



SNAP-Ed New Mexico

Social Marketing Project Phase II Report

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Introduction

Background of the Project

The United States Department of Agriculture (USDA) is committed to improving and sustaining the health and well-being of people in the U.S. by providing "leadership on food, agriculture, natural resources, and related issues based on sound public policy, the best available science, and efficient management." Strategic Goal 4 in the USDA's Strategic Plan for FY 2010-2015 focuses on providing all children in the United States access to safe and healthy meals.2 A nutritious and balanced diet is important for all people, but it is particularly important for the development and well-being of children and youth.² As part of these efforts, the USDA's Food and Nutrition Service (FNS) implements over a dozen nutrition assistance programs throughout the United States to children and eligible participants.³ The Supplemental Nutrition Assistance Program (SNAP) has been a foundational FNS program for over 40 years and served almost 45 million people in the 2011 fiscal year.4

Formally known as the Food Stamp Program, SNAP provides monthly stipends to participants in lowincome households to purchase food from local supermarkets, grocery and convenience stores, and farmers' markets.4 SNAP empowers participants by granting them better access to nutritious food that can be prepared at home. 4 To further encourage healthy eating, SNAP provides nutrition education (SNAP-Ed) to participants "to improve the likelihood that persons eligible for SNAP will make healthy food choices within a limited budget and choose physically active lifestyles consistent with the current Dietary Guidelines for Americans and U.S. Department of Agriculture (USDA) food guidance."5 SNAP-Ed works collaboratively with state agencies in all 50 states, the District of Columbia, and the Virgin Islands to promote

the importance of diet and exercise and provide nutrition education for SNAP participants in their communities. This report will focus on one of the three key behavioral outcomes of SNAP-Ed, which is to "make half your plate fruits and vegetables, at least half your grains whole grains, and switch to fat-free or low-fat milk and milk products."

To help reach this objective, FNS released 16 core nutrition messages in 2008 that promote increased fruit and vegetable intake and a switch from whole to low-fat or fat-free dairy, while also addressing five different concepts that influence children's dietary behavior. These concepts include: role modeling; cooking and eating together; division of feeding responsibility; availability and accessibility; and food preferences, beliefs, and asking behaviors.3 The 16 core messages were tested by USDA FNS and targeted at three distinct groups, a) lowincome mothers of preschool-age children (2- to 5-year-olds), b) low-income mothers of elementary school-age children (6- to 10-year-olds), and c) 8- to 10-year-old children. FNS asks nutrition programs around the country to "speak with one voice" or to "maximize the message" to ensure that messages are heard, remembered, and motivate families to change behavior.³ If FNS programs use the same messages, based on the Dietary Guidelines for Americans and tested with the intended audience, they will "maximize the message."3

FNS recognizes the importance of reaching different populations with relevant material and works with SNAP-Ed to continuously improve the core messages. It is crucial to consider how the core messages resonate with different ethnic and racial groups, and what adjustments to the messages may be needed based on the population they serve. In order for the messages to remain effective, messages must be culturally relevant and relatable to each community. Development and implementation of new material should be behaviorally focused and evidence-based in order to have the optimal outcome.⁵ It is also

necessary to test modifications with the target audience to ensure messages are "clear and have the intended effect." Despite efforts by federal and state agencies to continue to improve and promote the core messages, additional research is needed regarding the way in which the core messages, when translated into Spanish, relate to and are accepted by Hispanic/Latino communities, particularly in Mexican and Mexican-American communities.

People of Hispanic-origin are the largest ethnic or racial minority in the nation.⁷ As of July 1, 2011, there were roughly 52.0 million Hispanics living in the U.S.7 It is estimated that by July 1, 2050, the Hispanic population will reach about 132.8 million; this is estimated to be 30% of the U.S. population by that date.8 In New Mexico 46.7% of the population is Hispanic, which is higher than in any other state in the nation.9 Furthermore, it was reported that 63% of people of Hispanic-origin in the U.S. were of Mexican background in 2010.¹⁰ Approximately one in four Spanish-speaking New Mexicans do not speak English well.¹¹ New Mexico's demographics and geographic location provide an excellent setting to develop, test, and pilot nutrition education interventions in Spanish with Hispanic communities.

Hispanic communities, and the nation at large need relevant and compelling nutrition education to aid in the prevention and reduction of childhood overweight and obesity. In 2009-2010, 31.8% of children and adolescents in the U.S. were either overweight or obese. 12 In the same year, 21.1% of Hispanic children and adolescents were obese compared with 14.0% of non-Hispanic white children and adolescents,12 and it is more likely for Mexican-American youth to be obese than non-Hispanic youth. 12 Children who are obese may have higher health-related risk factors¹³ and are more likely to become overweight or obese adults.14 Social marketing is a valuable way to engage communities with positive messages about diet and nutrition, and Healthy People 2020 calls

upon health promotion and disease prevention programs to utilize social marketing in their efforts.¹⁵

Social marketing is a process in which marketing principles and techniques are used to promote behaviors that will benefit individuals and society at large. Social marketing differs from commercial marketing in that the primary goal of social marketers is to increase well-being in individuals and society whereas commercial marketers often seek financial gain.¹⁶ Social marketing can strategically increase behavior change because efforts can reach target-audiences through multiple communication channels in culturally appropriate ways. 17 An important principle of social marketing is audience orientation. Social marketing employs a bottomup perspective, which allows audiences to assume the role of the expert and play an important part in building campaigns that are relevant to the needs of their communities by helping researchers and programs to understand what community members specifically want and need.¹⁶ The University of New Mexico Prevention Research Center (UNM PRC) is using social marketing principles to guide, develop, and implement the SNAP-Ed New Mexico Social Marketing Project, which is administered by the State of New Mexico Human Services Department (HSD).

Objective and Purpose of the Focus Groups

The SNAP-Ed New Mexico Social Marketing Project is a multiphase study that explores how the core nutrition messages developed by FNS and its collaborators are received by people of Hispanic-origin, particularly those of Mexican or Mexican-American descent. The objective of the SNAP-Ed New Mexico Social Marketing Project is to create culturally appropriate nutrition education messages in Spanish and implement a multi-level social marketing intervention to increase fruit, vegetable, whole grain, and low-fat and fat-free dairy

consumption. Formative research was conducted during Phase I of the project. The purpose of Phase I research was to familiarize the project team with the specific target population and to identify the concepts upon which the future messages would be based. Focus groups were conducted with Spanishspeaking, SNAP-eligible individuals in both urban and rural settings in New Mexico from January 2010 to June 2011. Focus groups consisted of: a) parents of preschool-age children, b) parents of elementary school-age children, and c) 8- to 10-year-old children. The goal was to have parents and children develop "slogans" and "messages" that would resonate with them and their neighbors and encourage families to make healthy food choices.¹⁸ (For specific details regarding the results in Phase I, please see the Phase I Report at http://hsc.unm.edu/som/ prc/_images/pdfs/snap_ed_report%202012_f.pdf).

During Phase II of the project, FNS core nutrition messages were translated into Spanish and tested with the target population. Translation of the messages incorporated results from the Phase I focus groups regarding culture and language. Eight focus groups were again conducted in rural and urban areas in New Mexico with Spanish-speaking, SNAP-eligible a) mothers of preschool-age children, b) mothers of elementary school-age children, and c) 8- to 10-year-old children. The goal of Phase II was to test the Spanish core messages for consistency with the English ones, to have participants choose the messages that most resonated with them, their families, and the communities where they live, and to share ideas regarding the best venues for conducting a social marketing campaign. This Phase II report presents the Spanish core nutrition messages, other Spanish messages that were tested in the focus groups (Appendix 1), the methods used, results, a discussion of findings, and implications for Phase III.

Demographics

During Phase II eight focus groups were conducted with a total of 50 participants. Of these, 18 were children, eight of whom were female and 10 were male. The remaining 32 participants were adults over 18 years of age. Although mothers are the target audience for FNS core nutrition messages and the SNAP-Ed New Mexico Social Marketing Project, two male adults participated in the focus groups in addition to 30 female adult participants. Throughout this report, the adult audience is referred to as mothers to be consistent with the intended target

Table 1. Phase II Focus Group Participants						
Target Audience	# of focus groups	# of participants	# of females	# of males		
Mothers of preschoolage children: Urban	2	11	11	0		
Mothers of preschoolage children: Rural	2	6	6	0		
Parents of elementary school age children: Urban	1	9	7	2		
Mothers of elementary school age children: Rural	1	6	6	0		
Children ages 8-10 years old: Urban	1	6	3	3		
Children ages 8-10 years old: Rural	1	12	5	7		

population for which the messages were created. For a breakdown on the number of participants that attended each focus group see **Table 1.**

Demographics were collected from adult participants. Participants were asked to report their age, gender, marital status, level of schooling, employment status, race and ethnicity, food benefits, and relationship to the child. A one-page anonymous demographic form was distributed to each participant at each focus group, which participants filled out voluntarily. For a breakdown of adult demographics, see **Table 2**.

Table 2. Adult Focus Group Demographic	s
Age	Total
18-24	8
25-34	7
35-44	13
	1 1
45-59	4
60-74	0
75+	0
Gender	
Male	2
Female	30
Marital Status	
Single	4
Married	21
Separated	2
Divorced	2
Domestic Partner	3
Highest Grade Completed in School	7
8th grade or less	7
Some high school	6
High school diploma/GED	12
Some College	5
Techincal/vocational training	1
Associates Degree or More	1
Current Employment Status	
Homemaker	24
Disabled	0
Unemployed	1
Self-employed	2
Employed part-time	1
Employed full-time	4
Ethnic Background	
Non Hispanic	0
Hispanic	32
Race	
White	32
Black/African American	0
Asian	0
American Indian or Alaska Native	l o
Native Hawaiian or Pacific Islander	0
Other	0
	Ĭ
Receive SNAP Benefits	
Yes	25
No	7
Receive WIC	
Yes	19
No	13
Polationship to Child	
Relationship to Child Mother	29
Father	2
Grandmother	0
Other	1

Overview of Methods

The focus group approach was adopted by the Social Marketing Team in order to test the chosen and developed nutrition messages with the target population to determine the acceptability, appropriateness, and effectiveness of the messages to affect behavior change. The Social Marketing Team used the USDA's focus group toolkit as a guide and modified it to be culturally sensitive to Spanish-speaking participants in New Mexico. Focus group scripts were translated into Spanish and reviewed by native Spanish-speaking researchers for content and clarity. All research, including the instruments used for evaluation, was approved by the University of New Mexico's Institutional Review Board prior to the implementation of Phase II.

Participants for Phase II focus groups were recruited by research team members in July and August 2012, and focus groups were completed in August 2012. The UNM PRC has a long-standing relationship with various communities in the state which facilitated the engagement of schools and communities in the study. Research team members contacted Head Start Centers and elementary schools in order to obtain approval to conduct focus groups and recruit participants at their institutions. Once the schools' administration granted approval, postcards were distributed to potential respondents inviting them to participate. Research team members also distributed sign-in sheets at the schools to generate lists of interested participants. Several phone calls were made to interested participants to explain the purpose of the focus groups and to ask for participation. Research team members made reminder phone calls to those who agreed to participate in the days prior to the focus groups. Focus groups were designed to attract mothers to participate and were held during the day, after school hours or in the evenings to accommodate work and school schedules. For the adult focus groups,

all participants signed consent forms. For the focus groups with children, parents provided consent for the children to participate. Children also had to agree to participate. All focus groups were held in the selected schools' facilities, such as classrooms or school offices. Healthy snacks (e.g., fruits and vegetables), water, and childcare were provided by the research staff. All materials, including the consent form, were given to participants in Spanish. Adult participants were compensated for their time with a \$20 gift card at the end of the focus groups. Children who participated in the focus groups received a book in Spanish for their participation.

All eight focus groups were conducted in Spanish by native Spanish-speaking research team members. Focus groups were conducted in both urban and rural settings for each one of the three target audience groups. Focus groups were conducted in three New Mexico counties: Bernalillo, Rio Arriba, and Doña Ana. Mothers of preschoolage children participated in two separate focus groups in both the urban and the rural settings due to the extensive amount of information that needed to be tested with this audience.

Focus groups lasted an average of 90 minutes. Participants were asked a variety of questions that touched upon their personal beliefs and practices regarding nutrition, themselves, and their household.



In the first of the two focus groups for mothers of preschool-age children, the discussion was about dinner time practices and routines; role modeling messages; cooking and eating together messages; and offering new foods messages. The mothers of preschool-age children who attended Part 2 of the focus groups were asked about division of feeding responsibility messages; letting children serve themselves messages; and information channels. Mothers of elementary school-age children were asked about: what can be done to help children stay healthy; fruit and vegetable messages regarding availability, accessibility, and ease; supporting documentation and content, such as a narrative paragraph and nutrition tips; messages regarding milk consumption; and information channels. Mothers of elementary school-age children were asked to comment on their children who ranged from 6 to 10 years of age. The 8- to 10-year-old children were asked about: health and nutrition perceptions; health and nutrition at home; perceptions of nutrition poster contents, which contained the fruit and vegetable and milk messages; and information channels. The messages were presented to the children on posters accompanied by illustrations, whereas mothers saw cards that contained the messages.

Qualitative Data Analysis

The focus groups were audio recorded with the permission of all participants. The recordings were transcribed and translated by an independent contractor fluent in both English and Spanish and checked for accuracy by bilingual research team members. Data analysis was conducted in NVivo 8, a qualitative data analysis software program, by a team of three researchers. The team coded the focus group transcripts according to a structure built upon the core concepts FNS developed (e.g., role modeling; cooking and eating together; division of feeding responsibility; availability and accessibility; and food preferences, beliefs, and asking behaviors)

as well as specific cultural practices and routines described by community members that influence nutrition choices and practices.¹⁹ The software allowed analysis of the prevalence of each theme and enabled the team to compare responses to messages across the rural and urban focus groups, as well as to examine responses to nutrition messages and the way responses may be influenced by customs and meanings of food, nutrition, and care giving practices that are common among this demographic group.

The first step in the analysis process was for each analyst to read a transcript to identify themes.

Next, coders met to standardize the themes and their definitions, agree on a structural framework to elucidate the relationship of themes to one another, and determine how they should be applied to the data. The team then coded all focus groups using the same framework. Each focus group transcript was coded by two different team members. To enhance the completeness and trustworthiness of the coding and coding framework, the research

team had frequent meetings to discuss the coding process, agree upon any necessary adjustments to the coding framework, and to resolve questions about how certain responses should be coded. We analyzed the English versions of the focus groups, with the exception of English-language portions that were coded "Spanish." In these cases, the Spanish-language originals were also coded at this node. Three members of our research team read and understand Spanish, and thus, we were able to verify that participants' responses were interpreted accurately. The research questions guided the team to examine themes that included "Agency and Empowerment," "Believability, Credibility" of the message, "Convenience and Availability" of food or food preparation strategies, "Culture," and "Routines, Practices, Schedules and Strategies," as well as "Values and Emotions" associated with food or practices related to food. A node was created for each nutrition message, and then all participant comments associated with that message were coded in the node. The next stage of the analysis consisted of analyzing



focus group transcripts for each demographic group (mothers of preschool-age children, mothers of elementary school-age children, and 8- to 10-year-old children) and ascertaining responses to each nutrition message, as well as comparing the cultural values and practices relating to nutrition across rural and urban participants. Researchers also ascertained similarities and differences in these groups' responses.

The Findings Mothers of Preschool-Age Children

Dinner Time

In this introductory section of the focus group, mothers of preschool-age children shared a range of strategies and routines, but by and large, they tended to eat as a family and value the parents' (mothers') role in helping children develop healthy eating habits.

Participants in both rural and urban focus groups discussed how cultural practices shape meal times. Mothers commented that lunch is typically the largest meal of the day in traditional Mexican culture. Breakfast is also an important meal. However, dinner is often something small, and some participants in the focus group equate dinner to a snack.

Dinner, or *la cena*, in traditional Mexican culture usually occurs around 7 p.m., and mothers described this as a time to eat a small portion of something light—such as cereal, fruit, or a quesadilla—something that is prepared easily and quickly. During the focus group, questions were asked about dinner, or *cena*, rather than *comida* (meal), and as a result, discussions were often about this last meal of the day, which is not comparable to the meal commonly understood to be dinner among predominantly non-Hispanic groups.

One mom clarified how cultural patterns in Mexico,

such as eating schedules, carry over to life in New Mexico but adapt around new school and work schedules. Rural mothers in the focus groups said that, as a rule, their families ate dinner together each night. While two of the urban mothers recounted eating at home with their kids every night, one working mom said she and her child ate out each night at a restaurant where she works.

Snacking was another area where linguistic distinctions came into play in the discussion and understanding of the focus group topics. While mothers understood the term *merienda* (snack) used in the messages, they indicated that this was not a term that they use but could not suggest a better word. One mother explained that she used the term while caring for her grandfather, but she has not used the term with her own child.

Every mom in the rural focus group said that they generally serve their preschool children at mealtimes. One mom indicated that, if the food is something like salad, the child can serve him or herself. When the moderator inquired if they ask the child how much they want to eat, or how they decide on portion sizes, several moms indicated that they ask the children. A couple of mothers commented that they are aware of their children's eating patterns, and thus, they gauge appropriate portions that way. Furthermore, both of these moms do not serve their children in excess so that food is not wasted. Another mother in this group explained how, if she didn't set limits, her child would eat or drink too much. In this way, moms said they take into account: individual eating habits of their kids when serving them food; appropriate portion sizes for particular children; and not serving in excess to avoid wasting food.

Urban moms described similar strategies for serving their children. Almost all of the moms in this group described serving their kids, and they discussed the different ways they determine appropriate amounts. One mom said she learned about portion size through her child's Head Start Center and indicated that she uses the size of her fist to gauge portion size for her 3-year-old child. Like in the rural focus group, one urban mom described how she serves her kids to address different eating styles (i.e. kids who won't eat much or only one type of food, versus children who will eat too much).

Role Modeling

Messages on Role Modeling

- 1) They learn from watching you. Eat fruits and veggies and your kids will too.
- 2) Meals are a great time to play follow the leader. Eat fruits and veggies and your kids will too.
- 3) They take their lead from you. Eat fruits and veggies and your kids will too.
- 4) Be a mirror for your children. Eat fruits and veggies and your kids will too.

In general, mothers of preschool-age children agreed that adult role modeling was essential in developing healthy eating habits in children. The favorite role modeling message for rural and urban moms was, "They take their lead from you. Eat fruits and veggies and your kids will too."

A mother summarized the message stating that her children want to be like her, and therefore, she is their example.

"...porque nosotros somos un ejemplo para ellos, lo que somos nosotros, ellos quieren ser."a

Mother of preschooler, urban New Mexico.

"Los niños aprenden visualmente de lo que uno hace, en todos los aspectos. Entonces uno está poniendo la mesa como aquí, frutas, verduras y ellos lo miran a uno. Ellos tratan de imitarlo y probar lo que uno está haciendo."b

— Mother of preschooler, urban New Mexico.

A mother also felt that role modeling is important for children and added that adults have to reinforce what they teach their children through their own actions.

"...porque toman el ejemplo de uno, porque uno puede tratar de decirles, pero si uno no lo hace, ellos nunca lo van a hacer. Pero si tú les dices tienes que comer algo saludable y allí estás tú comiendo papas fritas o lo que sea, ellos aunque tu les metas a diario o los regañes, igual no van a hacerlo porque tienes que ser tú el ejemplo para poder decirle a ellos que hacer."c

— Mother of preschooler, rural New Mexico.

This mother feels that directly telling children to do something is less effective than role modeling it for them. Furthermore, another mother commented that habits established at a young age will be held onto throughout life.

"Ellos aprenden y ellos cuando sean adultos, pues igual van a seguir..."d

— Mother of preschooler, urban New Mexico.

a. Because we are an example for them, what we are, they want to be.

b. Kids learn visually from what we do. So we are setting the table like here

fruits and vegetables, and they see us. They try to imitate us and try what we are doing.

c. Because they take the lead from us, because we can try to tell them, but if we don't do it, they'll never do it.

But if you tell them to eat something healthy and there you are eating chips or whatever, even if you

force them every day, they are still not going to do it, because you have to be an example to tell them what to do. d. They learn and when they grow up, well, they'll keep doing it.

Other role modeling messages received more mixed responses. For example, "Meals are a great time to play follow the leader. Eat fruits and veggies and your kids will too," suggests a playful approach to mealtime and eating fruits and vegetables. Some moms thought that the suggestion of play was positive, while others perceived this negatively. The message 4 containing the word "mirror" also did not resonate with the groups very much.

In general, all participants agreed with the core principles of the role modeling messages. The messages that participants seemed to prefer were those that emphasized mothers' role modeling in the first sentence.

Cooking & Eating Together

Messages on Cooking and Eating Together

- 1) Cook together. Eat together. Talk together. Make mealtime a family time.
- 2) Make meals and memories together. It's a lesson they'll use for life.
- 3) Stir up some family fun. Cooking together is a lesson they'll use for life.
- 4) Make it together. Taste it together. Try new foods together.
- 5) Make mealtime a fun adventure. Try new foods together.

The messages on cooking and eating together seemed to resonate with moms because they reflect values and practices that shape the everyday experience of mothers, namely eating together as a family and using preparation time, as well as eating time, to be together as a family and enjoy each other's company. The messages that emphasized these elements were

preferred. Messages that used terms like "adventure" or emphasized trying new foods were not received as well.

The favorite message of rural moms was, "Cook together. Eat together. Talk together. Make mealtime a family time." This message clearly rose to the top as mothers picked their favorites, but moms were mixed on the effect of having the word "together" appear three times in the message. One mom said it made the message stronger, but on the other end of the spectrum, one mom felt the repetition was disrespectful.

One mother commented that she liked the message because she enjoys talking with her kids, and based on the conversation, it seemed that mealtime is the time to talk. Often the hustle and bustle of everyday life does not allow much time for families to converse and spend time together. Therefore, this mother values mealtime with her children because, not only is it a time when she and her children have a chance to talk, but it is a time when her family unites as a whole. Another mother related to the theme of cooking together. This mom shared that she tries to involve her children in the process when she cooks and stated that her children enjoy it.

Other rural mothers chose the message for the reasons described by the two mothers above. Rural mothers in this focus group value spending time and talking with their children. Other moms speculated that the more kids are involved in food preparation, the more invested they will be in eating the food. This relates back to the previous mention of mothers having to address different eating styles of children, and it seems to offer a possible solution or idea to get children who "eat too little" to eat more.

Despite the positive feedback that mothers had regarding these messages, issues arose that pertained to the challenges and dangers of cooking with young children. One mother expressed fear that her children would burn themselves or cut themselves with sharp knives while trying to cook. A different mom shared her strategy, which allows her children to still participate in the process while avoiding the potentially dangerous tasks involved in cooking. This mom completes the dangerous tasks herself but allows her children to work with safer items like dough. Another mom responded positively to, "Make it together. Taste it together. Try new foods together." This mom particularly liked the phrase, "Try new foods together." This participant acknowledged that food is very different in Mexico than in the United States and noted that her children try new food in contexts other than home (e.g., Head Start and school). This mom felt that her children cannot lose anything by trying healthy new food, which makes her wonder about how healthy traditional Mexican food is.

Other moms also discussed the issue of incorporating new or different foods into their meals and commented on the challenge of integrating foods from a new culture. One mom discussed how offering new foods gives her a chance to help her kids develop new tastes. Interestingly, another mom thought that food offered at schools here in the U.S. must be healthy, which suggests that she believes that U.S. schools would not serve unhealthy food.

Overall, the messages about cooking and eating together were well received by participants. Message 2 invoked memories of past and positive experiences one mom had cooking with her caregivers, such as her grandparents. The messages also addressed the current realities and challenges of moms living in multicultural contexts



whose children were introduced to new foods at Head Start and school and the challenge of balancing the health and desires of their children.

Offering New Foods

Offering New Foods Messages

Sometimes, new foods take time.
 Kids don't always take to new foods right away. Offer new fruits and veggies many times. Give them a small taste at first and be patient with them.

2) If at first you don't succeed, try again.

It can take kids time to start liking new foods. Offer new foods many times. Before you know it they'll ask for more. And you won't have to make different meals for each family member.

3) Small portions, big benefits.

Let your kids try small portions of new fruits and veggies you enjoy. When they develop a taste for many types of foods, it's easier to plan family meals. And everyone can enjoy dinner together!

4) Every little taste counts.

Kids develop food likes at an early age, so give them tastes of new fruits and veggies. Each new taste is a chance for them to find a new favorite food.

5) Small tastes, less waste.

It may take a while for kids to like new foods. By offering small tastes over time, they can learn to like them. And small tastes mean less wasted food. Mothers commented that the messages about offering new foods were very similar to one another. The messages generated a lot of discussion about the different strategies mothers employ to get their kids to eat a wider range of foods, and different perspectives regarding the best strategies were discussed. Most parents agreed that patience and persistence pays off, while a vocal contingent suggested that insisting or requiring that their children try new foods works as well.

"Every little taste counts. Kids develop food likes at an early age, so give them tastes of new fruits and veggies. Each new taste is a chance for them to find a new favorite food," was the most popular of the messages in this category. Mothers in the urban focus group liked that this message focused on introducing new foods when kids are babies and said the content of the message reflected WIC teachings. Rural mothers focused their discussion on the ways that tastes for different foods change throughout life.

Overall, moms responded positively to the idea of offering small bites of food. The reminder to be patient may be beneficial. The reminder seemed to reinforce the idea for moms who described themselves as already patient. For moms who tended to describe themselves as "insistent" that their children try new foods and eat, it might soften their



approach somewhat. The most popular messages that explain how taste changes throughout the early years of children's lives resonated with moms who had children of multiple ages. Thus, it may serve as an important message for first time moms.

Division of Feeding Responsibility

Messages on Division of Feeding Responsibility

- Healthy choices, healthy decisions.
 Offer your children healthy food choices at meals. Then, let them choose how much to eat. You'll help them learn to make healthy choices — a lesson they'll use for life.
- 2) Patience works better than pressure. Offer your children new foods. Then, let them choose how much to eat. Kids are more likely to enjoy a food when eating it is their own choice. It also helps them learn to be independent.
- 3) Set the table for success. When you serve healthy choices at dinner, it's easier for your child to eat right. Offer many types of foods, then let your child choose how much to eat.
- 4) Help them know when they've had enough. Babies know when they have eaten enough. Help your children keep listening to their bodies as they grow. Let them tell you when they are "all done." It will help them grow up healthy.
- 5) Give them a chance for a healthier life.

 Give kids a chance to learn to stop eating when they're full the chance to say "all done," even when you think they haven't eaten enough. And you'll give them a chance for a healthy weight.

Moms' discussions of messages related to division of responsibility reflect core values and practices related to child autonomy, the importance of family time, scheduling, and competing priorities that some parents and kids have. The most conflict arose over the idea that all kids intuitively know about portion control. Moms more often mentioned pressuring their kids to eat or to finish portions rather than having to limit portions (although this was discussed as well). Moms indicated that often kids with these two different eating styles exist in the same family. Therefore, working with messages that address both of these types of eaters is important.

Another value that comes through in response to these messages is that serving your children food is an act of caring and love, and so that while letting children be independent in these matters can be seen as a benefit, and one that is related to other life skills, it might be difficult for some moms to relinquish this gesture. In terms of overall message success, moms seemed to respond more positively to messages that relate food choice to longer-term life skills and the value of independence.

"Healthy choices, healthy decisions. Offer your children healthy food choices at meals. Then, let them choose how much to eat. You'll help them learn to make healthy choices — a lesson they'll use for life," was one of two popular messages in this category. Moms liked this message as it balanced the mom's role as providing healthy choices and reinforced the idea to let children make choices among those offered. One mom in the rural focus group thought this message was the most convincing. Child empowerment is what resonated most with her. Another mom from the rural group saw this message as relating to decision-making skills in other areas of life and reflected on another value, that parenting is often about prioritizing the needs of kids over what is convenient or easy for parents.

"Patience works better than pressure. Offer your children new foods. Then, let them choose how much to eat. Kids are more likely to enjoy a food when eating it is their own choice. It also helps them learn to be independent," was the second most popular message. The reminder to be patient resonated with participants. The rest of the message was similar to the other messages in the group, and moms had similar responses to the ideas about letting kids choose. One mom, for example, was reminded of her own evolution as a parent, explaining how she used to compare her children's eating habits and would often force her youngest child to eat like his/her siblings. This mom acknowledged that this message is teaching her to have patience, but also likes how it promotes independence.

Another mom in this group said that she also learned that pressure is counter-productive. Contrary to this, one mom explained that patience does not work with her children. However, patience in this message refers specifically to food selections and portion sizes whereas this mother refers to patience in the context of time (i.e. when her children should eat).

Mothers' responses to the other messages in this section were mixed. Issues that came up for moms when responding to these messages reflect the values of the moms who participated in the focus groups. These included addressing the eating styles of different kids in the family. Many of the moms explained that different kids in the family have different eating styles. Moms recounted having trouble getting some children to eat anything, and other children in their family with a tendency to eat too much. There is also a high value placed on caring for children. As one mom said, "We are responsible for their health." And like in many cultures, serving food is a loving act. The other important value that we see in response to these messages is that even small children need to respect family routines and that it is not always possible for families to accommodate everyone.

Letting Children Serve Themselves

Messages on Letting Children Serve Themselves

- 1) **Help them choose.** Help your kids learn to serve themselves at dinner. Even your 3 to 5 year old can practice serving from small bowls that you hold for them. They'll learn new skills and feel "all grown up."
- 2) Let them learn by serving themselves. Let your kids serve themselves at dinner. Teach them to take small amounts at first. Tell them they can get more if they're still hungry.
- 3) **Hey mom, look at me.** Dinnertime can be a rush. Let your kids serve themselves foods that are easy and safe to handle. You'll help them learn to be more "grown-up." And meals will be easier for you.

The messages above included parents in more active teaching or helping roles. Overall these were more appealing to the moms in the focus groups. Moms liked the emphasis on independence and readily made the leap from independence with respect to food to larger life skills. Discussions included ways that these messages were educational or reminders of practices taught in Head Start or schools.

Mothers were open to different ideas. The most significant problems with these messages occurred primarily because of prevailing cultural practices in this group—namely, the focus on "dinner" when this is not the main meal of the day for Mexican immigrant families. This discrepancy influenced participant responses to the messages. We see many of the core values and themes discussed related to previous messages here, along with a clear demonstration about how cultural differences influence responses to the messages.

"Help them choose. Help your kids learn to serve themselves at dinner. Even your 3 to 5 year old can practice serving from small bowls that you hold for them. They'll learn new skills and feel all grown up," was a clear favorite for mothers of preschool-age children.

In the rural focus group, a mother commented that letting children serve themselves was a practice they follow in Head Start. Mothers liked that the message emphasized independence. Mothers also liked that this message stressed how important children feel when they are allowed to be independent. The mothers in the urban groups also discussed fostering independence. One mom said she liked the message because it helped make her kids feel "big" when they serve their own food. Another mom reflected on the ways that the cultural practice of having the main meal, *comida*, in the late afternoon, resulted in children eating a small dinner.

The other message that was popular with moms that focused on independence, but also made clear the mothers' role in the process, was, "Let them learn by serving themselves. Let your kids serve themselves at dinner. Teach them to take small amounts at first. Tell them they can get more if they're still hungry." One urban mother signified her understanding of the message by commenting that parents can allow children to serve themselves small portions, and parents can teach their children that they can always serve a small portion of seconds

if they are still hungry. Another mom in the focus group agreed but added that parents should also teach children about serving small portions to avoid wasting food. Mothers liked the message because it taught them about something they don't do or because it mirrored their own practices.

In the message, "Hey mom, look at me. Dinnertime can be a rush. Let your kids serve themselves foods that are easy and safe to handle. You'll help them learn to be more 'grown-up.' And meals will be easier for you," the safety issue stood out for one mom who said that she wouldn't let her children serve hot food, but another mother commented that there are other ways kids can help at dinner besides serving. One mom offered her strategy on how to involve kids when they can't serve themselves, which is to let her kids set the table or get their drinks.

Other moms responded to themes that appear in all the messages about children serving themselves. They liked the way the messages emphasized independence, and, they related that skill to broader life skills—even though as one mom admitted, "Sometimes we don't want our children to grow up." Another mom discussed the difficulties of letting children serve themselves because, as mentioned before, some children don't know portion size, or do, and still serve themselves larger portions. This mom felt it is a problem because later in the day the child will become sick or "have nightmares."

Information Channels

During the focus groups, mothers of preschool-age children discussed the information channels that would be most effective at transmitting nutrition information to them, their children and families, and other mothers like them. A range of ideas emerged from the conversations. Mothers commented that nutrition information can be shared through informal means, such as talking with a neighbor

or a group of friends. Mothers suggested placing pamphlets in clinics or to have information available at other places they frequent. Mothers also felt that radio and television would be a good medium to reach people with information about nutrition.

Mothers placed an emphasis on radio because, based on the conversation, it seems most people have access to and frequently listen to the radio. Moms offered suggestions on specific stations that nutrition messages could be played on, and when asked about television, moms commented more about times of the day when it might be most effective to reach moms and children with information. Moms suggested having nutrition information played during soap operas. If the messages were geared towards the kids, moms suggested playing information on the television in the afternoon when the whole family would be home. If this was the case, they suggested making it fun in order to capture the children's attention, and fun commercials or cartoon programs might be a good way to reach their children. When probed, mothers felt that educational videos would work if the videos taught them how to cook vegetables and provided recipes. One mom suggested playing videos at the start of a nutrition class.

In addition to the various media discussed thus far, mothers felt that having "billboards" or posters that contain messages, images, and information about fruits and vegetables would be helpful, effective, and could potentially reach a large number of people. Mothers discussed various locations for these posters. Moms thought it would be useful to have posters hung at their child's school, in clinics, doctors' offices, WIC offices, grocery stores, and on the streets and highways (assuming the latter would be large scale billboards). When prompted, moms provided extra information about hanging posters at their child's school and suggested hanging posters in school offices and at the entrances and exits of classrooms. Mothers of preschool-age children thought that elementary schools should be included in this effort

so that messages would reach their older children as well. Moms further commented that if teachers sent information home, such as recipes or nutrition tips, they would read the material and find it helpful.

Moms also thought it would be helpful if posters were hung in grocery stores. When moderators probed about this location, moms suggested hanging or placing posters in the produce section and aisles and shelves in the store where some of the "unhealthy" items are located. Moms would like to see informative posters about fruits and vegetables or a poster that has a healthy recipe on it. Moms felt that some of the posters could be geared towards kids in a fun way, but they should mostly be oriented towards mothers since they decide what to buy or not buy at the store. One mom emphasized that it would be a waste for the posters and messages to only be geared towards kids because moms are the ones that have to offer, and enforce the importance of, fruits and vegetables. Moms also indicated they would take time to stop and talk to someone in the store who would have information about eating healthy. Moms reinforced that recipes are of interest to them, and they are interested in attending nutrition classes at their child's school or at church.

Mothers' availability differed regarding optimal times to hold nutrition classes. For some mothers, mornings and daytime work best. Other mothers indicated they were only available in the afternoon. Furthermore, if events were to include families, moms commented the events would have to be held after school hours to accommodate their child's school schedule, and one mother suggested meeting once per month. Nonetheless, moms enjoyed participating in groups "like this" (i.e. focus groups) because they were able to share their opinions and experiences, contribute to the conversation, and interact with other moms they can identify with. Moms valued learning from one another versus attending a lecture style class where one person is talking to them, not with them.

When asked about posters and billboards, moms had a number of suggestions. One mom commented that she would like to see cut fruits and vegetables on the posters. Another mom thought that the posters should be big to capture people's attention, and it was also suggested by a mom to use caricature images. However, the most salient themes that emerged pertained to the aesthetics and images that should be used on the posters. Overall, moms thought posters should contain bright colors and images of various fruits and vegetables, children, and the family. Moms want to see children in the posters and specifically small children that represent 3-5-yearolds. However, moms thought that older siblings should be included too. A couple mothers would like to see the message or "slogan" on the posters in addition to pictures of kids playing. Moms also felt that it is important to include an image of a family, reflective of their own, eating fruits and vegetables. This prompted a discussion regarding what constitutes the makeup of "a typical Hispanic family."

Mothers had varying views on what a typical Hispanic, specifically Mexican or Mexican-American, family looks like. Some moms felt that a typical family has two parents (a mom and a dad) and two to three children. Moms commented that in the past families used to be bigger, but overall, this is a good representation of what a Hispanic family looks like today. Other moms felt that single-parent households are more representative of Hispanic families in current times. In single-parent households, moms felt that one gender wasn't more representative than the other, meaning both single moms and single dads raise families on their own. Mothers also placed an emphasis on the general importance of family in Mexican culture, and from the discussion, the family unit is close knit and of utmost value. Mothers made subtle comparisons with American families, saying that Mexican families are unified and that Mexican culture tends to be "warmer." One mother gave an example that many times families will live together until marriage

or other major life events occur, whereas, in the participants' opinion, American children are thought to typically leave home when they turn eighteen.

Because family is valued so highly, mothers would like to see fathers included in the posters and overall nutrition campaigns. Moms want dads included in the images used on posters and feel it is important to include dads because they play an important role in the family and in the development of their children. Mothers felt that fathers need to be educated about nutrition because it is not solely the mothers' responsibility to make sure their child is eating healthy and nutritious food. Furthermore, one mom commented that her husband is the one that does the grocery shopping in her family, and another mom pointed out that dads also cook and need to know how to prepare different foods. Some mothers felt that programs or different educational opportunities that are offered focus too much on moms, and there is a need to create opportunities for fathers and kids to learn and spend time together. Moms indicated that dads are interested in learning opportunities. However, other moms said that some dads still believe in the separation of gender roles and ascribed housework, including shopping and cooking to women. Moms felt this is due to upbringing, especially if dads came from families where female roles were related to the upkeep and care of the family and household. Moms commented that these men are "machos," and this concept is "worst with Mexican dads."

Nonetheless, moms felt that education about nutrition is important. Some moms thought that educating the parents is the first step, but overall, moms felt that information about healthy eating could only help their families. This sentiment also applies to the credibility of information sources. In general, moms already knew that healthy foods were better for their children. Therefore, they seemed open to receiving information from most sources as long as it would benefit their kids. Moms felt

friends and family members are credible sources. Moms also felt that information provided through the government, television, and grocery stores is trustworthy. Moderators asked about the internet, but it seemed some moms do not have access to it.

In general, moms felt their doctor is another good source of information. In fact, one mom felt doctors are credible sources more so than others. Interestingly, however, one mom mentioned it is hard to believe the things doctors tell her about eating healthy if the doctor does not look like he or she eats healthy. Furthermore, moms seemed to think the most credible sources of information are from other parents or people that have been in their place before. Moms said that if another mother or trained community member would lead a group or class about nutrition and healthy eating, they would believe her if her intentions were good. It seemed moms would judge this based on the person's conviction, level of preparation, confidence, and most of all personal experience. The moderator asked the focus group moms if they would feel comfortable leading a group or class, and moms felt it would be difficult for them due to shyness and nerves. The moderator pointed out that everyone participating in the focus group is already doing this giving their expertise and teaching others.



Mothers of Elementary School-Age Children Helping Children Stay Healthy

Ease of Getting Children to Eat Fruits and Vegetables

Urban and rural mothers of elementary school-age children seemed to have mixed feelings regarding the ease with which they are able to get their children to eat fruits and vegetables. Both groups commented that it is not hard to find fruits and vegetables, but it can sometimes be difficult to get children to eat fruits and vegetables. Urban mothers felt that the level of ease or difficulty can sometimes depend on the circumstance. Rural mothers felt that the level of ease or difficulty is based on the type of produce (i.e. fruits vs. vegetables) they serve their children. For example, rural mothers said that it is easy to get their children to eat fruit but hard to get their children to eat vegetables. Even though most urban mothers did not make this distinction, it is important to note that urban mothers often talked about fruit and did not make a lot of reference to vegetables, which could indicate preference of fruits in both urban and rural households.

Time and Strategy

Overall, urban mothers felt that time and strategy are two of the most important factors when it comes to increasing their children's fruit and vegetable intake. Mothers in the urban group



discussed strategies they use to get their children to eat fruits and vegetables. For example, moms involve their children in food preparation to spark their interest, or they prepare and present food to children in a favorable, fun way. Urban mothers also shared ways to deal with fruits and vegetables that have started to go bad. Despite this, urban mothers talked about how time, or lack thereof, affects their ability to plan and strategize. Mothers felt that it is necessary to put in the time to come up with ideas about how to get their children to eat fruits and vegetables, but it is also difficult because mothers have many other daily responsibilities.

In addition, urban mothers discussed how time and strategy also play a role in food shopping and maintaining a budget. Urban mothers thought that it is good to strategize when grocery shopping, and some of their ideas included: knowing what items you already have at home before going to the store; knowing the amount of food your family uses on a typical basis; and using a grocery list to remember what you need while at the supermarket. These ideas not only help urban mothers to plan meals, but it also helps them to eliminate waste and to stay within their budget.

Expense

In general, the cost of fruits and vegetables did not seem to prevent mothers from buying fruits and vegetables for their household. However, mothers in both groups noticed that there can be a difference in the cost of fruits and vegetables depending on the type of fruit and vegetables one buys. One rural mother said that fruits and vegetables can be expensive but did not comment on specific types. Another rural mother said that sometimes she has to buy apples over fruit trays, which her children prefer, because a bag of apples costs less than a tray of fruit. One urban mother stated that she likes organic fruits and vegetables, but organic

also costs more, making it harder for her to buy. Urban mothers commented that frozen fruits and vegetables cost less, but it is sometimes difficult to serve children frozen fruits and vegetables because the appearance is less appealing than fresh produce.

Gardening was brought up in both groups as a way to access fresh fruits and vegetables without having to spend a lot of money. Women in both groups shared that they either have or have had a personal garden at home, but they did mention that gardens require time to establish and maintain.

Urban mothers also discussed expense when buying food in general. Urban mothers often thought about ways to save money by looking for coupons and searching for deals at local stores. However, moms commented it is sometimes difficult to access stores where sales are being held because of lack of transportation. To further help with cost, one urban mother shared her strategy and buys only what she needs for the week. Another mom turned to different family members when she needed ideas on how to cook on a budget.

Fresh, Frozen or Canned

Both urban and rural mothers of elementary school-age children seemed to prefer fresh fruits and vegetables over canned, frozen, or dried. Urban mothers commented that it is hard to serve children frozen or canned fruits and vegetables because of the difference in taste and appearance. Rural mothers added to this saying that fresh produce has better texture than frozen and canned. One rural mother said that she sometimes buys frozen items, but her children will not eat them. Another rural mother commented that she only buys corn and green beans in the can, but all other produce is fresh. Other concerns regarding frozen and canned fruits and vegetables are the amount of sodium and preservatives that are sometimes found in these items. Although, one urban mother said it is possible to

find certain canned or frozen fruits and vegetables with low levels of sodium and preservatives. Despite a preference for fresh fruit and vegetables, mothers recognized that frozen and canned items do last longer than fresh.

Presentation

Urban and rural mothers both felt the way fruits and vegetables are presented to their children are important, and presentations should be colorful to capture children's attention. Urban mothers felt it is hard to compete with commercials that show colorful candies, and rural mothers shared options on how to present fruits and vegetables to children in a fun way. Rural mothers suggested making fruit salad, smoothies, and fruit lollypops for children or to mix fruit and vegetables with other things. Moms also suggested making happy faces with apples or having fruit baskets or fruit skewers. Skewers are good not only because they are colorful and attention grabbing, but also because they are easy as they do not require a plate.

Fruits and Vegetables

Fruits and Vegetables Availability/Accessibility Messages

- 1) Want your kids to reach for a healthy snack?

 Make sure fruits and veggies are in reach.
- 2) When they come home hungry, have fruits and veggies ready to eat.

Fruits and Vegetables Making it easy

- 3) Fresh. Frozen. Canned. Dried. Teach your kids to find fruits and veggies all over the store.
- 4) Let your kids be "produce pickers." Help them pick fruits and veggies at the store.

When discussing the nutrition messages for fruits and vegetables, mothers of elementary schoolage children chose, "Want your kids to reach for a healthy snack? Make sure fruits and veggies are in reach," as their favorite. Overall, mothers understood the message. Moms felt the message tries to encourage mothers to buy fruits and vegetables and to have fruits and vegetables available in the home. Mothers understood that availability also meant storing fruits and vegetables in places where children can easily access them (i.e. having fruits and vegetables within a child's reach). One mother commented that kids need to eat fruits and vegetables in order to be healthy, and another mom added that fruits and vegetables are the best foods mothers can offer their children.

Mothers seemed to relate to the message. Moms commented that often children come home hungry, and food is not prepared. Kids will sometimes look for chips or candy to snack on, but moms in the focus groups prefer for their children to eat fruits and vegetables over other unhealthy foods. Mothers felt this is why it is important to have fruits and vegetables in the house and in reach. One mom stated that if mothers have fruits and vegetables readily available their children might eat them rather than junk food.

Although this message was the overall favorite among the participants, some mothers brought up concerns with words used in the message. One mother felt that "agarrar (to grab)" was not well translated. She suggested to use "poner (to put)" or "tomen (to get)" and thought these words would help make the message clearer. Another mom commented that the word "merienda (snack)" is used more in an adult context, and she felt she cannot relate it to kids. This mom suggested using the word "botana (snack/appetizer)," but another mom objected because she believed "botana" referred to junk food.

Feelings Regarding the Phrase "produce pickers / Cosechadores" in Message 4

Women in the rural focus group did not have much discussion when it came to their feelings regarding the phrase "cosechadores (produce pickers)." One rural mother was okay with the phrase, and another mother shared that her son picks fresh tomatoes from a tomato plant that her husband planted. Neither woman seemed to be bothered by the phrase.

Women in the urban focus group had mixed feelings regarding the phrase "cosechadores." Some urban women were confused by the phrase, but others thought it was a "cute" marketing strategy. Initially, urban women associated the phrase with harvesting crops, and traditional farming images that came to mind included: preparing the soil; planting; weeding; watering; and picking fruit.

However as the conversation continued, different feelings emerged as ideas for a video campaign were discussed. One urban mother suggested that the campaign could include images of children in work clothes with tools and a sac, which plays on the idea of "cosechadores" being traditional farmers. Some women were not receptive to this idea, and one woman commented, "That would be pitiful, seeing a kid with tools." Another commented that she was not offended by the idea but felt like "poor kids."

Despite urban women not being fond of the idea of portraying "cosechadores" as kids working in the field, women discussed how the scenario could be used as a lesson with their children. Urban women thought they could use the scenario to teach their children not to waste fruits and vegetables because someone worked very hard to harvest the fruits and vegetables that they eat. Women echoed the sentiment that, at first, imagining their kids as "cosechadores" was cute, but after more discussion, they "don't

want to bring my kids to the harvest, like us." One participant commented, "The little sac and the tools... I don't know, it hurts, when you already know how hard it is to pick that up. I would have mixed feelings." In the end, the women agreed not to use the word "cosechadores," the idea of kids using tools and carrying a sac, and to eliminate any images of kids working in the field.

Fruits and Vegetables Supporting Documentation

Narrative Paragraph

"I'm hungry." That's the first thing my kids say when they come through the door. I need something to feed them — fast. Sometimes they go to the kitchen and get their own snacks. I found that when I put fruits and vegetables in a place where my kids can see them — they eat them. Now I keep cut up veggies on a low shelf in the fridge and a bowl of fresh fruit on the counter. When I don't have fresh fruits and veggies, I use canned or frozen. It takes a little planning, but it's worth it. I know fruits and vegetables help them stay healthy.

Women in the urban focus group felt that the narrative paragraph was realistic and informative. They commented that the paragraph describes "daily stuff, it is not saying magic tricks to make them eat it." Urban women also felt that the paragraph gave them a strategy to be healthy; "It tells us that we really have to plan." Women liked how the paragraph talks about having fruits and vegetables in reach and in places where kids can see them. Mothers would be willing to try these ideas.

Women in the rural focus group also felt the paragraph was realistic, but they offered their critiques of the supporting document. One rural mother commented that she likes to prepare food for her children versus letting them grab their own snack because her children would be more inclined to heat up food that is store bought, like frozen chicken nuggets. Rural mothers associated the word "rápido (fast)" in the paragraph with fast snacks that are microwaveable, often which are not fruits and vegetables. Also, rural women thought "bocadillo (snack)" sounded like fast food or junk food and not like a healthy nutritious snack. One woman suggested using the word "merienda" instead. (Although rural women do not seem to have an issue with the word "merienda," urban women stated that it was a word they would not use.)



When rural mothers were asked if they would try what is suggested in this paragraph, one mother said that they shouldn't try, but rather view it as something they have to do. She also stated that fruits and vegetables should be cut and ready for children because a) children will not take the time to do it themselves, and b) safety concerns about children using sharp objects.

Supporting Content

Make Fruits and Veggies Easy to See

- •Keep a bowl of washed fresh fruits on the kitchen table.
- Put washed and cut fruits and vegetables on a shelf in your refrigerator where your child can see them.

Make Ahead Fruit and Veggie Snacks from the Fridge.

- Toss veggies with cooked pasta and fat-free Italian dressing.
- Slice apples. Dip them in pineapple or orange juice to keep them from turning brown. Store apples in plastic snack bags or covered bowls in the fridge.
- Kids love to dip fresh veggies in low-fat ranch dressing. Cut up veggies. Store them near the dip on a low shelf in the fridge.

Urban and rural mothers also liked the supporting content; they thought the content was informative and realistic. One urban mother felt like the content gave her new ideas, for instance, making a fruit salad for her children. Urban mothers also liked how the content addressed real life challenges. For example, the content addressed how to deal with fruit that gets old or brown because it was cut and not eaten right away. Mothers thought the ideas regarding having visible and accessible fruits and vegetables and using ranch dressing to dip vegetables were good. One urban woman suggested to add content about whole wheat to the paragraph and to serve fruit on colorful plates to capture children's attention.

A few language issues did come up for both rural and urban women. One mother in the urban group felt the word "sumérjalas (dip it)" didn't fit well. Urban and rural women had problems with the word "estante (shelf)." A couple of women thought that it was not a good word to use, and they commented that they don't use the word in their personal lives. "Estante" reminded women of a place to store things like books or items in the garage. One rural woman suggested using the word "recipiente (container)" instead of "estante."

There was also a small discussion in both groups about describing different types of furniture in the kitchen where fruit or vegetables might be located. An urban woman said if there was a small table in the kitchen she would refer to it as, "mesita (little table)." Some rural women referred to counters in the kitchen as "sink" or "barra." However, "barra" could also refer to a type of table. One rural woman felt the level of education people have might affect how women understand words. "Maybe we understand differently because we cannot say that we had a lot of education. We understand things in a different way; we did not receive that much education at school." Differences in language or the meaning or understanding of a word could also be contextual.

Milk Consumption

Milk Consumption Messages

- 1) Pour some for everyone. Fat-free or low-fat milk helps the whole family stay healthy.
- 2) Pour some for everyone. Fat-free or 1% milk helps the whole family stay healthy.
- 3) They're still growing. Help your kids grow strong. Serve fat-free or low-fat milk at meals.
- 4) Fat-free and low-fat milk: same nutrition but lower in fat. Pour the goodness at every meal.

In terms of the milk consumption messages, "They're still growing. Help your kids grow strong. Serve fat-free or low-fat milk at meals," was the top choice for mothers of elementary school-age children. Mothers in both groups understood the message and liked that the message recommended serving low-fat or fat-free milk to their children. Mothers felt the message helped to teach that low-fat or fat-free milk has the same "benefits" as whole milk, and children are not missing out on anything (i.e. nutrients) by drinking low-fat or fat-free milk. Moms understood the difference between various types of milk lies in fat content, and by offering low-fat or fat-free milk to their children, moms will help their children grow up healthy and strong.

The concept around the first part of the message, that children are still growing, resonated heavily with mothers. It was evident from the discussion how important it was for mothers to have strong and healthy children, but moms also stressed the importance of having their children continue to grow up that way. Based on the discussion, moms felt that they could help their children to grow strong by serving them low or fat-free milk, and by doing so, children could also become healthy adults. A couple of mothers also noted that milk could be served at every meal.

Nutrition and Fat in Milk

Both urban and rural mothers felt it is important to think about fat and nutrition when purchasing milk and dairy products for their children. Mothers commented that it is important to them because of how much their children mean to them. Mothers in both groups discussed a "mito (myth)" or belief that exists that serving whole milk to children is better because it is thought to be more nutritious than fat-free or low-fat milk. However, most women in the focus groups believed that low-fat or fat-free milk is just as nutritious, and overall, mothers seemed to like the milk messages because they helped to clarify the conflicting information. It is unclear how the "mito" regarding whole milk originated.

A couple of women shared personal stories regarding experiences they had in the past regarding milk and nutrition. One rural mother shared that she never thought about milk having fat until she became a diabetic and someone explained fat content in milk to her. This mother feels that people need an explanation about the fat content in milk versus



relying on milk labels to indicate the amount of fat. One urban mother shared that she tries to buy fat-free or low-fat dairy in general, not only milk but also yogurt and cheese. She also tries to buy natural dairy products that do not contain much sugar. This mother talked about an instance where she found cheap cheese at the grocery store but was scared by it because she could not understand any of the ingredients it contained. This made her conclude that the cheese was not real cheese.

Moderators asked the urban women for suggestions on how to reach other mothers with the information that low-fat or fat-free milk has the same nutrients as whole milk, especially since there is a belief that whole milk has more nutrients. Some mothers commented that the words "baja en grasa (low-fat)" or "descremada (fat-free)" can sometimes portray that milk of this kind lacks nutrients. One urban mother suggested doing "mala campaña (bad campaign)" against whole milk. A couple other urban mothers thought that an explanation would be sufficient, explaining or showing moms that some milk has more fat than others and that children do not necessarily have to have whole milk or much fat in their diet to be healthy. Mothers suggested explaining that the difference between low-fat and whole milk is in the amount of fat the milk contains and does not regard the nutrients. One urban mother shared information regarding different types of milk that she learned by taking a nutrition class. Urban mothers suggested to phrase a slogan to say something like, "Leche descremada, tan deliciosa como la leche entera. (Fat free milk, as delicious as whole milk.)" One woman also prefers the phrasing "descremada" to "sin grasa (skim)."

Information Channels

During the focus groups, mothers of elementary school-age children discussed the information channels that would be most effective at transmitting nutrition information to them, their children and families, and other mothers like them. Various themes arose, but the most salient themes pertained to television and other forms of media. Moms thought that an effective way to provide nutrition information would be through television ads and programs, videos and DVDs, and the internet. Moms also talked about receiving information through their child's school.

Overall, moms seem to welcome and pay attention to information that is provided to them by their child's teacher or school. One mother talked about receiving brochures from her child's school and stated it is her job to make sure her kids eat right. Another mom commented that her children internalize information they learn at school and added that kids will come home, relay the information to their parents, and will even take on behaviors themselves. Moms felt that pamphlets and handouts distributed in the classroom would be a good way to reach moms with information. It was also suggested to post information at the entrance of the school, particularly on information boards. Moms mentioned that it helps to see the information when walking into the school.

Although school is thought to be a good location to provide information to kids and their families, moms of elementary school-age children also felt that television is an effective medium to disseminate nutrition information. Moms mentioned that information could be provided through television commercials and programs. Moms felt that kids believe what they see on television, and kids internalize and learn from the information presented to them. One mother gave an example about how her daughter approached her to ask for her help to "move forward" and "develop my skills." (This woman's child watches a television program that is supposed to help develop language and sensory skills.) The same mother also commented that her daughter tells her to buy low-fat milk

because that is what her daughter sees on T.V. In addition to children internalizing information they see on television, moms felt that television provides easy access to information. Moms commented that parents often watch T.V. with their children. Therefore, not only are their kids seeing and hearing the information, but they are as well. Moms suggested playing nutrition information during soap operas or during children's cartoons or other child programming. One mom suggested that the Disney channel might be a good channel to use.

In regard to other media, another suggestion was to provide information online. One mom stated that she frequently uses the internet because of school, and while she is online, she sees an abundance of nutrition ads. She added that her kids also use the internet, so it could be inferred that there is a potential for children to see nutrition ads online as well. However, one mom stated that she does not have access to cable or internet, which is a barrier that was also brought up in the mothers of preschool-age children's focus groups. This mother would prefer to have information through books or radio, but again, another mom had a different perspective because she felt books are

vulnerable to wear and tear and stated that it is likely she would push a book aside or misplace it.

A couple of mothers mentioned that they would like to receive nutrition information through videos or DVDs. One mom stated that her kids are engaged when watching movies, and they often rewind and replay scenes they want her to replicate. This mom stated she would use nutrition videos for this reason. In contrast, another mom felt she was the most powerful source of information. This mom did not want to use DVDs, television, brochures, etc. She feels information must be provided by her, and she needs to be the one to teach her children about nutrition. This mother's sentiment brings up the issue of credibility. In the focus groups, mothers of elementary school-age children discussed the credibility of various sources of information. Mothers seemed to have varying opinions about the credibility of receiving nutrition information from close friends or family members. One mother believes her friends and family are credible sources, feels close to her community, and participates in many local events. She stated that community members take advice and recipes from other members of the group, especially



if the information is coming from someone who has experience such as a gardener or teacher. This mom clarified that she will do her own research if something sounds illogical, but her first inclination is to believe what community members tell her.

Moderators followed up, asking mothers if they would believe a community member who was trained to teach or lead nutrition education groups. One mom felt that a trained community member wouldn't explain the material in the same way as the focus group moderators, and therefore, it would not be easy for this mom to believe the community leader. This mom mentioned that community leaders might be able to give mothers information about being healthy, but they wouldn't be able to provide the sources of information. Another mom mentioned that she has taken classes before and knows a little bit about what is healthy and what is not, but there is a difference between having knowledge and actually adopting the behaviors and living what one teaches. In general, it seems that moms do benefit from talking with other moms, even if it is to gain insight into different lifestyle choices around eating healthy.

There were also conflicting beliefs about the credibility of doctors and pediatricians. A couple of mothers believed information that doctors provided to them because they feel that doctors have their best interests in mind, and that it is a doctor's job to help and heal. One mother felt that this trust comes from the fact that she believes her doctor gives her information for her own good versus trying to promote or sell a product. Another mother added that information coming from a doctor is more convincing because they have training and expertise. In contrast to this, one mother did not believe or trust doctors due to a negative personal past experience. This mother focused more on prevention and utilized natural medicine. Moms also felt that brochures found in clinics, WIC, or community centers are reliable because these locations care about health and avoiding illnesses.

The perceived credibility of nutrition information provided by the government also varied from mom to mom. Some moms believed that information provided from the government is reliable, while others were more skeptical. One mom said she does not believe information provided by the federal government but does believe information that comes from local government sources. Another mom commented that she feels better about information provided through school or obtained on her own accord. It was noted that information, perhaps in general, would be more believable if the source of the information provided additional details regarding the purpose of asking the public to perform certain actions or adopt certain behaviors.

Like most of the sources previously discussed, mothers of elementary school-age children had conflicting views on information provided by grocery stores. A couple of mothers thought information at this venue would be reliable, while, again, others did not. Moms that felt grocery stores are not reliable sources of information explained their reasoning stating that grocery stores are simply trying to sell their products to consumers. In regard to posters and banners hanging in the store that contain nutrition messages, moms felt that they might be reliable sources. Some moms commented that a lot of people would stop to see the posters, while other moms thought a lot of people would ignore them.

Moms seemed open to talking with someone at the grocery store about nutrition. One mom that was skeptical about receiving information from the grocery store said she would believe an employee of the store if they approached her individually to talk about nutrition. Moms commented that they would believe this person if it was a trained neighbor, community member, or a specialist like a doctor. A couple of moms would judge the credibility of someone providing nutrition information in the store based on the approach and style in which they relayed information to her. For

example, it seems one mom would find someone more credible if the person allowed the mom to ask questions, and then provided answers. It seems this mom would not favor someone who would continuously talk because, to her, it would seem like they were just trying to get out information they were supposed to say as part of their job. However, overall, moms felt they would listen and not reject a person approaching them in the store.

When prompted by the moderator, mothers shared their opinions about having a trained community member provide nutrition education and talk with moms at the store. One mom stated that she would believe a community member but noted that the appearance of the person would affect her credibility. This mom felt that if she was the community member to do this, people wouldn't believe her because she is overweight. Other moms agreed with her and felt this perspective reflects what others in the community would think as well. This goes back to the notion that credibility is not just about providing information about eating healthy, people in this position have to practice it as well. One mom commented that this is why she feels it would be better for a specialist to be the one to take on that role.

Going with the notion of appearance, the moderator inquired if mothers would find a doctor credible if he or she was overweight but talked about nutrition. One mother felt that an overweight doctor would, indeed, lose credibility. Another mom felt that this would not affect the doctor's credibility in her mind because she knows that doctors, particularly her own, care about health. However, she did feel that lots of others would also make this judgment. To moms, there is a difference between those that practice behaviors they talk about, and those that talk about it because it is their job (i.e. they are getting paid to say certain things). Importantly, at another point in the conversation when talking about the size of children, the moms indicated that the "bigger" a child is, the healthier the child is.

One mom stated that chubby babies get attention while skinny kids do not. Another mom knows slim children are healthy but states it's "not for me."

In thinking about credibility and other sources, some mothers of elementary school-age children thought that television is a credible source. One mother commented that television can reach more people; therefore, she felt television teaches more information to more people than school. Another mom felt television is especially credible if it is in Spanish with "pure" Hispanic people. Other mothers, as previously discussed, stated that they do not watch television.

Mothers were united in their perception that most online sources did not provide credible information. Mothers commented that they don't believe everything that is online and that not everything on the internet is real. When asked by the moderator what internet pages (or sites) are valid, moms replied that "Google" is not. Mothers would be more likely to believe something from a federal or state website or from a page that they are more familiar with. Moms commented that, when it comes to the internet, it is up to them to decide what is trustworthy and what is not. The issue of access arose again at this point as some mothers stated that they either do not have the internet or do not have much knowledge about it. One mom commented that she does not want to learn or waste her time with the internet. In regard to the credibility of newspapers or magazines, moms felt that newspapers are somewhat credible sources but magazines are not. Moms commented that magazines are like television because most of the time magazines try to sell products and are not concerned about providing credible information. Moms felt that information in magazines can be misleading and that the information provided, especially about products, is scarce. Moms felt that magazines want to make products look good so they will sell. One mom gave an example of a product she found in a magazine, which was a "vitamin cookie." This

mom did not buy the product but made the effort to look for it at the store to verify the information that the magazine provided. It turned out the information in the magazine was not true, but this mom commented that it did put the idea in her head to go look for and research the product. This mom went on to say that she does not believe information found in magazines, but it did serve the purpose of sparking her interest. Another mom commented that she might believe information found in magazines if the articles or ads would provide the source of information, especially if the information came from a doctor or teacher. Moms do, however, like how magazines provide recipes to them. Some magazines that moms read include: T.V. Novelas, T.V. Notas, and People (in Spanish). One mom commented that she does not buy or read the newspaper because it is in English and that the magazines moms discussed are written in Spanish.

In closing out the focus groups, the moderator asked mothers what they thought would be the best venue to teach moms about nutrition. Moms commented that the best venue would be school. Mothers stated that they came to the focus group because the invitation was provided through their child's school. One mother went on to say that if she got the invitation in another place she would have thrown it out, but because it came from her son's school, she paid more attention. Other moms agreed and added that they also came to get to know other moms and learn more about nutrition.

8- to 10-Year-Old Children

At the beginning of each group, youth expressed their views about what it means to eat healthy including drinking water, *horchata* (a rice-based beverage, flavored with cinnamon and sugar), eating fruits and vegetables and drinking milk—the key messages of this campaign. Kids said that their parents (both mom and dad) and often grandparents shaped their ideas about what foods and drinks were healthy.

Kids also mentioned school as a place where they learned about healthy eating. Some of the urban kids mentioned that food with vitamins and fruit with protein were important, demonstrating that school-age kids have knowledge that different foods have different values in terms of health.

One urban child said that healthy foods were those grown "en la tierra donde hay muchas cosas saludables como agua, césped" (in fields where there was water and grass) indicating the belief that non-processed or whole foods are healthier. Kids also recognized the importance of play and sleep in being healthy.

Given that parents are the first and most important educators about healthy eating, when asked what the reasons their parents gave for eating healthy, kids responded that parents tell them to eat well in order to not get sick, to eat well in order to grow strong (milk is good for growing bones), that parents instruct them on the proper amount to eat (not too much, nor too little) and warn them that certain foods were not good for them, soda, for example. Several children emphasized the father's role at home in terms of health education, highlighting the importance of including fathers in social marketing campaigns.

Responses to the Messages

There are four messages for milk and four for fruit. In each of the two focus groups children were presented with either four milk messages and three fruit messages, or three milk messages and four fruit messages. For the majority of messages, responses by kids in the focus groups showed that they understood the intent of the messages: that drinking milk and eating fruits and vegetables are good for you, that they contribute to good health and make you strong. Kids were not shy about indicating when there were words or phrases that did not make sense in the context of the messages.

Milk Messages

Milk Messages

- Low-fat milk keeps you going strong ask mom to pour you some at dinner.
- 2) Fuel up with low-fat milk at meals. And soar through your day like a rocket ship.
- 3) Snack like a super hero. Power up with fruit and low-fat yogurt.
- 4) Eat smart to play hard. Drink low-fat milk at meals.

Children in the focus groups reported that the message, "Snack like a super hero. Power up with fruit and low-fat yogurt," was their overwhelming favorite. In asking why this was their favorite, kids had a variety of responses. Kids liked the words used in the message and thought it was "cool." The content about yogurt received favorable responses, and it resonated most with kids. Kids also liked that the message and poster included fruit and milk and commented that these foods (fruit, yogurt, and milk) are "yummy," "delicious," "good," and "natural." One child liked the poster because the superhero is eating healthy, and another commented that this is their "favorite food." One of the kids also mentioned that their mother gives them these foods every morning.

Kids were able to make the connection that eating healthy (i.e. fruit and low-fat yogurt and milk) helps make them strong and gives them energy. Kids commented that they should drink milk and eat vegetables rather than foods high in fat. One child stated, "You should eat yogurt that has less fat in order to be happy." In both focus groups, children responded affirmatively that the message would influence them to eat more fruit and drink low-fat milk and yogurt. The yogurt in the poster message seemed to be extra appealing. Although this message and poster was the overwhelming favorite among children, a couple of issues arose. One child was not able to relate to the message because they were lactose

intolerant, and some kids were confused about the term "grasa" or fat. Another child was confused by the term "merienda" (snack). However, there were other children that did understand the term.

Three of the urban kids picked "Eat smart to play hard. Drink low-fat milk at meals," as their favorite dairy message. Rural kids were not asked about this message. Kids readily made the association between growing stronger and drinking milk. One child asked what "inteligentemente" meant, but upon hearing an explanation, he/she readily came up with this definition of "eating smart": "Inteligentemente, es cuando comes sabiendo si es bueno o es malo." (English: "Intelligently, eat smart is when you are eating and you know if it is good or bad.") One child made the connection between eating healthy and performing better:

"Si tomas leche y comes bien eres más inteligente y si estás jugando un deporte puedes hacerlo más rápido y ser más bueno en eso."

- 8- to 10-year-old child in urban New Mexico.e

Other messages did not resonate as clearly with the kids and included some words or phrases that proved problematic.

Confusing Words

In the rural focus group, kids indicated that they had problems understanding the phrase "abastécete," in the message "Fuel up with low fat milk at meals. And soar through your day like a rocket ship." One child also commented, "A veces tomas demasiado y te duele la panza." (English: "Sometimes you drink too much, and then, your tummy hurts,") suggesting that maybe fuel up was not a term that went well with milk.

A child also asked what a "nave espacial" or rocket ship was. The urban group was not asked about this dairy message specifically, but they were asked this message with fruits and vegetables.

Ideas and Practices Related to Dairy

One rural child picked "Low-fat milk keeps you going strong - ask mom to pour you some at dinner" as his/her favorite message. No urban children picked this message as a favorite. When discussing this message, it became clear that some kids in both the rural and urban groups were not aware that not all milk is the same. They were unaware of different levels of milk fat, and were thus confused by the word "descremada," or non-fat. When the moderator asked about different kinds of milk, one child listed strawberry, chocolate and regular milk, but when she asked if they had seen fat free, 1% and 2% milk, the majority responded, that yes, they were aware that milk was sold this way. It is less clear if the kids understand that what is missing in fat-free and low-fat milk is the fat and not the nutrients.

Kids also made comments about dairy that help us understand their attitudes toward consuming it. One child indicated that he drank it when he was really thirsty, although he didn't like the taste. During the rural focus group, kids had an exchange about how milk goes with certain foods (e.g. cereal and cookies) but not others (e.g. soup).

Kids reported that they really enjoy eating yogurt and the message that included a reference to yogurt was overall the most appealing dairy message for kids.

Fruits and Vegetables

Fruits and Vegetables Messages

- 1) Be a food detective. Hunt for fruits and veggies with mom at the store.
- 2) Remind mom which veggies are your faves. So she will know to put them on your plate.
- 3) Eat smart to play hard. Eat fruits and veggies at meals and snacks.
- 4) Fuel up with fruits and veggies. And soar through your day like a rocket ship.

"Eat smart to play hard. Eat fruits and veggies at meals and snacks," was the favorite message among 8- to10-year-old children. The pairing of eating and play was remarked on by kids, and kids talked about wanting to do what the poster suggested — to eat and play. Children made the association that eating right enables one to play hard. Kids also were aware that eating fruits and vegetables provide energy and will help to make one strong. One child commented that he or she wanted to be strong in order to be able to play, and a couple of children mentioned that they liked to play sports. This message was not shown to kids in the urban group.



The favorite vegetable and fruit message of the urban focus group was "Remind mom which veggies are your favorites. So she will know to put them on your plate." No rural kids named this as their favorite. The message seemed to resonate with urban kids in terms of having a say in what they eat. One child said his mom always gave him a choice among several for his meal in general. Another child suggested that it is important for moms to ask, so that if the child doesn't want to eat the food, it won't be wasted. In the urban group the discussion of waste came up as well. In addition, in the urban group, one child commented that they inform their mother what foods to buy, but it usually doesn't include fruits. In further discussion in the rural group about which messages they liked the least, a child said she didn't like this message because she doesn't feel it is realistic (i.e. she would not ask her mother to give her vegetables). Another child added that vegetables taste bad.

Buying and Eating Vegetables

"Be a food detective. Hunt for fruits and veggies with mom at the store," was chosen by three rural kids, and by one urban as their favorite. When asked about their first reaction, one child commented that the person in the picture was helping mom buy healthy things. It caught the attention of kids who liked to help their mom or dad pick out food in the stores. Moreover, the message that kids might enjoy helping their parents was picked up by the kids. In both focus groups, at least one child did not understand what the word detective meant. However, another child said they liked it because it included the word detective.

Kids often ask their parents to buy food they request. During further discussion about this concept of reminding your mom about what you like, a child elaborated on his response to this message stating that kids don't always have to remind moms what vegetables they like because often mothers already know.

Confusing Words

Like with the dairy messages when reading the vegetable message, "Fuel up with fruits and veggies. And soar through your day like a rocket ship," kids in the urban focus group said that they had a problem with the word, "abastécete" or fuel up. All the kids in this focus group understood what a "nave espacial" (spaceship) was. This was the last message tested with this group, and as she had done with every group, the moderator asked the kids in the group if they would follow what the poster suggested. Kids gave mixed responses. One child said they would, others wouldn't, and one child elaborated that not everyone believes what they see on posters, or if they do the suggested behavior, it is sometimes a one-time thing. This discussion suggests that even at this young age kids can be critical about how marketing messages influence them.

Information Channels

Rural children named a number of places that would be good for displaying posters with nutrition messages: television, newspapers, a CD that could be viewed on the computer. They had to be prompted with the idea that school would be a good place, but then responded that classrooms would be a good place to display the posters. When asked about what television channels they watched, they said Univision and Nickelodeon. When asked directly about the internet, all the kids seemed to indicate that they used it regularly, either at school or at home.

In the urban group, the kids were less enthusiastic about the internet. One child said he doesn't have a computer at home, but another said that they use it at school. One urban child suggested parks would be other places for displaying nutrition messages. Finally, one child suggested that some children like to watch T.V. and so putting the messages on T.V. programs might also be a good avenue.

Conclusions and Implications Key Findings Summary Mothers of Preschool-Age Children

Cultural values and practices influence mothers' behavior around food and nutrition for their children. Our focus groups showed that mothers think a lot about food practices, such as when to eat, family eating, serving food or not, portion sizes, and the roles their children have in choosing particular foods. While there were differing perspectives on many of these practices within the focus groups, several things are clear. Mothers see that decisionmaking and practices related to food are related to many other aspects of life. Mothers prize family togetherness, the independence and the health of their children, and the role they play in helping their children develop healthy eating habits. Mothers described a variety of eating styles among children in their own families and had developed different practices to respond to these challenges. Mothers related the difficulty of balancing what their children want, what they see as best for them, and their own convenience or constraints (e.g. availability or preference of certain foods, dangers of involving kids in cooking). In general, it seems that many mothers

will go out of their way to provide healthy, nutritious food options for their kids. Many moms are openminded about trying new routines and practices, often because mothers of multiple children related the insight that different things work for each child.

Mothers also offered great insight into ways we could disseminate nutrition information to other mothers. Moms felt the radio would be a good media outlet and also suggested placing posters and billboards that contain images of fruits, vegetables, and family in various locations in the community. Moms believed posters that contain nutrition slogans would be helpful, and posters would effectively reach a large number of people if they were placed in schools, clinics, grocery stores, and other locations. Mothers thought nutrition education is important, and they were open to attending classes or seminars that would provide them with further nutrition information. Moms like groups that are interactive; groups that allow for open participation and contribution from all. Furthermore, moms were open to receiving nutrition information from different sources, especially if the information would obviously benefit their family. However, mothers felt that other parents are the most credible sources of information because they have experience raising children and taking care of a family.



Mothers of Elementary School-Age Children

Overall, mothers of elementary school-age children felt it was important to serve fruits, vegetables, and low-fat and fat-free milk to their children. Mothers placed great value on family and raising strong and healthy kids. Our focus groups showed that mothers understood that eating healthy can lead to good health outcomes in their children. Furthermore, moms made the connection that good health in childhood can lead to good health in adulthood.

Mothers discussed the ease and difficulty they encounter when trying to get their children to eat fruits and vegetables. Mothers felt that it is often contextual, meaning that the level of difficulty they face depends on what type of produce they offer their children (i.e. fruits vs. vegetables; fresh vs. frozen or canned). Mothers also talked about the challenges of having to balance time and money constraints with child preference. Moms recognized that it is important to come up with creative ways to prepare and present food, but due to other daily responsibilities, they were also realistic about what they can and cannot do. Therefore, mothers welcomed nutrition messages, tips, and suggestions that were, not only informative and clarifying, but realistic, and they gravitated to material they could relate to. Overall, mothers understood the fruit and vegetable and milk messages presented and could identify certain underlying themes such as a) availability of fruits and vegetables relates to accessibility of fruits and vegetables; and b) types of milk pertain to fat content and not nutritional content.

Mothers of elementary school-age children also provided suggestions on the best ways to reach other mothers with nutrition information and gave great insight into the perceptions they have regarding credible sources. Moms discussed various

forms of media they thought would be effective in disseminating nutrition information, which included television, videos and DVDs, and the internet. Moms felt that their child's school was another important outlet because mothers pay particular attention to information they receive from their child's school. Moms suggested sending nutrition information home with their child through the school, as well as posting information at the entrance of the school.

In terms of credibility, mothers' views varied from source to source. Moms' opinions differed regarding the credibility of doctors, government sources, television, internet, newspapers, magazines, and information provided at grocery stores. While some mothers trusted a particular source, other mothers did not. However, moms were in agreement that the most credible sources were people that have training, experience, and expertise in the area. Mothers of elementary school-age children have good intuition, as they make credibility judgments based on the underlying intent as to why information is being provided to them. For example, mothers know that some sources share information for the sake of making a profit. Mothers also make a distinction between those who provide information because it is their job and those who actually role model their teachings in their own lives. Moms felt that physical appearance and the nature of the interaction affects the credibility of a source (i.e. open dialogue vs. being preached to). Mothers generally trust the information that family, friends, and community members provide to them while keeping the things mentioned above in mind.

8- to 10-Year-Old Children

The 8- to 10-year-old children in the focus groups shared thoughts regarding nutrition and health. Kids provided insights about nutrition practices that occur within their households, and they offered suggestions about different ways to reach other

children with nutrition information. Children also provided feedback on poster concepts relating to fruit, vegetable, and milk consumption practices.

At this age, children are adept at reading the intent of the messages: eating fruits and vegetables and drinking dairy are healthy. Children associated drinking milk with growing strong. Fruits were widely appealing. At the same time, they clearly articulated when their own personal preferences were at odds with the messages. They stated clearly that the messages do influence them to want to eat more fruits and vegetables and drink low-fat dairy. The messages were most influential, however, when they reflect foods, ideas and practices that the kids already like or do. Kids also responded positively to posters that included images of foods they liked, especially fruits and yogurt. In addition, messages that reflect the idea that eating and drinking healthy foods will enable them to do the things they value—be strong, play sports and play in general—were most appealing and persuasive.

Children felt that nutrition information can be disseminated to other kids through television, newspapers, CDs that can be viewed on the computer, and posters displayed at parks and in their classrooms. Children in the focus groups provided information on specific television channels they watch. Children's opinions differed on the use of the internet. While some children indicated they use the internet regularly, others were less enthusiastic about it.

Implications of Key Findings

The information provided by the participants of our focus groups is highly valuable and can be utilized in the SNAP-ED New Mexico Social Marketing Project's future work, as well as future work by other local, state, and nationwide organizations. While the feedback and insight

provided to us regarding nutrition messages and the participants' personal beliefs, practices and opinions about health, nutrition, and fruit, vegetable, and dairy consumption will be incorporated into future stages of the project, we must also remain aware of underlying themes that surfaced throughout our focus groups that will also add to the richness and relevance of future campaigns and interventions with this target population.

One thing we learned throughout the process is that it is imperative to test new messages with the target audience prior to the implementation of campaigns or interventions in the community. One of the most significant examples of this was the reactions we received from mothers regarding the message about children being fruit pickers. Some mothers had a very negative reaction to the message because of their own background. Some of these families in the focus groups immigrated to the United States to provide a better future for their children, and they are or have been fruit pickers and don't want the same occupation for their children. Because the message was tested with the target audience, we were able to examine reasons why the message was potentially offensive or hurtful. Mothers were able to express their opinions and feelings about the message, and as a group, they concluded that messages like this should not be used in nutrition campaigns with Hispanic families, particularly families of Mexican or Mexican-American descent.



Another example of why messages need to be tested with the target audience is the issues involved with language. It is imperative to incorporate messages in the native language of participants when building culturally relevant campaigns. However, words and phrases are often not neatly translated from English to Spanish and vice versa. We see examples of this in the focus groups with mothers as some of the words in English did not translate well into Spanish. At times, the Spanish translation of a word had a negative connotation or invoked a different feeling, sentiment or meaning all together. This greatly affects the relevance of a campaign, especially when the purpose is to invoke positive behavior change in individuals, families, and communities.

Testing messages for appropriateness and clarity is important to reaching the overall goals of nutrition education campaigns. Furthermore, it is also important to remember not to see individuals or groups as homogeneous based on race or ethnicity. There are great cultural and language differences that can exist within populations. Depending on the region or location of a population, it would be our suggestion to test messages with communities that have a significant amount of geographical distance between them. For example, the culture and Spanish dialect of Hispanics in southern New Mexico differs from the culture and dialect of Hispanic populations in northern New Mexico.

Another theme that surfaced relating to culture is the importance and value that Mexican or Mexican-American mothers and children place on family. From our focus groups we learned what typical Hispanic families look like to participants, and we learned that dads play an equally important role in Mexican or Mexican-American households as mothers. We can see this through the desire of participants to include fathers in focus groups, campaign images and

educational opportunities. It should be noted that future work with this population should aim to include fathers and potentially the extended family (e.g. grandparents) as well.

Another important thing to keep in mind for future nutrition campaigns is the development of messages that valorize "traditional" Mexican food options as healthy, and messages that recognize the diversity of eating styles within families. The fact that one mom suggested that the exposure to different food traditions made her question the healthiness of food she traditionally offers, and another mom's assumption that if the food is served in school, it must be healthy, could be addressed in future stages of the project. We may want to develop messages that reinforce the idea that traditional Mexican foods, are, for the most part, healthy. And that just because a food is served in school, does not mean that it's healthy.

Some of the participants' comments provided important information about the content of the education needed. One mother still referred to the different types of milk by the color of the cap, which could indicate that mothers possibly identify milk by the container color rather than reading the labels.

Phase III

Findings from the focus groups were used to plan Phase III of the Social Marketing Project — the pilot-testing of an evidence-based, tailored Social Marketing Campaign in a rural community in New Mexico. Phase III is underway and includes campaigns on fruits and vegetables, low-fat dairy, and whole grains that are being piloted in a Head Start center, elementary school, and grocery store. A future report will detail the process and outcomes of Phase III.

References

- Mission Statement. United States Department of Agriculture Web site. http://www.usda.gov/wps/portal/usda/usdahome?navid=MISSION_STATEMENT. Updated February 25, 2013. Accessed October 17, 2012.
- United States Department of Agriculture. Strategic Plan FY 2010-2015. http://www.ocfo.usda.gov/usdasp/sp2010/sp2010.pdf. Accessed October 17, 2012.
- United States Department of Agriculture Food and Nutrition Service.
 Maximizing the Message: helping moms and kids make healthier food choices.
 http://www.fns.usda.gov/sites/default/files/Guidebook.pdf.
 Published October 2008. Accessed October 17, 2012.
- 4. United States Department of Agriculture Food and Nutrition Service. Building a healthy America: a profile of the Supplemental Nutrition Assistance Program. http://www.fns.usda.gov/ora/MENU/published/snap/FILES/Other/BuildingHealthyAmerica.pdf.
 Published April 2012. Accessed October 19, 2012.
- United States Department of Agriculture. Supplemental Nutrition Assistance Program Education Guidance. http://snap.nal.usda.gov/snap/Guidance/FY2014S NAP-EdGuidance.pdf. Published March 29, 2013. Accessed August 6, 2013.
- United States Department of Agriculture Food and Nutrition Service.
 Supplemental Nutrition Assistance Program Education (SNAP-Ed) facts.
 http://www.nal.usda.gov/snap/SNAP-EdFactsheet2012.pdf.
 Published August 2012. Accessed October 19, 2012.
- 7. United States Census Bureau. Table 3: Annual Estimates of the Resident Population by Sex, Race, and Hispanic Origin for the United States: April 1, 2010 to July 1, 2011. http://www.census.gov/popest/data/national/asrh/2011/index.html. Population Division (NC-EST2011-03). Published May 2012. Accessed August 14, 2013.
- 8. United States Census Bureau. An older and more diverse nation by midcentury. http://www.census.gov/newsroom/releases/archives/population/cb08-123.html. Public In formation Office CB08-123. Published August 14, 2008. Accessed August 15, 2013.
- 9. U.S. Census Bureau News. Hispanic Heritage Month 2012: Sept. 15-Oct. 15. http://www.census.gov/newsroom/releases/pdf/cb12ff-19_hispanic.pdf. Published August 6, 2012. Accessed August 14, 2013.

- Ennis SR, Ríos-Vargas M, Albert NG. The Hispanic population: 2010. http://www.census.gov/prod/cen2010/briefs/c2010br-04.pdf. United States Census Bureau C2010BR-04. Published May 2011. Accessed August 14, 2013.
- 11. United States Census Bureau. 2012 American Community Survey 1-Year Estimates:
 Language Spoken at Home. http://factfinder2.census.gov/faces/tableservices/jsf/pages/productview.
 xhtml?pid=ACS_12_1YR_\$1601&prodType=table. American FactFinder \$1601.
 Accessed October 23, 2013.
- 12. Ogden CL, Carroll MD, Kit BK, Flegal KM. Prevalence of obesity and trends in body mass index among US children and adolescents, 1999-2010. *JAMA*. 2012; 307(5): 483-490.
- 13. Freedman DS, Mei Z, Srinivasan SR, Berenson GS, Dietz WH. Cardiovascular risk factors and excess adiposity among overweight children and adolescents:

 The Bogalusa Heart Study. *J Pediatr*. 2007; 150(1): 12-17.
- 14. Singh AS, Mulder C, Twisk JWR, van Mechelen W, Chinapaw MJM. Tracking of childhood overweight into adulthood: a systematic review of the literature. *Obes Rev.* 2008; 9:474-488.
- 15. Health Communication and Health Information Technology. Healthy
 People Web site. http://healthypeople.gov/2020/TopicsObjectives2020/ObjectivesList.aspx?topicid=18.
 Updated August 28, 2013. Accessed September 10, 2013.
- 16. Lee NR, Kotler P. *Social Marketing: Influencing Behaviors for Good.* 4th ed. Los Angeles, CA: Sage Publications, Inc; 2011.
- 17. Hersey J, Daugherty S. Evaluating social marketing in nutrition: a resource manual. http://www.fns.usda.gov/ora/MENU/Published/nutritioneducation/Files/evalman-2.PDF. Published December 1999. Accessed September 4, 2013.
- 18. Davis SM, Canaca G, Canaca J, Keane P, Monaghan-Geernaert P, Hanrahan M. SNAP-Ed New Mexico Social Marketing Campaign Phase 1 focus groups report. http://hsc.unm.edu/som/prc/_images/pdfs/snap_ed_report%202012_f.pdf. Published June 2012. Accessed August 17, 2013.
- 19. Strauss A, Corbin JM. *Basics of Qualitative Research: Grounded Theory Procedures and Techniques.* Los Angeles, CA: Sage Publications, Inc; 1990.

Appendix 1

Messages and Supporting Content in Spanish

For Mothers of Preschool-Age Children Role Modeling Messages

- 1) Ellos aprenden viéndole. Coma frutas y verduras y sus niños lo harán también.
- 2) Las comidas son un buen momento para jugar a seguir al líder. Coma frutas y vegetales y sus niños lo harán también.
- 3) Ellos siguen su ejemplo. Coma frutas y vegetales y sus hijos lo harán también.
- 4) Sea un espejo para sus hijos. Coma frutas y vegetales y sus niños lo harán también.

Cooking and Eating Together Messages

- 1) Cocinen juntos. Coman juntos. Hablen juntos. Haga el tiempo de comida un tiempo familiar.
- 2) Haga comidas y recuerdos juntos. Es una lección que ellos usarán de por vida.
- 3) Mezcle un poco de diversión familiar. Cocinar juntos es una lección que ellos usarán de por vida.
- 4) Háganlo juntos. Pruébenlo juntos. Prueben nuevas comidas juntos.
- 5) Hagan del tiempo de comida una aventura divertida. Prueben nuevas comidas juntos.

Offering New Foods Messages

- 1) **Algunas veces, las comidas nuevas toman tiempo.** Los niños no siempre prueban comidas nuevas inmediatamente. Ofrezca frutas y verduras nuevas muchas veces. Al principio deles una prueba pequeña y sea paciente con ellos.
- 2) Si al principio usted no triunfa, trate de nuevo. Puede que a los niños les tome tiempo que les empiece a gustar nuevas comidas. Ofrezca comidas nuevas muchas veces. Antes de que usted se dé cuenta ellos pedirán más. Y usted no tendrá que hacer diferentes comidas para cada miembro de la familia.
- 3) **Porciones pequeñas, grandes beneficios.** Deje que sus niños prueben porciones pequeñas de frutas y verduras nuevas que usted disfruta. Cuando ellos desarrollan el gusto por muchos tipos de comida, es más fácil planear comidas para la familia. ¡Y todos pueden disfrutar la cena juntos!
- 4) Cada pequeña probadita cuenta. Los niños desarrollan el gusto por las comidas a temprana edad, entonces deles a probar nuevas frutas y verduras. Cada nueva probadita es una oportunidad para ellos de encontrar una nueva comida favorita.
- 5) **Pequeñas probaditas, menos desperdicio.** Les puede tomar mucho tiempo a los niños que les gusten nuevas comidas. Al ofrecerle pequeñas probaditas a lo largo del tiempo, ellos pueden aprender a que les guste. Y pequeñas probaditas significan menos desperdicio de comida.

Division of Feeding Responsibility Messages

- 1) **Opciones saludables, decisiones saludables.** Ofrezca a sus hijos opciones de alimentos saludables en las comidas. Después, déjelos escoger cuánto van a comer. Usted les ayudará a aprender a tomar decisiones saludables una lección que ellos usarán de por vida.
- 2) La paciencia funciona mejor que la presión. Ofrezca nuevas comidas a sus hijos. Después,

- déjelos escoger cuánto van a comer. Es más probable que los niños disfruten una comida cu ando comer ha sido su propia decisión. También les ayuda a aprender a ser independientes.
- 3) **Sirva la mesa para triunfar.** Cuando usted sirve opciones saludables en la cena, es más fácil para su hijo comer adecuadamente. Ofrezca muchos tipos de comida, después deje que su hijo escoja cuanto comer.
- 4) **Ayúdelos a saber cuando ya han tenido suficiente.** Los bebés saben cuando ya han comido suficiente. Ayude a sus hijos a seguir escuchando su cuerpo mientras siguen creciendo. Déjelos que le digan cuando ya "han terminado." Eso les ayudará a crecer saludables.
- 5) **Deles una oportunidad de una vida más sana.** Deles la oportunidad a los niños de aprender a dejar de comer cuando están llenos la oportunidad de decir "ya terminé," incluso cuando usted piensa que no han comido suficiente. Y usted les dará la oportunidad de un peso saludable.

Letting Children Serve Themselves Messages

- 1) Ayúdelos a escoger. Ayude a sus niños a aprender a servirse ellos mismos durante la cena. Incluso su niño de 3-5 años puede practicar servirse de un recipiente pequeño que usted sostiene por él. Ellos aprenderán nuevas destrezas y se sentirán "todos grandes."
- 2) **Déjelos que aprendan sirviéndose ellos mismos.** Deje que sus niños se sirvan ellos mismos durante la cena. Enséñeles a servirse pequeñas cantidades al principio. Dígales que pueden agarrar más si todavía están hambrientos.
- 3) **Hey mami, mírame.** El tiempo de la cena puede ser una carrera. Deje que sus niños se sirvan ellos solos comidas que son fáciles y seguras de manipular. Usted les ayudará a aprender a ser más "adultos." Y las comidas serán más fáciles para usted.

Tested Messages for Mothers of Elementary School-Age Children Fruits and Vegetables-Availability/Accessibility Messages

- 1) ¿Quieren que sus niños agarren una merienda saludable? Asegúrense que haya frutas y verduras a su alcance.
- 2) Cuando vengan hambrientos a la casa, tenga frutas y verduras listas para comer.

Fruits and Vegetables-Making It Easy

- 3) Frescas. Congeladas. Enlatadas. Secas. Enséñeles a sus niños a encontrar frutas y verduras por toda la tienda.
- 4) Deje que sus niños sean "cosechadores." Ayúdelos a escoger frutas y verduras en la tienda.

Supporting Documentation-Narrative Paragraph

"Tengo hambre." Esa es la primera cosa que dicen mis niños cuando pasan por la puerta. Necesito algo para darles – rápido. Algunas veces van a la cocina y agarran su propio bocadillo. He encontrado que cuando pongo frutas y verduras en un lugar donde mis niños las puedan ver – se las comen. Ahora mantengo verduras cortaditas abajo en el refrigerador y un tazón con fruta fresca en el mostrador. Cuando no tengo frutas y verduras frescas, uso enlatadas o congeladas. Se ocupa planear un poquito, pero vale la pena. Yo se que las frutas y las verduras los ayudan a mantenerse saludables.

Supporting Documentation-Supporting Content

Haga que las frutas y las verduras sean fáciles de ver.

- Mantenga un tazón de frutas frescas lavadas en la mesa de la cocina.
- Ponga frutas y verduras lavadas y cortadas en el refrigerador donde su hijo las pueda ver.

Bocadillos preparados de fruta y verdura del refrigerador

- Revuelva vegetales con pasta cocinada y aderezo italiano sin grasa.
- Corte manzanas. Sumérjalas en jugo de naranja o piña para que no se pongan cafés. Guarde las manzanas en bolsitas plásticas o en tazas cubiertas en el refrigerador.
- A los niños les encanta meter los vegetales frescos en el aderezo Ranch bajo en grasa. Corte vegetales. Guárdelos cerca del aderezo abajo en el refrigerador.

Milk Consumption Messages

- 1) Sírvale un poco a todo mundo. La leche descremada o baja en grasa ayuda a toda la familia a mantenerse saludable.
- 2) Sírvale un poco a todo mundo. La leche descremada o 1% ayuda a toda la familia a mantenerse saludable.
- 3) Ellos siguen creciendo. Ayude a sus niños a crecer fuertes. Sírvales leche descremada o baja en grasa en las comidas.
- 4) Leche descremada y baja en grasa: la misma nutrición pero menos grasa. Sirva lo bueno en cada comida.

Tested Messages for 8- to 10 year old Children

Milk Messages

- 1) La leche descremada te mantiene fuerte pídele a mamá que te sirva un poco en la cena.
- 2) Abastécete con leche descremada en las comidas. Y vuela cada día como una nave espacial.
- 3) Merienda como un súper héroe. Agarra energía con fruta y yogur bajo en grasa.
- 4) Come inteligentemente para jugar fuerte. Toma leche descremada en las comidas.

Fruit and Vegetable Messages

- 1) Se un detective de comida. Busca frutas y verduras con mamá en la tienda.
- 2) Recuérdale a mamá cuáles son tus vegetales favoritos. Para que sepa servírtelos en tu plato.
- 3) Come inteligentemente para jugar fuerte. Come frutas y verduras en las comidas y meriendas.
- 4) Abastécete con frutas y verduras. Y vuela cada día como una nave espacial.



