37 states that have one or more charter schools that participate in the NSLP or SBP. Data Source: State CN Director Survey 2011, question C11c.

Appendix E, Table E-40 shows for each state the number of charter schools that were separate SFAs and the number that were part of a larger SFA. Thirty-three states reported that 1,804 charter schools (or 39 percent<sup>77</sup> of charter schools) operated as separate SFAs with respect to food service operations. Twenty-six states reported that 1,421 charter schools (31 percent<sup>78</sup> of charter schools) were part of the food service operations of a larger SFA. The numbers reported only account for 70 percent of the charter schools reported because many states with charter schools in the NSLP or SBP did not answer the question about whether the charter schools were separate SFAs or part of a larger SFA.<sup>78</sup>

<sup>&</sup>lt;sup>77</sup> This percentage is based on only those states that reported the total number of charter schools operating in their state and the total number of charter schools operating in their state as a separate SFA. Minnesota reported the total number of charter schools operating in the state but did not report the number of charter schools operating as a separate SFA. Pennsylvania did not report the total number of charter schools operating in the state nor the number of charter schools operating as a separate SFA.

<sup>&</sup>lt;sup>78</sup> It should be noted that while the purpose of this chapter is to provide information on the relationship between charter schools and the NSLP/SBP, the state may not be the best source of information about charter schools, which are highly concentrated in specific districts. See "A Growing Movement : America's Largest Charter School Communities; Seventh Annual Edition," <u>http://www.publiccharters.org/data/files/Publication\_docs/NAPCS%202012%20Market%20Share%20Report\_20121113T12531\_2.pdf.</u>

# VI-4. Training and Technical Assistance Background

Training, technical assistance, and minimum educational requirements are integral to the ability to comply with nutritional standards and to implement Federal, state, and local policies regarding school meals. State agencies provide training and technical assistance to SFAs on numerous topics. The skills of state agency directors are likely an important factor in determining the success and efficiency of administrating the NSLP and SBP at the state level. State agency directors are responsible for implementing Federal policies and guidelines and ensuring that SFA staff in their states are appropriately trained on those policies. This section explores issues related to technical assistance and training offered by state agencies during SY 2011-12.

## **Research Questions**

This section addresses the following research questions:

- What specific topic areas do state agencies include in training and technical assistance programs?
- How frequently is training or technical assistance provided? Is technical assistance provided routinely or only in response to SFA requests?
- What mechanisms do state agencies use in providing technical assistance (e.g., written materials, workshops or courses, discussions during program reviews, etc.)?
- What new training topics have state agencies offered in the past year?

## **Results**

State agencies provide training and technical assistance on numerous topics related to school meals ranging from the safe handling of food through NSLP/SBP regulations and procedures. These trainings can be provided in written documents such as manuals or through various forms of verbal communication. As Table VI-4.1 shows, states provided some level of training or technical assistance in many of the topics identified on the survey questionnaire.

- Program regulations, recordkeeping, and menu planning were the most frequent training topics. All states provided training on program regulations and procedures at least annually. Menu planning and recordkeeping were close seconds, with 84 to 87 percent of states providing training at least annually, respectively.
- Food safety plans, other food sanitation and safety topics, and use of commodities were also frequently covered but not necessarily by all states. Nearly all states (96 percent) provided training on food safety plans with two-thirds (63 percent) providing it at least annually. Training on other food sanitation and safety topics was never provided by 13 percent of the states but 57 percent provided it annually or more often. Use of

commodities was addressed at least annually by 74 percent of states, but 17 percent never provided that training.

- Food purchasing, food preparation, and contracting procedures were training subjects that fewer states provided, but still, close to half of the states (46 to 52 percent) addressed these topics at least annually. Merchandising was a training topic for fewer than half the states and not provided by 28 percent of them.
- A third of the states provided training on topics that were not listed in the questionnaire. Additional training was provided in areas related to monitoring and reviewing CN program implementation (e.g., Coordinated Review Effort, School Meals Initiative for Healthy Children, new program training, new CN requirements, outreach); administrative issues (e.g., customer service, financial management, CN program administration, procurement, media communications, new employee training, work simplification, personnel management); and implementation of various CN programs (e.g., students with special dietary needs, farm to school, salad bars, team nutrition, Healthier US School Challenge, standardized recipes, and FFVP).

Table VI-4.1.	Percentage of States Providing School Meal Training and Technical Assistance
	by Topic and Frequency, SY 2011-12

	Percentage of states providing training and technical assistance (n=54			
Торіс	At least annually	Less than annually	Only when requested	Not provided
Program regulations and procedures	100.0%	0.0%	0.0%	0.0%
Recordkeeping	87.1	1.9	11.1	0.0
Menu planning	83.4	5.6	9.3	1.9
Use of commodities	74.1	0.0	9.3	16.7
Food safety plans	63.0	9.3	24.1	3.7
Other food sanitation and safety	57.4	3.7	25.9	13.0
Food purchasing	51.9	1.9	27.8	18.5
Food preparation	51.9	1.9	29.6	16.7
Contracting procedures	46.4	3.7	31.5	18.5
Merchandising	40.8	3.7	27.8	27.8
Other	27.8	0.0	5.6	66.7
Total states: n		1	54	

Data Source: State CN Director Survey 2011, question E1.

Most training, regardless of topic, was provided on an annual basis. Six topics were covered on an 'only when requested' basis by about a quarter or more of states: food safety plans (24 percent), other food sanitation and safety (26 percent), food purchasing (28 percent), food preparation (30 percent), contracting procedures (32 percent), and merchandising (28 percent). Five percent (not shown) of states reported that the number of training sessions decreased over the past 3 years because of budgetary constraints and changes in staffing resources (e.g., staffing cuts or having an insufficient number of trained staff).

Table VI-4.2 shows that states used a variety of methods for delivering trainings on the various topics. The most common methods of delivering trainings were through workshops and courses (100 percent), through written materials such as manuals (98 percent), and during

discussions at the time of program reviews (98 percent). Three-fourths of states also used on-line training materials and webinars to provide training.

In most instances, there was overlapping or joint responsibility for training. Table VI-4.2 shows, for example, 94 percent of the states reported that CN office staff were reported to have the responsibility, and 56 percent of states indicated that the state CN director was responsible for training. Over a third of states identified some "other" source as responsible for the training and technical assistance (e.g., CN field staff, contracted trainers, school nutrition consultants, training coordinator, cadre trainers, other state agency personnel, contracting with NSFMI, state food and nutrition education staff, Department of Public Health, and University Extension Service).

## Table VI-4.2. Percentage of States that Used Various Approaches for Training and Technical Assistance, SY 2011-12

pproaches for training and technical assistance	Percentage of state
Aethods used by states to provide training and technical assistance ( <i>n</i> = 54)	
Workshops or courses	100.0%
Written materials (e.g., manuals)	98.2
Discussions during program reviews	98.2
On-line training materials	75.9
Webinars	74.1
Other	24.1
esponsibility for providing training and technical assistance to SFA resides with: (n = 54)	
State CN director	55.6
Child nutrition office staff	94.4
Other	38.9
mong states offering new training topics during 2011-12 ( <i>n</i> = 39), topics included: <sup>1</sup> Program regulations and procedures	46.2
Menu planning	35.9
Food preparation	30.8
Other food sanitation and safety	23.1
Record keeping	20.5
Food purchasing	20.5
Contracting procedures	18.0
Food safety plans based on HACCP principles	12.8
	12.0
Merchandising	12.8
	12.8

<sup>1</sup>*n* is less than the 40 states that offered new training topics during 2011-12 due to item non-response. Data Source: State CN Director Survey 2011, questions E2, E5, and E7.

Forty states introduced new training topics during the 2011-12 school year. The 10 topics offered as possibilities were the same topics listed in the questions on frequency of training sessions. Interestingly, among the states that offered new training, some reported that they had introduced new training topics under the four most popular training areas that are covered by virtually all the states: food safety (13 percent), menu planning (36), recordkeeping (21 percent), and regulations (46 percent). This development of new topics in areas already covered by training suggests either that these states were responding to changes in program regulations, or they were sensitive to updating or improving their training content on important topics. Over half of the states that added training offered training on new topics that were not covered in the list of 10 items in the question.

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## **Section VII: Conclusions**

SFA and school participation in the NSLP was nearly universal, and participation in the SBP was high. Less than 8 percent of students do not have access to these programs. As these programs continue to evolve and concern has shifted from malnutrition to healthy eating, SFAs are well positioned to implement the new regulations stemming from the HHFKA in many areas. Several of the goals of the HHFKA have already been met, including near universal provision of potable water at lunch and the promulgation of school food safety plans. Similarly, there is high compliance with conducting at least two annual food safety inspections at each school.

There are a few areas that may prove to be challenging as SFAs will have to make substantial changes to fully meet the new requirements, but it appears that many SFAs may have begun the transition in advance of the policy implementation. Nearly three-quarters of the SFAs used food-based menu planning systems, and, although an overwhelming majority of SFAs offer alternative foods, many SFAs have operated under local and state policies that regulate these items.

Additionally, to meet the requirements of the Paid Meal Equity Provision of HHFKA that went into effect in July 2011, many SFAs began to raise the prices of paid lunches to bring them in line with free-meal reimbursement rates. Similarly, staff training is likely to require significant changes, as a large share of SFAs did not previously require specific certifications or licenses for their directors. However, this is somewhat mitigated by the fact that the profile of SFA directors' training qualifications exceeded the profile of SFA requirements, and more junior directors tended to have higher education levels.

There are some structural factors that may make rapid change difficult, such as the type of kitchen system used within an SFA (e.g., onsite production only versus offsite production only) Additionally, SFA size is highly linked to school district size, with half serving fewer than 1,000 students. As the results show, SFA size is often associated with meal production practices, as it likely limits the options available to the director and staff. With over 14,000 SFAs, the system is inherently decentralized, and therefore, implementing the HHFKA policy changes will likely require significant communication, training, and time.

FNS and the states have recognized the need for extensive communication and training, and all the states provided training and technical assistance at least annually on program regulation and procedures. Most states also regularly provided training on other topics critical to implementing the provisions of the HHFKA, which should help facilitate implementation.

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Appendix A

State Child Nutrition (CN) Director Survey 2011

OMB Number: 0584-0562 Expiration Date: 9/30/2014

## Special Nutrition Program Operations Study

SNPOS

### State Nutrition Director Survey 2011



U.S. Department of Agriculture Food and Nutrition Service This survey is being conducted for the Food and Nutrition Service, U.S. Department of Agriculture as part of a study of the National School Lunch Program (NSLP) and School Breakfast Program (SBP) as well as other USDA food programs throughout the country. **All responses will be treated in strict confidence; no names will be used in our reports, and only aggregated results will be reported.** Participation is completely voluntary. Choosing not to participate will not affect your employment or your state's participation in school meal programs.

Public reporting burden for this collection of information is estimated to average 30 minutes per respondent, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number.

Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden to: U.S. Department of Agriculture, Food and Nutrition Service, Office of Research and Analysis, Room 1014, Alexandria, VA 22302. Attn: Mr. John Endahl.

We thank you for your cooperation and participation in this very important study.



#### Instructions

- Please answer all questions.
- Unless you see the words CHECK ALL THAT APPLY after a question, please check only one answer for each question.
- If you have any questions about the study or about completing this survey, please contact Laura Prinslow, Westat survey manager, at 1-800-937-8281 ext. 2437 or by email: LauraPrinslow@westat.com

Date 1 1

Child Nutrition Director
ZIP Code
Extension

ZIP Code
Extension





A1. Are your state nutrition standards stricter than the Federal requirements for foods and beverages offered in school meals?

Yes	
⊡ No	(SKIPTO A2)

A1a. In which of the following areas are your state nutrition standards stricter than the Federal requirements?

	Yes	No
a. Dietary fat		2
b. Calories from total sugars		1
c. Maximum calories for snack and a la carte items		7
d. Sodium content for snack items	1	2
e. Other steps (Specify)		2

A2. Does your state have nutrition standards for foods and beverages from the following sources?

	Yes	No
a. School stores		2
b. A la carte items		
c. Bake sales		a
d. Snack bars		2
e. Vending machines		a

IF YOU ANSWERED "NO" TO ALL OF THE ITEMS IN QUESTION A2, THEN SKIP TO A3; OTHERWISE CONTINUE WITH QUESTION A2A.



Special Nutrition Program Operations Study (SNPOS)

1.1

2.

- A2a. Since adopting these nutrition standards, which of the following best describes the impact of these standards on participation in the school meals program?
  - Increased
    Decreased
    No impact
- A2b. Please describe any impact of the nutrition standards on nutritional profiles under the School Meal Initiative.

A3. Does your state currently have a policy or standard practice with regard to providing school breakfasts or lunches to children who are without funds for breakfast or lunch?

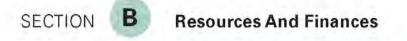
	Breakfast	Lunch
Yes, have policy		, 🗌
No policy but have standard practice	1	2
No policy or standard practice		Ee

IF YOU ANSWERED "NO POLICY OR STANDARD PRACTICE" FOR BOTH BREAKFAST AND LUNCH, THEN SKIP TO B1; OTHERWISE CONTINUE WITH QUESTION A4.

- A4. What is the state policy for providing a meal to a child who is not receiving free meals and cannot pay for a meal? (CHECK ONLY ONE)
  - State requires SFA to provide the full reimbursable meal being served that day
  - State requires SFA to provide an alternative meal
  - State recommends SFA provide the full reimbursable meal being served that day
  - □ State recommends SFA provide alternative meal
  - State leaves it up to SFA to determine
  - Other steps (SPECIFY)

Special Nutrition Program Operations Study (SNPOS)

USDA • 3



B1. Does your state provide a subsidy for breakfasts or lunches to SFAs? If yes, how is the subsidy provided, and what was the total amount of subsidies given to all SFAs in your state during 2010-11?

	B1a. Did you receive a subsidy?	B1b. If YES, how was the subsidy provided? (CHECK ONLY ONE)	B1c. What was the total amount of these subsidies given to all SFAs during 2010-11?
Meal			
a. Breakfast	☐ Yes ☐ No	<ul> <li>Per-meal reimbursement</li> <li>Annual lump sum</li> <li>Supplement to cover specific costs</li> <li>Based on a percentage of low-income students</li> <li>Other (SPECIFY)</li> </ul>	\$
b. Lunch	,⊡ Yes ⊡ No	<ul> <li>Per-meal reimbursement</li> <li>Annual lump sum</li> <li>Supplement to cover specific costs</li> <li>Based on a percentage of low-income students</li> <li>Other (SPECIFY)</li> </ul>	\$

B2. Does your state provide financial or personnel support for any of the following school food services operations?

	Yes	No
a. Reimbursable meal preparation (including food purchase and labor)		2
b. Non-reimbursable meal preparation	-	
c. Equipment		
d. Preparing claims		
e. Storage		
f. Contracted services		4
g. Overhead/indirect costs		
h. Other (SPECIFY)		



Special Nutrition Program Operations Study (SNPOS)

B3. Have any of the following areas been impacted by state budget issues?

	Yes	No
a. Hiring/retraining staff		2
b. Meal prices		
c. Purchasing/upgrading equipment		
d. Food purchases		
e. Procuring contracted services		
f. Contracted services		
g. Other (SPECIFY)	0	

B4. How many full-time equivalent (FTE) state agency staff are responsible for conducting monitoring of school meal operations?

Number	of FT	E State	Staff
--------	-------	---------	-------

B5. How adequate is this staffing for monitoring program operations?

- Adequate
- 2 Somewhat adequate

- Not adequate
- B6. Are you currently operating under a state-mandated hiring freeze for Child Nutrition/School Program staff?

Yes		
No	(SKIPTO B7)	

B6a. Approximately how long has the hiring freeze been in effect?

	Less than one year	
	One year	
	Two years	
4	Three or more years	

USDA	5	
100 C	100	

B7. Is your state currently using contracted staff for any of the following functions?

	Yes	No	Don't know
a. Monitoring	<u>_</u>		-
b. Technical assistance		2	
c. Claims processing		2	
d. Nutrition education	, D		3
e. Other (SPECIFY)	л <u>.</u>	2	

B8. Is your state warehouse for USDA Foods state owned, or is warehouse space contracted?

- All state owned
- All contracted
- Some of both

B9. How is the warehouse funded?

Funded in state budget		
-		-

School districts are charged a fee

Other (SPECIFY)

B10. Does your state agency currently charge school districts for the delivery of USDA food?

	Yes	
2	No	(SKIPTO B11)



B10a. For each of the following categories of charges indicate whether your state agency charged SFAs on a per-case basis for the delivery of USDA food during 2010-11.

	Yes	No
a. Administrative fees	-	-
b. Storage fees		1
c. Delivery fees	.C	
d. Warehouse fees	.0	2
e. Other (SPECIFY)	Ū.	

- B11. What effect has the increased processing of USDA food had on warehouse fees charged to SFAs over the last 3 years (2010-11, 2009-10, 2008-9)?
  - Increased storage fees
  - Decreased storage fees
  - No change in storage fees
- B12. For how many SFAs does your state purchase food products for the school food programs?
  - All SFAs
  - Most SFAs
  - Some SFAs
  - None



SECTION	C	Administrative

C1. Have the SFAs in your state ever used direct verification?

	Yes	
2	No	(SKIPTO C10)

C2. Do any SFAs in your state currently use direct verification?

Yes		(SKIPTO C4)
2	No	

C3. Which of the following reasons describe why you are not currently using direct verification?

	Yes	No
a. Satisfied with household verification	, 🗆	PI I
b. Number of eligible students is too small to make it worthwhile		2
c. Lack of staff at state or district level to perform direct verification		2
d. Lack of computer equipment		2
e. No training available for staff	, 🗆	2
f. Agency does not keep records in a manner that is cost-effective to access	Πŗ	2
g. Too difficult to gain cooperation of agency	, 🗖	2
h. Other (SPECIFY)	,□	,
SKIPTO C10.		

8 USDA

L

C4. How many SFAs in your state currently use direct verification?

Number of SFAs		
	₀ □ Don't know	

C5. When conducting direct verification, from which of the following programs is information collected?

	Yes	No
a. Supplemental Nutrition Assistance Program (SNAP)	1	2
b. Temporary Assistance for Needy Families (TANF)	1	2
c. Food Distribution Program on Indian Reservations (FDPIR)	1	2
d. Medicaid		2
e. State Children's Health Insurance Program (SCHIP)		2
f. State unemployment office		2
g. Too difficult to gain cooperation of agency		2
h. Other (SPECIFY)	1	2

C6. Are program records matched to the student records by the state or by the district?

1	State	matches
---	-------	---------

- 2 District matches
- Dirich party (e.g., TANF, SNAP, or other program office) matches
- C7. How frequently does direct verification occur?
  - 1 Once each school year
  - 2 Once each semester or quarter
  - On a monthly basis

4□ Other (SPECIFY)

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USDA • 9

C8. Do the SFAs in your state have access to a web-based lookup system to search the records of individual students, including those who may be deemed ineligible through computerized matching?

Yes	
No	

C9. Have you encountered any of the following while implementing direct verification?

	Yes	No
a. Difficulties matching student records		2
b. Students known to be eligible were determined ineligible		
c. Staff did not have time for direct verification		
d. Had to upgrade computer systems		2
e. Difficulty gaining cooperation of program providing data		-
f. Other (SPECIFY)	1	2

C10. Does your state anticipate conducting Direct Verification during...

	Yes	No
a. This school year (2011-12)		
b. 2012-2013 school year	10	
c. 2013-2014 school year or later?	Ū.	

#### The next few questions are about charter schools in your state.

C11. Does your state have any charter schools?

Yes

□ No (SKIPTO SECTION D)



	How many charter schools are currently operating in your s Number of charter schools	itate?	
C11b.	How many of these charter schools are participating in the I	NSLP and SBP prog	rams?
		NSLP	SBP
	Number of charter schools participating in		
C11c.	For purposes of school food operations, how many of these to be separate SFAs or part of a larger SFA?	e charter schools are	considered
		Separate SFA	Part of larger SFA
	Number of charter schools		
_	<b>Operational</b> any SFAs have schools that are operating under the option of	f Provision 2 or Prov	
-			
01. How m Numb	any SFAs have schools that are operating under the option of	Provision 2	Provision 3

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USDA	•	11
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D3. In your state, how many SFAs and schools are using Food Service Management Companies (FSMC)? Indicate how many are using the companies listed below.

	SFAs	Schools
a. Number using national companies		-
b. Aramark		
c. Chartwells		
d. Preferred Meal Systems		
e. Sodexho		
f. Number using regional companies (i.e., within multi-state area)		
g. Number using local companies		
h. Total number using Food Service Management Companies		

D4. Does your state agency require the use of a state-developed prototype contract for food service management?

Yes		
No		

D4a.

Does the state have any oversight of the provisions in the contract?

Yes
No

D5. Does the state review SFA FSMC contracts in advance of execution to ensure proper inclusion of the following?

	Yes	No
a. Return of rebates		
b. Discounts	, D	
c. Credits		

12 • USDA

D6.

Is there a state policy governing food recalls?

I Yes

2 No

Don't know

D7. Who at the school or district level is notified by the state agency about holds or food recalls?

	Yes	No
a. Food Services Directors at the school/district level		2
b. Food Safety Coordinator at the school/district level	1	
c. Distributors		2
d. Further Processors	4	3
e. Someone else (SPECIFY)	Ē	-

D8. How are schools and districts alerted about holds or food recalls?

	Yes	No
a. Email notification	, D	2
b. Phone calls	, D	2
c. Fax		
d. Regular mail		1
e. Some other way (SPECIFY)		2

D9. What information is provided to the schools and districts about holds or food recalls?

	Yes	No
a. Product name and information	1	
b. Press release regarding the hold or recall		2
c. Contact information for questions	1	
d. Product disposition/disposal instructions		2
e. USDA food hold/recall notice		a 🗖
f. Other (SPECIFY)		1

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D10. What procedures or guidelines are schools and districts expected to follow when there is a USDA food recall?

	Yes	No
a. State-established procedures or guidelines		
b. School district-established procedures or guidelines	1	5
c. Other (SPECIFY)		

D11. How quickly do you expect schools and districts to respond to a USDA food recall?

On the day the notice is received (within 24 hours)

Within two days (24 to 48 hours)

Within one week

Other
 (SPECIFY)

D12. What information do you expect the schools and districts to report back to the state when there is a USDA food recall?

	Yes	No
a. Location and quantity of the product in storage		
b. Amount of the product already consumed		
c. Reimbursable costs		
d. Actions taken		
e. Other (SPECIFY)		

D13. How does your state agency communicate with local SFAs for each of the following?

	Regular mail	Email	Web posting	Automated phone or fax	Other (SPECIFY)
a. Policy memos		z.		4	σ
b. Announcements		-		, D	(E)
c. Commodity recalls		2		. 🗖	в
d. Other (SPECIFY)		7		Ū.	F

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E1. For which of the following specific topic areas does your state agency provide training and technical assistance? How frequently is training provided?

Training topic areas	Does your state provide?	If YES, how frequently? (CHECK ALL THAT APPLY)
a. Food Safety Plans based on HACCP Principles	-⊡ Yes ⊡ No	<ul> <li>Every two years</li> <li>Annually</li> <li>Semi annually</li> <li>Quarterly</li> <li>Monthly</li> <li>Only when requested</li> </ul>
b. Other food sanitation and safety	⊧⊟ Yes ₂⊟ No	Image: Every two years         Image: Annually         Image: Semi annually         Image: Semi annually         Image: Output Descent annually
c. Food purchasing	-⊡ Yes ₂⊡ No	<ul> <li>Every two years</li> <li>Annually</li> <li>Semi annually</li> <li>Quarterly</li> <li>Monthly</li> <li>Only when requested</li> </ul>
d. Menu planning	⊣⊡ Yes /⊡ No	Image: Every two years         2       Annually         3       Semi annually         4       Quarterly         5       Monthly         6       Only when requested

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USDA •

15

Training topic areas	Does your state provide?	If YES, how frequently? (CHECK ALL THAT APPLY)
e. Food preparation	,⊡ Yes ,⊡ No	<ul> <li>Every two years</li> <li>Annually</li> <li>Semi annually</li> <li>Quarterly</li> <li>Monthly</li> <li>Only when requested</li> </ul>
f. Contracting procedures	,⊡ Yes ₃⊡ No	Every two years Annually Semi annually Quarterly Monthly Only when requested
g. Recordkeeping	☐ Yes ₃∏ No	<ul> <li>Every two years</li> <li>Annually</li> <li>Semi annually</li> <li>Quarterly</li> <li>Monthly</li> <li>Only when requested</li> </ul>
h. Merchandising	,⊡ Yes .⊡ No	<ul> <li>Every two years</li> <li>Annually</li> <li>Semi annually</li> <li>Quarterly</li> <li>Monthly</li> <li>Only when requested</li> </ul>
i. Program regulations and procedures	⊡ Yes .⊡ No	<ul> <li>Every two years</li> <li>Annually</li> <li>Semi annually</li> <li>Quarterly</li> <li>Monthly</li> <li>Only when requested</li> </ul>



Training topic areas	Does your state provide?	If YES, how frequently? (CHECK ALL THAT APPLY)
j. Use of commodities	,⊡ Yes ₃⊡ No	Image: Second structure       Image: Second structure         Image: Second structure       Image: Second structure
k. Other (Specify)	.□ Yes .□ No	Image: Every two years         Image: Annually         Image: Semi annually         Image: Semi annually         Image: Ouarterly         Image: Monthly         Image: Only when requested

E2. How does your state agency provide technical assistance?

	Yes	No
a. Through written materials (e.g., manuals)		2
b. Through workshops or courses	,0	2
c. During discussions during program reviews		2
d. Through on-line training materials	· 🗖 .	2
e. Through webinars		2
f. Other (SPECIFY)	, D	3

E3. Have the topic areas available for training changed over the last 3 years?

- More topic areas
- Fewer topic areas
- Replaced some with newer topic areas
- No changes in topic areas

E4. Has the number of training sessions available decreased?

Yes

(GOTO E5) D No

- E4a. Why has the number of training sessions available through your state agency decreased over the last 3 years?
- Budgetary constraints
- Decreased funds for training
- Staffing cuts
- Insufficient number of trained staff
- Change in state policy or Federal policy
- Result of program audit

Other (SPECIFY)

E5. Were any new training topics offered this year?

	Yes	
2	No	(GOTO E6)

E5a. What new training topics did your state agency offer this year that were not provided previously?

	Yes	No
a. Food Safety Plans based on HACCP Principles		2
b. Other food sanitation and safety		2
c. Food purchasing		-
d. Menu planning		2
e. Food preparation	,0,	2
f. Contracting procedures		
g. Recordkeeping	,	2
h. Merchandising		2
i. Program regulations and procedures		2
j. Use of commodities	,D	2
k. Other (Specify)		

18 USDA

E6. Were any training topics eliminated this year?

1	Yes	
2	No	(GOTO E7)

#### E6a. What training topics did your state agency eliminate this year that were offered in previous years?

	Yes	No
a. Food Safety Plans based on HACCP Principles	1	2
b. Other food sanitation and safety	1	2
c. Food purchasing	1	2
d. Menu planning	1	2
e. Food preparation	1	2
f. Contracting procedures	1	2
g. Recordkeeping	1	2
h. Merchandising	1	2
i. Program regulations and procedures	1	2
j. Use of commodities	1	2
k. Other (SPECIFY)	1	2

E7. Who within the state agency is responsible for providing training and technical assistance to SFA personnel?

1	State Child Nutrition	Director
2	Child Nutrition Office	staff
з	Other (SPECIFY)	

łow long have γou beer	the Child Nutrition Director?	
Years	Months	
Prior to your position as th	Child Nutrition Director, how much experience did	d you have in food service
Years	Months	
What is the minimum ed	cation requirement for the state Child Nutrition	Director?
High school		
Dia Some college, no d	gree	
Associate degree		
Bachelor's degree		
Bachelor's degree		
Graduate degree	£ - dou- time	
Graduate degree	of education you completed?	
Graduate degree	and the second	
Graduate degree What is the <u>highest</u> level Less than high school	st	
Graduate degree Chat is the <u>highest</u> level Less than high school Graduate degree	st	
Craduate degree Chat is the <u>highest</u> level Less than high school Chigh school	st	
Graduate degree Chat is the <u>highest</u> level Less than high school Graduate college, no d Graduate degree Graduate degree Graduate degree	st	
Craduate degree Chat is the <u>highest</u> level Less than high school Chigh school	st	
Graduate degree Chat is the <u>highest</u> level Less than high school Graduate college, no d Graduate degree Graduate degree	st	
Graduate degree Chat is the <u>highest</u> level Less than high school Graduate college, no d Graduate degree Graduate degree	gree	
Graduate degree What is the <u>highest</u> level Less than high schoo High school Some college, no d Associate degree Bachelor's degree Graduate degree	gree	
Craduate degree Chat is the highest level Cless than high school Cle	gree	
Craduate degree Chat is the highest level Less than high school Chief High school Chief Some college, no d Chief Associate degree Chief Bachelor's degree Chief Craduate degree Chief What was your major in Chief Business Chief Ch	ollege? (CHECK ALL THAT APPLY)	
Craduate degree Chat is the highest level Less than high school Chief High school Chief Some college, no d Chief Associate degree Chief Bachelor's degree Chief Craduate degree Chief What was your major in Chief Business Chief Ch	ollege? (CHECK ALL THAT APPLY)	

20 • USDA

## **Appendix B**

# School Food Authority (SFA) Director Survey 2011

OMB Number: 0584-0562 Expiration Date: 9/30/2014

## Special Nutrition Program Operations Study

# SNPOS

## School Food Authority (SFA) Director Survey 2011



U.S. Department of Agriculture Food and Nutrition Service This survey is being conducted for the Food and Nutrition Service, U.S. Department of Agriculture as part of a study of the National School Lunch Program (NSLP) and School Breakfast Program (SBP) as well as other USDA food programs throughout the country. **All responses will be treated in strict confidence**; **no names will be used in our reports, and only aggregated results will be reported. Participation is completely voluntary**. Choosing not to participate will not affect your employment or your state's participation in school meal programs.

Public reporting burden for this collection of information is estimated to average 1.75 hours per respondent, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number.

Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden to: U.S. Department of Agriculture, Food and Nutrition Service, Office of Research and Analysis, Room 1014, Alexandria, VA 22302. Attn: Mr. John Endahl.

We thank you for your cooperation and participation in this very important study.

#### **INSTRUCTIONS**

- Please answer all questions.
- Unless you see the words CHECK ALL THAT APPLY after a question, please check only one answer for each question.
- If you have any questions about the study or about completing this survey, please contact the Westat survey helpline at 1-888-202-1565 or by email: SNPOS@westat.com

Da	ate				
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30	2100	T D IS	arici	глан	le(s)

#### **Contact information for the SFA Director**

Name	
Address	
City	
State	ZIP Code
Telephone ()	Extension
Email	

#### Name and address of person filling out this survey if other than the SFA Director

Name	
Address	
City	
State	ZIP Code
Telephone ( )	Extension
Email	



SECTION	1	Introduction	
---------	---	--------------	--

- **1.1** How would you characterize your School Food Authority (SFA)? Is your SFA responsible for a school district, several school districts, or an individual school?
  - 1 One school district with multiple schools
  - 2 Several school districts
  - ₃□ One individual school
  - <sup>₄</sup>□ Other (SPECIFY)
- **1.2** Does your school district have a Pre-K program?

1	Yes	
2	No	(GOTO NEXT SECTION)
8	Don't know	(GOTO NEXT SECTION)

**1.3** Do the children that participate in the Pre-K program have access to school meals?

Yes
No
Don't know





## The next few questions are about the number of schools in your SFA participating in the school breakfast and lunch programs during the 2011-12 school year.

2.1 For this question, please record your responses separately for elementary (i.e., schools composed of any span of grades from Kindergarten through 6th grade); middle or junior high (i.e., schools that have no grade lower than 6 and no grade higher than 9); or high school (i.e., schools that have no grade lower than 9 and continue through grade 12). If any school does not meet the elementary, middle or junior high, or high school definition, please include it in the "Other school" column and describe it briefly in Question 2.1.1.

Please answer the following questions	for the 2011-12 school year:
---------------------------------------	------------------------------

	1	2	3	4	5
Number of schools	Elementary school	Middle or junior high	High school	Other school	Total
a. Total number of schools in the school district					
b. Number participating in both the School Breakfast					
Program (SBP) and the National School Lunch					
Program (NSLP)					
c. Number participating in SBP only					
d. Number participating in NSLP only					
e. Number NOT participating in either SBP or NSLP					

2.1a Please list the grades included in schools listed under "other school."

Special Nutrition Program Operations Study (SNPOS)

USDA • 3

**2.2** For the 2011-12 school year, how many schools participate in the School Breakfast Program as severe need schools?

1	2	3	4	5
Elementary school	Middle or junior high	High school	Other school	Total

# SECTION **3** Student Participation

The next few questions are about the number of children enrolled in the school(s) you serve and their participation in the school breakfast and lunch programs during the 2011-12 school year.

**3.1** For this question, please record your responses separately for elementary (i.e., schools composed of any span of grades from Kindergarten through 6th grade); middle or junior high (i.e., schools that have no grade lower than 6 and no grade higher than 9); or high school (i.e., schools that have no grade lower than 9 and continue through grade 12). If any school does not meet the elementary, middle or junior high, or high school definition, please include it in the "Other school" column.

Please answer	the following	auestions f	or the 2011-	12 school year:
riodoo anonon	the renorming	, quootiono i		The own over your.

	1	2	3	4	5
Number of students	Elementary school	Middle or junior high	High school	Other school	Total
a. Total number of students enrolled in the 2011-12 school year as of October 1st					
b. Number approved to receive free meals					
c. Number approved to receive reduced price meals					
<ul> <li>Number of students included in the "Total Student Enrollment" without access to the SBP*</li> </ul>					
e. Number of students included in the "Total Student Enrollment" without access to NSLP*					
f. What was the average daily attendance for the month of October 2011**					

\* Kindergarten students who attend school half day and do not have access to meals or a school that does not have the NSLP or the SBP should be included in this count.

\*\* Calculate the average daily attendance for students in each type of school and place in the appropriate column. For the Total column, calculate the average daily attendance for all students, across all schools, in the district.





#### **Food Service Characteristics**

#### The next section asks about food services that may be available in your school district.

4.1 What types of meal service systems do you currently use in the schools? Do you use...

	Yes	No				
a. Traditional cafeteria line	1	2				
b. Food court concepts where students select from various specialty stations, such as burger bars, salad bars, etc	1	2				
c. Window service where students can walk-up and obtain food from a limited menu						
<ul> <li>d. Speed lines where multiple points of service are offered including pre-wrapped products, such as chef salads, standard bagged lunches, etc</li> </ul>						
e. Kiosks that offer food for faster service at small, free-standing carts	1	2				
f. Packaged, reimbursable meals at a pick-up and go setting	1	2				
g. Food boutiques and convenience stores which are similar in appearance to retail stores with specialized food choices						
h. Emphasis on visual display (Marche concepts)	1	2				
k. Other (SPECIFY)	1	2				

- 4.2 Do you give elementary school students the "offer vs. serve" option for the NSLP?
  - 1 Yes
- **4.3** Which of the following types of alternatives to SBP and NSLP meals are available in your school(s)? Please choose a response for each meal alternative or "not applicable" for each type of school.

	1			2				3		4		
Meal alternatives	Elementary school			Middle or junior high			High school			Other school		
	Yes	No	N/A	Yes	No	N/A	Yes	No	N/A	Yes	No	N/A
a. A la carte items during breakfast	1	2	9	1	2	9	1	2	9	1	2	9
b. A la carte items during lunch	1	2	9	1	2	9	1	2	9	1	2	9
c. Vending machines	1	2	е	1	2	9	1	2	9	1	2	9
d. Snack bars	1	2	e	1	2		1	2	9	1	2	е.
e. School store	1	2	9	1	2	9	1	2	9	1	2	9
f. Alternate food source	1	2	9	1	2	9	1	2	9	1	2	9



4.4 In which of the following locations are students allowed to eat their breakfasts and lunches?

	1		2			
		Breakfast		Lunch		
	Yes	No	N/A	Yes	No	N/A
a. Cafeteria	1	2	9	1	2	9
b. Outside tables	1	2	9	1	2	9
c. Classroom	1	2	9	1	2	9
d. Other (SPECIFY)	1	2	е	1	2	e

**4.5** During the current school year, do all, some, or none of the high schools allow any of their students to go off-campus during lunch in all, some, or none of the schools?

1	All high schools
2	Some high schools
з	None of the high schools
9	Not applicable, do not have any high schools
8	Don't know

**4.6** How much time, on average, is a student given to eat school breakfast? Please choose the closest time period for each type of school.

	Time Allowed				
	Less than 20 minutes	20 minutes	30 minutes	45 minutes or more	N/A
a. Elementary school	1	2	3	4	5
b. Middle or junior high school	1	2	3	4	5
c. High school	1	2	3	4	5
d. Other school	1	2	3	4	5

6 • USDA

**4.7** How much time on average is a student given to eat lunch? Please choose the closest time period for each type of school.

	Time Allowed				
	Less than 30 minutes	30 minutes	45 minutes	60 minutes	N/A
a. Elementary school	1	2	з	4	9
b. Middle or junior high school	1	2	з	4	9
c. High school	1	2	з	4	9
d. Other school	1	2	з	4	9

4.8 In most elementary schools, is lunch provided before or after recess?

1	Before recess
2	After recess
з	Some before and some after recess
8	Don't know
9	Not applicable, do not have any elementary schools

**4.9** Are students allowed to leave the cafeteria after eating, before the lunch period is over, or do they remain in the cafeteria for the entire lunch period? Please answer for each type of school.

	1	2	3	4
	Elementary school	Middle or junior high	High school	Other school
a. Students are allowed to leave the cafeteria after eating	1	1	1	1
b. Students must remain in the cafeteria for the entire lunch period	2	2	2	2
c. Don't know	8	8	8	8
d. Not applicable, do not have this type of school	9	9	e	e

4.10 Which of the following methods does your SFA use in planning lunch menus?

	Yes	No	N/A
a. Traditional Food-Based Menu Planning	1	2	9
b. Enhanced Food-Based Menu Planning	1	2	9
c. Nutrient Standard Menu Planning (NuMenus)	1	2	9
d. Assisted Nutrient Standard Menu Planning (Assisted NuMenus)	1	2	э
e. New or innovative approaches to menu planning	1	2	9

4.10a Describe new or innovative approaches to menu planning:

**4.11** Does your school district have policies for school meals, a la carte items, or vending machines that are stricter than the Federal rules?

	Yes	No	Don't know
a. School meals	1	2	8
b. A la carte items	1	2	8
c. Vending machines	1	2	8

# **4.12** Have any individual schools implemented stricter food policies than Federal, state, or district-level rules?

	Yes	No	Don't know
a. Federal rules	1	2	8
b. State rules	1	2	8
c. District-level rules	1	2	8



**4.13** Does your SFA conduct a formal nutritional analysis of your menus? That is, does your SFA determine the nutritional content of the meals served independent of the menu planning system you use?

₁□ Yes	
2 No	(GOTO QUESTION 4.16)
₀□ Don't know	(GOTO QUESTION 4.16)

4.14 Is nutrition information posted for students, staff, and/or parents to see?

1	Yes	
2	No	(GOTO QUESTION 4.16)
8	Don't know	(GOTO QUESTION 4.16)

4.15 Where is the nutrition information posted? (CHECK ALL THAT APPLY)

1	On the school	l website			
2	In the cafeteria				
3	On menu or f	lyer sent to students' homes			
4	Other (SPECIFY)				

**4.16** Is free drinking water available to students where school meals are served? Please answer for each type of school.

	1	2	3	4
	Elementary school	Middle or junior high	High school	Other school
Yes	1	1	1	1
No	2	2	2	2
Don't know	8	8	8	8

IF YOU ANSWERED YES FOR ANY SCHOOL IN QUESTION 4.16, GO TO QUESTION 4.17. IF YOU ANSWERED NO OR DON'T KNOW FOR ALL SCHOOLS IN QUESTION 4.16, SKIP TO QUESTION 4.19. **4.17** How is free drinking water made available to students during breakfast? Do they have access to... (CHECK ALL THAT APPLY)

1	Water fountains
2	Water in pitchers, jugs, or cups
з	Free bottled water
4	Other (SPECIFY)

**4.18** How is free drinking water made available to students during lunch? Do they have access to... (CHECK ALL THAT APPLY)

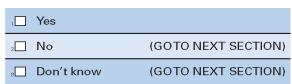
1	Water fountains
2	Water in pitchers, jugs, or cups
з	Free bottled water
4	Other (SPECIFY)

**4.19** How many of each of the following types of kitchens does your school district currently operate? (Please enter the number of kitchens. If none, enter "0." If you have kitchen types not described here, please record under "Other type of kitchen" and provide a brief description).

Type of kitchen	Number of kitchens
a. Central kitchens where meals are prepared only for serving at receiving or satellite schools	1
b. Base kitchens where meals are prepared for serving on-site and for shipment to receiving kitchens	2
c. On-site kitchens where meals are prepared for serving only at the facility in which the kitchen is located	3
d. Receiving or satellite kitchens which obtain partially or fully prepared meals from a base or central kitchen or an outside vendor	4
e. Combination kitchens where some food is prepared for on-site consumption and some food is received fully or partially prepared from a central or base kitchen	5
f. Other type of kitchen (SPECIFY)	6

10 • USDA

**4.20** Are food service facilities in your district used to prepare foods for purposes other than SBP and NSLP?



**4.21** Are these facilities used to prepare reimbursable meals for any of the following programs?

	Yes	No	Don't know
a. Child and Adult Care Food Program (CACFP)	1	2	8
b. Summer Food Service Program (SFSP)	1	2	8
c. Elderly Nutrition Program	1	2	8
d. Head Start Program	1	2	8
e. Other schools or school systems	1	2	8
f. Disaster feeding	1	2	8
g. Any other program (SPECIFY)	1	2	8

4.22 Are these facilities used to prepare food for any of the following non-reimbursable purposes?

	Yes	No	Don't know
a. Athletic events	1	2	8
b. PTA meetings	1	2	8
c. School staff meals	1	2	8
d. Day care	1	2	8
e. Catering	1	2	8
g. Any other event (SPECIFY)	1	2	8

Special Nutrition Program Operations Study (SNPOS)

USDA • 11



The next few questions are about the meal prices for the current school year (2011-12) and how the prices have changed during the past 3 years. For this section, please record your responses separately for elementary (i.e., schools composed of any span of grades from Kindergarten through 6th grade); middle or junior high (i.e., schools that have no grade lower than 6 and no grade higher than 9); or high school (i.e., schools that have no grade lower than 9 and continue through grade 12). If any school does not meet the elementary, middle or junior high, or high school definition, please include them in the "Other school" column.

**5.1** What prices did you charge for reimbursable full price, reduced price, and adult **breakfasts** in your school district by school level at the beginning of the 2011-12 school year?

Do not have a <b>breakfast</b> program	n (GOTO QUESTION 5.4)			
	1	2 Middle or	3	4
Breakfast prices	Elementary school	junior high	High school	Other school
a. Full price breakfast	\$	\$	\$	\$
b. Reduced price breakfast	\$	\$	\$	\$
c. Adult breakfast	\$	\$	\$	\$
d. Not applicable, do not have this type of school	9	9	9	e
e. Do not serve breakfast at this type of school	8	8	6	6

12 • USDA

Special Nutrition Program Operations Study (SNPOS)

**5.2** What prices did you charge for reimbursable full price, reduced price, and adult breakfasts at the beginning of the past two school years.

# 5.2a 2010-11 School year

IF BREAKFAST PRICES FOR 2010-11 ARE THE SAME AS THE 2011-12 SCHOOL YEAR,
CHECK HERE 🗌 AND GO TO QUESTION 5.2b.

# IF YOU DID NOT HAVE A BREAKFAST PROGRAM IN 2010-11, CHECK HERE AND GO TO QUESTION 5.2b.

	1	2	3	4
Breakfast prices	Elementary school	Middle or junior high	High school	Other school
a. Full price breakfast	\$	\$	\$	\$
b. Reduced price breakfast	\$	\$	\$	\$
c. Adult breakfast	\$	\$	\$	\$
d. Not applicable, do not have this type of school	9	9	9	9
e. Do not serve breakfast at this type of school	6	6	6	6

# 5.2b 2009-10 School year

IF BREAKFAST PRICES FOR 2009-10 ARE THE SAME AS THE 2010-11 SCHOOL YEAR, CHECK HERE 
AND GO TO QUESTION 5.3.

# IF YOU DID NOT HAVE A BREAKFAST PROGRAM IN 2009-10, CHECK HERE AND GO TO QUESTION 5.3.

	1	2	3	4
Breakfast prices	Elementary school	Middle or junior high	High school	Other school
a. Full price breakfast	\$	\$	\$	\$
b. Reduced price breakfast	\$	\$	\$	\$
c. Adult breakfast	\$	\$	\$	\$
d. Not applicable, do not have this type of school	9	9	9	9
e. Do not serve breakfast at this type of school	6	6	6	6

Special Nutrition Program Operations Study (SNPOS)

USDA • 13

**5.3** Over the past 3 years (2009-10, 2010-11, 2011-12), in general, which of the following factors influenced the school breakfast prices?

Do not have a breakfast program		GOTO QUESTION 5.4)	
	Yes	No	Don't know
a. Food costs	1	2	8
b. Labor costs	1	2	8
c. Student participation rates	1	2	8
d. State revenues (increases or decreases)	1	2	8
e. Federal subsidies (increases or decreases)	1	2	8
f. Local subsidies (increases or decreases)	1	2	8
g. Profits from a la carte items	1	2	8
h. Unpaid school meals	1	2	8
i. SFA budget deficit	1	2	8
j. Administrative indirect costs	1	2	8
k. Other reason (SPECIFY)	1	2	8

**5.4** What prices did you charge for reimbursable full price, reduced price, and adult **lunches** in your school district by school level at the beginning of the 2011-12 school year?

	1	2	3	4
Lunch prices	Elementary school	Middle or junior high	High school	Other school
a. Full price lunch	\$	\$	\$	\$
b. Reduced price lunch	\$	\$	\$	\$
c. Adult lunch	\$	\$	\$	\$
d. Not applicable, do not have this type of school	9	9	9	9

**5.5** What prices did you charge for reimbursable full price, reduced price, and adult lunches at the beginning of each of the past two school years (2010-11 and 2011-12)?

# 5.5a 2010-11 School year

# IF LUNCH PRICES FOR 2010-11 ARE THE SAME AS THE 2011-12 SCHOOL YEAR, CHECK HERE AND GO TO QUESTION 5.5b.

	1 2			4
Lunch prices	Elementary school	Middle or junior high	High school	Other school
a. Full price lunch	\$	\$	\$	\$
b. Reduced price lunch	\$	\$	\$	\$
c. Adult lunch	\$	\$	\$	\$
d. Not applicable, do not have this type of school	9	e D	9	9

# 5.5b 2009-10 School year

IF LUNCH PRICES FOR 2009-10 ARE THE SAME AS THE 2010-11 SCHOOL YEAR, CHECK HERE 
AND GO TO QUESTION 5.6.

	1	2	3	4
Lunch prices	Elementary school	Middle or junior high	High school	Other school
a. Full price lunch	\$	\$	\$	\$
b. Reduced price lunch	\$	\$	\$	\$
c. Adult lunch	\$	\$	\$	\$
d. Not applicable, do not have this type of school	е	e	e	e

**5.6** Over the past 3 years (2009-10, 2010-11, 2011-12), in general, which of the following factors influenced the National School Lunch Prices?

	Yes	No	Don't know
a. Food costs	1	2	8
b. Labor costs	1	2	8
c. Student participation rates	1	2	8
d. State revenues (increases or decreases)	1	2	8
e. Federal subsidies (increases or decreases)	1	2	8
f. Local subsidies (increases or decreases)	1	2	8
g. Profits from a la carte items	1	2	8
h. Unpaid school meals	1	2	8
i. SFA budget deficit	1	2	8
j. Administrative indirect costs	1	2	8
k. Other reason (SPECIFY)	1	2	8

**5.7** Over the past 3 years (2009-10, 2010-11, 2011-12), has your SFA taken any steps to minimize or avoid an increase in the prices charged for school breakfasts or lunches?

1	Yes	
2	No	(GOTO QUESTION 5.9)



**5.8** Over the past 3 years, what steps were taken to minimize or avoid an increase in the prices charged for school breakfasts or lunches? Did you ...

	Yes	No
a. Switch to lower priced foods	1	2
b. Reduce food service administrative staff hours	1	2
c. Reduce the number of kitchen staff hours	1	2
d. Substitute part-time staff for full-time staff	1	2
e. Use USDA donated foods	1	2
f. Increase the quantity of a la carte sales	1	2
g. Increase the price of a la carte items	1	2
h. Increase the price of adult meals	1	2
i. Improve food staff efficiency	1	2
j. Postpone equipment repair/replacement	1	2
k. Use school district general funds	1	2
I. Reduce the number of on-site kitchens	1	2
m. Ask for volunteer help	1	2
n. Take other steps (SPECIFY)	1	2

5.9 When meal prices are increased, do you take any special steps to maintain participation?

1	Yes	
2	No	(GOTO NEXT SECTION)
9 <b>—</b>	Not applicable	(GOTO NEXT SECTION)

5.10 What steps do you take to maintain participation? Do you...

	Yes	No
a. Increase student or parent awareness of the program	1	2
b. Improve meal quality	1	2
c. Offer more popular foods	1	2
d. Take other steps (SPECIFY)	1	2

# Special Nutrition Program Operations Study (SNPOS)

USDA • 17



6.1 For the last school year, that is, the 2010-11 school year, please record all **income** that was received by your school district's food service program. If you did not have income from a category, please enter a 0 (zero) for that category. If a category includes revenues from another category, list the other categories included by item code in the last column. For example, if income from full price and reduced price meals served to students cannot be separated, record the total student meal payments in row a, write "b" in the last column, and check N/A for row b. If a category is not applicable, please check the NA box.

## 6.1a Total income

\$			
Income from local sources	Income	N/A	List other categories included
a. Full price meals served to students	\$		
b. Reduced price meals served to students	\$		
c. Adult meals	\$		
d. A la carte sales	\$		
e. Subsidy from the school district	\$		
f. Community donations	\$		
g. Catering	\$		
h. Other local income	\$		
Income from state sources	Income	N/A	List other categories included
i. State meal reimbursements for free meals	\$		
j. State meal reimbursements for reduced price meal	\$		
k. Other income from the state	\$		



Income from federal sources	Income	N/A	List other categories included
I. Federal meal reimbursements for free meals	\$		
m. Federal meal reimbursements for reduced price meals	\$		
n. Federal meal reimbursements for full price meals	\$		
o. Federal income from other child nutrition programs (e.g., FFVP, SMP)	\$		
p. Adjustment for an underclaim from a Federal or state audit	\$		
q. Other Federal income	\$		
Other sources of income	Amounts of other income		
	\$		
	\$		
	\$		



**6.2** The next set of questions asks about whether your district or state provided a subsidy for breakfasts or lunches and how that subsidy was provided during the last school year, that is, the 2010-11 school year.

	Did you receive a subsidy?	If YES, how was the subsidy provided?				
School district	1					
a. Breakfast	₁ Yes ₂ No ₃ Not applicable	<ul> <li>Per-meal</li> <li>Annual lump sum</li> <li>Supplement to cover specific costs</li> <li>Based on a percentage of low-income students</li> <li>Other (SPECIFY)</li> </ul>				
b. Lunch	ı Yes ₂□ No ₃□ Not applicable	Image: state stat				
State						
c. Breakfast	₁ Yes ₂ No ₃ Not applicable	<ul> <li>Per-meal</li> <li>Annual lump sum</li> <li>Supplement to cover specific costs</li> <li>Based on a percentage of low-income students</li> <li>Other (SPECIFY)</li> </ul>				
d. Lunch	1     Yes       2     No       3     Not applicable	<ul> <li>Per-meal</li> <li>Annual lump sum</li> <li>Supplement to cover specific costs</li> <li>Based on a percentage of low-income students</li> <li>Other (SPECIFY)</li> </ul>				
• USDA	Spec	· cial Nutrition Program Operations Study (SNPOS)				

B-22

20



### This section asks about expenditures.

7.1 For the last school year that is, the 2010-11 school year, please enter all **expenditures** for your school district's food service program. If you did not have an expense for a category, please enter a 0 (zero) for that category. If a category includes expenses from another category, list the other categories included by item code in the last column. If a category is not applicable, please check the NA box.

7.1a	Total expenditures			
	Expenditure categories	Expenditures	N/A	List other categories included
	a. Salaries	\$		
	b. Fringe benefits	\$		
	c. Purchased foods	\$		
	d. Capital expenditures	\$		
	e. Supplies	\$		
	f. Storage and transportation	\$		
	g. Contracted services	\$		
	h. Payment for an overclaim as a result of a state or Federal audit	\$		
	i. Overhead/indirect costs	\$		
	j. Other	\$		
	Other sources of expenditures	Amounts of other expenditures	_	
		\$		
		\$		
		\$		

Special Nutrition Program Operations Study (SNPOS)

USDA • 21

# SECTION 8 Alternative Meals/Recouping Credits

The following questions are about alternative meals provided and recouping credits.

8.1	What is	What is normally done if a child who is not receiving a free meal cannot pay for a meal?					
		Serve the child the reimbursable meal					
	2 Se	2 Serve the child an alternate meal					
	₃⊡ Do	o not serv	ve the child a meal				
		her PECIFY)					
	8.1b	Does yo school r	our school district keep track of the amount of money owed as a result of meals?	unpa	id		
		₁□ Ye	S				
		2 No	GO TO NEXT SECTION)				
8.2			chool year, what was the total amount of money owed to your school dis school meals?	strict a	as a		
	\$						
8.3	How m	uch of thi	s money has been recovered?				
	\$						
	φ						
8.4	W/bat et	ens does	your district take to recover money for unpaid student meals?				
0.4	what st	eps does		Yes	No		
	a. Bill	the pare	nts	1	2		
			student with alternate meals until the debt is paid	1	2		
	c. Use	a debt c	ollection agency	1	2		
	d. Try	to retroa	ctively approve the student for free or reduced price meals	1	2		
	e. Adr	ninistrati	ve actions (e.g., withhold grades)	1	2		
	f. No	effort ma	de	1	2		
	g. Oth (SP	er ECIFY)		1	2		
22	• USI	DA	Special Nutrition Program Operations Stud	dy (SN	IPOS)		



9

# Meal Counting and Claiming

### The following questions ask about meal counting and claiming.

9.1 How does your SFA keep track of the number the number of free, reduced price, and paid meals served to students?

	Yes	No
a, Tickets or tokens	, <b>D</b>	2
b. Swipe cards	, <b>D</b>	
c. Personal Identification Numbers (PINs)		
d. Biometric technology (e.g., fingerprint scanners)	-	2
e. Other (SPECIFY)	,0	20

# 9.2 Which of the following types of payments are accepted?

	Yes	No
a, Cash at Point of Service (POS)		2
b. Credit or debit card		
c. Personal check or money order	Ω,	2
d. Prepayment via the Internet		2
e. Prepayment via mail, phone, or fax		2
e. Other (SPECIFY)	,0	-

# Special Nutrition Program Operations Study (SNPOS)

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Type of training	Training provided?	If YES, how often provided? (CHECK ALL THAT APPLY)			
	1 Yes	,□ When cashier is hired			
a. Method of counting meals	₂□ No	<sup>2</sup> Once each school year			
		₃□ More than once each school year			
	1 Yes	,□ When cashier is hired			
<ul> <li>Monitoring student meal selections for reimbursable meals</li> </ul>	2 No	₂□ Once each school year			
		₃☐ More than once each school year			
	₁□ Yes	,□ When cashier is hired			
<ul> <li>Managing cash for a la carte and adult meals</li> </ul>		<sup>2</sup> Once each school year			
	2 No	₃☐ More than once each school year			
	1 Yes	□ When cashier is hired			
d. Acceptable types of payments	2 No	₂□ Once each school year			
		₃☐ More than once each school year			
	1 Yes	,			
e. Meal and food pricing	₂□ No	2 Once each school year			
		₃ More than once each school year			
	₁□ Yes	,□ When cashier is hired			
f. Offer versus serve		₂□ Once each school year			
		₃☐ More than once each school year			
	₁□ Yes	,			
g. Applications for free or reduced price meals	₂□ No	<sup>2</sup> Once each school year			
		₃☐ More than once each school year			
	1 Yes	,□ When cashier is hired			
h. Operating a Point of Service (POS) system	₂□ No	₂□ Once each school year			
		₃☐ More than once each school year			
i. Other	1 Yes	,			
(SPECIFY)	₂□ No	<sup>2</sup> Once each school year			
		₃☐ More than once each school year			

9.3 Which of the following types of training is provided to cashiers?



9.4 Does your SFA conduct on-site monitoring of cashiers?

₁□ Yes	
2 No	(GO TO NEXT SECTION)

9.5 How often is on-site monitoring conducted?

- Less than once a year
- 2 Once a year
- In Twice a year
- <sup>4</sup> Three or more times a year

SECTION



# **Procurement Issues**

The next questions are about procurement issues.

- **10.1** For the 2011-12 school year, has your school district given preference to purchasing unprocessed foods for school meal programs that have been locally grown, raised, or produced? Would you say...
  - Most of the time
  - 2 Some of the time

In Never (GOTO QUESTION 10.5)

**10.2** If locally-grown fruits, vegetables, and other products cost more than similar products obtained from outside the local area, to what extent do you purchase them anyway? Do you ....

- Always purchase or try to purchase local foods
- 2 Sometimes purchase or try to purchase local foods
- Only purchase local foods when they are priced competitively

USDA • 25

- **10.3** Which of the following types of local foods have you given preference to in your purchases? (CHECK ALLTHAT APPLY)
  - Image: Fresh fruits and vegetables

     Image: Pasteurized milk

     Image: Meat, fish, or poultry

     Image: Other (SPECIFY)

10.4 When giving preferences to the purchase of local foods, do you consider "local" to be within?

- 50 miles of your school(s)
- 2 51-100 miles of your school(s)
- 101-200 miles of your school(s)
- 4 More than 200 miles of your school(s)
- Some other definition (SPECIFY)

#### **Food Purchasing Specifications**

- 10.5 How do you obtain the nutrition information for foods that you receive:
  - Nutrition labels packaged with or directly on the product
  - <sup>2</sup> Contacting the vendor/manufacturer directly
  - □ Other (SPECIFY)
- **10.6** Do you find the availability of nutrition information for foods you receive:
  - Excellent
  - 2 Satisfactory
  - J Unsatisfactory

**10.7** When your SFA orders foods for the school meal programs, how often do you specify the nutrient requirements for a single serving of a specific type of food or meal?

1	Always
2	Sometimes
з	Never

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10.8 For which of the following food types do you specify per serving nutrient requirements?

	Yes	No
a. Milk	1	2
b. Main dish/entree	1	2
c. Bread or bread alternate	1	2
d. Salad/ raw vegetables	1	2
e. Cooked vegetables	1	2
f. Fruit	1	2
g. Beverages other than milk	1	2
h. Snack foods	1	2
i. Desserts	1	2

**10.9** Which of the following types of nutritional information per serving do you require from vendors for the foods they supply?

	Yes	No
a. Total calories	1	2
b. Protein	1	2
c. Fiber	1	2
d. Carbohydrates	1	2
e. Calcium	1	2
f. Iron	1	2
g. Vitamin A	1	2
h. Vitamin B	1	2
i. Vitamin C	1	2
j. Vitamin D	1	2
k. Sodium	1	2
I. Sugar	1	2
m. Percent of calories from total fat	1	2
n. Percent of calories from saturated fat	1	2
o. Percent of calories from trans fat	1	2
p. Other	1	2

- 10.10 In the last year, have vendors always, sometimes or never supplied the nutritional information you requested?
  - Always 2 Sometimes Bever
- 10.11 How are food products purchased for your school district?

	Yes	No
a. Directly purchased by SFA	1	2
b. Directly purchased by the schools	1	2
c. Directly purchased by the state	1	2
d. Directly purchased by a consortium of states		2
e. Through a food co-op		2
f. By Food Service Management Companies (FSMC)		2
g. Through the Department of Defense Fresh Fruit and Vegetable Program		2
h. Other (SPECIFY)	1	2

10.12 Does your SFA use school food service management companies (FSMCs)?

- 1 Yes 2 No (GO TO NEXT SECTION)
- 10.13 Which of the following methods does your school district use to track rebates, discounts, or fees for service from Food Service Management Companies (FSMCs)?

Yes	No
1	2
1	2
1	2
1	2
1	2
1	2
	Yes

28 • USDA Special Nutrition Program Operations Study (SNPOS)



# **Involvement in Other Programs**

# The next set of questions asks about your school district's involvement in other programs.

11.1 Does your SFA participate in the following?

	Yes	No
a. USDA Fresh Fruit and Vegetable Program	1	2
b. The NSLP After School Snack Program	1	2
c. The CACFP At-Risk After School Snack or Supper Program	1	2
d. Summer Food Service Program	1	2

11.2 Does your SFA participate in the Department of Defense (DoD) Fresh program?

₁□ Yes	
2 <b>No</b>	(GO TO QUESTION 11.5)

11.3 How satisfied are you with the way the DoD Fresh Fruit and Vegetable Program is working in your state in each of the following areas?

	Very satisfied	Satisfied	Dissatisfied	Very dissatisfied	N/A
a. Price for fruits and vegetables	1	2	з	4	9
b. On-line ordering	1	2	з	4	9
c. Overall customer service	1	2	з	4	9
d. Other (Specify)	1	2	3	4	9

IF ALL ANSWERS TO QUESTION 11.3 ARE YOU ARE "VERY SATISFIED" OR "SATISFIED," GO TO QUESTION 11.5.

11.4 Why are you dissatisfied with the DoD Fresh Program?

Special Nutrition Program Operations Study (SNPOS)

USDA •

29

11.5 Does your SFA participate in the Farm to School Initiative?

1 Yes	
2 No	(GO TO QUESTION 11.7)

**11.6** As part of your district's Farm to School Initiative, in which of the following activities do you participate?

	Yes	No
a. Nutrition education at school	1	2
b. Agriculture-related lessons and curriculum	1	2
c. School or community gardens	1	2
d. Farm tours	1	2
e. Taste testing	1	2
f. Parent educational lessons	1	2
g. Community educational lessons	1	2

11.7 How many schools in your district(s) have been recognized as HealthierUS schools at the following levels?

For this question, please record your responses separately for elementary (i.e., schools composed of any span of grades from Kindergarten through 6th grade); middle or junior high (i.e., schools that have no grade lower than 6 and no grade higher than 9); or high school (i.e., schools that have no grade lower than 9 and continue through grade 12). If any school does not meet the elementary, middle or junior high, or high school definition, please include it in the "Other school" column.

	1	2	3	4
	Elementary school	Middle or junior high	High school	Other school
Gold Award of Distinction				
Gold				
Silver				
Bronze				
No awards received				

**11.8** Have any other schools applied, but have not yet been recognized as HealthierUS schools?

 Yes

 2
 No

 ...
 Not applicable

 ...
 Don't know

30 • USDA

11.9 What challenges do schools face in trying to attain the HealthierUS schools recognition?



The following questions are about food safety.

**12.1** Do schools in your SFA have a written Food Safety Plan based on Hazard Analysis and Critical Control Point (HACCP) principles?

1	All schools	(GOTO QUESTION 12.3)
2	Most schools	
з	Some schools	
4	None of the school	s

**12.2** What is the main reason that all schools do not have a written Food Safety Plan and/or a HACCP Plan for the preparation and service of school meals served to children?

USDA • 31

**12.3** Which of the following food safety program components have been implemented in the school(s) under your supervision?

	Yes	No
a. Written Standard Operating Procedures (SOPs)	1	2
b. Annual review and updating of food safety plan	1	2
c. Menu items grouped by process (e.g., no cook, same day service, complex)	1	2

### Temperatures taken and recorded for

d. Foods at receiving	1	2
e. Foods in storage	1	2
f. End-point cooking temperatures	1	2
g. Holding temperatures	1	2
h. Serving temperatures	1	2
i. Cooling temperatures	1	2

**12.4** Do you have policies and procedures to accommodate students with special diets?



12.5 How many children with non-allergy related special diets are served in your district?

Number of children with special diets

🔋 🔲 Don't know

12.6 What types of food service procedures do you use to protect students with special diets?

	Yes	No
a. Signed prescription from child's physician	1	2
b. Cashier has child names to check trays	1	2
c. Consultation with registered dietitian to plan menus	1	2
d. Other (SPECIFY)	1	2

32 • USDA

# **Food Safety Inspections**

12.7 For each of the following school years, how many schools in your SFA had two or more safety inspections?

	All	Most	Some	None
a. School year 2010-11	1	2	з	4
b. School year 2009-10	1	2	з	4
c. School year 2008-09	1	2	з	4

IF SY 2010-11 = ALL, MOST OR SOME, GO TO QUESTION 12.8, OTHERWISE SKIP TO QUESTION 12.9.

12.8 Which of the following types of agencies conducted the school food safety inspections during the 2010-11 school year?

		Yes	No
a. State gover	nmental agency (e.g. public health agency)	1	2
b. Local gover	nmental agency	1	2
c. Some other	type of agency		
(SPECIFY)		1	2

**SKIPTO QUESTION 12.10.** 

12.9 Which of the following reasons best describes why at least two inspections were not made at all schools covered under your food safety plan during school year 2010-11:

	Yes	No
a. Insufficient funding at state and local public health agencies	1	2
b. Lack of local public health inspectors	1	2
c. Schools are a low priority	1	2
d. The public health agencies prioritize inspections according to risk	1	2
e. Insufficient funding in the school district to pay for two or more inspections	1	2
d. Some other reason	_	
(SPECIFY)	1	2
(SPECIFY)		

Special Nutrition Program Operations Study (SNPOS)

33

12.10 Were any schools cited for food safety inspection violations during school year 2010-11?

1	Yes	
2	No	(GO TO QUESTION 12.13)

12.11 How many schools were cited for food safety violations during school year 2010-11?

	Number of schools cited	N/A
a. Elementary school		
b. Middle or junior high school		
c. High school		
d. Other school		

**12.12** During the 2010-11 school year, of the schools cited for food safety violations, how many schools were cited for the following violations?

	AII	Most	Some	None
a. Food storage problems	1	2	з 🗖	1
<ul> <li>b. Improper temperature of food during storage, cooking, holding, and/or cooling</li> </ul>	1	2	з	1
c. Inconsistent or not using gloves and/or hair restraints	1	2	з	1
d. Presence of pests	1	2	з	1
e. Raw meat or fish not properly separated from ready-to-eat food	1	2	з	1
f. Surfaces and/or utensils not properly cleaned/sanitized	1	2	з	1
g. Lack of proper, adequate hand washing	1	2	з	1
h. Chemicals and other poisonous or toxic materials not properly marked, stored, or used		2	3	1
i. Other (SPECIFY)	1	2	3	1

# Hold Or Recall Procedures For USDA Foods

# **12.13** How is your SFA alerted about holds or food recalls?

	Yes	No
a. Email notification	1	2
b. Telephone calls	1	2
c. Fax	1	2
d. Notice sent by mail	1	2
e. Other (SPECIFY)	1	2

12.14 How does your SFA alert schools about holds or food recalls? Does your SFA...

	Yes	No
a. Send email notification	1	2
b. Make telephone calls	1	2
c. Send faxes	1	2
d. Send notice by mail	1	2
e. Other (SPECIFY)	1	2

# **Food Safety Training**

12.15 What percentage of schools in your SFA have at least one food service supervisor or manager who has a food safety certification?





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**12.16** Which of the following safety topics have food service employees been trained on during the 2010-11 school year?

	Yes	No
a. Personal hygiene, proper hand washing	1	2
b. Pathogens and characteristics of food borne illness	1	2
c. Illnesses and symptoms that should be reported to a foodservice supervisor	1	2
d. Kitchen sanitation	1	2
e. Storing and labeling chemicals and sanitizers	1	2
f. Equipment and maintenance	1	2
g. Proper thermometer use and maintenance	1	2

Safe food handling at each of the following steps in the food flow:

h. Receiving	1	2
i. Storage	1	2
j. Thawing	1	2
k. Preparation	1	2
I. Cooking	1	2
m. Cooling	1	2
n. Reheating	1	2

12.17 Which of the following USDA materials has your SFA used to assist in food safety?

	Yes	No
a. Fresh Fruit and Vegetable Problem Handbook	1	2
b. Produce/Salad Area: Produce/Salad Area - Educational Poster	1	2
c. Choice Plus: Food Safety Supplement	1	2
d. Best Practices: Handling Fresh Produce in Schools	1	2
e. Fruits and Vegetables Galore: Helping Kids Eat More	1	2



12.18a Does your SFA currently have a food defense plan or food defense practices?

1 Yes	
2 No	(GOTO QUESTION 12.19)

**12.18b** Which of the following food defense practices are currently being used in your SFA?

	Yes	No
a. The food service operations have a plan to prevent the intentional contamination of food	1	2
b. The school food service operators are involved in the school district emergency plan	1	2
c. A Biosecurity Checklist for School Food Service Programs is being used	1	2
d. Other (SPECIFY)	1	2

SECTION **13** Communication Issues

13.1 How do the state agencies communicate with your SFA? Do they use...

	Yes	No
a. Mail	1	2
b. A website	1	2
c. Email correspondence	1	2
d. Blanket emails	1	2
e. Email blasts	1	2
f. Other methods (SPECIFY)	1	2

13.2 Does the type of communication vary depending on the type of information communicated?

1	Yes
2	No
8	Don't know

Special Nutrition Program Operations Study (SNPOS)

37

13.3 How does your SFA communicate with individual households in the school district? Do you...

	Yes	No
a. Use a website to provide information	1	2
b. Send letters/memos through the students	1	2
c. Send a periodic newsletter	1	2
d. Send emails or text messages	1	2
e. Other methods (SPECIFY)	1	2

4

# 13.4 What information do you provide to households?

	Yes	No
a. Breakfast menus	1	2
b. Lunch menus	1	2
c. Nutritional information	1	2
d. Inspections of the cafeteria reports	1	2
e. Insecticide spraying alerts	, 🗖	2
f. Other information (SPECIFY)	,	2

# 13.5 How does your SFA communicate with school staff in the school district? Do you...

	Yes	No
a. Use a website to provide information	1	2
b. Send letters, memos	1	2
c. Send a periodic newsletter	1	2
d. Send emails or text messages	1	2
e. Other methods (SPECIFY)	1	2

38 • USDA



# These questions are about the SFA Director.

	Months	
Prior to your pos Years	sition as the SFA Director, he Months	ow much experience did you have in food service?
What is the <u>high</u> 1 Less than I 2 High schoo		ompleted?
₃□ Some colle	ge, no degree	
4 Associate		
₅ Bachelor's	aogroo	

- 2 Part-time SFA Director
- Business manager (district)
- ITransportation coordinator (district)
- ₅ Other (SPECIFY)

USDA	•	39
USDA	-	

- 14.5 What is the <u>minimum</u> level of education required for an SFA Director in your district?
  - Less than high school
  - 2 High school
  - 3 Some college, no degree
  - 4 Associate degree
  - Bachelor's degree
  - 6 Graduate degree

# 14.6 In your district, is an SFA Director required to be a:

	Yes	No
a. Licensed Dietician	1	2
b. School Nutrition Specialist	1	2
c. Certified Professional Food Manager	1	2
d. Certified Professional in Food Safety	1	2
e. Certified Professional Food Handler	1	2
f. Certified ServSafe Food Safety Professional	1	2

# 14.7 Is your current SFA director a...

	Yes	No
a. Licensed Dietician	1	2
b. School Nutrition Specialist	1	2
c. Certified Professional Food Manager	1	2
d. Certified Professional in Food Safety	1	2
e. Certified Professional Food Handler	1	2
f. Certified ServSafe Food Safety Professional	1	2

Thank you for your participation in this important study.



Special Nutrition Program Operations Study (SNPOS)

Appendix C

Weighting Procedures for the Base-Year Survey of School Food Authorities

# Weighting Procedures for the Base-Year Survey of School Food Authorities

This appendix summarizes the procedures used to weight the sample of SFAs included in the base-year (Round 1) SFA survey analysis files. Both full-sample weights and a series of replicate weights designed for variance estimation purposes were constructed. We first describe the construction of the base weights. Next, we describe the procedures used to adjust the base weights for survey nonresponse. Finally, we describe the procedures used to create a series of jackknife replicate weights for variance estimation.

#### **Construction of Full-Sample SFA Weights**

#### **Initial Base Weights**

A stratified sample design was used to select the SFA sample for the SN-OPS evaluation (refer to SN-OPS project sampling memo 6 dated Feb. 24, 2011, for details about the sample selection process). Although explicit strata defined by a cross-classification of 7 categories of SFA enrollment size, 3 categories of poverty status, and 7 FNS regions were specified for sample selection purposes, the sampling rates varied only by size class (see Attachment C.1). The base weight for sample SFA *i* in SFA size class *b* was therefore computed as:

$$w_{hi}^{base} = 1/P_{hi}$$
 (1)

where  $P_{hi}$  = the sampling rate used to select SFAs in size class *h*. The base weights are often referred to as "unbiased" weights because weighted totals using the base weights are theoretically unbiased in the absence of survey nonresponse. The values of the sampling rates used to select the SN-OPS sample along with the corresponding base weights assigned to the sampled SFAs are summarized in Table C-1.

#### **Special Cases**

Two types of situations required special procedures to assign the base weights. The first involved SFAs consisting of multiple school districts for which the selected SFA could not provide a single consolidated report covering all of the school districts under its supervision. The second involved a sampled SFA that merged with another SFA in the sampling frame. We describe the ways in which these cases were handled below.

SFA enrollment size class ( <i>h</i> )	Number of SFAs in sampling frame	Number of SFAs selected for sample	Sampling rate	Base weight
Under 1,000	7,632	447	0.0589	16.99
1,000 to 2,499	3,297	366	0.1101	9.08
2,500 to 4,999	1,945	310	0.1612	6.20
5,000 to 9,999	1,043	237	0.2280	4.39
10,000 to 24,999	594	210	0.3483	2.87
25,000 to 99,999	260	172	0.6582	1.52
100,000 or more	26	26	1.0000	1.00
TOTAL	14,797	1,768		

#### Table C-1. Base Weights for the SN-OPS SFA Sample

#### **Multidistrict SFAs**

There were 3 instances where the originally sampled SFA consisted of more than 1 independent school district. Of these 3, 2 were sampled as individual SFAs in the sampling frame. One of these served 5 school districts, and the other served 3 districts. Ordinarily, such SFAs would be asked to provide a single report that covered all of their constituent districts. However, in both of these instances, the originally sampled SFA could not provide the required consolidated report. Thus, the individual school districts were contacted separately for data collection, bringing the total number of SFAs fielded for data collection in the base year to 1,774.

For the 2 multidistrict SFAs described above, each of the individual school districts associated with the SFA received the same base weight as the originally sampled SFA; that is, the base weight for district d in sample SFA i in SFA size class h was computed as:

 $w_{hid}^{base} = 1/P_{hi} \tag{2}$ 

where  $P_{hi}$  = the sampling rate originally used to select the SFA in size class *h*.

The third instance involved 2 school districts in Los Angeles (the Los Angeles Unified School District and the Los Angeles County Board of Education) combined as a single unit for sampling purposes based on linkage information provided by FNS. Like the above two cases, the individual districts comprising the original combined sampling unit were able to report their data separately. However, since the two districts had been combined at the time of sampling, they are treated as a single sampling unit, with each of the two component districts receiving the same base weight.

#### **Merged SFAs**

There was 1 instance where a sampled SFA merged with another SFA in the sampling frame. In this case, the merged entity could have been selected for the study sample if either of the individual SFAs had been sampled. The 2 SFAs that merged were in the same SFA size stratum. To reflect the multiple chances of selection, the base weight of the merged SFA m in size class h was computed as:

### $w_{hm}^{base} = 1/(P_{hi} + P_{hj})$ (3)

where  $P_{hi} = P_{hj}$  = the sampling rate associated with the 2 SFAs in size class *h* that subsequently merged.

#### Nonresponse Adjustment

The base weights are often referred to as "unbiased" weights because weighted totals using the base weights are theoretically unbiased in the absence of survey nonresponse. The next step in the weighting process was to adjust the base weights defined by formulas 1 to 3 to compensate for nonresponse in the base-year survey. The adjustments were made as described in this section.

Table C-2 summarizes the distribution of the SFA sample by six response-status groups. Note that 73 of the 252 "partial completes" (cases with a final result code of 2) completed 50 percent or more of the survey sections and are considered to be sufficiently complete for analysis purposes. Though a distinction is made in the receipt control system between refusals and other nonrespondents, together they make up the group of survey nonrespondents for weighting purposes. All nonresponding cases are considered to be eligible SFAs. The small number of ineligible SFAs are primarily closed or inactive SFAs.

#### Table C-2. Distribution of the SFA Sample by Survey Response Status

Response status group	Final result codes	Number of SFAs in sample
1a. Complete	4	1,327 **
1b. Partial complete (50%+ comp. sections)*	2	73
1c. Partial completes (<50% comp. sections)*	2	179
2a. Refusal	7-10	18
2b. Other nonrespondent	0, 1	168
3. Ineligible	12	9
	Total	1,774

\* Out of a total of 252 partial completes, 73 completed 50 percent or more of the survey sections and are considered to be "respondents" for the purposes of weighting and analysis.

\*\* The combined SFA consisting of 2 SFAs in Los Angeles is counted as 1 SFA in this table (see discussion under Multidistrict SFAs).

The purpose of the adjustment was to compensate for differential nonresponse losses by distributing a portion of the base-weighted count of the nonresponding cases (excluding the ineligibles) to the responding cases in the sample. The nonresponse adjustment had the effect of distributing the weight of the cases in response-status groups 1c (partial completes with less than 50 percent of the sections completed), 2a (refusals), and 2b (other nonrespondents) to response-status groups 1a and 1b defined in Table C-2. The nine ineligible cases were excluded from the adjustment.

To be effective in reducing potential nonresponse biases, the nonresponse adjustment was made within subsets of SFAs (or "weighting classes") expected to have similar propensities for responding to the survey. We used a CHAID analysis (Chi-square Automatic Interaction Detector) to identify subsets of SFAs in which the predicted probabilities of response were similar.

To conduct the CHAID analysis, the "dependent" variable for a sampled SFA was defined by the zero-variable:

$$Y = \begin{cases} 1, if \text{ response} - \text{status group} = 1a \text{ or } 1b, \\ 0, if \text{ response} - \text{status group} = 1c, 2a, \text{ or } 2b. \end{cases}$$

In addition to the variables used in sample stratification (i.e., SFA size, SFA poverty status, and FNS region), we also used SFA characteristics available in the FNS-742 sampling frame and selected district-level variables from the Common Core of Data (CCD) Local Education Agency Universe Survey as potential predictor variables in the CHAID analysis (see Attachment B.2).

The output from the CHAID analysis was a tree diagram that defined the final cells (labeled r = 1, 2, ..., R) used in the nonresponse adjustment. Table C-3 summarizes the 12 nonresponse adjustment cells determined by the CHAID analysis. It can be seen that the weighted response rates varied from around 62 percent to over 99 percent across the 12 adjustment cells. The weighted response rates shown in Table D.3 are relevant because they provide a measure of the potential impact of nonresponse on weighted estimates derived from the survey.

Next, a nonresponse adjustment factor,  $A_r$ , was computed as the inverse of the weighted response rate in final cell r:

$$A_{r} = \sum_{i=1}^{n_{12}^{(r)}} w_{ri}^{base} / \sum_{i=1}^{n_{1}^{(r)}} w_{ri}^{base} \quad (4)$$

where the sum of base weights in the numerator extended over the  $n_{12}^{(r)}$  eligible sampled SFAs in final cell r, while the sum of base weights in the denominator extended over the  $n_1^{(r)}$  responding SFAs in final cell r.

Table C-3.	Definition of Nonresponse Adjustment Cells	
------------	--	--

Nonresponse adjustment cell	Definition of cell based on CHAID analysis*	Weighted response rate**
1	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 1, 2	75.1%
2	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 3, 9, sfapov = 1, 3, ap_fr_el = 1, 2	65.9
3	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 3, 9, sfapov = 1, 3, ap_fr_el = 3	87.8
4	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 3, 9, sfapov = 2	92.6
5	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 4, sfa_lev = 1, 2, 9	86.4
6	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 4, sfa_lev = 3, pct_wh = 1, 2	65.1
7	region = 1, 2, 3, 4, 7, type08 = 1, minstat = 4, sfa_lev = 3, pct_wh = 3	79.7
8	region = 1, 2, 3, 4, 7, type08 = 2, 4, 5, 7, 9	61.8
9	region = 5, 6, pct_ai = 1, 2, pct_bk = 1	77.1
10	region = 5, 6, pct_ai = 1, 2, pct_bk = 2, 3	89.8
11	region = 5, 6, pct_ai = 3, sfapov = 1, 3	99.6
12	region = 5, 6, pct_ai = 3, sfapov = 2	90.9

\* See Attachment B.2 for definitions of variables used above to construct nonresponse adjustment cells.

\*\* Computed using base weights.

The final nonresponse-adjusted weight for the ith responding SFA in cell r was computed as:

$$w_{ri}^{NR} = A_r \ w_{ri}^{base} \tag{5}$$

#### **Replicate Weights for Variance Estimation**

The sampling rates used to select the SFA samples varied widely by enrollment size (see Table C-1). For example, SFAs with 100,000 or more students were selected with certainty (i.e., probability 1), while smaller SFAs were selected at rates ranging from 1 in 17 to 1 in 1.5. For strata in which the sampling rates are relatively high, the impact of the finite population correction (FPC) on sampling variances can be appreciable. For this reason, a form of jackknife replication referred to as the JKN method was used to construct the replicates.

To create the jackknife replicates, we first created 6 variance strata, 1 for each level of SFA enrollment size (excluding the 26 SFAs in the largest enrollment size class that were selected with certainty). Within variance stratum h, we created  $l_h$  variance units, where a variance unit is a systematic sample of the full sample within the stratum. We created a total of 100 variance units consisting of roughly equal numbers of SFAs spanning the 6 variance strata. Next, we created 100 jackknife replicates by deleting a specified variance unit in stratum h and then multiplying the weights of the remaining units in that stratum by a factor of  $(l_h -1)/l_h$ , where  $l_h$  is the number of variance units in the stratum. To complete the construction of the given replicate, the weights of the SFAs in the deleted variance unit were set to 0 while the weights of the SFAs in variance units in the variance units of the SFAs in variance units in the variance unit were set to 0 while the weights of the SFAs in variance units in the variance units to create a total of 100 jackknife replicates.

Variance stratum	No. of variance units used to form replicates in variance stratum	JKN factor	FPC factor*	Replicates to which factors are applied
1	25	0.960000	0.9558	1 to 25
2	21	0.952381	0.9117	26 to 46
3	17	0.941176	0.8766	47 to 63
4	13	0.923077	0.8219	64 to 76
5	12	0.916667	0.6987	77 to 88
6	12	0.916667	0.4423	89 to 100

#### Table C-4. JKN and FPC Factors to Be Used for Variance Estimation

\* FPC is computed as 1 minus the effective sampling rate,  $f_h^{eff} = n_h^{resp} / N_h^{elig}$ , where  $n_h^{resp}$  = the number of responding SFAs in variance stratum h, and  $N_h^{elig}$  is the corresponding estimated number of eligible SFAs in the frame.

To derive the required replicate weights, the entire weighting process described above was applied separately to each replicate, resulting in a set of 100 replicate-specific weights for each responding SFA. Together with the full-sample weight, the replicate weights can be used to calculate the sampling errors of survey-based estimates using the grouped jackknife variance estimator described in Rust (1986) and Wolter (1985).<sup>79</sup> The grouped jackknife estimator, appropriately modified to reflect the within-stratum FPC factors, is given by the formula:

$$v_{GJ}(\hat{y}) = \sum_{h=1}^{L} (1 - f_h) \left( \frac{l_h - 1}{l_h} \right) \sum_{i=1}^{l_h} (\hat{y}_{ih} - \hat{y})^2$$
 (6)

where  $\hat{y}$  is an estimated total based on the full stratified sample of SFAs,  $\hat{y}$  ih is the corresponding estimate in which the ith subsample (referred to as a "dropout" group) in stratum h has been omitted,  $l_h$  is the number of drop-out groups in stratum h, and  $f_h$  is the sampling fraction used to select SFAs in stratum h. The term  $(l_h - 1)/l_h$  in formula 6 is referred to as the JKN factor. The term  $(1-f_h)$  is the corresponding FPC. Both factors are applied to particular sets of replicate weights as indicated in Table B-4. See WesVar 4.3 User's Guide (http://www.westat.com/Westat/pdf/wesvar/WV\_4-3\_Manual.pdf) for examples of the use of the

JKN and FPC factors in variance estimation.

<sup>&</sup>lt;sup>79</sup> Rust, K. Efficient replicated variance estimation. In Proceedings of the Section on Survey Research Methods, American Statistical Association, 1986, pp. 81-87; and Wolter, K. Introduction to Variance Estimation. New York: Springer-Verlag, 1985, p. 183.

## **ATTACHMENT C.1**

## SN-OPS Sampling Frame, Sample Sizes, and Sampling Rates by Stratum

STRATUM	SFA Enrollment Size	SFA poverty status*	FNS Regional Office	No. SFAs in frame	No. SFAs in sample	Sampling rate
1	1. Less than 1,000	1. <30	1 Northeast	271	16	0.058875
2	,		2 Mid Atlantic	179	10	0.058875
3			3 Southeast	23	2	0.058875
4			4 Midwest	322	19	0.058875
5			5 South West	42	2	0.058875
6			6 Mountain Plains	329	19	0.058875
7			7 Western	96	6	0.058875
8		2. 30-59	1 Northeast	367	22	0.058875
9		2. 30-39	2 Mid Atlantic	175	10	0.058875
10			3 Southeast	51	3	0.058875
10				904		
11			4 Midwest 5 South West	500	53 29	0.058875
12			6 Mountain Plains		29 65	0.058875 0.058875
13			7 Western	1,093 419	25	0.058875
15		3. 60+	1 Northeast	124	7	0.058875
16			2 Mid Atlantic	176	10	0.058875
17			3 Southeast	161	9	0.058875
18			4 Midwest	664	39	0.058875
19			5 South West	800	47	0.058875
20			6 Mountain Plains	366	21	0.058875
21			7 Western	570	33	0.058875
22	2. 1,000 to 2,499	1. <30	1 Northeast	277	31	0.110146
23			2 Mid Atlantic	183	20	0.110146
24			3 Southeast	7	1	0.110146
25			4 Midwest	276	30	0.110146
26			5 South West	24	3	0.110146
27			6 Mountain Plains	91	10	0.110146
28			7 Western	44	5	0.110146
29		2. 30-59	1 Northeast	185	21	0.110146
30			2 Mid Atlantic	192	21	0.110146
31			3 Southeast	103	11	0.110146
32			4 Midwest	610	67	0.110146
33			5 South West	178	20	0.110146
34			6 Mountain Plains	199	20	0.110146
35			7 Western	143	16	0.110146
36		3. 60+	1 Northeast	12	1	0.110146
37		5.001	2 Mid Atlantic	46	5	0.110146
37			3 Southeast	195	22	0.110140
38 39			4 Midwest	195	16	0.110146
39 40			5 South West	212	23	0.110146
			6 Mountain Plains		25 7	
41 42			7 Western	56 119	14	0.110146 0.110146

\* Based on percentage of students eligible for free or reduced-price lunch.

### SN-OPS Sampling Frame, Sample Sizes, and Sampling Rates by Stratum

STRATUM	SFA Enrollment Size	SFA poverty status*	FNS Regional Office	No. SFAs in frame	No. SFAs in sample	Sampling rate
43	3. 2,500 to 4,999	1. <30	1 Northeast	240	38	0.16
44			2 Mid Atlantic	161	26	0.16
45			3 Southeast	7	1	0.10
46			4 Midwest	169	27	0.1
47			5 South West	15	3	0.1
48			6 Mountain Plains	32	5	0.1
49			7 Western	45	8	0.1
50		2. 30-59	1 Northeast	77	13	0.1
51			2 Mid Atlantic	109	17	0.1
52			3 Southeast	120	19	0.1
53			4 Midwest	218	35	0.1
54			5 South West	104	17	0.1
55			6 Mountain Plains	79	12	0.1
56			7 Western	97	15	0.1
57		3. 60+	1 Northeast	9	1	0.1
58			2 Mid Atlantic	21	3	0.1
59			3 Southeast	171	27	0.1
60			4 Midwest	68	11	0.1
61			5 South West	87	14	0.1
62			6 Mountain Plains	18	3	0.1
63			7 Western	98	15	0.1
64	4. 5,000 to 9,999	1. <30	1 Northeast	78	18	0.2
65			2 Mid Atlantic	69	16	0.2
66			3 Southeast	8	2	0.2
67			4 Midwest	105	24	0.2
68			5 South West	10	2	0.2
69			6 Mountain Plains	27	6	0.2
70			7 Western	49	11	0.2
71		2. 30-59	1 Northeast	38	9	0.2
72			2 Mid Atlantic	59	14	0.2
73			3 Southeast	93	21	0.2
74			4 Midwest	77	17	0.2
75			5 South West	43	10	0.2
76			6 Mountain Plains	32	7	0.2
77			7 Western	84	19	0.2
78		3. 60+	1 Northeast	12	3	0.2
79			2 Mid Atlantic	17	4	0.2
80			3 Southeast	74	16	0.2
81			4 Midwest	40	9	0.2
82			5 South West	58	14	0.2
83			6 Mountain Plains	11	2	0.2
84			7 Western	59	13	0.2

\* Based on percentage of students eligible for free or reduced-price lunch.

## SN-OPS Sampling Frame, Sample Sizes, and Sampling Rates by Stratum

STRATUM	SFA Enrollment Size	SEA povortu status*	FNS Regional Office	No. SFAs in frame	No. SFAs in	Sampling
85	5. 10,000 to 24,999	SFA poverty status* 1. <30	1 Northeast	17	sample 6	rate 0.3483
85	5. 10,000 to 24,395	1. <50	2 Mid Atlantic	24	8	0.3483
80 87			3 Southeast	8	3	0.3483
88			4 Midwest	35	13	0.3483
89			5 South West		4	0.3483
89 90			6 Mountain Plains	12	4	
				18		0.3483
91			7 Western	31	11	0.3483
92		2.30-59	1 Northeast	9	3	0.3483
93			2 Mid Atlantic	24	8	0.3483
94			3 Southeast	75	26	0.3483
95			4 Midwest	34	12	0.3483
96			5 South West	38	14	0.3483
97			6 Mountain Plains	26	10	0.3483
98			7 Western	79	28	0.3483
99		3.60+	1 Northeast	12	4	0.3483
100			2 Mid Atlantic	11	4	0.3483
101			3 Southeast	18	6	0.3483
102			4 Midwest	19	7	0.3483
103			5 South West	35	12	0.3483
104			6 Mountain Plains	8	3	0.3483
105			7 Western	61	21	0.3483
106	6. 25000-99999	1. <30	1 Northeast	1	1	0.6582
107			2 Mid Atlantic	12	8	0.6582
108			3 Southeast	6	4	0.6582
109			4 Midwest	4	2	0.6582
110			5 South West	9	6	0.6582
111			6 Mountain Plains	12	7	0.6582
112			7 Western	12	8	0.6582
113		2. 30-59	1 Northeast	1		0.6582
113		2.30-39	2 Mid Atlantic	4	3	0.6582
			3 Southeast	4	30	0.6582
115			4 Midwest			
116				4	2	0.6582
117			5 South West	18	12	0.6582
118			6 Mountain Plains	8	6	0.6582
119			7 Western	33	22	0.6582
120		3.60+	1 Northeast	2	1	0.6582
121			2 Mid Atlantic	5	4	0.6582
122			3 Southeast	15	10	0.6582
123			4 Midwest	9	6	0.6582
124			5 South West	28	19	0.658
125			6 Mountain Plains	5	3	0.6582
125			7 Western	26	18	0.658
	7 100 000					
127	7. 100,000+	ALL	ALL	26	26	1.0000
TOTAL				14,797	1,768	

\* Based on percentage of students eligible for free or reduced-price lunch.

### **ATTACHMENT C.2**

#### Variables Used as Potential Predictors of Response Propensity

#### **SFA Sampling Frame Variables**

#### **REGION (SFA regional office):**

- 1. Northeast
- 2. Mid Atlantic
- 3. Southeast
- 4. Midwest
- 5. South West
- 6. Mountain Plains
- 7. Western

#### SFAPOV (SFA F/R lunch percentage categories/poverty status):

1. Low ( < 30 percent F/RP);

- 2. Medium (Between 30 and 59.9 percent F/RP);
- 3. High (  $\geq$  60 percent F/RP);

#### SFASIZE (SFA enrollment size):

1. < 1,000; 2. 1,000 - 2,499; 3. 2,500 - 4,999; 4. 5,000 - 9,999; 5. 10,000 - 24,999; 6. 25,000 - 99,999; 7. 100,000+;

#### AP\_FR\_EL (Number of applications free eligible):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### AP\_FR\_IN (Number of applications free eligible income):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### Variables Used as Potential Predictors of Response Propensity

#### AP\_TR (Number of applications total reduced-price eligible):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### **PROVSCH** (Dichotomous variable number of provision schools in SFA):

0. 0 provision schools in SFA;

1. 1+ provision schools in SFA;

#### SCH\_SFA (Number of schools in SFA):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### **ST\_FE\_CA** (Number of students free eligible categorically):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### ST\_FE\_NV (Number of students free eligible not verified):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### ST\_FIE (Number of students free income eligible):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### **ST\_TR\_PE** (Number of students total reduced-price eligible):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### Variables Used as Potential Predictors of Response Propensity

#### **ST\_T\_FE** (Number of students total free eligible):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);

#### CCD Variables<sup>80</sup>

#### **MINSTAT (Percent minority status)**

- 1. < 5% minority;
- 2.5 to 19.9% minority;
- 3. 20 to 49.9% minority;
- 4. 50%+ minority;
- 9. Not matched or missing in CCD;

#### LOCALE (Type of locale):

- 1. City;
- 2. Suburban;
- 3. Town;
- 4. Rural;
- 9. Not matched or missing in CCD;

#### SFA\_LEV (Instructional level):

- 1. Elementary schools only;
- 2. Secondary schools only;
- 3. Both elementary and secondary schools;
- 9. Not matched or missing in CCD;

#### TYPE08 (Education agency type code):

- 1. Regular local school district;
- 2. Local school district that is a component of a supervisory union;
- 3. Supervisory union;
- 4. Regional education service agency;
- 5. State-operated agency;

<sup>&</sup>lt;sup>80</sup> Sable, J., and Plotts, C. (2010). Documentation to the NCES Common Core of Data Local Education Agency Universe Survey: School Year 2008-09 (NCES 2010-351). U.S. Department of Education. Washington, DC: National Center for Education Statistics. <u>http://nces.ed.gov/pubsearch/pubsinfo.asp?pubid=2010351.</u>

7. Charter agency;

9. Not matched or missing in CCD;

#### Variables Used as Potential Predictors of Response Propensity

#### PCT\_AI (Percent American Indian in SFA):

1. Low ( < 25<sup>th</sup> percentile);

- 2. Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
- 3. High ( > 75<sup>th</sup> percentile);
- 9. Not matched or missing in CCD;

#### PCT\_AS (Percent Asian in SFA):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);
 Not matched or missing in CCD;

#### PCT\_BK (Percent Black/African American in SFA):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);
 Not matched or missing in CCD;

#### PCT\_HS (Percent Hispanic in SFA):

Low ( < 25<sup>th</sup> percentile);
 Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
 High ( > 75<sup>th</sup> percentile);
 Not matched or missing in CCD;

#### PCT\_PI (Percent Pacific Islander in SFA):

Low ( < 25<sup>th</sup> percentile); Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile); High ( > 75<sup>th</sup> percentile); 9- Not matched or missing in CCD;

#### **PCT\_WH (Percent White in SFA):**

- Low ( < 25<sup>th</sup> percentile);
   Medium (Between 25<sup>th</sup> and 75<sup>th</sup> percentile);
   High ( > 75<sup>th</sup> percentile);
- 9. Not matched or missing in CCD;

Appendix D

**Nonresponse Bias Analysis** 

#### **Nonresponse Bias Analysis**

As specified in the *Standards and Guidelines for Statistical Surveys* published by the Office of Management and Budget (September 2006; <u>http://www.whitehouse.gov/sites/default/files/omb/inforeg/statpolicy/standards\_stat\_surveys.pdf</u>), a nonresponse bias analysis is required if the overall unit response rate for a survey is less than 80 percent (Guideline 3.2.9). For the SFA Survey conducted under SN-OPS, a sampled SFA is considered to be nonresponding if it did not provide sufficiently complete questionnaire data for analysis (e.g., see Appendix C). Under this criterion, the overall unweighted and weighted response rates for the SFA survey were 79 and 77 percent, respectively, where the weight used in the response rate calculations is the base weight described in Appendix C.

In this appendix, we summarize the findings of an analysis of nonresponse in the survey of SFAs. As one of survey responses was completed after the fielding window, we conducted the nonresponse bias analysis on a sample of 1,400 respondents rather than 1,401. The two main goals of the analysis are (1) to assess and document the impact nonresponse may have on estimates derived from the survey and (2) to inform the construction of sampling weights for analysis that will be effective in reducing potential nonresponse biases. As discussed later in this appendix in the section Derivation of Nonresponse-Adjusted Weights, the culmination of the analysis was the specification of appropriate weighting classes within which to carry out weight adjustments for nonresponse. To the extent that the weighting classes are formed using relevant SFA characteristics that are correlated with both response propensity and survey responses, we can expect the nonresponse bias in the survey estimates using the nonresponse-adjusted weights to be reduced.

This appendix is divided into eight sections. We first provide an overview of the sample design and a brief discussion of the development of the base weights. This is followed by a summary of the survey response rates by selected SFA characteristics. Next, we compare the distributions of the respondents by selected SFA characteristics with the corresponding distributions of the nonresponding SFAs. We then describe the procedures used to adjust the sampling weights to compensate for nonresponse, and we assess the effectiveness of the weight adjustments in reducing potential nonresponse biases. The last section of the appendix presents a summary and conclusions.

#### Sample Design and Construction of Base Weights

A total of 1,768 SFAs were selected for the survey from a sampling frame constructed from the 2009-10 FNS-742 universe file compiled by the FNS. The sample was stratified by 7 categories of enrollment size class, 3 categories of poverty status based on the percentage of students eligible for free/reduced-price lunch, and the 7 FNS regional offices. SFAs were selected systematically within strata at rates that depended on the size class of the SFA. During data collection, it was discovered that 2 of the originally sampled SFAs represented multiple school districts that operated as independent SFAs. The independent SFAs associated with the original selections were added to the SFA sample, bringing the total SFA sample size to 1,774.

For subsequent weighting purposes, a base weight was calculated for each sampled SFA. The base weight,  $w_{hi}$ , for SFA *i* in sampling stratum *h* was computed as  $w_{hi} = 1/P_{hi}$ , where  $P_{hi}$  is the corresponding probability of selecting the SFA from the stratum. Under the SFA sample design,  $P_{hi}$ 

varied from 0.06 to 1.0 depending on enrollment size class. The base weights are theoretically unbiased in the absence of survey nonresponse. When survey nonresponse is relatively high (e.g., 20 percent or higher), use of the base weights to derive estimates from the survey can result in serious biases. To minimize the potential for nonresponse bias, adjustments were made to the base weights to compensate for differential nonresponse losses (see the section Derivation of Nonresponse-Adjusted Weights, below, and Appendix C for details about the weighting adjustments).

### **Response Rates by Selected SFA Characteristics**

To examine the extent to which missing data resulting from nonresponse are "missing at random," we calculated response rates for subsets of sample based on selected characteristics of SFAs. The characteristics included SFA enrollment size class, poverty status based on percentage of students eligible for free/reduced-price lunch, FNS region, type of LEA, SFA level, minority status of SFA, and levels of the number of approved categorically eligible applications on file (i.e., low, medium, high based on quartiles). The results are summarized in Table D-1. As indicated in Table D-1, 9 of the 1,774 sample SFAs were determined to be ineligible for the survey (e.g., closed, inactive, or not an SFA) and were excluded from the calculation of the response rates summarized below. The last column of the table shows the *p*-value of a test of association between response status and each of the selected SFA characteristics. A *p*-value of 0.05 or less indicates that there is a statistically significant association between the (weighted) response rate and the specified characteristic.

As can be seen in Table D-1, FNS region, type of LEA, instructional level of SFA, and minority status of SFA are all strongly correlated with response status (p-value = 0.006 or less). By FNS region, (weighted) response rates are highest in the Southwest and Mountain Plains regions (85-90 percent) and lowest in the Northeast and Mid-Atlantic regions (71 percent). By type of LEA, the weighted response rates tend to be higher among the "regular" school districts (81 percent) than in other types of LEAs (63 percent). By SFA level, response rates for SFAs serving both elementary and secondary schools were generally higher (80 percent) than those serving elementary schools only (75 percent). By minority status, SFAs with 20-49.9 percent minority populations had higher response rates (85 percent) than those in other categories (64-79 percent). For the remaining SFA characteristics shown in Table D-1, the unweighted and weighted response rates did not vary significantly by the individual categories.

### **Comparison of Respondents and Nonrespondents by Selected Characteristic**

We also compared the base-weighted distributions of the respondents and nonrespondents for the same categories of SFA characteristics shown in Table D-1. The base-weighted distributions of responding SFAs (respondent sample) can be compared with the corresponding base-weighted distributions of the *total* sample to obtain a measure of the potential impact of nonresponse on the survey-based estimates. These comparisons, which are presented in Table D-2, provide an alternative but equivalent way of examining the variation in response rates across selected subgroups of the sample. The *p*-value shown in column 6 of the table corresponds to an overall test of the hypothesis that the base-weighted distribution of the respondent sample is the same as the distribution of the

## Table D-1.Sample Sizes by Response Status, Response Rates, and Test of AssociationBetween Response Status and Selected Characteristics of Sampled SFAs

		Sample sizes b	oy response stat	JS	Unweighted	Weighted	Test of
					response	response	association
SFA characteristic	Total	Response	Nonresponse	Ineligible	rate	rate <sup>1</sup>	(p-value) <sup>2</sup>
All SFAs	1,774	1,400 <sup>3</sup>	365	9	79.32	77.44	
SFA enrollment size class							0.114
Under 1,000	447	332	108	7	75.45	75.45	
1,000-2,499	368	292	75	1	79.56	79.56	
2,500-4,9999	314	243	71	0	77.39	77.38	
5,000-9,999	237	185	51	1	78.39	78.39	
10,000-24,999	210	179	31	0	85.24	85.24	
25,000 or more	198	169	29	0	85.35	85.03	
Percent of students eligible for							
free or reduced-price lunch							0.094
Less than 35%	459	348	110	1	75.98	74.64	
35%-59%	802	650	149	3	81.35	80.24	
60 % or more	513	402	106	5	79.13	75.39	
FNS region							0.000#
Northeast (1)	202	147	54	1	73.13	70.63	
Mid-Atlantic (2)	196	142	53	1	72.82	70.75	
Southeast (3)	225	183	41	1	81.70	76.92	
Midwest (4)	390	278	108	4	72.02	71.04	
Southwest (5)	254	237	17	0	93.31	90.22	
Mountain Plains (6)	215	188	26	1	87.85	85.93	
Western (7)	292	225	66	1	77.32	75.87	
Type of LEA							0.000#
Regular district	1,507	1,233	272	2	81.93	81.29	
All other codes	118	72	41	5	63.72	62.98	
Not available	149	95	52	2	64.63	63.60	
SFA level							0.006
Elementary only	171	130	38	3	77.38	75.07	
Secondary only	48	35	11	2	76.09	78.02	
Combined	1,403	1,139	263	1	81.24	80.03	
Not available	152	96	53	3	64.43	63.31	
Minority status of SFA							0.002
Less than 5% minority	269	207	62	0	76.95	78.56	
5%-19.9% minority	433	343	89	1	79.40	78.16	
20%-49.9% minority	424	367	56	1	86.76	85.47	
50%+ minority	485	380	101	4	79.00	76.16	
Not available in CCD	163	103	57	3	64.38	63.63	
Number approved categorically							
eligible applications							0.716
1st quartile	251	190	58	3	76.61	75.81	
2 <sup>nd</sup> or 3 <sup>rd</sup> quartiles	701	546	152	3	78.22	78.03	
4 <sup>th</sup> quartile	822	664	155	3	81.07	77.79	

CCD = Common Core of Data LEA universe file

# Rounds to zero.

<sup>1</sup> Weighted response rates are calculated using base weights.

<sup>2</sup> Test of association between response status and SFA characteristic.

<sup>3</sup> The non-response bias analysis was conducted on 1400 responses rather than the final 1,401 responses because there were delays in obtaining the last response.

NOTE: Detail may not sum to totals because of rounding. SFA characteristics are based on data available on the frame at the time of sampling and may differ from classification variables used in other reports.

			Base-weighted	data		No	nresponse-adju	sted data
	Percent distribution of sample			Relative bias			Relative bias	Test of association
SFA characteristic	Total	Respondents	Non-Respondents	(percent) <sup>1</sup>	(p-value) <sup>2</sup>	(percent)	(percent) <sup>3</sup>	(p-value) <sup>4</sup>
All SFAs	100	100	100			100		
SFA enrollment size class					0.114			0.522
Under 1,000	50.9	49.6	55.4	-2.6		50.2	-1.3	
1,000-2,499	22.7	23.3	20.6	2.8		23.4	3.1	
2,500-4,9999	13.3	13.3	13.3	-0.3		13.3	0.2	
5,000-9,999	7.1	7.1	6.8	0.5		6.9	-3.3	
10,000-24,999	4.1	4.5	2.7	11.1		4.2	3.9	
25,000 or more	2.0	2.1	1.3	9.7		1.9	-1.1	
Percent of students eligible for								
free or reduced-price lunch					0.094			0.652
Less than 35%	23.3	22.4	26.2	-3.6		23.2	-0.2	
35%-59%	45.9	47.5	40.2	3.6		46.5	1.4	
60% or more	30.9	30.0	33.7	-2.6		30.3	-1.9	
FNS Region					0.000#			0.439
Northeast (1)	12.0	11.0	15.7	-8.8		12.2	1.3	
Mid-Atlantic (2)	9.7	8.9	12.6	-8.6		9.5	-2.3	
Southeast (3)	8.0	7.9	8.2	-0.6		8.3	4.0	
Midwest (4)	24.7	22.7	31.8	-8.3		23.7	-4.4	
Southwest (5)	15.1	17.6	6.5	16.5		15.0	-0.2	
Mountain Plains (6)	16.4	18.2	10.2	11.0		16.4	0.2	
Western (7)	14.0	13.8	15.0	-2.0		14.9	6.0	
Type of LEA					0.000#			0.619
Regular district	78.6	82.5	65.2	5.0		79.0	0.5	
All other codes	10.8	8.7	17.6	-18.7		10.3	-3.8	
Not available	10.6	8.7	17.1	-17.9		10.6	0.1	
SFA level					0.006			0.829
Elementary only	14.3	13.9	15.8	-3.1		14.1	-1.9	
Secondary only	3.1	3.1	3.0	0.8		3.4	9.0	
Combined	71.7	74.1	63.5	3.3		71.7	0.0	
Not available	10.9	8.9	17.7	-18.2		10.8	-0.3	

### Table D-2. Comparison of Weighted Distributions of Sampled SFAs, by Response Status and Selected Characteristics

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## Table D-2.Comparison of Weighted Distributions of Sampled SFAs, by Response Status and Selected Characteristics<br/>(continued)

			Base-weighted	d data		Nonresponse-adjusted data			
	Percent distribution of sample		Relative bias	Test of association	Respondents	Relative bias	Test of association		
SFA characteristic	Total	Respondents	Non-Respondents	(percent) <sup>1</sup>	(p-value) <sup>2</sup>	(percent)	(percent) <sup>3</sup>	( <i>p</i> -value) <sup>4</sup>	
Minority status of SFA	-	-	-	-	0.002	-	-	0.731	
Less than 5% minority	21.8	22.1	20.7	1.4		22.4	3.0		
5%-19.9% minority	26.7	27.0	25.9	0.9		26.3	-1.5		
20%-49.9% minority	18.7	20.6	12.0	10.4		18.8	0.9		
50%+ minority	20.8	20.4	21.9	-1.7		20.3	-2.0		
Not available in CCD	12.1	9.9	19.5	-17.9		12.1	-0.1		
Number approved categorically									
eligible applications					0.716			0.399	
1st quartile	23.8	23.3	25.5	-2.1		23.6	-0.7		
2nd and 3rd quartiles	51.3	51.7	49.9	0.8		52.2	1.8		
4th quartile	24.9	25.0	24.5	0.4		24.2	-3.0		

# Rounds to zero.

<sup>1</sup> Relative bias defined to be 100\*(B-A)/A, where A = base-weighted estimate for total sample and B = base-weighted estimate for respondent sample.

<sup>2</sup> Test comparing distribution of total sample versus respondent sample using base weights.

<sup>3</sup> Relative bias defined to be 100\*(C-A)/A, where A = base-weighted estimate for total sample and C = nonresponse-adjusted estimate for respondent sample.

<sup>4</sup>Test comparing distribution of respondent sample using nonresponse-adjusted weights with distribution of total sample using base weights.

NOTE: Detail may not sum to totals because of rounding. SFA characteristics are based on data available in either the sampling frame or Common Core of Data (CCD) files at the time of sampling and may differ from classification variables used elsewhere in this report.

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total sample for the given characteristic. A *p*-value of 0.05 or less indicates that the 2 distributions are significantly different, which implies that the distribution of respondents is significantly different from that of the nonrespondents. Column 5 of the table shows an estimate of the relative bias of the percentage of a particular level of a characteristic if no adjustment is made to the base weights to compensate for nonresponse. (The tests associated with the *p*-values shown in the last column of this table are discussed in the next section.)

Overall, there are significant differences between the distributions of the respondents and nonrespondents by FNS region, type of LEA, SFA level, and minority status. These are essentially the same results presented earlier in Table D-1, but viewed in a different way. For example, by FNS region, the respondent sample has a greater percentage of SFAs in the Southwest and Mountain Plains regions (17-18 percent) than the total sample (15-16 percent) and a smaller percentage of SFAs in the Northeast and Mid-Atlantic regions (9-11 percent) than the total sample (10-12 percent). This disparity is also reflected in the relatively large spread of the relative biases shown in column 5 of the table. Similarly, by type of LEA, the percentage of responding SFAs that are regular districts (82 percent) is higher than the percentage of the total sample that are regular districts (79 percent), reflecting the generally higher response rates for regular SFAs. By SFA level, the percentage of responding SFAs that serve both elementary and secondary schools (74 percent) is higher than the corresponding percentage for the total sample (72 percent), reflecting the generally lower response rates among the nonregular SFAs. By minority status, a greater percentage of responding SFAs have 20-49.9 percent minority populations (21 percent) than the total sample (19 percent). It is noteworthy that both the magnitude and variation of the relative biases shown in column 5 tend to be large for those characteristics that are significantly correlated with response status.

#### **Derivation of Nonresponse-Adjusted Weights**

As noted in the previous section, the base-weighted distribution of the responding SFAs differed significantly from the total sample for a number of characteristics. In general, weighting adjustments are used to compensate for any distributional differences resulting from differential response rates. To be effective in reducing potential nonresponse biases, the nonresponse adjustment should be made within subsets of SFAs (or "weighting classes") that have similar propensities for responding to the survey. We used a CHAID analysis (Chi-square Automatic Interaction Detector) to identify subsets of SFAs in which the predicted probabilities of response were similar. In addition to the variables used in sample stratification (i.e., SFA size, SFA poverty status, and FNS region), we also specified SFA characteristics available in the FNS-742 sampling frame and selected district-level variables from the Common Core of Data (CCD) LEA universe file as potential predictor variables in the CHAID analysis. The output from the CHAID analysis was a tree diagram that defined the final cells used in the nonresponse adjustment.

Twelve nonresponse adjustment cells were determined by the CHAID analysis. The variables used to create the weight adjustment cells included all (or variants) of the variables listed in Attachment C.2 of Appendix C). Across the 12 adjustment cells, the weighted response rates ranged from around 62 percent to over 99 percent. The nonresponse-adjusted weight,  $W_{ki}^{NR}$ , for the *i*th responding SFA in weighting class *k* was computed as:

$$w_{ki}^{NR} = (1/R_k) w_{ki}^{base}$$

where  $w_{ki}^{base}$  is the base weight for the *i*th responding SFA in weighting class *k*, and  $R_k$  is the base-weighted response rate for SFAs in weighting class *k*. The  $w_{ki}^{NR}$ 's defined above are the final weights used to construct the survey-based estimates presented in this report. For more information about the procedures used to construct the final weights, see Appendix C.

### **Comparisons Before and After Nonresponse Adjustment for Selected Distributions**

The last three columns of Table D-2 summarize results related to distributions of the respondent sample using the nonresponse-adjusted weights described above. Column 7 shows the (nonresponse-adjusted) weighted distributions. Column 8 shows the corresponding relative bias. Column 9 shows the *p*-value for a test comparing the nonresponse-adjusted weighted distribution in column 7 with the corresponding base-weighted distribution in column 2. Although significant differences were observed for some characteristics prior to nonresponse adjustment (see column 6), after nonresponse adjustment the differences for all of these characteristics have essentially disappeared, as can be seen by the small relative biases in column 8 and the nonsignificant *p*-values in column 9.

### **Comparisons Before and After Nonresponse Adjustments for Estimates of CCD Data Items**

Another way of gauging the effectiveness of the weighting procedures is to compare weighted estimates of characteristics available from the sampling frame for both responding and nonresponding SFAs before and after the nonresponse adjustments. Table D-3 summarizes such a comparison. The variables presented in these tables are a subset of the items available (or derived) from the FNS-742 sampling frame. The *p*-value given in column 6 of the table corresponds to a test comparing the base-weighted estimate for respondents with the corresponding base-weighted estimate for the total sample (which is an unbiased estimate of the true population value). The *p*-value shown in the column 9 of the tables corresponds to a test comparing the nonresponse-adjusted estimate for respondents with the corresponding base-weighted estimate for the total sample. In Table D-3, the five items listed under "numeric variables" are estimated means of selected counts reported in the FNS-742 form. The two items under "attribute variables" are estimated percentages derived from data reported in the FNS-742 form.

For all of the numeric variables presented in Table D-3, the base-weighted mean of the respondents is significantly different from the base-weighted mean of the total sample (*p*-value = 0.007 or less in column 6 of the table). The corresponding relative biases are positive (indicating that responding SFAs tend to report higher FNS-742 counts than nonresponding SFAs) and range from 5.3 percent to 8.4 percent. However, after nonresponse adjustment, it can be seen in column 8 of the table that the relative biases have been reduced considerably, ranging from 0.1 percent to 3.2 percent. Although some of the differences remain significant at the 0.05 level, none are significant at the 0.01 level (*p*-value = 0.016 or greater in column 9). This suggests that the nonresponse adjustments used to create the final SN-OPS weights can be effective in reducing the bias of survey estimates that are correlated with the count variables listed in Table D-3.

A similar comparison was made for the two attribute variables shown in Table D-3. In both cases, there were no significant differences between the respondents and the total sample before nonresponse adjustment (column 6) and after nonresponse adjustment (column 9).

FNS-742 data item	Total	Respondents	Non- respondents	Relative bias <sup>1</sup>	T-test <sup>2</sup>	Estimates of FNS- 742 data items for respondents	Relative bias <sup>3</sup>	T-best <sup>4</sup>
1	2	3	4	5	6	7	8	9
Numeric variables	(	Mean)	(Percent)	(p-value)	(Mean)	(Percent)	( <i>p</i> -v	alue)
SFA enrollment	3326.74	3569.27	2494.18	7.3	0.000	3424.83	2.9	0.016
Students eligible for free								
or reduced-price lunch	1301.92	1407.73	938.72	8.1	0.000	1342.07	3.1	0.022
Students free eligible not								
verified	546.09	585.33	411.41	7.2	0.000	563.66	3.2	0.042
Number of applications								
free eligible	90.38	95.16	73.97	5.3	0.007	90.49	0.1	0.092
Number of applications								
free eligible income	327.06	354.43	233.12	8.4	0.000	333.95	2.1	0.924
Attribute variables	(F	Percent)	<i>(p</i> -val	ue)		(Percent)	( <i>p</i> -v	alue)
SFAs with provision								
schools	4.2	4.3	3.9	2.4	0.784	4.1	-2.9	0.753
SFAs with applications exceeding 75 <sup>th</sup>								
percentile	25.0	24.9	25.0	-0.2	0.887	24.2	-3.2	0.848

## Table D-3.Comparison of Weighted Estimates of FNS-742 Frame Statistics for SampledSFAs, by Response Status and Selected SFA Characteristics

<sup>1</sup> Relative bias defined to be 100\*(B-A)/A, where A = base-weighted estimate for total sample and B = base-weighted estimate for respondent sample.

<sup>2</sup> Test comparing base-weighted estimate of total sample with base-weighted estimate of respondent sample.

<sup>3</sup> Relative bias defined to be 100\*(C-A)/A, where A = base-weighted estimate for total sample and C = nonresponse-adjusted estimate for respondent sample.

<sup>4</sup>Test comparing nonresponse-adjusted estimate of respondent sample with base-weighted estimate of total sample.

## **Comparisons Before and After Nonresponse Adjustments for Selected Survey Results**

The final set of comparisons conducted in the nonresponse bias analysis involved a comparison of weighted estimates of selected survey characteristics using the base weights and nonresponse-adjusted weights. The results are summarized in Table D-4. The *p*-value given in this table corresponds to a test of the hypothesis that there is no difference between the two weighted estimates. The difference between the base-weighted and nonresponse-adjusted estimates was statistically significant for 10 out of the 24 meal price variables considered in the analysis. This suggests that the use of the nonresponse-adjusted weights will have a non-negligible effect on meal price estimates derived from the survey, potentially reducing the bias of such estimates.

## Table D-4.Comparison of Weighted Estimates of Select Survey Statistics Before and After<br/>Nonresponse Adjustment, by Response Status

Survey variable	Base-weighted estimates	Nonresponse- adjusted estimates	Relative bias <sup>1</sup>	T-test <sup>2</sup>		
Meal Prices	(Pe	rcent)	(p-value)			
Full-price breakfast price, elementary	\$1.18	\$1.19	0.3	0.1056		
Full-price breakfast price, middle	\$1.27	\$1.27	-0.8	0.3558		
Full-price breakfast price, high	\$1.27	\$1.27	-0.5	0.0026		
Full-price breakfast price, other	\$1.21	\$1.23	1.4	0.3022		
Reduced-price breakfast price, elementary	\$0.30	\$0.30	0.1	0.8528		
Reduced-price breakfast price, middle	\$0.31	\$0.30	-1.4	0.6650		
Reduced-price breakfast price, high	\$0.31	\$0.30	-0.5	0.8657		
Reduced-price breakfast price, other	\$0.31	\$0.31	-0.5	0.3956		
Adult breakfast price, elementary	\$1.76	\$1.71	-2.7	0.0076		
Adult breakfast price, middle	\$1.79	\$1.74	-2.6	0.0734		
Adult breakfast price, high	\$1.79	\$1.74	-2.8	0.0091		
Adult breakfast price, other	\$1.80	\$1.78	-1.3	0.4392		
Full-price lunch price, elementary	\$2.01	\$2.00	-0.8	0.0055		
Full-price lunch price, middle	\$2.22	\$2.21	-0.6	0.0189		
Full-price lunch price, high	\$2.25	\$2.21	-1.7	0.0013		
Full-price lunch price, other	\$2.13	\$2.15	1.0	0.0266		
Reduced-price lunch price, elementary	\$0.40	\$0.40	0.1	0.1151		
Reduced-price lunch price, middle	\$0.40	\$0.40	0.2	0.1437		
Reduced-price lunch price, high	\$0.40	\$0.40	-0.2	0.0511		
Reduced-price lunch price, other	\$0.41	\$0.40	-2.1	0.6669		
Adult lunch price, elementary	\$3.07	\$3.05	-0.7	0.0002		
Adult lunch price, middle	\$3.11	\$3.09	-0.7	0.0005		
Adult lunch price, high	\$3.11	\$3.06	-1.4	0.0012		
Adult lunch price, other	\$3.11	\$3.06	-1.7			

<sup>1</sup> Relative bias defined to be  $100^{*}(B-A)/A$ , where A = base-weighted estimate for respondents and B = nonresponse adjusted estimate for respondents.

<sup>2</sup> Test of difference between base-weighted and nonresponse-adjusted estimates

### **Summary and Conclusions**

The overall response rate for the SN-OPS survey of SFAs was 79 percent unweighted and 77 percent weighted. Response rates varied significantly by FNS region, type of LEA, SFA level, and minority status of SFA. To compensate for the differential survey response rates, weight adjustments were developed and applied to the base weights using a CHAID analysis to identify appropriate weight adjustment classes. In general, such weight adjustments will reduce nonresponse bias if the variables used in forming the weight adjustment classes are correlated with response propensity (the probability that a sampled SFA will respond to the survey) and with the characteristics obtained from the survey.

There are reasons to believe that the nonresponse-adjusted weights developed for the survey of SFAs will be reasonably effective in reducing potential biases. First, the weight adjustments removed most of the disparities between the weighted distributions of the respondents and the distributions of the total sample. Second, a comparison of weighted estimates of selected characteristics available in the FNS-742 files showed that the weight-adjustment procedures reduced the difference between the nonresponse-adjusted estimate for the respondent sample and the corresponding base-weighted estimate for the total sample. Further evidence of the potential bias

reductions is given by a comparison of weighted estimates of selected survey items before and after nonresponse adjustment, where it was found that for 10 out of 24 meal price variables, there was a statistically significant difference between the base-weighted and nonresponse-adjusted estimates.

Although it is possible to conduct more in-depth analysis and possibly refine the weighting procedures, the results of this analysis suggest that any potential improvements will be modest.

Appendix E

**Supplementary Tables** 

## Table E-1.Educational Requirements and Years of Experience for State CN Directors,<br/>SY 2011-12

	Percentage of states
Minimum education requirement for the State CN Director $(n = 49)^{1}$	
High school	6.1%
Some college, no degree	0.0
Associate's degree	0.0
Bachelor's degree	51.0
Graduate degree	40.8
There is no requirement	2.0
Highest grade or year of schooling State CN Director completed $(n = 53)^2$	
High school diploma	0.0
Some college, no degree	1.9
Associate's degree	0.0
Bachelor's degree	30.2
Graduate degree	67.9
State CN Director's major in college $(n = 53)^3$	
Business	18.9
Education	30.2
Food service administration/management	18.9
Home economics/family and consumer services	24.5
Nutrition/dietetics	47.2
Other	34.0
Years of experience in food service prior to position as the CN Director ( <i>n</i> = 43) <sup>4</sup>	
1-2 years	7.0
3-5 years	2.3
6-10 years	27.9
11 or more years	62.8
Tenure as State CN Director ( <i>n</i> = 54)	
Less than 1 year	14.8
1-2 years	13.0
3-5 years	29.6
6-10 years	24.1
11 or more years	18.5

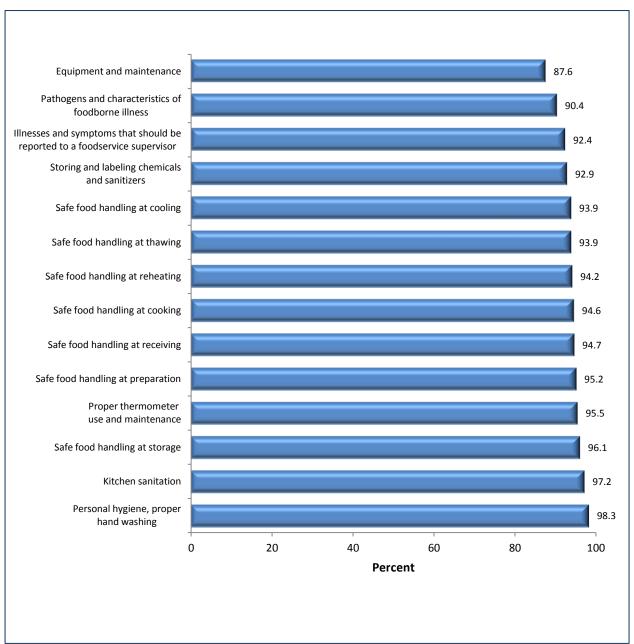
<sup>1</sup> Five states did not answer the question about the minimum education requirement.

<sup>2</sup>One state did not answer the question about the highest grade completed.

<sup>3</sup>One state did not answer the question about major in college.

<sup>4</sup> Eleven SFAs did not answer the question about years of experience in food service.

Data Source: State CN Diretctor Survey, question F3.



#### Figure E-1. Safety Topics on Which Food Service Employees Have Been Trained

Percentages based on a weighted response of 14,383 (unweighted 1,383). Source: SFA Director Survey 2011, question 12.16.

#### Percent of SFAs where all schools had two or more safety inspections, by SFA Table E-2. Characteristics for SY 2008-09, SY 2009-10, and SY 2010-11

	Percentage of SI	As where all schools safety inspections	Total SFAs			
SFA characteristics	SY 2010-11	SY 2009-10	SY 2008-09	Weighted n	Unweighted <i>n</i>	
All SFAs	84.2%	84.9%	83.7%	14,418	1,386 <sup>1</sup>	
SFA size						
Small (1-999)	84.9	85.9	86.2	7,179	324	
Medium (1,000-4,999)	84.7	85.7	83.5	5,337	531	
Large (5,000-24,999)	80.7	79.8	76.0	1,618	362	
Very large (25,000+)	75.3	72.2	68.0	284	169	
Urbanicity						
City	74.5	69.7	68.3	1,539	252	
Suburban	84.7	86.0	81.7	2,860	378	
Town	83.6	83.8	81.4	2,769	263	
Rural	86.2	88.1	88.6	7,250	493	
Poverty level						
Low (0-29% F/RP)	85.5	84.6	84.9	3,341	344	
Medium (30-59% F/RP)	83.2	85.3	83.7	6,757	645	
High (60% or higher F/RP)	84.6	84.5	82.9	4,319	397	

<sup>1</sup>*n* is less than 1,401 due to item non-response. Data Source: SFA Director Survey 2011, question 12.7.

	SY 2009-10				S	6Y 2010-1	1		SY 2011-12						
				Total	SFAs				Tota	l SFAs				Tota	SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$1.90	\$0.75	\$3.50	11,763	1,228 <sup>1</sup>	\$1.90	\$0.75	\$3.50	11,794	1,229 <sup>1</sup>	\$2.00	\$0.75	\$4.50	11,763	1,229 <sup>1</sup>
SFA size															
Small (1-999)	1.75	0.80	3.50	5,050	235	1.85	0.80	3.50	5,073	236	1.95	0.75	3.50	5,045	235
Medium (1,000-4,999)	1.95	0.75	3.50	4,900	489	2.00	0.75	3.50	4,907	490	2.00	0.75	3.50	4,901	489
Large (5,000-24,999)	1.95	0.75	3.05	1,542	343	2.00	0.80	3.25	1,544	343	2.00	0.80	4.50	1,545	343
Very large (25,000+)	1.90	0.85	3.25	271	161	1.95	0.85	3.50	269	160	2.00	0.85	3.50	272	162
Urbanicity															
City	2.20	0.75	3.27	1,149	221	2.15	0.80	3.27	1,154	222	2.25	0.80	3.27	1,145	221
Suburban	2.00	1.00	3.50	2,299	337	2.05	1.00	3.50	2,325	337	2.25	1.00	4.50	231	339
Town	1.90	0.75	3.05	2,269	236	1.95	0.80	3.05	2,283	237	2.00	0.80	3.00	2,296	238
Rural	1.75	0.75	3.25	6,046	434	1.75	0.75	3.50	6,031	433	1.85	0.75	3.50	6,009	431
Poverty level															
Low (0-29% F/RP)	2.05	1.20	3.50	2,765	304	2.10	1.20	3.50	2,795	305	2.20	1.20	3.50	2,809	307
Medium (30-59% F/RP)	1.90	0.90	3.50	6,026	603	1.90	0.90	3.50	6,023	602	2.00	0.75	3.50	6,020	604
High (60% or higher	1.75	0.75	3.25	2,971	321	1.75	0.75	3.50	2,976	322	1.75	0.75	4.50	2,935	318
F/RP)															

## Table E-3.Median, Minimum, and Maximum NSLP Meal Prices for Full-Price Lunches in Elementary Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have elementary schools and item non-response. Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

	Percent of SFAs							
Lunch price	SY 2009-10	SY 2010-11	SY 2011-12					
≤\$1.00	3.1	2.9	1.8					
\$1.01 - \$1.10	0.5	0.6	1.0					
\$1.11 - \$1.20	0.9	0.9	0.5					
\$1.21 - \$1.30	5.1	4.6	3.7					
\$1.31 - \$1.40	2.7	2.4	1.7					
\$1.41 - \$1.50	9.7	9.7	6.6					
\$1.51 - \$1.60	3.9	3.4	4.2					
\$1.61 - \$1.70	4.0	3.9	2.5					
\$1.71 - \$1.80	17.2	16.0	13.4					
\$1.81 - \$1.90	5.2	5.8	7.5					
\$1.91 - \$2.00	19.2	18.2	13.3					
\$2.01 - \$2.10	4.2	4.6	9.7					
\$2.11 - \$2.20	2.1	2.5	4.8					
\$2.21 - \$2.30	8.2	9.4	9.5					
\$2.31 - \$2.40	1.6	2.1	3.4					
\$2.41 - \$2.50	7.2	6.8	9.0					
\$2.51 - \$2.60	0.1	0.5	0.7					
\$2.61 - \$2.70	0.2	0.0	0.3					
\$2.71 - \$2.80	1.9	1.9	2.2					
\$2.81 - \$2.90	0.1	0.2	0.2					
\$2.91 - \$3.00	2.3	2.6	2.5					
> \$3.00	0.6	1.0	1.8					
Total SFAs: Weighted n	11,763	11,794	11,763					
Total SFAs: Unweighted n <sup>1</sup>	1,228	1,229	1,229					

## Table E-4.Distribution of NSLP Meal Prices for Full-Price Lunches in Elementary Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

<sup>1</sup> n is less than 1,401 because not all SFAs have elementary schools and item non-response.

Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

	SY 2009-10					9	SY 2010-11				SY 2011-12				
				Tota	l SFAs				Tota	SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$2.05	\$0.80	\$3.75	8,895	1,059 <sup>1</sup>	\$2.10	\$0.80	\$3.75	8,908	1,061 <sup>1</sup>	\$2.25	\$0.80	\$4.50	8,888	1,061 <sup>1</sup>
SFA size															
Small (1-999)	2.00	1.00	3.50	2,874	135	2.00	1.00	3.75	2,874	135	2.10	1.00	4.22	2,847	134
Medium (1,000-4,999)	2.10	0.80	3.75	4,258	433	2.15	0.80	3.75	4,265	434	2.25	0.80	3.75	4,269	434
Large (5,000-24,999)	2.10	1.00	3.75	1,502	335	2.15	1.00	3.75	1,507	336	2.25	1.00	4.50	1,509	336
Very large (25,000+)	2.10	0.85	3.75	262	156	2.15	0.85	3.75	262	156	2.25	0.85	3.75	263	157
Urbanicity															
City	2.25	0.85	3.75	829	202	2.25	0.85	3.75	835	203	2.25	0.85	3.75	798	201
Suburban	2.25	1.00	3.75	2,003	314	2.30	1.00	3.75	2,011	315	2.40	1.00	4.50	2,017	317
Town	2.00	0.80	3.50	2,047	220	2.05	0.80	3.50	2,061	221	2.25	0.80	3.50	2,073	222
Rural	2.00	0.85	3.25	4,017	323	2.00	0.95	3.50	4,002	322	2.10	1.00	4.22	4,000	321
Poverty level															
Low (0-29% F/RP)	2.25	1.40	3.75	2,165	274	2.30	1.40	3.75	2,174	275	2.40	1.40	4.22	2,213	277
Medium (30-59% F/RP)	2.05	1.00	3.50	4,691	522	2.10	1.00	3.75	4,691	522	2.25	1.00	3.75	4,670	523
High (60% or higher F/RP)	1.85	0.80	3.25	2,039	263	1.85	0.80	3.50	2,043	264	2.00	0.80	4.50	2,004	261
r/ nr )															

## Table E-5.Median, Minimum, and Maximum NSLP Meal Prices for Full-Price Lunches in Middle Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

 $^{1}n$  is less than 1,401 because not all SFAs have middle schools and item non-response.

Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

	Percent of SFAs								
Lunch price	SY 2009-10	SY 2010-11	SY 2011-12						
≤\$1.00	1.2	1.1	0.7						
\$1.01 - \$1.10	0.2	0.2	0.3						
\$1.11 - \$1.20	0.1	0.2	0.3						
\$1.21 - \$1.30	2.5	2.5	1.6						
\$1.31 - \$1.40	1.1	1.1	0.8						
\$1.41 - \$1.50	4.9	4.4	3.4						
\$1.51 - \$1.60	1.7	1.3	2.2						
\$1.61 - \$1.70	1.6	2.0	1.1						
\$1.71 - \$1.80	12.3	10.6	8.0						
\$1.81 - \$1.90	5.7	5.8	4.9						
\$1.91 - \$2.00	18.2	18.0	12.8						
\$2.01 - \$2.10	5.8	4.7	8.1						
\$2.11 - \$2.20	4.0	5.1	3.8						
\$2.21 - \$2.30	14.4	14.8	15.7						
\$2.31 - \$2.40	3.5	3.1	6.7						
\$2.41 - \$2.50	10.3	11.7	11.6						
\$2.51 - \$2.60	1.1	1.3	3.1						
\$2.61 - \$2.70	0.9	0.5	1.0						
\$2.71 - \$2.80	5.1	5.2	6.3						
\$2.81 - \$2.90	0.4	0.3	1.1						
\$2.91 - \$3.00	3.2	4.1	3.8						
> \$3.00	1.9	2.1	2.7						
Total SFAs: Weighted n	8,895	8,908	8,888						
Total SFAs: Unweighted n <sup>1</sup>	1,059	1,061	1,061						

## Table E-6.Distribution of NSLP Meal Prices for Full-Price Lunches in Middle Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

<sup>1</sup>*n* is less than 1,401 because not all SFAs have middle schools and item non-response.

Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

		:	SY 2009-	10			S	Y 2010-11	L				SY 2011-1	2	
				Tota	l SFAs				Tota	l SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Мах	n	n
All SFAs	\$2.05	\$0.80	\$4.00	10,344	1,149 <sup>1</sup>	\$2.10	\$0.80	\$4.00	10,349	1,150 <sup>1</sup>	\$2.25	\$0.80	\$4.50	10,314	1,150 <sup>1</sup>
SFA size															
Small (1-999)	2.00	0.85	3.25	3,919	183	2.00	0.85	3.50	3,919	183	2.10	1.00	4.00	3,869	181
Medium (1,000-4,999)	2.20	0.80	4.00	4,618	461	2.25	0.80	4.00	4,617	461	2.25	0.80	4.00	4,630	462
Large (5,000-24,999)	2.20	1.00	4.00	1,529	340	2.25	1.00	4.00	1,535	341	2.25	1.00	4.50	1,536	341
Very large (25,000+)	2.20	1.00	3.75	278	165	2.25	1.00	3.75	278	165	2.25	1.00	3.75	279	166
Urbanicity															
City	2.25	1.00	3.75	844	208	2.25	1.00	3.75	850	209	2.35	1.00	3.75	818	207
Suburban	2.35	1.25	3.75	2,098	321	2.45	1.25	4.00	2,098	321	2.50	1.25	4.50	2,104	323
Town	2.15	0.80	4.00	2,196	229	2.20	0.80	4.00	2,210	230	2.25	0.80	4.00	2,222	231
Rural	2.00	0.85	3.50	5,206	391	2.00	0.85	3.50	5,192	390	2.10	1.00	3.50	5,170	389
Poverty level															
Low (0-29% F/RP)	2.25	1.30	4.00	2,515	298	2.30	1.30	4.00	2,515	298	2.40	1.40	4.00	2,527	299
Medium (30-59%	2.05	0.85	4.00	5,360	561	2.10	0.85	4.00	5,360	561	2.25	1.00	4.00	5,338	562
F/RP)															
High (60% or higher	2.00	0.80	3.50	2,470	290	2.00	0.80	3.50	2,474	291	2.00	0.80	4.50	2,449	289
F/RP)															
									L						

# Table E-7.Median, Minimum, and Maximum NSLP Meal Prices for Full-Price Lunches in HighSchools, SY 2009-10, SY 2010-11,and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have high schools and item non-response. Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

		Percent of SFAs	
Lunch price	SY 2009-10	SY 2010-11	SY 2011-12
≤\$1.00	1.4	1.3	0.6
\$1.01 - \$1.10	0.3	0.3	0.3
\$1.11 - \$1.20	0.1	0.2	0.4
\$1.21 - \$1.30	2.9	2.7	1.8
\$1.31 - \$1.40	1.3	1.4	1.2
\$1.41 - \$1.50	5.3	4.4	3.6
\$1.51 - \$1.60	1.5	1.3	2.1
\$1.61 - \$1.70	1.9	2.2	1.3
\$1.71 - \$1.80	11.5	10.7	9.1
\$1.81 - \$1.90	5.7	5.5	3.7
\$1.91 - \$2.00	17.2	17.0	11.5
\$2.01 - \$2.10	5.1	4.9	8.6
\$2.11 - \$2.20	4.0	4.3	4.4
\$2.21 - \$2.30	13.8	14.6	14.5
\$2.31 - \$2.40	3.3	3.1	6.4
\$2.41 - \$2.50	10.4	11.4	11.7
\$2.51 - \$2.60	1.2	1.1	3.0
\$2.61 - \$2.70	0.9	0.8	1.1
\$2.71 - \$2.80	5.8	6.0	6.5
\$2.81 - \$2.90	0.5	0.7	1.4
\$2.91 - \$3.00	3.5	3.6	3.9
> \$3.00	2.2	2.7	3.0
Total SFAs: Weighted n	10,344	10,349	10,314
al SFAs: Unweighted n <sup>1</sup>	1,149	1,150	1,150

# Table E-8.Distribution of NSLP Meal Prices for Full-Price Lunches in High Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

<sup>1</sup>*n* is less than 1,401 because not all SFAs have high schools and item non-response.

			SY 2009-	10			9	<b>SY 2010-1</b>	1			9	6Y 2011-1	2	
				Tota	al SFAs				Tota	l SFAs				Total	SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Мах	n	n
All SFAs	\$0.40	\$0.25	\$0.40	11,258	1,172 <sup>1</sup>	\$0.40	\$0.25	\$0.40	11,302	1,174 <sup>1</sup>	\$0.40	\$0.25	\$0.40	11,288	1,170 <sup>1</sup>
SFA size															
Small (1-999)	0.40	0.25	0.40	4,759	222	0.40	0.25	0.40	4,800	224	0.40	0.25	0.40	4,803	224
Medium (1,000-4,999)	0.40	0.25	0.40	4,778	476	0.40	0.25	0.40	4,785	477	0.40	0.25	0.40	4,775	475
Large (5,000-24,999)	0.40	0.25	0.40	1,480	330	0.40	0.25	0.40	1,476	329	0.40	0.25	0.40	1,469	327
Very large (25,000+)	0.40	0.25	0.40	241	144	0.40	0.25	0.40	241	144	0.40	0.25	0.40	241	144
Urbanicity															
City	0.40	0.25	0.40	1,065	204	0.40	0.25	0.40	1,081	205	0.40	0.25	0.40	1,067	202
Suburban	0.40	0.25	0.40	2,180	318	0.40	0.25	0.40	2,209	319	0.40	0.25	0.40	2,190	318
Town	0.40	0.25	0.40	2,188	229	0.40	0.25	0.40	2,202	230	0.40	0.25	0.40	2,217	231
Rural	0.40	0.25	0.40	5,825	421	0.40	0.25	0.40	5,810	420	0.40	0.25	0.40	5,814	419
Poverty level															
Low (0-29% F/RP)	0.40	0.25	0.40	2,671	295	0.40	0.25	0.40	2,700	296	0.40	0.25	0.40	2,713	297
Medium (30-59%	0.40	0.25	0.40	5,904	585	0.40	0.25	0.40	5,897	584	0.40	0.25	0.40	5,901	586
F/RP)															
High (60% or higher	0.40	0.25	0.40	2,682	292	0.40	0.25	0.40	2,705	294	0.40	0.25	0.40	2,674	287
F/RP)															
	1			1		1			1		1			1	

# Table E-9.Median, Minimum, and Maximum NSLP Meal Prices for Reduced-Price Lunches in Elementary Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have elementary schools and item non-response.

Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

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	SY 2009-10					SY 2010-11					SY 2011-12				
				Tota	I SFAs				Tota	SFAs				Tota	SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Мах	n	n
All SFAs	\$0.40	\$0.25	\$0.40	8,537	1,010 <sup>1</sup>	\$0.40	\$0.25	\$0.40	8,557	1,010 <sup>1</sup>	\$0.40	\$0.25	\$0.40	8,523	1,006 <sup>1</sup>
SFA size															
Small (1-999)	0.40	0.25	0.40	2,713	127	0.40	0.25	0.40	2,732	128	0.40	0.25	0.40	2,705	127
Medium (1,000-4,999)	0.40	0.25	0.40	4,148	421	0.40	0.25	0.40	4,155	422	0.40	0.25	0.40	4,155	421
Large (5,000-24,999)	0.40	0.25	0.40	1,442	322	0.40	0.25	0.40	1,438	321	0.40	0.25	0.40	1,431	319
Very large (25,000+)	0.40	0.25	0.40	234	140	0.40	0.25	0.40	232	139	0.40	0.25	0.40	232	139
Urbanicity															
City	0.40	0.25	0.40	770	186	0.40	0.25	0.40	785	186	0.40	0.25	0.40	716	181
Suburban	0.40	0.25	0.40	1,901	297	0.40	0.25	0.40	1,908	297	0.40	0.25	0.40	1,908	297
Town	0.40	0.25	0.40	1,966	213	0.40	0.25	0.40	1,979	214	0.40	0.25	0.40	1,995	215
Rural	0.40	0.25	0.40	3,899	314	0.40	0.25	0.40	3,885	313	0.40	0.25	0.40	3,904	313
Poverty level															
Low (0-29% F/RP)	0.40	0.25	0.40	2,082	264	0.40	0.25	0.40	2,089	264	0.40	0.25	0.40	2,128	266
Medium (30-59%	0.40	0.25	0.40	4,609	507	0.40	0.25	0.40	4,603	506	0.40	0.25	0.40	4,585	507
F/RP)															
High (60% or higher	0.40	0.25	0.40	1,845	239	0.40	0.25	0.40	1,865	240	0.40	0.25	0.40	1,810	233
F/RP)															

# Table E-10.Median, Minimum, and Maximum NSLP Meal Prices for Reduced-Price Lunches in Middle Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have middle schools and item non-response.

Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

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		S	Y 2009-1	.0			S	Y 2010-11				9	SY 2011-1	2	
				Tota	l SFAs				Tota	l SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Мах	n	n	Median	Min	Max	n	n
All SFAs	\$0.40	\$0.25	\$0.40	9,967	1,095 <sup>1</sup>	\$0.40	\$0.25	\$0.40	9,959	1,095 <sup>1</sup>	\$0.40	\$0.25	\$0.40	9,909	1,093 <sup>1</sup>
SFA size															
Small (1-999)	0.40	0.25	0.40	3,775	176	0.40	0.25	0.40	3,775	176	0.40	0.25	0.40	3,709	173
Medium (1,000-4,999)	0.40	0.25	0.40	4,479	446	0.40	0.25	0.40	4,472	446	0.40	0.25	0.40	4,487	447
Large (5,000-24,999)	0.40	0.25	0.40	1,467	326	0.40	0.25	0.40	1,466	326	0.40	0.25	0.40	1,467	326
Very large (25,000+)	0.40	0.25	0.40	246	147	0.40	0.25	0.40	246	147	0.40	0.25	0.40	246	147
Urbanicity															
City	0.40	0.25	0.40	809	194	0.40	0.25	0.40	808	194	0.40	0.25	0.40	777	192
Suburban	0.40	0.25	0.40	1,966	298	0.40	0.25	0.40	1,974	299	0.40	0.25	0.40	1,978	300
Town	0.40	0.25	0.40	2,114	222	0.40	0.25	0.40	2,128	223	0.40	0.25	0.40	2,145	224
Rural	0.40	0.25	0.40	5,078	381	0.40	0.25	0.40	5,049	379	0.40	0.25	0.40	5,010	377
Poverty level															
Low (0-29% F/RP)	0.40	0.25	0.40	2,395	283	0.40	0.25	0.40	2,389	283	0.40	0.25	0.40	2,405	285
Medium (30-59%	0.40	0.25	0.40	5,276	545	0.40	0.25	0.40	5,269	544	0.40	0.25	0.40	5,232	544
F/RP)															
High (60% or higher	0.40	0.25	0.40	2,296	267	0.40	0.25	0.40	2,301	268	0.40	0.25	0.40	2,271	264
F/RP)															

#### Table E-11. Median, Minimum, and Maximum NSLP Meal Prices for <u>Reduced-Price Lunches</u> in <u>High</u> Schools, SY 2009-10, SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have high schools and item non-response. Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

		S	Y 2009-1	0				SY 2010-	11		SY 2011-12				
				Tota	SFAs				Tota	SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Мах	n	n
All SFAs	\$3.00	\$1.00	\$6.35	11,908	1,221 <sup>1</sup>	\$3.00	\$1.00	\$6.35	11,976	1,227 <sup>1</sup>	\$3.00	\$1.00	\$6.35	12,004	1,228 <sup>1</sup>
SFA size															
Small (1-999)	2.85	1.00	6.30	5,255	245	3.00	1.00	6.30	5,278	246	3.00	1.00	6.30	5,300	247
Medium (1,000-4,999)	3.00	1.10	6.35	4,890	488	3.00	1.35	6.35	492	491	3.00	1.40	6.35	4,938	492
Large (5,000-24,999)	3.00	1.25	5.00	1,508	337	3.00	1.50	5.00	1,517	339	3.00	1.50	5.00	1,510	337
Very large (25,000+)	3.00	1.60	5.00	255	151	3.00	1.60	5.00	255	151	3.00	1.60	5.00	256	152
Urbanicity															
City	3.00	1.25	5.00	1,061	215	3.00	1.60	5.00	1,067	216	3.00	1.50	5.00	1,063	215
Suburban	3.00	1.35	5.00	2,272	328	3.00	1.35	5.00	2,320	332	3.10	1.40	5.00	2,326	334
Town	3.00	1.60	4.50	2,323	240	3.00	1.60	4.75	2,337	241	3.00	1.60	4.75	2,349	242
Rural	2.85	1.00	6.35	6,251	438	3.00	1.00	6.35	6,251	438	3.00	1.00	6.35	6,266	437
Poverty level															
Low (0-29% F/RP)	3.00	1.75	5.00	2,723	294	3.01	1.75	5.00	2,754	296	3.15	1.80	5.00	2,764	296
Medium (30-59%	3.00	1.35	6.30	5,926	585	3.00	1.35	6.30	5,943	587	3.00	1.35	6.30	5,939	587
F/RP)															
High (60% or higher F/RP)	2.80	1.00	6.35	3,259	342	3.00	1.00	6.35	3,279	344	3.00	1.00	6.35	3,300	345

# Table E-12.Median, Minimum, and Maximum NSLP Meal Prices for Adult Lunches in Elementary Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have elementary schools and item non-response.

Data Source: SFA Director Survey 2011, questions 5.4 and 5.5.

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		Percent of SFAs				
Lunch price	SY 2009-10	SY 2010-11	SY 2011-12			
≤ \$2.00	6.8	5.8	4.5			
\$2.01 - \$2.10	0.6	0.2	0.5			
\$2.11 - \$2.20	0.7	0.9	0.7			
\$2.21 - \$2.30	5.1	4.8	3.6			
\$2.31 - \$2.40	1.9	1.4	1.2			
\$2.41 - \$2.50	12.7	12.3	9.2			
\$2.51 - \$2.60	1.9	1.5	2.5			
\$2.61 - \$2.70	2.5	2.6	1.9			
\$2.71 - \$2.80	10.5	9.2	8.5			
\$2.81 - \$2.90	3.4	3.1	3.1			
\$2.91 - \$3.00	21.5	23.5	21.3			
\$3.01 - \$3.10	2.5	2.8	4.9			
\$3.11 - \$3.20	1.8	2.5	2.1			
\$3.21 - \$3.30	8.9	8.7	10.8			
\$3.31 - \$3.40	0.7	1.0	2.1			
\$3.41 - \$3.50	9.0	8.9	9.2			
\$3.51 - \$3.60	0.3	0.6	1.0			
\$3.61 - \$3.70	0.2	0.3	0.4			
\$3.71 - \$3.80	2.4	2.3	3.4			
\$3.81 - \$3.90	0.4	0.6	0.5			
\$3.91 - \$4.00	3.8	4.3	4.7			
> \$4.00	2.4	2.9	3.8			
Total SFAs: Weighted n	11,908	11,976	12,004			
otal SFAs: Unweighted n <sup>1</sup>	1,221	1,227	1,228			

# Table E-13.Distribution of NSLP Meal Prices for Adult Lunches in Elementary Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

<sup>1</sup> n is less than 1,401 because not all SFAs have elementary schools and item non-response.

		9	SY 2009-1	LO			S	Y 2010-1	1			9	SY 2011-12	12		
				Tota	l SFAs				Tota	I SFAs				Tota	l SFAs	
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt	
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Мах	n	n	
All SFAs	\$3.00	\$1.10	\$6.35	8,990	1,047 <sup>1</sup>	\$3.00	\$1.35	\$6.35	9,008	1,049 <sup>1</sup>	\$3.00	\$1.00	\$6.35	9,076	1,053 <sup>1</sup>	
SFA size																
Small (1-999)	2.95	1.35	5.00	2,985	140	3.00	1.35	5.00	2,985	140	3.00	1.00	5.00	3,035	142	
Medium (1,000-4,999)	3.00	1.10	6.35	4,300	436	3.00	1.40	6.35	4,312	437	3.00	1.40	6.35	4,334	439	
Large (5,000-24,999)	3.00	1.50	5.00	1,463	327	3.00	1.50	5.00	1,469	328	3.10	1.50	5.00	1,464	327	
Very large (25,000+)	3.00	1.75	5.00	242	144	3.00	1.75	5.00	242	144	3.00	1.75	5.00	243	145	
Urbanicity																
City	3.00	1.75	5.00	789	195	3.00	1.75	5.00	792	195	3.10	1.50	5.00	790	195	
Suburban	3.06	1.40	5.00	1,971	304	3.06	1.40	5.00	1,982	306	3.25	1.40	5.00	1,988	308	
Town	3.00	1.60	4.50	2,085	224	3.00	1.60	4.75	2,099	225	3.00	1.60	4.75	2,111	226	
Rural	3.00	1.10	6.35	4,145	324	3.00	1.35	6.35	4,135	323	3.00	1.00	6.35	4,187	324	
Poverty level																
Low (0-29% F/RP)	3.06	1.75	5.00	2,144	264	3.10	1.75	5.00	2,152	265	3.25	1.80	5.00	2,190	266	
Medium (30-59%	3.00	1.35	4.75	4,597	504	3.00	1.35	5.00	4,600	505	3.00	1.35	5.00	4,596	505	
F/RP)																
High (60% or higher	3.00	1.10	6.35	2,249	279	3.00	1.40	6.35	2,255	279	3.00	1.00	6.35	2,290	282	
F/RP)																

### Table E-14.Median, Minimum, and Maximum NSLP Meal Prices for Adult Lunches in Middle Schools, SY 2009-10, SY 2010-11,<br/>and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have middle schools and item non-response.

		Percent of SFAs	
Lunch price	SY 2009-10	SY 2010-11	SY 2011-12
≤ \$2.00	4.7	3.8	3.2
\$2.01 - \$2.10	0.8	0.3	0.4
\$2.11 - \$2.20	0.7	1.0	0.9
\$2.21 - \$2.30	5.4	5.3	3.7
\$2.31 - \$2.40	1.3	1.0	1.0
\$2.41 - \$2.50	11.1	10.5	6.1
\$2.51 - \$2.60	1.7	1.3	2.4
\$2.61 - \$2.70	2.2	2.4	1.7
\$2.71 - \$2.80	10.5	9.0	8.8
\$2.81 - \$2.90	3.7	3.7	3.7
\$2.91 - \$3.00	23.7	25.3	21.9
\$3.01 - \$3.10	2.4	3.0	5.3
\$3.11 - \$3.20	2.1	2.5	3.0
\$3.21 - \$3.30	9.8	9.3	10.6
\$3.31 - \$3.40	0.6	0.9	2.0
\$3.41 - \$3.50	9.1	9.1	10.4
\$3.51 - \$3.60	0.3	0.6	1.0
\$3.61 - \$3.70	0.4	0.4	0.7
\$3.71 - \$3.80	2.3	2.4	3.1
\$3.81 - \$3.90	0.5	0.5	0.4
\$3.91 - \$4.00	4.3	4.8	5.1
> \$4.00	2.5	3.1	4.6
Total SFAs: Weighted n	8,990	9,008	9,076
tal SFAs: Unweighted n <sup>1</sup>	1,047	1,049	1,053

# Table E-15.Distribution of NSLP Meal Prices for Adult Lunches in Middle Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

 $^{1}n$  is less than 1,401 because not all SFAs have middle schools and item non-response.

		S	Y 2009-1	.0			S	Y 2010-11				:	SY 2011-12		
				Tota	l SFAs				Tota	l SFAs				Total	SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$3.00	\$1.10	\$6.35	10,292	1,123 <sup>1</sup>	\$3.00	\$1.35	\$6.35	10,360	1,129 <sup>1</sup>	\$3.00	\$1.00	\$6.35	10,365	1,129 <sup>1</sup>
SFA size															
Small (1-999)	2.85	1.35	5.00	3,963	185	3.00	1.35	5.00	3,986	186	3.00	1.00	5.00	3,985	186
Medium (1,000-4,999)	3.00	1.10	6.35	4,603	458	3.00	1.50	6.35	4,639	461	3.00	1.50	6.35	4,651	462
Large (5,000-24,999)	3.00	1.50	5.00	1,468	327	3.00	1.50	5.00	1,477	329	3.10	1.50	5.00	1,469	327
Very large (25,000+)	3.00	1.75	5.00	258	153	3.00	1.75	5.00	258	153	3.00	1.75	5.00	260	154
Urbanicity															
City	3.00	1.75	6.00	801	199	3.00	1.75	6.00	806	200	3.00	1.50	6.00	802	199
Suburban	3.15	1.75	5.00	2,032	307	3.15	1.75	5.00	2,057	310	3.25	1.75	5.00	2,063	312
Town	3.00	1.60	4.50	2,218	230	3.00	1.60	4.75	2,232	231	3.00	1.60	4.75	2,222	231
Rural	2.85	1.10	6.35	5,241	387	3.00	1.35	6.35	5,264	388	3.00	1.00	6.35	5,278	387
Poverty level															
Low (0-29% F/RP)	3.01	1.75	5.00	2,485	287	3.10	1.75	5.00	2,494	288	3.25	1.80	5.00	2,504	288
Medium (30-59%	3.00	1.35	6.00	5,244	541	3.00	1.35	6.00	5,284	544	3.00	1.35	6.00	5,257	543
F/RP)															
High (60% or higher	3.00	1.10	6.35	2,563	295	3.00	1.50	6.35	2,582	297	3.00	1.00	6.35	2,604	298
F/RP)															

# Table E-16.Median, Minimum, and Maximum NSLP Meal Prices for Adult Lunches in High Schools, SY 2009-10, SY 2010-11, and<br/>SY 2011-12

n is less than 1,401 because not all SFAs have high schools and item non-response.

		Percent of SFAs					
Lunch price	SY 2009-10	SY 2010-11	SY 2011-12				
≤ \$2.00	4.4	3.9	2.9				
\$2.01 - \$2.10	0.7	0.2	0.4				
\$2.11 - \$2.20	0.6	0.8	0.8				
\$2.21 - \$2.30	5.9	5.7	3.9				
\$2.31 - \$2.40	1.8	1.5	1.3				
\$2.41 - \$2.50	11.3	10.8	7.4				
\$2.51 - \$2.60	2.0	1.5	2.7				
\$2.61 - \$2.70	2.7	2.9	2.1				
\$2.71 - \$2.80	10.7	9.2	8.6				
\$2.81 - \$2.90	3.6	3.0	3.7				
\$2.91 - \$3.00	22.6	24.3	21.8				
\$3.01 - \$3.10	2.7	2.8	5.0				
\$3.11 - \$3.20	2.0	2.9	2.5				
\$3.21 - \$3.30	8.8	8.8	10.4				
\$3.31 - \$3.40	0.8	1.0	2.5				
\$3.41 - \$3.50	9.3	9.0	9.9				
\$3.51 - \$3.60	0.6	0.8	1.1				
\$3.61 - \$3.70	0.3	0.4	0.4				
\$3.71 - \$3.80	2.8	2.9	3.7				
\$3.81 - \$3.90	0.4	0.6	0.4				
\$3.91 - \$4.00	4.2	4.6	4.9				
> \$4.00	1.8	2.3	3.6				
Total SFAs: Weighted n	10,292	10,360	10,365				
tal SFAs: Unweighted n <sup>1</sup>	1,123	1,129	1,129				

# Table E-17.Distribution of NSLP Meal Prices for Adult Lunches in High Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have high schools and item non-response.

		S	Y 2009-1	0			S	Y 2010-11			SY 2011-12				
				Tota	SFAs				Tota	I SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwg
SFA characteristics	Median	Min	Max	n	n	Median	Min	Мах	n	n	Median	Min	Мах	n	n
All SFAs	\$1.10	\$0.25	\$3.00	9,596	1,031 <sup>1</sup>	\$1.15	\$0.25	\$3.00	9,732	1,041 <sup>1</sup>	\$1.25	\$0.25	\$3.00	9,792	1,036
SFA size															
Small (1-999)	1.10	0.40	2.25	3,969	187	1.15	0.40	2.00	4,076	192	1.20	0.40	2.30	4,147	195
Medium (1,000-4,999)	1.15	0.40	3.00	4,022	402	1.25	0.40	3.00	4,030	401	1.25	0.40	3.00	4,058	404
Large (5,000-24,999)	1.10	0.25	2.25	1,377	307	1.10	0.25	2.25	1,393	310	1.20	0.25	2.25	1,358	301
Very large (25,000+)	1.00	0.40	2.00	227	135	1.10	0.40	2.25	232	138	1.15	0.40	2.25	230	136
Urbanicity															
City	1.25	0.25	2.25	928	183	1.25	0.25	2.25	941	187	1.25	0.25	2.30	9,167	180
Suburban	1.20	0.60	2.00	1,702	279	1.25	0.60	2.10	1,764	284	1.25	0.60	2.00	17,752	282
Town	1.15	0.40	3.00	1,898	200	1.15	0.40	3.00	1,931	201	1.25	0.40	3.00	1,924	202
Rural	1.00	0.40	2.00	5,067	369	1.10	0.40	2.25	5,096	369	1.20	0.40	2.25	5,176	372
Poverty level															
Low (0-29% F/RP)	1.20	0.65	2.25	1,901	234	1.25	0.65	2.25	2,027	243	1.25	0.65	2.25	2,098	249
Medium (30-59% F/RP)	1.10	0.40	3.00	5,321	545	1.15	0.40	3.00	5,353	547	1.25	0.40	3.00	5,339	542
High (60% or higher F/RP)	1.00	0.25	2.25	2,373	252	1.00	0.25	2.25	2,353	251	1.00	0.25	2.30	2,355	24

# Table E-18.Median, Minimum, and Maximum SBP Meal Prices for Full-Price Breakfasts in Elementary Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

 $^{1}n$  is less than 1,401 because not all SFAs have elementary schools and item non-response.

#### Distribution of SBP Meal Prices for Full-Price Breakfasts in Elementary Schools, Table E-19. SY 2009-10, SY 2010-11, and SY 2011-12

		Percent of SFAs	
Breakfast price	SY 2009-10	SY 2010-11	SY 2011-12
≤ \$0.50	2.8	2.6	2.5
\$0.51 - \$0.60	1.2	1.2	0.7
\$0.61 - \$0.70	0.8	0.7	0.8
\$0.71 - \$0.80	9.0	7.9	7.1
\$0.81 - \$0.90	4.3	4.1	3.2
\$0.91 - \$1.00	26.8	24.6	20.7
\$1.01 - \$1.10	6.2	5.4	6.3
\$1.11 - \$1.20	7.6	7.6	6.3
\$1.21 - \$1.30	21.8	22.9	25.2
\$1.31 - \$1.40	5.2	7.2	8.1
\$1.41 - \$1.50	9.1	9.8	11.6
\$1.51 - \$1.60	1.4	1.2	2.5
\$1.61 - \$1.70	0.8	1.3	1.0
\$1.71 - \$1.80	1.6	2.2	2.8
\$1.81 - \$1.90	0.0	0.0	0.1
\$1.91 - \$2.00	0.9	1.3	0.8
>\$2.00	0.4	0.2	0.4
Total SFAs: Weighted n	9,596	9,732	9,792
Total SFAs: Unweighted n <sup>1</sup>	1,031	1,041	1,036

 $^{1}$  n is less than 1,401 because not all SFAs have elementary schools and item non-response. Data Source: SFA Director Survey 2011, questions 5.1 and 5.2.

		S	Y 2009-1	0			SY	2010-11				S	<mark>7 2011-1</mark> 2	2	
				Tota	l SFAs				Tota	l SFAs				Tota	I SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$1.25	\$0.25	\$2.50	7,308	895 <sup>1</sup>	\$1.25	\$0.25	\$2.50	7,510	912 <sup>1</sup>	\$1.25	\$0.25	\$2.50	7,437	899 <sup>1</sup>
SFA size															
Small (1-999)	1.25	0.50	2.00	2,313	109	1.25	0.50	2.00	2,417	114	1.25	0.50	2.00	2,384	113
Medium (1,000-4,999)	1.25	0.40	2.50	3,417	349	1.25	0.40	2.50	3,496	355	1.25	0.40	2.50	3,503	356
Large (5,000-24,999)	1.25	0.25	2.25	1,353	303	1.25	0.25	2.25	1,367	306	1.25	0.25	2.25	1,324	295
Very large (25,000+)	1.20	0.45	2.25	225	134	1.25	0.45	2.25	230	137	1.25	0.45	2.25	227	135
Urbanicity															
City	1.25	0.25	2.25	727	172	1.25	0.25	2.25	743	177	1.25	0.25	2.25	661	167
Suburban	1.25	0.60	2.50	1,510	262	1.25	0.60	2.50	1,571	267	1.25	0.60	2.50	1,613	267
Town	1.25	0.40	2.00	1,731	188	1.25	0.40	2.25	1,759	190	1.25	0.40	2.00	1,730	188
Rural	1.25	0.50	2.00	3,341	273	1.25	0.50	2.25	3,435	278	1.25	0.50	2.30	3,433	277
Poverty level															
Low (0-29% F/RP)	1.25	0.85	2.50	1,463	208	1.25	0.90	2.50	1,521	213	1.30	1.00	2.50	1,569	217
Medium (30-59%	1.25	0.50	2.01	4,207	477	1.25	0.50	2.25	4,291	485	1.25	0.50	2.30	4,200	475
F/RP)															
High (60% or higher	1.15	0.25	2.00	1,638	210	1.15	0.25	2.25	1,698	214	1.25	0.25	2.25	1,669	207
F/RP)															

# Table E-20.Median, Minimum, and Maximum SBP Meal Prices for Full-Price Breakfasts in Middle Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup>*n* is less than 1,401 because not all SFAs have middle schools and item non-response.

# Table E-21.Distribution of SBP Meal Prices for <u>Full-Price Breakfasts</u> in <u>Middle</u> Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

		Percent of SFAs	
Breakfast price	SY 2009-10	SY 2010-11	SY 2011-12
≤ \$0.50	1.8	1.5	1.4
\$0.51 - \$0.60	1.5	1.5	1.1
\$0.61 - \$0.70	0.4	0.2	0.3
\$0.71 - \$0.80	5.0	4.5	4.4
\$0.81 - \$0.90	3.1	3.0	1.9
\$0.91 - \$1.00	22.6	21.1	16.9
\$1.01 - \$1.10	5.2	4.3	5.6
\$1.11 - \$1.20	5.7	5.3	4.4
\$1.21 - \$1.30	24.9	25.6	25.8
\$1.31 - \$1.40	6.9	9.2	10.5
\$1.41 - \$1.50	14.7	14.2	16.4
\$1.51 - \$1.60	1.9	1.6	3.6
\$1.61 - \$1.70	0.7	1.4	1.5
\$1.71 - \$1.80	3.2	3.7	3.7
\$1.81 - \$1.90	0.5	0.5	0.5
\$1.91 - \$2.00	1.6	1.8	1.4
>\$2.00	0.3	0.5	0.7
Total SFAs: Weighted n	7,308	7,509	7,437
otal SFAs: Unweighted n <sup>1</sup>	895	912	899

<sup>1</sup> *n* is less than 1,401 because not all SFAs have middle schools and item non-response.

		S	Y 2009-1	.0			S	Y 2010-1	.1			S	Y 2011-1	.2	
				Tota	I SFAs				Tota	I SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unw
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$1.25	\$0.25	\$2.85	8,622	982 <sup>1</sup>	\$1.25	\$0.25	\$2.85	8,834	1,002 <sup>1</sup>	\$1.25	\$0.25	\$2.85	8,813	99
SFA size															
Small (1-999)	1.20	0.45	2.50	3,098	146	1.25	0.45	2.50	3,193	150	1.25	0.45	2.50	3,215	15
Medium (1,000-4,999)	1.25	0.40	2.85	3,907	389	1.25	0.40	2.85	3,997	397	1.25	0.40	2.85	3,988	39
Large (5,000-24,999)	1.25	0.25	2.25	1,383	308	1.25	0.25	2.60	1,404	313	1.25	0.25	2.25	1,374	30
Very large (25,000+)	1.25	0.45	2.25	234	139	1.25	0.45	2.25	239	142	1.25	0.45	2.50	236	14
Urbanicity															
City	1.25	0.25	2.25	663	172	1.25	0.25	2.25	710	179	1.30	0.25	2.25	700	17
Suburban	1.25	0.60	2.85	1,687	279	1.25	0.60	2.85	1,750	286	1.25	0.60	2.85	1,759	28
Town	1.25	0.40	2.00	1,858	196	1.25	0.40	2.00	1,894	199	1.25	0.40	2.00	1,897	19
Rural	1.20	0.45	2.25	4,414	335	1.25	0.45	2.25	4,480	338	1.25	0.45	2.30	4,457	33
Poverty level															
Low (0-29% F/RP)	1.25	0.80	2.85	1,819	235	1.30	0.80	2.85	1,886	241	1.35	0.80	2.85	1,910	24
Medium (30-59% F/RP)	1.25	0.50	2.50	4,788	515	1.25	0.50	2.50	4,854	522	1.25	0.50	2.50	4,814	51
High (60% or higher F/RP)	1.10	0.25	2.00	2,014	232	1.15	0.25	2.60	2,094	239	1.20	0.25	2.25	2,089	23

### Table E-22.Median, Minimum, and Maximum SBP Meal Prices for Full-Price Breakfasts in High Schools, SY 2009-10, SY 2010-11,<br/>and SY 2011-12

<sup>1</sup>*n* is less than 1,401 because not all SFAs have high schools and item non-response.

# Table E-23.Distribution of SBP Meal Prices for Full Price Breakfasts in High Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

		Percent of SFAs	
Breakfast price	SY 2009-10	SY 2010-11	SY 2011-12
≤ \$0.50	1.9	1.7	1.6
\$0.51 - \$0.60	1.5	1.5	1.1
\$0.61 - \$0.70	0.5	0.4	0.4
\$0.71 - \$0.80	6.7	6.0	5.3
\$0.81 - \$0.90	3.4	3.4	2.4
\$0.91 - \$1.00	22.6	21.1	17.4
\$1.01 - \$1.10	4.6	3.9	5.0
\$1.11 - \$1.20	5.1	4.8	4.0
\$1.21 - \$1.30	23.2	22.7	24.1
\$1.31 - \$1.40	7.3	9.2	10.2
\$1.41 - \$1.50	13.4	14.3	15.7
\$1.51 - \$1.60	1.8	1.6	2.4
\$1.61 - \$1.70	0.6	1.2	1.4
\$1.71 - \$1.80	3.7	4.0	4.3
\$1.81 - \$1.90	0.4	0.3	0.4
\$1.91 - \$2.00	2.4	2.4	2.2
>\$2.00	1.0	1.5	1.9
Total SFAs: Weighted n	8,622	8,834	8,813
otal SFAs: Unweighted n <sup>1</sup>	982	1,002	994

<sup>1</sup> *n* is less than 1,401 because not all SFAs have high schools and item non-response.

		S	Y 2009-1	.0			S	Y 2010-1	1			S	Y 2011-1	.2	
				Tota	l SFAs				Tota	I SFAs				Tota	I SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$0.30	\$0.15	\$0.30	8,156	884 <sup>1</sup>	\$0.30	\$0.15	\$0.30	8,256	886 <sup>1</sup>	\$0.30	\$0.15	\$0.30	8,257	873 <sup>1</sup>
SFA size															
Small (1-999)	0.30	0.15	0.30	3,282	158	0.30	0.15	0.30	3,396	163	0.30	0.15	0.30	3,395	163
Medium (1,000-4,999)	0.30	0.20	0.30	3,520	353	0.30	0.20	0.30	3,511	351	0.30	0.20	0.30	3,581	358
Large (5,000-24,999)	0.30	0.15	0.30	1,167	262	0.30	0.15	0.30	1,163	261	0.30	0.15	0.30	1,101	246
Very large (25,000+)	0.30	0.20	0.30	186	111	0.30	0.20	0.30	186	111	0.30	0.20	0.30	181	106
Urbanicity															
City	0.30	0.15	0.30	722	147	0.30	0.15	0.30	770	150	0.30	0.15	0.30	730	144
Suburban	0.30	0.20	0.30	1,470	240	0.30	0.20	0.30	1,509	241	0.30	0.20	0.30	1,516	236
Town	0.30	0.20	0.30	1,549	167	0.30	0.20	0.30	1,609	171	0.30	0.20	0.30	1,622	173
Rural	0.30	0.15	0.30	4,414	330	0.30	0.15	0.30	4,369	324	0.30	0.15	0.30	4,389	320
Poverty level															
Low (0-29% F/RP)	0.30	0.20	0.30	1,640	201	0.30	0.20	0.30	1,713	204	0.30	0.20	0.30	1,753	204
Medium (30-59%	0.30	0.15	0.30	4,561	470	0.30	0.15	0.30	4,565	469	0.30	0.15	0.30	4,503	457
F/RP)															
High (60% or higher	0.30	0.15	0.30	1,954	213	0.30	0.15	0.30	1,979	213	0.30	0.15	0.30	2,001	212
F/RP)															

# Table E-24.Median, Minimum, and Maximum SBP Meal Prices for Reduced-Price Breakfasts in Elementary Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have elementary schools and item non-response.

		S	Y 2009-1	.0			S	Y 2010-1	1			S	SY 2011-1	2	
				Tota	I SFAs				Tota	I SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$0.30	\$0.15	\$0.30	6,183	761 <sup>1</sup>	\$0.30	\$0.15	\$0.30	6,340	769 <sup>1</sup>	\$0.30	\$0.15	\$0.30	6,329	754 <sup>1</sup>
SFA size															
Small (1-999)	0.30	0.15	0.30	1,890	91	0.30	0.15	0.30	1,996	96	0.30	0.15	\$0.30	2,008	97
Medium (1,000-4,999)	0.30	0.20	0.30	2,979	305	0.30	0.20	0.30	3,034	309	0.30	0.20	\$0.30	3,085	315
Large (5,000-24,999)	0.30	0.15	0.30	1,132	256	0.30	0.15	0.30	1,128	255	0.30	0.15	\$0.30	1,059	238
Very large (25,000+)	0.30	0.20	0.30	182	109	0.30	0.20	0.30	182	109	0.30	0.20	\$0.30	177	104
Urbanicity															
City	0.30	0.15	0.30	573	140	0.30	0.15	0.30	595	142	0.30	0.15	\$0.30	551	135
Suburban	0.30	0.20	0.30	1,245	219	0.30	0.20	0.30	1,295	221	0.30	0.20	\$0.30	1,319	217
Town	0.30	0.20	0.30	1,410	158	0.30	0.20	0.30	1,442	161	0.30	0.20	\$0.30	1,459	163
Rural	0.30	0.15	0.30	2,954	244	0.30	0.15	0.30	3,009	245	0.30	0.15	\$0.30	2,999	239
Poverty level															
Low (0-29% F/RP)	0.30	0.20	0.30	1,263	175	0.30	0.20	0.30	1,309	178	0.30	0.20	\$0.30	1,309	175
Medium (30-59%	0.30	0.15	0.30	3,562	408	0.30	0.15	0.30	3,606	410	0.30	0.15	\$0.30	3,555	399
F/RP)															
High (60% or higher	0.30	0.15	0.30	1,357	178	0.30	0.15	0.30	1,425	181	0.30	0.15	\$0.30	1,465	180
F/RP)															

# Table E-25.Median, Minimum, and Maximum SBP Meal Prices for Reduced-Price Breakfasts in Middle Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have middle schools and item non-response. Data Source: SFA Director Survey 2011, questions 5.1 and 5.2.

		S	Y 2009-1	.0			S	Y 2010-1	1			S	Y 2011-1	2	
				Tota	l SFAs				Tota	l SFAs				Tota	I SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$0.30	\$0.15	\$0.30	7,348	839 <sup>1</sup>	\$0.30	\$0.15	\$0.30	7,512	850 <sup>1</sup>	\$0.30	\$0.15	\$0.30	7,471	833 <sup>1</sup>
SFA size															
Small (1-999)	0.30	0.15	0.30	2,610	125	0.30	0.15	0.30	2,706	129	0.30	0.15	0.30	2,723	130
Medium (1,000-4,999)	0.30	0.20	0.30	3,376	338	0.30	0.20	0.30	3,443	344	0.30	0.20	0.30	3,450	345
Large (5,000-24,999)	0.30	0.15	0.30	1,170	262	0.30	0.15	0.30	1,171	263	0.30	0.15	0.30	1,111	249
Very large (25,000+)	0.30	0.20	0.30	192	114	\$0.30	0.20	0.30	192	114	0.30	0.20	0.30	186	109
Urbanicity															
City	0.30	0.15	0.30	584	143	0.30	0.15	0.30	620	147	0.30	0.15	0.30	604	142
Suburban	0.30	0.20	0.30	1,378	232	0.30	0.20	0.30	1,432	236	0.30	0.20	0.30	1,428	230
Town	0.30	0.20	0.30	1,505	165	0.30	0.20	0.30	1,537	168	0.30	0.20	0.30	1,582	171
Rural	0.30	\$0.15	0.30	3,881	299	\$0.30	0.15	0.30	3,923	299	0.30	0.15	0.30	3,858	290
Poverty level															
Low (0-29% F/RP)	0.30	0.20	0.30	1,546	197	0.30	0.20	0.30	1,609	201	0.30	0.20	0.30	1,574	194
Medium (30-59% F/RP)	0.30	0.15	0.30	4,057	441	0.30	0.15	0.30	4,099	444	0.30	0.15	0.30	4,032	433
High (60% or higher F/RP)	0.30	0.15	0.30	1,745	201	0.30	0.15	0.30	1,804	205	0.30	0.15	0.30	1,866	206

#### Table E-26. Median, Minimum, and Maximum SBP Meal Prices for <u>Reduced-Price Breakfasts</u> in <u>High</u> Schools, SY 2009-10, SY 2010-11, and SY 2011-12

<sup>1</sup>*n* is less than 1,401 because not all SFAs have high schools and item non-response. Data Source: SFA Director Survey 2011, questions 5.1 and **5.2**.

			SY 2009-:	10				SY 2010-	11				SY 2011-:	12	
				Tota	SFAs				Tota	l SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwg
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$1.50	\$0.35	\$4.00	10,108	1,077 <sup>1</sup>	\$1.60	\$0.35	\$4.00	10,332	1,100 <sup>1</sup>	\$1.70	\$0.35	\$4.00	10,418	1,105
SFA size															
Small (1-999)	1.50	0.35	3.00	4,282	202	1.50	0.35	3.00	4,381	207	1.55	0.35	3.00	4,425	209
Medium (1,000-4,999)	1.60	0.50	4.00	4,183	418	1.65	0.50	4.00	4,283	427	1.75	0.50	4.00	4,333	433
Large (5,000-24,999)	1.75	0.75	3.53	1,407	317	1.75	0.75	3.53	1,427	322	1.75	0.75	3.53	1,420	320
Very large (25,000+)	1.75	0.75	3.00	235	140	1.75	0.75	3.00	242	144	1.85	0.75	3.50	241	143
Urbanicity															
City	1.75	0.75	3.25	906	200	1.75	0.75	3.25	918	204	1.75	0.75	3.50	883	200
Suburban	1.75	0.85	3.10	1,691	272	1.75	0.85	3.25	1,738	278	1.75	0.85	3.10	1,763	280
Town	1.55	0.85	4.00	2,098	220	1.60	0.85	4.00	2,159	225	1.70	0.85	4.00	2,175	227
Rural	1.50	0.35	3.53	5,413	385	1.50	0.35	3.53	5,517	393	1.60	0.35	3.53	5,598	398
Poverty level															
Low (0-29% F/RP)	1.75	1.00	3.53	1,728	207	1.75	1.00	3.53	1,834	214	1.75	1.00	3.53	1,904	219
Medium (30-59% F/RP)	1.50	0.50	4.00	5,393	547	1.60	0.50	4.00	5,472	558	1.70	0.50	4.00	5,459	556
High (60% or higher F/RP)	1.50	0.35	3.25	2,987	323	1.50	0.35	3.25	3,026	328	1.55	0.35	3.50	3,055	330

# Table E-27.Median, Minimum, and Maximum SBP Meal Prices for Adult Breakfasts in Elementary Schools, SY 2009-10,<br/>SY 2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have elementary schools and item non-response.

		Percent of SFAs	
Breakfast price	SY 2009-10	SY 2010-11	SY 2011-12
≤\$1.00	9.1	8.8	7.5
\$1.01 - \$1.10	1.0	0.9	0.9
\$1.11 - \$1.20	1.5	1.4	1.2
\$1.21 - \$1.30	12.8	12.2	8.9
\$1.31 - \$1.40	3.6	3.1	3.8
\$1.41 - \$1.50	22.6	20.8	19.7
\$1.51 - \$1.60	3.4	3.4	5.3
\$1.61 - \$1.70	3.0	3.6	2.9
\$1.71 - \$1.80	14.1	14.5	14.2
\$1.81 - \$1.90	3.2	3.6	4.4
\$1.91 - \$2.00	14.7	16.0	16.8
\$2.01 - \$2.10	1.1	1.3	2.1
\$2.11 - \$2.20	0.5	0.7	1.2
\$2.21 - \$2.30	2.5	2.8	4.1
\$2.31 - \$2.40	0.4	0.6	0.5
\$2.41 - \$2.50	3.3	2.9	2.7
\$2.51 - \$2.60	0.1	0.3	0.1
\$2.61 - \$2.70	0.2	0.2	0.2
\$2.71 - \$2.80	0.5	0.5	0.9
\$2.81 - \$2.90	0.1		
\$2.91 - \$3.00	1.2	1.2	1.3
> \$3.00	1.0	1.2	1.3
Total SFAs: Weighted n	10,108	10,332	10,418
tal SFAs: Unweighted n <sup>1</sup>	1,077	1,100	1,105

# Table E-28.Distribution of SBP Meal Prices for Adult Breakfasts in Elementary Schools,<br/>SY 2009-10, SY 2010-11, and SY2011-12

<sup>1</sup> n is less than 1,401 because not all SFAs have elementary schools and item non-response.

		S	Y 2009-1	.0			S	Y 2010-1	1			S	SY 2011-1	.2	
				Tota	I SFAs				Tota	I SFAs				Tota	I SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$1.60	\$0.50	\$3.53	7,500	909 <sup>1</sup>	\$1.70	\$0.50	\$4.00	7,691	931 <sup>1</sup>	\$1.75	\$0.50	\$4.00	7,736	934 <sup>1</sup>
SFA size															
Small (1-999)	1.50	0.60	3.00	2,428	114	1.50	0.60	3.00	2,505	118	1.55	0.75	3.00	2,499	118
Medium (1,000-4,999)	1.65	0.50	3.50	3,505	358	1.70	0.50	3.50	3,589	366	1.75	0.50	3.50	3,648	372
Large (5,000-24,999)	1.75	0.75	3.53	1,342	303	1.75	0.75	4.00	1,366	309	1.80	0.75	4.00	1,358	307
Very large (25,000+)	1.75	0.75	3.00	224	134	1.80	0.75	4.00	231	138	1.95	0.75	4.00	230	137
Urbanicity															
City	1.75	0.75	3.25	736	184	1.75	0.75	3.25	753	189	1.80	0.75	3.45	717	185
Suburban	1.75	0.85	3.10	1,400	245	1.75	0.85	4.00	1,448	252	1.75	0.85	4.00	1,494	255
Town	1.60	0.85	3.25	1,865	203	1.65	0.85	3.25	1,886	205	1.75	0.85	3.25	1,903	207
Rural	1.50	0.50	3.53	3,499	277	1.50	0.50	3.53	3,604	285	1.60	0.50	3.53	3,623	287
Poverty level															
Low (0-29% F/RP)	1.75	1.00	3.53	1,282	180	1.75	1.00	3.53	1,335	185	1.75	1.00	3.53	1,382	188
Medium (30-59%	1.55	0.50	3.50	4,161	466	1.65	0.50	4.00	4,230	476	1.75	0.50	4.00	4,200	474
F/RP)															
High (60% or higher	1.50	0.60	3.25	2,057	263	1.50	0.60	4.00	2,126	270	1.70	0.75	4.00	2,154	272
F/RP)															

### Table E-29.Median, Minimum, and Maximum SBP Meal Prices for Adult Breakfasts in Middle Schools, SY 2009-10, SY 2010-11,<br/>and SY 2011-12

<sup>1</sup>*n* is less than 1,401 because not all SFAs have middle schools and item non-response.

		Percent of SFAs	
Breakfast price	SY 2009-10	SY 2010-11	SY 2011-12
≤ \$1.00	7.6	7.6	6.4
\$1.01 - \$1.10	0.4	0.5	0.6
\$1.11 - \$1.20	0.7	0.8	0.7
\$1.21 - \$1.30	12.7	11.5	8.2
\$1.31 - \$1.40	4.3	3.9	3.6
\$1.41 - \$1.50	22.7	21.2	20.7
\$1.51 - \$1.60	2.8	3.1	4.6
\$1.61 - \$1.70	2.8	3.0	2.8
\$1.71 - \$1.80	14.8	15.2	14.6
\$1.81 - \$1.90	3.5	4.1	4.6
\$1.91 - \$2.00	14.8	15.6	16.6
\$2.01 - \$2.10	1.6	1.4	2.2
\$2.11 - \$2.20	0.6	0.8	1.5
\$2.21 - \$2.30	3.2	3.6	4.6
\$2.31 - \$2.40	0.3	0.4	0.3
\$2.41 - \$2.50	3.2	3.1	3.5
\$2.51 - \$2.60	0.1	0.1	0.1
\$2.61 - \$2.70	0.1	0.1	0.0
\$2.71 - \$2.80	0.7	0.8	1.0
\$2.81 - \$2.90	0.2	0.0	0.0
\$2.91 - \$3.00	1.6	1.6	1.7
> \$3.00	1.2	1.4	1.4
Total SFAs: Weighted n	7,500	7,691	7,736
tal SFAs: Unweighted n <sup>1</sup>	909	931	934

# Table E-30.Distribution of SBP Meal Prices for Adult Breakfasts in Middle Schools,<br/>SY 2009-10, SY2010-11, and SY 2011-12

<sup>1</sup> *n* is less than 1,401 because not all SFAs have middle schools and item non-response.

	SY 2009-10				SY 2010-11			SY 2011-12							
				Tota	l SFAs				Tota	I SFAs				Tota	l SFAs
				Wgt	Unwgt				Wgt	Unwgt				Wgt	Unwgt
SFA characteristics	Median	Min	Max	n	n	Median	Min	Max	n	n	Median	Min	Max	n	n
All SFAs	\$1.55	\$0.50	\$4.00	8,822	996 <sup>1</sup>	\$1.65	\$0.50	\$4.00	9,041	1,019 <sup>1</sup>	\$1.75	\$0.50	\$4.00	9,075	1,020 <sup>1</sup>
SFA size															
Small (1-999)	1.50	0.60	3.15	3,313	156	1.50	0.60	3.15	3,409	160	1.55	0.75	3.15	3,425	161
Medium (1,000-4,999)	1.70	0.50	4.00	3,898	389	1.75	0.50	4.00	3,990	398	1.75	0.50	4.00	4,015	401
Large (5,000-24,999)	1.75	0.75	3.53	1,371	308	1.75	0.75	4.00	1,395	314	1.80	0.75	4.00	1,388	312
Very large (25,000+)	1.75	0.75	3.00	241	143	1.85	0.75	4.00	247	147	2.00	0.75	4.00	247	146
Urbanicity															
City	1.75	0.75	4.00	699	187	1.75	0.75	4.00	743	193	1.80	0.75	4.00	707	189
Suburban	1.75	0.85	3.15	1,560	261	1.75	0.85	4.00	1,626	269	1.75	0.85	4.00	1,638	269
Town	1.60	0.85	3.25	1,992	210	1.65	0.85	3.25	2,013	212	1.75	0.85	3.25	2,052	215
Rural	1.50	0.50	3.53	4,571	338	1.50	0.50	3.53	4,659	345	1.60	0.50	3.53	4,678	347
Poverty level															
Low (0-29% F/RP)	1.75	1.00	3.53	1,611	206	1.75	1.00	3.53	1,678	212	1.75	1.00	3.53	1,723	214
Medium (30-59%	1.50	0.50	4.00	4,803	506	1.60	0.50	4.00	4,881	516	1.70	0.50	4.00	4,841	513
F/RP)															
High (60% or higher	1.50	0.60	3.25	2,408	284	1.50	0.60	4.00	2,482	291	1.75	0.75	4.00	2,511	293
F/RP)															

### Table E-31.Median, Minimum, and Maximum SBP Meal Prices for Adult Breakfasts in High Schools, SY 2009-10, SY 2010-11, and<br/>SY 2011-12

 $^{1}n$  is less than 1,401 because not all SFAs have high schools and item non-respone.

	Percent of SFAs				
Breakfast price	SY 2009-10	SY 2010-11	SY 2011-12		
≤ \$1.00	8.5	8.3	6.7		
\$1.01 - \$1.10	0.6	0.5	0.6		
\$1.11 - \$1.20	1.2	1.3	1.3		
\$1.21 - \$1.30	11.9	10.9	7.6		
\$1.31 - \$1.40	4.0	3.7	3.4		
\$1.41 - \$1.50	23.4	21.9	21.1		
\$1.51 - \$1.60	2.7	2.9	4.9		
\$1.61 - \$1.70	2.8	3.1	2.5		
\$1.71 - \$1.80	14.5	15.3	15.1		
\$1.81 - \$1.90	3.5	3.6	4.2		
\$1.91 - \$2.00	14.8	14.9	16.1		
\$2.01 - \$2.10	1.3	1.3	2.0		
\$2.11 - \$2.20	0.5	0.7	1.3		
\$2.21 - \$2.30	3.1	3.4	4.0		
\$2.31 - \$2.40	0.3	0.5	0.3		
\$2.41 - \$2.50	3.3	3.6	4.1		
\$2.51 - \$2.60	0.1	0.1	0.1		
\$2.61 - \$2.70	0.1	0.1	0.0		
\$2.71 - \$2.80	0.6	0.6	0.8		
\$2.81 - \$2.90	0.2	1.6	0.1		
\$2.91 - \$3.00	1.3	0.0	1.7		
> \$3.00	1.4	1.7	1.8		
Total SFAs: Weighted n	8,822	9,041	9,075		
tal SFAs: Unweighted n <sup>1</sup>	996	1,019	1,020		

# Table E-32.Distribution of SBP Meal Prices for Adult Breakfasts in High Schools,<br/>SY 2009-10, SY 2010-11, and SY 2011-12

 $^{1}n$  is less than 1,401 because not all SFAs have high schools and item non-response.

#### Table E-33.USDA Meal Reimbursements as a Percent of Total Revenue: Distribution of<br/>SFAs, SY 2010-11

USDA reimbursements/total revenue	Percentage of SFAs
Less than 20%	15.6%
20% - < 30%	7.2
30% - < 40%	9.3
40% - < 50%	13.7
50% - < 60%	12.8
60% - < 70%	11.5
70% - < 80%	12.5
80% or more	17.4
Total	100.0
Average percentage: USDA reimbursements/total revenue	51.7%
Total SFAs: Weighted n	6,876
Total SFAs: Unweighted n	702 <sup>1</sup>

<sup>1</sup> *n* is less than 1,401 because of item non-response.

Data Source: SFA Director Survey, question 6.1.

#### Table E-34.Student Payments for Reimbursable Meals as a Percent of Total Revenue:<br/>Distribution of SFAs, SY 2010-11

Student payments/total revenue	Percentage of SFAs
Less than 20%	42.7%
20% - < 30%	18.7
30% - < 40%	16.1
40% - < 50%	12.3
50% - < 60%	6.1
60% or more	4.1
Total All SFAs	100.0
Average percentage: student payments/total revenue	26.1%
Total SFAs: Weighted n	10,788
Total SFAs: Unweighted n	1,095 <sup>1</sup>

 $^{1}n$  is less than 1,401 because of item non-response.

Data Source: SFA Director Survey, question 6.1.

### Table E-35.State and Local Funds as a Percent of Total Revenue: Distribution of SFAs,<br/>SY 2010-11

State and local funds/total revenue	Percentage of SFAs
Less than 5%	57.8%
5% - < 10%	17.2
10% - < 15%	5.8
15% - < 20%	2.9
20% - < 25%	3.4
More than 25%	12.9
Total All SFAs	100.0
Average percentage: student payments/total revenue	11.5%
Total SFAs: Weighted n	10,456
Total SFAs: Unweighted n	1,058 <sup>1</sup>

<sup>1</sup> *n* is less than 1,401 because of item non-response.

Data Source: SFA Director Survey, question 6.1.

#### Table E-36.Non-Reimbursable Sales as a Percent of Total Revenue: Distribution of SFAs,<br/>SY 2010-11

Non-reimbursable sales/total revenue	Percentage of SFAs
Less than 10%	64.8%
10% - < 20%	20.9
20% - < 30%	8.8
30% - < 40%	3.2
40% or more	2.3
Total All SFAs	100.0
Average percentage: student payments/total revenue	9.3%
Total SFAs: Weighted n	10676
Total SFAs: Unweighted n	<b>1079</b> <sup>1</sup>

<sup>1</sup> *n* is less than 1,401 because of item non-response.

Data Source: SFA Director Survey, question 6.1.

State	Type of subsidy	Dollar amount
California	Per-meal reimbursement	\$44,195,133
Colorado	Per-meal reimbursement	\$682,722
Connecticut	Other	DK
District of Columbia	Other	\$1,105,048
Florida	Based on percentage of low income students	\$7,590,912
Hawaii	Supplement to cover specific costs	\$6,000,000
Illinois	Per-meal reimbursement	\$7,534,530
lowa	Per-meal reimbursement	DK
Maine	Per-meal reimbursement	\$210,000
Maryland	Other	\$2,820,000
Massachusetts	Supplement to cover specific costs	\$3,511,060
Michigan	Annual lump sum	\$3,360,000
Minnesota	Per-meal reimbursement	DK
Nebraska	Per-meal reimbursement	\$438,282
New Hampshire	Per-meal reimbursement	\$118,809
New Mexico	Annual lump sum	\$1,924,600
New York	Per-meal reimbursement	\$9,359,296
North Carolina	Other	\$2,200,000
Oregon	Supplement to cover specific costs	\$542,752
Pennsylvania	Per-meal reimbursement	DK
Puerto Rico	Annual lump sum	\$30,638,177
Rhode Island	Other	\$270,000
Vermont	Per-meal reimbursement	\$132,632
Virgin Islands	Supplement to cover specific costs	\$1,006,907
Virginia	Per-meal reimbursement	\$2,497,421
Washington	DK	DK
Wisconsin	Other	\$2,789,400

#### Type and Dollar Amount of State Subsidies for Breakfast to SFAs in Each State, Table E-37. SY 2010-11

Analysis includes only states that provided a subsidy for breakfast. DK = don't know

Data Source: State CN Director Survey, question B.1c.

State	Type of Subsidy	Dollar Amount
California	Per-meal reimbursement	\$101,182,742
Colorado	Other	\$685,061
Connecticut	Annual lump sum	\$2,354,000
District of Columbia	Other	\$1,069,397
Georgia	Supplement to cover specific costs	\$24,230,678
Hawaii	Supplement to cover specific costs	\$30,000,000
Illinois	Per-meal reimbursement	\$16,709,527
lowa	Per-meal reimbursement	DK
Kansas	Per-meal reimbursement	\$2,435,171
Maine	Per-meal reimbursement	\$1,050,000
Massachusetts	Per-meal reimbursement	\$5,426,986
Michigan	Other	\$600,000
Minnesota	Per-meal reimbursement	DK
Nebraska	Annual lump sum	\$392,032
New Hampshire	Annual lump sum	\$832,003
New Jersey	Per-meal reimbursement	\$5,612,975
New York	Per-meal reimbursement	\$20,716,431
North Carolina	Other	\$5,000,000
Ohio	Per-meal reimbursement	\$8,447,732
Oklahoma	Per-meal reimbursement	\$4,601,288
Pennsylvania	Per-meal reimbursement	DK
Puerto Rico	Annual lump sum	\$118,261,757
Utah	Per-meal reimbursement	\$28,860,635
Vermont	Per-meal reimbursement	\$407,738
Virgin Islands	Supplement to cover specific costs	\$1,869,971
Virginia	Other	\$5,801,932
Washington	DK	DK
Wisconsin	Other	\$4,218,100

# Table E-38.Type and Dollar Amount of State Subsidies for Lunch to SFAs in Each State,<br/>SY 2010-11

Analysis includes only States that provided a subsidy for lunch.

DK = don't know

Data Source: State CN Director Survey, question B.1c.

Abbrane         73         4         500         NR           Alaska         189         1NR         11000         389           Alaska         289         NR         11000         389           Arkanasa         458         NR         225         385           Arkanasa         458         NR         2255         NR           Colorado         226         21         1796         NR           Colorado         223         6         4131         92           Delaware         61         5         228         5           District of Columbia         42         54         214         208           Florida         232         22         24449         135           Georgia         232         22         24449         135           Idabo         480         4         1436         30           Illinois         148         190         78         1472           Iowa         499         17         1936         53           Kanasa         400         10         1378         39           Kentucky         189         74         631         593	State	Number of SFAs in state <sup>1</sup>	Number of SFAs using FSMCs <sup>2</sup>	Number of schools in state <sup>2</sup>	Number of schools using FSMCs
Alaska         189         13         1600         39           Arkanca         289         NR         1110         NR           Arizona          87         28         395           Arkansas         458         NR         2265         NR           California         1094         169         10124         831           Colorado         226         21         1796         NR           Connecticut         185         53         1157         323           District of Columbia         42         54         214         208           Georgia         2323         2         2449         135           Georgia         335         2         289         NR           Idaba         480         4         1432         53           Georgia         132         57         4361         218           Indiana         1132         14         1442         1472           Indiana         1132         14         1471         79           Kentucky         189         0         1554         0           Louisian         113         14         1471         79 <td>Alabama</td> <td>73</td> <td>4</td> <td>509</td> <td>NR</td>	Alabama	73	4	509	NR
American Samoa         289         NR         1110         NR           Arizona          87         28         395           Arkansas         458         NR         2265         NR           California         1094         169         10124         831           Colorado         226         21         1796         NR           Connecticut         185         53         11157         323           Delaware         61         5         228         5           District of Columbia         42         54         214         208           Florida         232         22         2449         135           Georgia         355         2         289         NR           Idaho         480         4         1436         30           Illinois         148         190         748         1,472           Iowa         499         17         1936         53           Kanasa         400         10         1378         39           Kentucky         189         74         631         93           Kentucky         189         74         631         93 </td <td></td> <td></td> <td></td> <td></td> <td></td>					
Arizona          87         28         395           Arkansas         458         NR         2265         NR           California         1094         169         10124         831           Colorado         226         21         1796         NR           Connecticut         185         53         1157         323           District of Columbia         42         54         214         208           Florida         223         6         4131         92           Georgia         353         2         289         NR           Idaho         480         4         1436         30           Illinois         148         190         748         1472           Indiana         1132         157         4361         218           Iowa         499         17         1936         53           Kansas         400         1378         39         Kansas         149           Iowa         499         17         1936         53         33           Kentucky         189         0         1554         0           Louisian         113         14					
Arkansas         458         NR         2265         NR           California         1094         169         10124         831           Colorado         226         21         1796         NR           Connecticut         185         53         1157         323           Delaware         61         5         228         5           District of Columbia         42         54         214         208           Florida         223         22         2449         135           Georgia         232         22         2449         135           Hawali         35         2         289         NR           Idaho         480         4         136         30           Illinois         148         190         748         1,472           Indiana         113         14         1374         0           Lousiana         113         14         1471         79           Marke         429         2         1283         Marke           Masachusetts         189         74         631         593           Marke         287         753         1449         135 </td <td></td> <td></td> <td></td> <td></td> <td></td>					
California         1094         169         10124         831           Colorado         226         21         1796         NR           Connecticut         185         53         1157         323           District of Columbia         42         54         214         208           Forida         223         6         4131         92           Georgia         232         22         2449         135           Idaho         400         4         1436         30           Ilinois         148         190         748         1,472           Iowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Lousiana         113         14         1471         79           Maryand         73         5         1449         133           Maryand         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         822         18         3877         NR <td></td> <td></td> <td></td> <td></td> <td></td>					
Colorado         226         21         179         NR           Connecticut         185         53         1157         323           Delaware         61         5         228         5           District of Columbia         42         54         214         208           Florida         233         6         4131         92           Georgia         232         22         2449         135           Hawali         35         2         289         NR           Idaho         480         4         136         30           Illinois         148         190         748         1,472           Iowa         499         17         1366         53           Kansas         400         1         1378         39           Kansas         400         1         144         1471         79           Maine         429         2         1839         74         631         593           Kansas         103         74         631         593         144         153         133           Mississipip         75         70         105         133         154					
Connecticut185531177223Delaware6152285District of Columbia4254214208Florida2236413192Georgia32222249135Hawaii352289NRIdaho4804143630Illinois1132554361218Indiana1132554361218Iowa49917193653Kentucky189015540Louisiana11314147179Marie429218292Maryland7351449133Maschusetts18974631593Michigan8822183877NRMinesota697712392NRMississippi7854241018Mostaria162182567105Newafa215NR516NRNew Jersey100412480NRNew Mexico697752607197New Jersey100412485117New Jersey100412485117New Jersey100412486117New Jersey100412486117New Jersey100412486117New Jersey1001222 <td< td=""><td></td><td></td><td></td><td></td><td></td></td<>					
Delaware         61         5         228         5           Ibirtic of Columbia         223         64         214         92           Georgia         223         22         2449         135           Hawaii         35         2         289         NR           Idaho         480         4         1436         30           Illinois         148         190         748         1,472           Indiana         1132         55         4361         218           Iowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Maryland         73         57         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Missouri         197         170         1083         754           Montana         241         5         827         53 <td></td> <td></td> <td></td> <td></td> <td></td>					
District of Columbia         42         54         214         208           Florida         223         6         4131         92           Georgia         232         22         2449         135           Hawaii         35         2         289         NR           Idaho         480         4         1436         30           Illinois         148         190         748         1,472           Indiana         1132         55         4361         218           Iowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Marie         429         2         1829         2           Maryland         73         5         1449         133           Masschusetts         189         74         631         593           Mississipi         785         4         240         18           Missouri         197         707         1083         754					
Florida         223         22         2449         135           Georgia         332         22         2449         135           Hawaii         35         2         289         NR           Idaho         480         4         1436         30           Ilniois         148         190         748         1,472           Indiana         1132         55         4361         218           Iowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Missouri         197         170         1083         754           Montana         241         5         827         53           Nethaska         162         18         256         NR <t< td=""><td></td><td></td><td></td><td></td><td></td></t<>					
Georgia         232         22         249         135           Idaho         35         2         289         NR           Idaho         480         4         136         30           Illinois         148         190         748         1,472           Indiana         1132         55         4361         218           lowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Markand         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Mississippi         785         4         2410         18           Mostana         241         5         827         53           Nebraska         162         18         2567         105           New Hampshire         378         28         1096         87					
Hawaii         35         2         289         NR           Idaho         480         4         136         30           Idinois         148         190         748         1,472           Indiana         1132         55         4361         218           Iowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Marine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Mississippi         785         4         2410         18           Mississippi         197         170         1083         754           Montana         241         5         827         53           New Jassachusetts         162         18         966         87 <td></td> <td></td> <td></td> <td></td> <td></td>					
Idaho         480         4         1436         30           Illinois         148         190         748         1,472           Indiana         1132         55         4361         218           lowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Maine         429         2         1829         2           Maryland         73         5         1449         133           Mississipi         189         74         631         593           Michigan         882         218         3877         NR           Missouri         197         170         1083         754           Motana         241         5         827         53           Nebraska         162         18         2567         105           New Jersey         00         412         480         NR           New Marshire         378         28         1096         87					
Illinois1481907481,472Indiana1132554361218lowa49917193653Kansas40010137839Kentucky189015540Louisiana11314147179Marine429218292Maryland7351449133Minesota697712392NRMinesota697712392NRMississippi7854241018Mississippi1971701083754Montana241582753Netraska162182567105Nevada215NR516NRNew Jersey100412480NRNew Jersey100412460NRNew Varko220195862951North Carolina324645117North Dakota1105047570Okiao3233013233NRPuerto Rico38014730Puerto Rico380147333South Dakota106141214205South Dakota12510337316Vermont16115611330Virginia8533013233NROregon245111130<	Hawaii	35			
Indiana1132554361218Iowa49917193653Kansas40010137839Kentucky189015540Louislana11314147179Maine429218292Maryland7351449133Massachusetts18974631593Michigan8822183877NRMissouri1971701083754Missouri1971701083754Motana241582753Nebraska215NR516NRNew Jersey100412480NRNew Jersey100412480NRNew Jersey100412480NRNew Versey100412480NRNew Versico69775 <td>Idaho</td> <td>480</td> <td></td> <td></td> <td>30</td>	Idaho	480			30
lowa         499         17         1936         53           Kansas         400         10         1378         39           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Marine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Mississippi         785         4         2410         18           Mississippi         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           New Hampshire         378         28         1096         87           New Hampshire         378         28         1096         87           New York         220         195         862         951           North Carolina         32         4         645         1	Illinois		190		
Kansas         400         10         1378         93           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Maine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           North Carolina         32         4         645         117 </td <td>Indiana</td> <td>1132</td> <td>55</td> <td>4361</td> <td>218</td>	Indiana	1132	55	4361	218
Kansas         400         10         1378         93           Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Maine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           North Carolina         32         4         645         117 </td <td>lowa</td> <td>499</td> <td>17</td> <td>1936</td> <td>53</td>	lowa	499	17	1936	53
Kentucky         189         0         1554         0           Louisiana         113         14         1471         79           Maine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missosuri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Newada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Hampshire         378         28         1096         87           New York         220         195         862         951           North Carolina         32         4         645			10		
Louisiana         113         14         1471         79           Maine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Hexico         697         75         2607         197           New Verkico         200         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757					
Maine         429         2         1829         2           Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           New dampshire         378         28         1096         87           New Hampshire         378         28         1096         87           New Mexico         697         75         2607         197           New Mexico         697         75         2607         197           New Mexico         697         75         2607         197           New Yampshire         32         4         645         117           North Carolina         32         4         645 <td></td> <td></td> <td></td> <td></td> <td></td>					
Maryland         73         5         1449         133           Massachusetts         189         74         631         593           Minchigan         882         218         3877         NR           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           New da         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           North Carolina         32         4         645         117           North Carolina         322         4         645         117           North Carolina         322         97         3758         NR           Oklahoma         574         18         1785<					
Massachusetts         189         74         631         593           Michigan         882         218         3877         NR           Misnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Hersey         100         412         480         NR           New Mexico         697         75         2607         197           New Mexico         105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233					
Michigan         882         218         3877         NR           Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           New data         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Vork         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233					
Minnesota         697         71         2392         NR           Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Newada         215         NR         516         NR           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oregon         245         36         1296         418           Pennsylvania         853         301         3233					
Mississippi         785         4         2410         18           Missouri         197         170         1083         754           Montana         241         5         827         53           Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Puerto Rico         38         0         1473					
Missouri1971701083754Montana241582753Nebraska162182567105Nevada215NR516NRNew Hampshire37828109687New Jersey100412480NRNew Mexico697752607197New Vork220195862951North Carolina324645117North Carolina105047570Ohio1222973758NROklahoma574181785322Oregon245361296418Pennsylvania8533013233NRPuerto Rico38014730Rhode Island5442317333South Carolina106141214205South Dakota2112871093Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virginia22611320NRWashington327023380Wisconsin7366757NRWyoning58336026					
Montana         241         5         827         53           Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Pennsylvania         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710 <td></td> <td></td> <td></td> <td></td> <td></td>					
Nebraska         162         18         2567         105           Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710<					
Nevada         215         NR         516         NR           New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Carolina         105         8732         1,337           Texas         1259         105         8732 <td< td=""><td></td><td></td><td></td><td></td><td></td></td<>					
New Hampshire         378         28         1096         87           New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Vermont         161         56         217					
New Jersey         100         412         480         NR           New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Virgin Islands          0         32         0           Virginislands         226         11         3					
New Mexico         697         75         2607         197           New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175	New Hampshire	378	28		87
New York         220         195         862         951           North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virgini Islands          0         238	New Jersey				
North Carolina         32         4         645         117           North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virginia         226         11         320         NR           Washington         327         0         2338	New Mexico	697	75	2607	197
North Dakota         1105         0         4757         0           Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virginia         226         11         320         NR           Washington         327         0         238         0           West Virginia         848         NR         2238	New York	220	195	862	951
Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238	North Carolina	32	4	645	117
Ohio         1222         97         3758         NR           Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238	North Dakota	1105	0	4757	0
Oklahoma         574         18         1785         322           Oregon         245         36         1296         418           Pennsylvania         853         301         3233         NR           Puerto Rico         38         0         1473         0           Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757	Ohio	1222	97	3758	NR
Oregon245361296418Pennsylvania8533013233NRPuerto Rico38014730Rhode Island5442317333South Carolina106141214205South Dakota2112871093Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
Pennsylvania8533013233NRPuerto Rico38014730Rhode Island5442317333South Carolina106141214205South Dakota2112871093Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
Puerto Rico38014730Rhode Island5442317333South Carolina106141214205South Dakota2112871093Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
Rhode Island         54         42         317         333           South Carolina         106         14         1214         205           South Dakota         211         28         710         93           Tennessee         201         11         1784         17           Texas         1259         105         8732         1,337           Utah         85         4         1016         118           Vermont         161         56         2175         103           Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					
South Carolina106141214205South Dakota2112871093Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
South Dakota2112871093Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
Tennessee20111178417Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
Texas125910587321,337Utah8541016118Vermont161562175103Virgin Islands0320Virginia22611320NRWashington327023380West Virginia848NR22382Wisconsin7366757NRWyoming58336026					
Utah         85         4         1016         118           Vermont         161         56         2175         103           Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					
Vermont         161         56         2175         103           Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					
Virgin Islands          0         32         0           Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					
Virginia         226         11         320         NR           Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					
Washington         327         0         2338         0           West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					
West Virginia         848         NR         2238         2           Wisconsin         73         66         757         NR           Wyoming         58         3         360         26					NR
Wisconsin         73         66         757         NR           Wyoming         58         3         360         26		327	0		0
Wisconsin         73         66         757         NR           Wyoming         58         3         360         26	West Virginia	848	NR	2238	2
Wyoming 58 3 360 26					
Total 19,011 2,799 100,350 9,903		19,011	2,799	100,350	9,903

#### Number of SFAs and Schools Using FSMC in Each State, SY 2011-12 Table E-39.

<sup>1</sup>Data on number of SFAs in each state comes from USDA Administrative data form FNS-742. The file did not include data for American Samoa or Virgin Islands. Idaho and the Virgin Islands reported some inconsistent data on the number of Provision 2/3 SFAs and schools and therefore are not shown in those cases. <sup>2</sup> NCES CCD 2010-11 <u>http://nces.ed.gov/pubs2012/pesschools10/tables/table\_02.asp</u>

NR = non-response.

Data Source: State CN Director Survey, question D3.

	Number of charter schools operating		ols that are a ate SFA		t are part of a larger A
State	in state	Number	Percent	Number	Percent
Alabama <sup>1</sup>	0	0	0%	0	0%
Alaska	27	1	4	8	30
Arizona	513	145	28	244	48
Arkansas	13			0	0
California	983	345	35	283	29
Colorado	175	3	2	46	26
Connecticut	16	12	75	3	19
Delaware	22	16	73	0	0
District of Columbia	53	50	94	0	0
Florida	517	97	19	278	54
Georgia	34	31	91	0	0
0	31	24	77	0	0
Hawaii Idaho	43	17	40	7	16
Illinois	23	6	26	12	52
Indiana	65	38	58	17	26
lowa	6	0	0	3	50
Kansas	17	0	0	8	47
Kentucky	0	0	0	0	0
Louisiana	78	20	26	17	22
Maine	0	0	0	0	0
Maryland	42	0	0	42	100
Massachusetts	72	47	65	23	32
Michigan	256	185	72	0	0
Minnesota	148	NR		NR	
Mississippi	0	0	0	0	0
Missouri	41	39	95	0	0
Montana⁺	0	0	0	0	0
Nebraska <sup>2</sup>	0	0	0	0	0
Nevada	30	1	3	6	20
New Hampshire	18	3	17	0	0
New Jersey	75	62	83	6	8
New Mexico	88	38	43	19	22
New York	196	41	21	72	37
North Carolina	100	43	43	0	0
North Dakota <sup>1</sup>	0	0	0	0	0
Ohio	355	234	66	8	2
Oklahoma	22	17	77	1	5
Oregon	115	17	15	51	44
Pennsylvania	NR	NR		NR	
Puerto Rico	0	0	0	0	0
Rhode Island	14	5	36	9	64
South Carolina	12	12	100	0	0
South Dakota	0	0	0	0	0
Tennessee	45	12	27	33	73
Texas	194	152	78	0	0
Utah	82	46	56	7	9
Vermont	0	0	0	0	0
Virgin Islands	0	0	0	0	0
Virginia	2	Ő	Ő	2	100
Washington	0	Ő	Ő	0	0
West Virginia <sup>1</sup>	0	Ő	Ő	Ő	Ő
Wisconsin	235	19	8	216	92
Wyoming	4	0	0	0	0
Total	4,762	1,804	39% <sup>2</sup>	1,421	31% <sup>2</sup>

# Table E-40.Number of Charter Schools Participating in the NSLP and SBP as Separate SFAs<br/>or Part of a Larger SFA in Each State, SY 2011-12

<sup>1</sup> These states do not have legislation permitting charter schools. Maine enacted a law in 2011 allowing charter schools.

<sup>2</sup> This percentage is based on only those states that reported the total number of charter schools operating in their state and the total number of charter schools operating in their state as a separate SFA.

Idaho reported inconsistent data on the number of charter schools and is not included in the table.

Note: National Alliance for Public Charter Schools reports 5,618 public charter schools for SY 2011-12.

NR = non-response.

Data Source: State CN Director Survey, questions C11a and C11c.