Research Report
Informing the Future of WIC: Lessons Learned during COVID-19 from California WIC Participants

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University of California, Nutrition Policy Institute
PHFE WIC, a program of Heluna Health
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Executive Summary

Multiple Concurrent Changes to WIC

For nearly 50 years, the Special Supplemental Nutrition Program for Women, Infants and Children (WIC), a federal nutrition assistance program, has supported low-income, nutritionally at-risk pregnant and postpartum women, and infants and children up to age five. Women and children in these circumstances are at higher than usual risk of nutritional inadequacy leading to a host of life-limiting diseases and conditions. WIC participation has proven health benefits that result in healthcare cost savings.

Participants in WIC typically visit a local WIC clinic at least quarterly to receive nutrition education, and/or breastfeeding support, referrals to other health and social services, and monthly benefits for specified healthy foods. Annually, all participants are required to be certified for eligibility based on income and nutritional risk. In 2020, WIC services were provided to nearly 6.3 million women and young children in the United States. With over one million WIC participants, California serves more women, infants and children than any other state.

Beginning in June 2019 and continuing through the end of March 2020, California WIC began to issue WIC Cards, similar to a SNAP EBT card or a debit card, in lieu of paper coupons. Benefits are loaded online and participants can purchase prescribed WIC foods. Participants can also check their monthly food benefits using a newly created WIC App.

With the onset of the coronavirus pandemic, in March 2020 California’s Governor issued an order requiring individuals to remain at home as much as possible. At the same time, the Families First Coronavirus Response Act gave the US Department of Agriculture (USDA) authority to grant states waivers allowing WIC operations to continue safely during the COVID-19 pandemic. As a result, local WIC clinics ceased most in-person visits and shifted to remote service delivery.

Identifying Lessons Learned during the Pandemic

From June 2020 to March 2021, we conducted structured interviews with WIC participants (n=182) in three California regions: Southern (PHFE WIC, a program of Heluna Health), Central (Clinica Sierra Vista) and Northern (Napa County). The purpose of this timely evaluation was to elicit WIC participants’ perceptions regarding what worked well and which challenges remained during this time of unprecedented change, with a goal of informing improvements to WIC operations during and following the pandemic. A separate report provides findings from interviews with local WIC agency directors about their perspectives on remote WIC services and their preferences regarding WIC services moving forward. A third document summarizes the key policy recommendations from the participants’ and agency directors’ interviews and from a convening of about twenty WIC observers, including local, state and federal administrators, researchers and advocates and WIC participants. The ultimate goal is to use input from WIC agency staff and participants to inform lasting improvements to the WIC program to improve participants’ experience and increase participation and retention of eligible families, as well as inform preparedness for future crises.

WIC Families Experienced Multiple Challenges during COVID-19
Over a quarter of the WIC participants interviewed reported that the pandemic resulted in reduced wages, work hours or job loss, and associated challenges paying for housing. Among those (n=25) who had stopped making payments for housing, a minority (n=9) had accessed income or housing support programs. Nearly 1 in 5 also struggled to afford medical care.

Over half of respondents reported difficulties associated with school and childcare closures, and many reported challenges taking care of children and helping children with distance learning. Adequate physical activity for parents and children was another common concern, reported by about half of families. Respondents found it difficult to find places for children to be active with parks closed and playgrounds restricted. Many also reported fears of leaving the house and concerns regarding their ability to socially distance when outdoors.

Another common challenge was the higher cost of feeding families due to spending more time at home. While most respondents (93%) who had access to school meals were pleased with the program, fewer (39%) were receiving school meals than prior to the pandemic (53%) and less than half (44%) had received pandemic-EBT. Household food insecurity was reported by nearly two-thirds of respondents. Given this multitude of simultaneous challenges, feelings of stress and overwhelm were common.

**Challenges with Access to WIC Foods Especially Early in the Pandemic**

Approximately two in five respondents reported stocking up on staples, particularly early in the pandemic, due to concerns about shortages and to reduce shopping trips and potential COVID exposure. About a third reported challenges finding WIC foods, particularly milk, eggs, and fresh fruit. Only one in eight reported awareness of the expanded WIC food options when regular WIC foods were unavailable and even fewer had taken advantage of those options. Compared to pre-pandemic, most were now purchasing either the same amounts or more shelf-stable foods (96%) and fresh produce (95%). Many respondents also reported purchasing more water, fewer sugary drinks or both (30%), and wasting less household food (42%).

**Appreciation for California’s New WIC Card and WIC App**

A majority of participants used the California WIC App to help them understand which foods they could purchase. Participants were highly appreciative of the WIC Card and WIC App, noting convenience and ease of finding WIC-eligible foods compared to the paper checks used previously. Half of respondents had no suggestions for improving the WIC App. Those who did have suggestions mentioned sending reminders before benefits expire, adding tips on cooking and nutrition, and providing updates about changes to WIC. Several also suggested additions such as a chat or videoconferencing feature, and the ability to pay for WIC foods and schedule WIC appointments using the App.

**Positive Experiences with Remote Enrollment, Recertification, and Nutrition Education**

Among the third of respondents who had newly enrolled in WIC after the pandemic began, the main reasons were for financial help and for food and nutrition. The most common methods used to provide proof of income and other necessary documentation to establish WIC eligibility
were by email or in-person (e.g., by safely showing documents at the WIC site). Nearly all those interviewed reported being comfortable and experiencing few challenges with remote enrollment. Notably, several respondents mentioned that remote enrollment was easier during the pandemic than it had been in-person in the past.

The most helpful ways that participants received nutrition information during the pandemic were by phone call and text. When asked how WIC could improve communications, nearly two-thirds expressed complete satisfaction and had no recommendations for improvements. Some indicated that they preferred the convenience of remote compared to in-person interactions. The relatively few suggestions for improvement centered on additional forms of communication, such as videoconferencing. Others acknowledged, however, the value of in-person assessments and counseling, suggesting the use of a hybrid approach to meet the diverse and changing needs of families with young children.

**WIC Valued in Time of Extraordinary Need**

A theme reported by program participants was that WIC was a tremendous help in meeting families’ needs for food and nutrition during an especially difficult time.

“People at WIC have been helping me a lot and I am very appreciative. Because it’s been rough. Especially when you’re a single parent and you have little kids. So, I’m very grateful.”

“Thanks to WIC my household has been able to move forward, since they take such a huge weight off our shoulders by providing our formula. So I’m just really grateful for WIC. It really, really helps my family through these tough times.”
Introduction

Since 1972, the Special Supplemental Nutrition Assistance Program for Women, Infants and Children (WIC), a federal nutrition assistance program, has supported low-income, nutritionally at-risk pregnant and postpartum women, and infants and children up to age 5 years old. Women and children in these circumstances are at higher than usual risk of nutritional inadequacy leading to a host of chronic diseases. WIC provides nutritious foods, health care and social service referrals, breastfeeding support, and nutrition education and counseling. In February 2020, 6.11M women, infants and children participated in WIC nationally. The number of participants increased to 6.26M by April 2020 due to the economic impacts of COVID-19.

In March of 2020, President Trump declared the COVID-19 pandemic to be a national emergency. In response, WIC operations across the country quickly transitioned to provide remote services. With authorization from Congress, the USDA granted states multiple operational waivers. The states have variously adapted WIC services by not requiring participants to be physically present at WIC clinics to enroll and recertify and by implementing flexible options for obtaining food benefits and nutrition education. For example, states variously offered telephone or video appointments, developed mechanisms to transmit eligibility documents electronically, and expanded WIC-eligible food options.

Simultaneously, and unrelated to the growing pandemic, in the latter half of 2019 and continuing through the end of March 2020, WIC agencies across California began to issue WIC Cards in lieu of paper checks, enabling participants to have monthly food benefits loaded online and to redeem prescribed WIC foods similarly to using a debit card. The state also released a WIC App enabling participants to check their monthly food benefits.

Implementation of these changes provides a unique window of opportunity to gather information from WIC participants and staff to inform innovations to improve the WIC program and participant experience long after the pandemic is over and to ensure that generations to come receive the proven health benefits of WIC.

In 2020-2021, we conducted interviews with 182 WIC participants and 22 local agency directors. The purpose of this timely evaluation was to understand what worked well and what was learned during this time of unprecedented change in California. This brief reports on the perspectives of California WIC participants. A separate report provides the perspectives of California WIC agency directors. A third document summarizes the key policy recommendations from the participants’ and agency directors’ interviews and from a convening of about twenty WIC observers, including local, state and federal administrators, researchers and advocates and WIC participants. The ultimate goal is to inform lasting improvements to the WIC program to increase the participation and retention of eligible families to receive the proven health benefits and healthcare cost savings of the WIC program.
Methods

Structured Interviews

Interview questions were developed by a team of researchers to assess the impacts of the COVID-19 pandemic on WIC families, and their experience and satisfaction with remote interactions and enrollment or recertification in WIC, shopping for WIC foods, and use of the WIC Card and App. The structured interview included a combination of multiple-choice, yes/no and open-ended questions (Appendix). The script was first finalized in English and then translated into Spanish by a native Spanish speaker. A second Spanish speaker reviewed the translation before finalizing. The instrument was programed into Qualtrics (Qualtrics, 2020) and pilot-tested with research staff. All interviews were conducted by phone in Spanish (by one researcher) or English (by three researchers), recorded, transcribed and, if conducted in Spanish, translated into English. Interviewers captured responses to close-ended questions using Qualtrics. Each interview took 20-45 minutes to complete. Each respondent received a $25 gift card (either electronically or through the postal mail) after completing the interview.

Participant Recruitment

In May 2020, 200 current WIC participants with a child 0-5 years old on WIC were randomly selected from administrative records at PHFE-WIC and stratified by primary language (English or Spanish) and whether they had been on WIC prior to the pandemic (‘legacy’ participants) or had joined WIC since March 2020 (‘new’ participants, included to evaluate the process of enrolling in WIC). PHFE-WIC, a program of Heluna Health, is located in Los Angeles County, and is the largest local agency WIC program in the country, serving about 20% of all participants in California. Of the 200, the first 110 were invited by text message to participate to an interview. Research staff then called interested participants in June-July 2020 until 60 interviews were complete, half by English-speaking and half by Spanish-speaking participants. In September 2020, a similar protocol was followed with WIC participants from Clinica Sierra Vista, a WIC agency which serves Kern and Fresno Counties. Of the 200 WIC participants randomly selected from administrative records, 148 were invited by text to participate until 60 interviews were completed in September-November 2020. Finally, in December 2020, 200 WIC participants were randomly selected from Napa County WIC. A total of 120 were invited by text to participate until 60 interviews were completed in March 2021; 2 additional WIC participants were interviewed as they had been scheduled before the 60 mark was reached.

Of the 182 total respondents, half completed the interview in English and half in Spanish. Most respondents were ‘legacy’ (n=126, 69%); 57 had enrolled in WIC in March 2020 or later. All but one respondent was female. The majority (85%) were Hispanic, had a high school education (41%) or higher (32%), and had a median of 2.0 children (median of 1.0 on WIC). One quarter (26%) currently participated in the Supplemental Nutrition Assistance Program (SNAP; CalFresh in California) and three-quarters (75%) participated in Medicaid (Medi-Cal in California). Relatively few received Temporary Assistance for Needy Families (TANF; 4%) or Pandemic-Electronic Benefit Transfer (EBT; 11%). More detailed demographic information is presented in the Appendix.

Data Analysis
Responses to close-ended questions were downloaded into an electronic database (Excel, Microsoft Office 2019) and descriptive statistics were generated (SAS, version 9.4). Responses to open-ended questions were transcribed to capture quotes and coded using Dedoose, a software designed for qualitative data analysis. An integrated approach was used involving a deductive framework for organizing interview responses to open-ended questions based on the interview guide and an inductive identification of themes and illustrative quotes within topic area (i.e., COVID impacts, WIC participation and enrollment, WIC services, use of the WIC Card and App, and shopping for WIC foods and food in general). One researcher, who conducted interviews, reviewed the written transcripts to initially identify themes within each topic area and then identify quotes to illustrate each theme. After finalizing the preliminary coding, quotes within the same segment of dialogue were moved to another topic section when relevant. A second researcher, who did not conduct the interviews, reviewed the themes and quotes and the two researchers reached consensus on any discrepancies in coding and quote selection.
Impacts of COVID-19

What was Evaluated?

To inform ongoing needs of WIC families, questions were asked about the impacts of the pandemic on physical and economic well-being, housing, medical care, and the care of children.

What were Participants’ Experiences with COVID?

Most respondents were moderately (41%) or very (40%) concerned about the pandemic; 19% were not at all or only a little concerned. One in 11 had a member of their household diagnosed with COVID-19. Few (2%) of those reported challenges getting a COVID test.

Families reported numerous other challenges during the pandemic. Over a quarter (29%) had less income due to reduced wages, work hours or job loss. Less than half of those with lost income (43%) had been able to access paid sick leave, wage replacement or unemployment benefits. Such income protections were less often available to Spanish-speaking (28%) than English-speaking (59%) respondents.

“Since COVID started I had to quit work. I didn’t really trust all daycares and stuff high risk, of my kids getting sick. So I just stay home. My husband has continued working.”

“I was laid off for 3 months and my husband as well....No nothing [unemployment benefits]. No pay rights, no right to vacation, nothing, no right to illness, nothing. Nothing was given to me.”

“My husband has another job. But when all of this (COVID) just started he was laid off for about 2 weeks then they gave him work but just of 1 day or 2 days (per week).”

Over a quarter (27%) had difficulty paying for housing. Among those facing housing issues, half had to stop making rent or mortgage payments during the pandemic and relatively few who had stopped making payments (18%) were aware of eviction protections.

“We made an arrangement with the owner because we told him that we can’t pay the rent and we’ve borrowed from family members because at the bank they’ll charge more interest and some of our relatives were able to lend us a little. We’re paying the owner little by little.”

“There were two programs to which we applied and they helped us for 2 months with the rent. Since April we have not paid for electricity, water, garbage and we’ve been receiving letters that we need to pay or apply for a program, but we haven’t been able to pay that.”

Many families (60%) reported challenges with school and/or childcare closures. Almost half of those impacted reported that at least one parent stayed home to take care of children by reducing work hours, quitting work, or not looking for new work. A quarter of respondents (25%) reported that caring for their children at home was difficult and 12% volunteered that they experienced challenges helping their children with distance learning.

“I barely found a babysitter for my daughter, but she’s only available some days of the week. So I’m only able to work part-time. And then my son’s teacher actually got COVID because he started to go back to school. So...he’s back at home again....Now I have to find a sitter for him.”
“I’m [the] only [one] in charge of my daughters and I can’t work because I have to be here with them and I don’t have someone to take care of them and I don’t have someone to help me put them in school online.”

“It’s been tough, you know with the home schooling and everything. I have a daughter that goes [to elementary school] and I have a three year old and then the baby that was just born. I don’t know... I guess I mean, it was kind of tough,...the patience to sit with my daughter. Sometimes she didn't want to do math and stuff like that, or was not fully trying to deal with all that with me....Getting ready to go into labor and stuff...I felt like that affected me, affected her because I wasn’t on track with her assignments.

With children learning from home, families were often required to provide more meals. Over half of families (53%) had received school meals for their school-age children prior to the pandemic. Slightly over a third (39%) continued to receive school meals. Among those receiving school meals, the majority (93%) were very or somewhat satisfied with the school meal program (Figure 1).

Figure 1. Satisfaction with school meal program high during COVID, but fewer families able to access program than previously

“I think it’s very convenient that they just have it like a drive-through, you don’t have to get out with the kids in the car and honestly I think everything about it is very convenient.”

“For me everything is perfect. I qualified for delivery (of school meals) to my house and that way I don’t need to go out.”

However, for some families, transportation was a barrier to accessing school meals. Moreover, several were concerned about the quality of the foods provided.

“It would be easier for (the school) to give us everything once a week, because I don’t have transportation and...now the weather is bad.”

“The way that (schools) planned it (meals) out and everything was pretty okay. I don’t think they’re slipping. There’s not much I would change about it. Maybe the schedule because they only did it from 8:30 to 10. Maybe do it a little bit longer. When I went during the pandemic they would give me [meals] for the three of us (all in the family).”

“Like at the beginning of the pandemic, as we also didn’t have much money because out of necessity we walked to school every night and it made me think that what they give us is fine. But I think that they give the children too much food that is not healthy....And it really worries me because only now I realized what they ate when they were in school.”

“I think that a lot of the meals that are given, which I’m very grateful for, are not as healthy or they have a ton of sugar. Maybe replace some of the food that they give the kids with healthier versions of foods, like not juice, but milk or water.”
Relatively few families (9%) received free childcare meals (i.e., through the federal Child and Adult Care Food Program) prior to the pandemic, only a third of whom continued to do so during the pandemic.

Less than half (44%) received pandemic-EBT, which was described as being extremely helpful during a time of great need. However, not all were successful in accessing these benefits.

“(Pandemic-EBT) really helped us a lot because it was at the time that we had no money, no job, or unemployment. It still hadn’t come. Because what they gave them (children) from school was too difficult for me because I don’t have transportation to go daily to pick up.”

“For the months that were the most difficult (June, May, July).….it (pandemic-EBT) helped very much because we did not have to worry about food.”

“We were having trouble with the rent and payments. And then figuring out how to get food….But now that I have the (pandemic-)EBT card. I know I can go to a store and get whatever they need in the house like yogurt or milk. So it helped me a lot with the EBT.”

“Well they (school-age children) are more at home now. I’ve been feeding them more fruits and vegetables, so it (pandemic-EBT) has helped a lot…buying and feeding them when they’re home more.”

“For pandemic EBT I wasn’t really sure how that works... I’ve asked around and they told me that usually the office that helps you with all that kind of paperwork is not open. So it’s been very difficult to reach out for help in the office, the offices are closed, or that’s what I believe.”

A majority of respondents (63%) reported household food insecurity, defined as not being able to afford enough food for all members, and half of all respondents had received food from a food bank or pantry during the pandemic. Among those who had used the emergency food system, most (76%) said the first time doing so was during the pandemic.

Other challenges experienced during COVID had to do with paying for medical expenses, including medications (17%). The most common issue reported by respondents was difficulty getting treatment or quality treatment; respondents had issues scheduling medical appointments or they received virtual treatment that was not sufficient. Multiple respondents reported that their clinics or medical offices had limited hours and appointments were hard to get.

“One of my sons has asthma. COVID-19 made me fear going out to take him to a hospital when he has his checkup, or take him to the pharmacy when I know he’s in danger of getting COVID-19.”

“It was hard making appointments and being able to go to the office to appointments in general. Everything was just rescheduled constantly. And then on top of that, the expenses. We had to apply for Medi-Cal (Medicaid) because of the loss of income.”

Another common challenge was getting physical activity (48%). Multiple respondents reported difficulty finding places for their children to be active with parks closed or playgrounds restricted – especially when children no longer had regular access to physical activity in school or childcare. Many also reported fears of leaving the house and concerns regarding their ability to socially distance when outdoors.

“My girls they were used to always going to the park, taking them to a center where children could play. But ever since COVID started I have been unable to take them anywhere….I do take them to the parks, but only to walk
there, but they want to play there where they were used to playing….Sometimes I don't even want to take them because they want to go to where the swings and slides are and all of that, so it's a bit complicated….They want to play and they don’t understand that they can’t….It’s difficult for the children to be in the house (so much).”

“Well, here (at home) we do a bit of dancing, but apart from that, we don’t walk any more. He wants to touch everything, he wants to get close to everyone and how do I tell the little one “no”? I take him to my mom’s house because my sister lives there and my sister has a little boy and I know that it is exposure (to COVID) and I shouldn’t, but I say ‘My God, I have to find a balance between good health and emotional wellbeing.’ That is what the child requires.”

“I live in an apartment, a little apartment house and it has a lot of different units. So, I don’t really like to go outside or take them (my children) outside. I feel like it might be a little scary because there’s a lot of people that live here. So I don’t live in the best area with a baby and everything. It’s kind of scary for me to even try to go out somewhere where I could even try to take them, like the parks and stuff.”

“Well, I take my kids to the park and run them like they were in school. I try my best. I try to give my kids activity because they have been getting a little chunky.”

Finally, as many as one in three respondents reported mental health challenges, including experiencing little or no pleasure in doing things (Figure 2) or feeling down, depressed or hopeless (Figure 3) in the prior two weeks.

“I think it (COVID) affected me with my mental health, because right when the pandemic happened, I just had my baby. So I was experiencing baby blues and depression and with that, it just made it worse. And when everyone was saying not to go out and everything, well it was really hard for me because I wanted to go out and wanted to, you know, distract myself a little bit from being home all the time. It was hard to get through.”

“It’s very stressful especially because they (the children) don’t have school. My daughter would release some of her energy at school and during recess or whatever and now we are having her home all day long. It’s been very stressful. I seem to be more stressed out so I release my stress on her, which is so unfair. But I feel like it’s just due to COVID that we are in this situation.”

“It was hard to find somebody to come to help me at home…with my son or my daughter and it was just really hard….I went through postpartum depression because of it, because it was just too much.”

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Figure 2. WIC participants feeling little or no pleasure in prior 2 weeks

- Not at all: 67.6%
- Several days: 21.4%
- Over half of days: 5.5%
- Nearly every day: 5.5%

Figure 3. WIC participants feeling down, depressed, hopeless in prior 2 weeks

- Not at all: 71.4%
- Several days: 19.2%
- Over half of days: 3.9%
- Nearly every day: 5.5%
WIC Foods and Use of WIC Card and App

What was Evaluated?

California implemented a USDA waiver allowing food package substitutions when WIC foods were not available in stores due to shortages during the pandemic. WIC participants were able to substitute milk or yogurt of any fat content instead of the 1% or non-fat milk prescribed for most participants, whole grain/whole wheat bread in 24 oz. packages instead of 16 oz. packages, and baked beans for dried or plain canned legumes. Simultaneously, shopping with the WIC Card and App was relatively new to California WIC participants. Of the study’s three sites, Napa County was among the first California regions to transition from paper coupons (also referred to as checks) to electronic benefits in June 2019. Los Angeles County transitioned in January 2020, Kern County in February 2020, and Fresno County in March 2020. Because of the confluence of the new WIC Card and App with COVID-19, participants were asked about challenges with purchasing food in general, regular WIC foods as well as substitutions from the expanded WIC foods list, in addition to using the WIC Card and App.

What were Participants’ Experience with Food Access in General?

Stocking up on staples was somewhat common (reported by 41% of respondents) early on in the pandemic due to concerns about shortages and to reduce shopping trips and potential COVID exposure. The respondents who stocked up on food reported purchasing quantities sufficient for up to 2 weeks (41%) or longer (42%) at a time. Others reported that they would have liked to purchase more staples but were unable because of food shortages in stores.

“Yes, (stocked up on food) when it (pandemic) started and they said that a quarantine was in place and that they were going to close the stores...But later, (we) only (purchased) what we needed.”

“Yes, (stocked up on food) for fear that there is no longer anything at the market. It has already happened to us. What we looked for we haven’t found.”

“We just go in and we take advantage of our trip and we try to stock up on things that we can just keep in our pantry for a longer time so that we can we can avoid taking so many trips to the store.”

“No (to stocking food), on the contrary, when we went to the store there wasn’t much. Many of the products had been taken.”

Compared to before the pandemic, most families purchased either the same amount (48%) or more (47%) shelf-stable foods during the pandemic. For most households, purchase of fresh fruits and vegetables during the pandemic did not change (57%) or increased (38%). Several respondents mentioned a desire for improved health and immunity and needing more fresh fruits and vegetables because they were consuming more meals and snacks at home than before. Beverage purchases did not change for most households, but among the third (37%) that did report a change, many said that they were buying more water and less sugary beverages for similar health reasons.

“I like for them (children) to eat a lot of fruit and more now that the immune system must be fed better.”
“Since the activity of the children has been lower, I have tried to give them more healthy foods to compensate for their lack of physical activity.”

“Because right now everyone wants to be healthy. I am trying to incorporate more vegetables and fruits to my kids. Before COVID-19, I think everyone was not eating healthy at all. But right now, everyone is trying to eat healthy.”

“I feel like we started drinking more water. To help our immune systems.”

“We’ve bought a lot more water, because there was a shortage of water in the beginning. Besides that I also did buy more water because we’re trying to…drink more water than anything sugary like juice and soda.”

Respondents were also asked about food waste during the pandemic. Compared to before the pandemic, most wasted similar amounts (57%) or less food than usual (42%), with the primary reason being that they were at home more and could make better use of leftovers and that they were treating food with more value during the crisis. However, many acknowledged that they wasted very little food even before the pandemic occurred.

“What were Participants’ Experience with WIC Foods?

The majority of respondents shopped for WIC foods at large grocery stores (49%) or ‘WIC only’ stores (39%) whose food options cater to those redeeming WIC benefits. Some reported that during the pandemic stores made a special section for WIC foods (27%) or allowed preordering of WIC foods by phone or online for in-store or curbside pickup (15%). Several participants expressed a desire for online shopping of WIC foods for safety reasons.

“I’ve tried to avoid going to the store and I’ve been doing a lot of grocery pickup. And with WIC, we unfortunately can’t use our benefits that way. That’s the only challenging part I feel (about using WIC food benefits).”

About a third (30%) reported challenges finding WIC foods, more often at grocery stores than at WIC only stores, but primarily only at the start of the pandemic. Not finding WIC foods meant that some participants were unable to use all their WIC food benefits and had to use other funds to purchase food.

“Especially in the beginning they (WIC foods) were just not in stock and my checks were set to expire within the next couple of days. So there was no way of getting them (WIC foods). So I just had to forfeit those (WIC) checks.”

“The beginning was really difficult. A lot of the places didn’t have all the items and I had to just skip out on stuff for the month.”
Among those who reported challenges finding WIC foods, the most common shortages were for milk (64%), eggs (33%), and fresh fruit (33%). Among participants (n=77) with an infant on formula, 10% reported having difficulty finding WIC-approved infant formula during the pandemic.

“I would go to Target, and all the eggs were gone. I would go to Walmart, all the eggs were gone…. I would then head over to Raley’s and then I would be able to find some eggs, but it was really difficult because they put a limit on the amount that you can get…. And it would be difficult to go back… to run another errand and go get eggs, when you have a baby at home. You’re not trying to take the baby outside (because of COVID risk).”

“I wouldn’t find milk so, I wouldn’t be able to get milk for two weeks. Or I will have my husband find milk at a gas station at a small store. He would have to pay double the price.”

“They (stores) didn’t have enough formula at that time. Because I would go and I would try to get all the formula, I can in one shopping trip so I wouldn’t have to worry about getting more. My family would go out and buy me a larger size formula instead of the one that’s approved by WIC. We would have to spend money out of their pocket to buy formula.”

Very few participants (12%) were aware of the expanded WIC food brands and package sizes. Seven participants learned about the expanded list from WIC staff, seven at a store, four through the internet/news/social media, and two via the WIC App. Two reported that their store did not allow the expanded options. Among those who knew about the expansion, only a quarter (24%) had purchased any of the new options.

“I found out (about expanded WIC foods) when I went to look for, I believe it was… cheese. (The store) didn’t have the packaged cheese but they had string cheese, which I didn’t know you can get with WIC now. I found it out through one of the employees there.”

What were Participants’ Experience with the WIC Card?

Participants were highly appreciative of the WIC Card, noting that it was more convenient than paper coupons, easier to remember to take to the store and easier to use, in combination with the WIC App, to find WIC-eligible foods.

“I actually love the WIC card, because there were days (before) I’d forget the folder (of coupons) at home.”

“I feel that it is easier now to buy… before I didn’t use the (WIC) Card just the coupons then. Now I go to the store with the Card and I can see on the phone (with the App). It’s no longer like before (when) I was walking around with the coupons comparing and all that.”

What were Participants’ Experience with the WIC App?

A majority of participants who had newly enrolled in WIC during the pandemic had downloaded the App on their smartphone (88%) and had used the WIC App to help understand the foods that they could buy with their WIC Card (86%). Notably, more English-speaking (97%) than Spanish-speaking (79%) participants had downloaded the App. Similarly, more English-speaking (91%) than Spanish-speaking (80%) participants had used the WIC App to understand what WIC foods to purchase. Many appreciated that the WIC App helped them identify WIC-eligible foods. They particularly appreciated the pictures provided. Many respondents also appreciated the detailed information about sizes allowed, the ability to scan items to check for eligibility, and the ability to
track their balance (i.e., the purchases remaining each month). The WIC App also saved time associated with searching for eligible items or mistakenly taking ineligible items.

“Well, we click on let’s say some milk...I need to know what brand I can purchase, and it (WIC App)...will give me the name of the brand. So it’s a lot easier instead of grabbing any soymilk and taking it to a front register and then telling me that it is not...the correct one. And it gives us a picture of which one qualifies or not. So it’s really, really helpful. Compared to the coupon that they used to give us, I would always grab the wrong item and I would have to leave it at the front, because it wouldn’t qualify.”

“It (WIC App) tells me what I get and the balance of each thing, so when I go in there I already know what I can get and how much.”

Participants were highly satisfied with the WIC App (mean rating = 1.1 on a 4 point-scale where 1 is very satisfied and 4 is very unsatisfied; standard deviation = 0.40). Most were very (87%) or somewhat (12%) satisfied with the WIC App.

“For me it’s been perfect. I tell you that if it had been like this (with the App available) when my girl was little, I think I would’ve received WIC all the time. But I didn’t like to go to the WIC office.”

“I’ll give it five stars because there’s a lot of things that I would forget (when) I had the vouchers and just by the App, I go in and it tells me what I have leftover. And what I need to get.”

About half of the respondents were completely satisfied with the App and had no suggestions for improvement. Some (n=20) complained about issues with the App being too slow, crashing, having sign-in issues or displaying the wrong balance or appointment information. Suggestions to improve the App included providing updates when benefits expire, adding additional resources such as cooking and nutrition tips, and providing updates about changes to WIC. Several also suggested additions such as a chat or videoconferencing feature, and the ability to pay for WIC foods and schedule WIC appointments using the App.

“Only what I would do to improve (the App) is if they could put more information right now because of COVID...if we are able to buy (WIC foods) in other stores, online, like all those things. They could put the information there so that one is aware of what is happening.”

“To have additional pages that would have information like how to feed babies or healthy recipes, information for mothers.”
Remote WIC Enrollment and Certification

What was Evaluated?

Of the 182 WIC participants interviewed between June 2020 and March 2021, 56 (30%) completed enrollment during this time (n=33 English-speaking, n=23 Spanish-speaking). Among the new enrollees, 30 joined WIC for the first time during the pandemic, and 26 returned to WIC after a gap in participation. Most participants learned about WIC by word of mouth (n=18), calling WIC (n=17), or referral from a hospital or medical clinic (n=11).

What were Reasons for Enrolling?

The main reason for joining WIC was to get help with their financial situation (n=20), particularly due to new hardships such as a lost job, reduced hours, and the increased financial burden associated with children not getting meals at school. Other reasons participants enrolled included for the food or baby formula and nutrition counseling.

“(Enrolled in WIC) because of the change of income in my family and I thought ‘you know it will be a great choice right now to be able to utilize that, something that I was in need of for my child.’ And, it was the first time I actually went to ask for any type of help. So, mainly I did it because of loss of income.”

“(Enrolled in WIC) because we needed the help. It was getting very expensive to buy milk and just everything because the kids were not in school anymore. So having them at home 24/7 was increasing my expense for goods like milk and everything they would get at school.”

“I chose to enroll in WIC because I was looking up some of the benefits to being connected to them, and the support that they offer, not just for the nutrition part but you know once the baby isn’t taking formula or the baby is starting foods. I think it’s great that they have all of that support for moms….I was very happy about that.”

What were Participants’ Experiences with Remote Enrollment?

Proof of income and other necessary documentation were often provided by email (n=22), in person (n=18, including 5 while their local WIC site was open before the pandemic; other clinics allowed limited in-person contact and/or curbside provision of documents), by text (n=7), and by other means such as over the phone and by postal mail. Most WIC participants felt comfortable (88%) or somewhat comfortable (10%) providing documentation for enrollment remotely.

“There were a few challenges. One was sending proof of income and my baby’s newborn card for proof of birth over the computer through a picture because to me if I didn’t have access to the internet.”

“They had me show copies, and they had me hold it against the window (of the WIC clinic) for them.”

“Actually I had to go take it in…We had to wear a mask and they did it through like a slit of the door (of the WIC clinic). They didn’t let anybody in.”

Participants found remote enrollment quick and easy, and encountered few challenges when enrolling. Of the few challenges that were encountered, several participants brought up frustration with the time it took to be called back. One participant felt fortunate that access to technology was not a barrier, explaining that it is an issue for others.

“If they [WIC] can do it [call back], within the same day if possible, it will be nice. You know, so you don’t have to wait 24 hours or next day to get a call back.”
If I didn’t have access to the internet, if I didn’t have access to email, if I didn’t have access to a computer, or if I didn’t have access to a smartphone, I wouldn’t be able to provide any proof of income or be connected and communicate electronically with WIC. And so I’m fortunate that I am knowledgeable in using all of those different methods of communication.... But if I didn’t, you know that is a huge barrier for many families to be connected.”

Upon enrolling, participants were informed how to use the WIC Card predominantly by a training video (n=25) or phone call (n=17). Additional methods of learning to use the WIC Card included in person at a WIC clinic (n=11), through written directions either printed out or on the WIC App (n=5), or at a grocery store (n=4).

When asked if they had downloaded the WIC App on their smartphone, most (88%) had done so. The major reason given for not yet using the WIC App involved having issues with their phone capacity/not having a smartphone (n=8) or not knowing how to do it (n=4). Some new WIC participants had not yet gotten to it (n=4) or did not think they needed the App (n=2).

When asked how hard or easy it was to apply to WIC, 39 out of 56 respondents brought up how easy and quick the enrollment process was. Many of the respondents talked about how helpful WIC staff were during enrollment. Several respondents brought up the convenience of remote enrollment compared to in person because of transportation, scheduling, or childcare constraints.

“This time it was the easiest. It was excellent. It was easier (compared to enrolling in other programs).”

“Very easy, super easy. Maybe because everything was done over the phone. I would just send a picture of the documents they asked me for so it was very easy because I didn’t have to leave my home to enroll, super easy. I called them and they asked me for my number of people in my home. And then I scanned over a stub of my check. And then they told me that I did qualify.”

“They made it really easy over the phone and everybody was really nice and helpful.”

“I actually found it much...easier (than in the past) because I didn’t have to go into the office and talk to them in person. Because just with kids, especially if you can’t find a babysitter. So I found it more convenient for me, because I have such a busy schedule because of school. So it works perfectly for me.”
Other Remote WIC Services

What was Evaluated?

Services for WIC participants changed markedly from mostly in-person visits to local WIC clinics prior to the COVID-19 pandemic to primarily remote interactions beginning in March 2020. The majority of the 182 WIC participants interviewed reported receiving information from WIC by phone (selected by 87% or respondents), text (75%), and the WIC App (60%). Other less common modes of interacting with WIC included by email (27%), via an online website (23%), and in other ways (23%), such as in person or postal mail (multiple responses were allowed).

What were Participants’ Experiences with Remote WIC Services?

The most helpful ways that participants received information during the pandemic were by phone call (selected by 48% of respondents), and text (45%). Less common ways were via the WIC App (19%), email (12%), WIC website (8%), and postal mail (2%) (multiple response options were allowed). Respondents often relied on multiple modes of communicating with WIC.

“Usually text (is most helpful), because when they call sometimes my daughters are on Netflix on my phone and they decline all the calls. So when they [WIC staff] text me it stays on there and when I get my phone back, I see it.”

“It’s best to do it through text because sometimes we don’t have time to go and check the App….If they [WIC staff] don’t send a text then I don’t remember that I have an appointment and they’re going to call me or that my benefits are about to expire….If you choose to get the text reminders or even through the email, it’s better.”

In response to a request for suggestions to improve communication with WIC, most respondents expressed only satisfaction (70 of the 113 who provided a response).

“Usually just to call them [WIC] they are really super helpful and are willing to give me resources or to send me directly to somebody else when I need help. I’ve never had a problem. Anytime I’ve needed anything, even before the pandemic, they’ve been great.”

“I think they [WIC staff] are doing everything right. They are on top of it by talking to us to see how we are doing or if we have any questions about the benefits that they’re giving us. We can talk and we know that they’ll respond.”

“They are really responsive, like if I do respond to them they respond right away. So I mean I don’t really have any other suggestions. Because it [WIC] has been really easy to use and they were really helpful.”

“What I do like about them [WIC] is they do try to provide the best information they can. They always have the website to provide more information, or have any specific questions, and stuff like that.”

Several indicated that they preferred remote over in-person communications.

“The phone calls are better than going to the WIC office.”

However, some participants acknowledged challenges with only communicating remotely, including missing weight checks or bloodwork used for assessing nutritional risk and other interactions with WIC staff.
“But the bad thing (with not going to the WIC clinic) is that you see that you go to WIC and they weigh you, they weighed my child, they weighed you, and now there is nothing.”

“When I would go to my appointment [before the pandemic] and they would check up on my daughters...they attended to us well...the conversation pleased me. I don’t know, maybe something like that can be done over the phone.”

“To have the services open to those that are really in need, like pregnant women for one, the ones that are high risk pregnancies.”

What were suggestions for improving WIC communications?

The relatively few suggestions for improvement centered around adding more lines of communication, such as more texts, calls or email, more info on the WIC App, and using videoconferencing. Several participants asked for more reminders about when WIC benefits expire, more help with child nutrition, and more WIC App support.

“I would say just give us a call when our benefits run out, because my benefits ran out and I didn’t know. Nobody called me.”

“Unfortunately the office, you know there’s not really a technical person to reach out to...there was not really technical support for the (WIC) App itself.”
### Table 1. Participant Characteristics by Language and by whether Legacy (enrolled in WIC prior to the COVID-19 pandemic) or New (enrolled or reenrolled in WIC during the pandemic).

<table>
<thead>
<tr>
<th>Race/Ethnicityb</th>
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<th>English-Speaking (n = 91)</th>
<th>Spanish-Speaking (n = 91)</th>
<th>P-Valuea</th>
<th>Legacy (n = 126)</th>
<th>New (n = 56)</th>
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<th>%</th>
<th>N</th>
<th>%</th>
<th>N</th>
<th>%</th>
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<th>%</th>
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<th>%</th>
<th>N</th>
<th>%</th>
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<th>%</th>
<th>N</th>
<th>%</th>
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<th>N</th>
<th>%</th>
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<tr>
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<td>Newly applied to free or reduced price meals since COVID</td>
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a. Determined using chi-square or Fisher’s exact tests (indicated by italics) for categorical variables and T-tests for continuous variables.

b. Hispanic/Latino marked if volunteered when the following race options are offered: White, Black or African American, Asian, Pacific Islander, American Indian or an Alaskan native, or a member of another race or a combination of these; Other includes Pacific Islander, American Indian/Alaska Native or other ethnicities not specified in the table.

c. Reflects Central and Northern California only; Data not available for Southern California participants.
Appendix: WIC Participant Interview Guide

**Introduction**

Hi, my name is [insert name] and I’m from the University of California calling on behalf of the WIC Program. Thank you for responding to our text and agreeing to participate in this interview today about WIC and COVID-19. We are calling to hear more about how the COVID-19 pandemic has affected your family and your ability to access WIC. We want to learn about your experiences to help improve access to the WIC program and other services that may help during this time. We are not trying to sell you anything. The interview should take about 35-45 minutes. In appreciation for your time, we will send you a $25 gift card by mail, text or email when you complete the interview. We encourage you to provide your opinions. Please know that your participation is entirely voluntary. If there are any questions that you do not want to answer or have no opinion about, please let me know and we will go to the next question. If you choose to end the interview before it is done, or if you choose not to participate, there will be no penalties or any loss of WIC benefits you may already be receiving. If you have any questions, you may contact WIC at 1-888-942-2229 or Dr. Lorrene Ritchie, the co-principal investigator at (510) 642-3589. For study purposes, the conversation will be recorded. This will help us ensure that we do not miss any important information you share with us. **What you say will be confidential**, meaning we will not be sharing any information about you with others. Do you have any questions before we get started? (Answer questions; if says now not a good time, ask for date and time to reschedule interview; if no longer interested or does not want to be recorded, thank for time and do not continue with the interview.)

Q0 Do you agree to participate in this interview today?  
No (Record if reason given why not; End call)  
Yes, (continue)  
Did not pick up (add how many times you have tried to contact (i.e. second attempt))

- As we go, I will move through different topics so I don’t keep you for too long.
- There are no right or wrong answers. We’re just interested in your thoughts.

First, I’m going to ask you a series of questions and response options for each question. I will ask you to choose one response or to select all that apply.

Q00 CONTROL Question: Mark yes if WIC is offering additional money for Fruits and Vegetables during Pandemic.  
No  
Yes

**COVID Impacts**

Q1. How concerned do you feel about COVID? [Stanford Q1 modified]. Would you say...  
(read responses):

Not at all concerned  
A little concerned  
Moderately concerned  
Very concerned  
DK/Ref

Q2. Have you or anyone in your household been diagnosed with COVID? (Positive test, or told by medical provider they probably are positive) By household, we mean anyone living with you.  
a. [show if yes to Q2] How were you/your household member/s tested for COVID?  
No  
Yes tested, Please describe  
DK/Ref
b. [show if yes to Q2] Are you/were your household member/s able to get medical help for COVID? (Describe)

Q3. Have you or anyone in your household been concerned about having COVID but have not been able to get tested?

a. [show if yes to Q3] Please describe your experience trying to get tested.

Q4. Due to the COVID pandemic, have you or other members of your household experienced difficulties with any of the following things? I am going to list off several items, please tell me yes or no for each item. (read items in random order) [Stanford Q44; Select all that apply]

Reduced wages, work hours or lost job .................................................Yes/No/DK/Ref (show Q5)
Childcare access .................... Yes/No/DK/Ref
Getting food............................. Yes/No/DK/Ref
Housing........................................ Yes/No/DK/Ref (show Q6)
Transportation........................ Yes/No/DK/Ref (show Q7)
Getting hand sanitizer or cleaning supplies ............................................Yes/No/DK/Ref
Getting medications, accessing healthcare or paying for medical expenses..............Yes/No/DK/Ref (show Q8)
Getting physical activity ...........Yes/No/DK/Ref (show Q9)
Other: __________________ Yes/No/DK/Ref

Q5 [Show if reduced wages/hours or lost job] Have you applied for paid sick leave or wage replacement, or unemployment benefits?

a. [show if yes to Q5] How did you learn about this? (probe with paid sick leave or wage replacement or unemployment benefits if needed)

Q6 [Show if experienced difficulty with housing] Has COVID affected your family’s ability pay rent or mortgage payments?

a. [Show if yes to Q6] Did you need to stop making payments at any time?

b. [Show if yes to Q6a] Housing protections have been put in place that prevent families from being evicted during the pandemic if they cannot make their rent or mortgage payments. Have these helped keep you and your family from being evicted?
Q7 [Show if experienced difficulty accessing transportation] How has COVID affected your family’s ability to access transportation when needed? Describe ________________ How have you dealt with this? DK/Ref

Q8 [Show if experienced difficulty paying for medical expenses /getting medications/accessing healthcare] How has COVID affected your family’s ability to get medications? Describe ________________ How have you dealt with this? DK/Ref

Q9 [Show if experienced difficulty getting physical activity] How has COVID affected your family’s ability to get physical activity? Describe ________________ How have you dealt with this? DK/Ref

Q10 Schools and many childcare facilities have been closed due to COVID. Has this impacted your family?

a. [Show if yes to Q10] Have you had difficulty taking care of children at home? No Yes DK/Ref

b. [show if yes to Q10] How have you dealt with care for your children during this time? Describe DK/Ref

Q11 Do you have any children that were receiving meals from school right before the COVID pandemic began?

a. Have you received school meals and/or Pandemic EBT during the COVID pandemic? No Yes, Both Yes, Meals Yes, Pandemic EBT DK/Ref

b. [Show if Yes, Pandemic EBT or both] Has receiving pandemic EBT helped your family? No... Why not? Yes... How so? DK/Ref

c. [Show if yes to Q11a meals/both] How satisfied are you with the school meal program during the COVID pandemic? Would you say... (read responses): Very satisfied Somewhat satisfied Somewhat unsatisfied Very unsatisfied DK/Ref

d. [Show if yes to Q11a meals/both] What would make the school meals work better for you during the COVID pandemic? Describe DK/Ref

Q12 Do you have any children that were receiving free meals from childcare right before the COVID pandemic began? No Yes DK/Ref
a. [Show if yes to Q12] Have you continued to receive childcare meals during the COVID pandemic?  
   No
   Yes Please describe___________________
   DK /Ref

b. [show if yes to Q12a] How satisfied are you with the childcare meal program during the COVID pandemic? Would you say... (read responses):
   Very satisfied
   Somewhat satisfied
   Somewhat unsatisfied
   Very unsatisfied
   DK/Ref

c. [Show if yes to Q12] What would make the childcare meals work better for you during the COVID pandemic?
   Describe
   DK/Ref

**WIC participation and enrollment**

**Q13** Who in your household is currently receiving WIC? (Read off options)  
I am going to list off several categories, please tell me yes or no and if yes how many for each category.

- Pregnant woman…………………….. No/ Yes____#/DK-Ref
- Postpartum woman…………………… No/Yes_____#/DK-Ref
- Newborn to <12 months)…………….No/Yes_____#/DK-Ref
- Child age 1(<2 years)…………………No/Yes____#/DK-Ref
- Child ages 2 to 5 years…………………No/ Yes____#/DK-Ref

**Q14** We are trying to understand people’s patterns of participation in WIC before, and since the COVID pandemic started in March.

Did you join WIC for the first time during the pandemic?  
(If yes, PROBE: Just to confirm, you have never participated in WIC before March of 2020.)

a. [Show if Q14 no] Did you receive WIC in the past but stopped receiving WIC and then returned to WIC since the start of pandemic in March, 2020?  
   No
   Yes, returned
   DK/Ref

b. [Show if Q14a no] Have you been receiving WIC benefits without any gaps over the last year?  
(If yes, PROBE: Just to confirm, you were on WIC before the pandemic started in February of 2020 and have continued to participate since the pandemic started.)  
   No
   Yes, continuous (Skip to Q23)
   DK/Ref

c. [Show if Q14 or Q14a yes and Q13 includes Pregnant Woman or Newborn] Did you rejoin WIC because of a new pregnancy?  
   No
   Yes
   DK/Ref
Q15 [Show if Q14a, yes, returned] When is the last time your family participated in WIC? (enter month/year, or just year if that’s all she can remember)

DK/Ref

Q16 [show if Q14 or Q14a yes] How hard or easy was it to enroll in WIC? Please describe your experience enrolling/re-enrolling in WIC, including how it compared to enrolling in other programs, if you applied to others. (probe for general experience)

Describe

DK/Ref

Q17 [show if Q14 or Q14a yes] How did you find out you were eligible for WIC? (Mark all that apply)

Friend or family member
Another program. What program? __________
By calling WIC
Online eligibility calculator
Other __________________________

DK/Ref

Q18 [show if Q14 or Q14a yes] This is the first time the WIC Program has enrolled new/returning participants over the phone instead of face to face. How did you provide proof of income, proof of address, (and proof of pregnancy if needed)? (Mark all that apply)

Text
Email
Other________

DK/Ref

Q19 [show if Q14 or Q14a yes] How comfortable were you sharing information this way? (Read responses)

Comfortable
Somewhat comfortable
Somewhat uncomfortable
Uncomfortable

DK/Ref

Q20 [show if Q14 or Q14a yes] Did you experience any other challenges enrolling in WIC remotely during the COVID pandemic?

No
Yes What things could be improved? ______________

DK/Ref

Q21 [show if Q14 or Q14a yes] Why did you enroll in WIC?

Describe________

DK/Ref

Q22 [show if Q14 or Q14a yes] How did you learn how to use the WIC card? (Mark all that apply)

Watched video
Taught by phone
Neither/haven’t done this yet
Other

DK/Ref

Q23 Were you able to download the California WIC App on your smart phone?

No Why not? __________
Yes

DK/Ref
WIC services (asked of all – new, returning and existing participants)

Q24 Have you talked with a WIC staff person by phone since the start of the COVID pandemic, when WIC clinics were closed to participants? (not counting when you enrolled in WIC over the phone. for anyone newly enrolled)  
No (e.g. my benefits are loaded on my WIC Card and I know how to use them)  
Yes  
DK/Ref

Q25 Have you received information from WIC during the COVID pandemic by...?: (Select all that apply)(Read responses).  
Text………………………………… No/ Yes/ DK-Ref  
Email………………………………… No/ Yes/ DK-Ref  
Online website……………………… No/ Yes/ DK-Ref  
California WIC app………………… No/ Yes/ DK-Ref  
Other: (specify)_________ No/ Yes/ DK-Ref

Q26 [Show if yes to any in Q24-25] What have been the most helpful ways for you to get information from WIC during this pandemic?  
Describe__________________________  
DK/Ref

Q27 What suggestions do you have for WIC to improve communication with you during this pandemic?  
Describe__________________________  
DK/Ref

The next questions are about shopping for your WIC foods

Q28 During the COVID pandemic, where do you most often shop for WIC-approved foods? Would you say... (read responses):  
Large store with lots of check out registers  
Small store with 1 to 2 registers  
WIC store  
Have not been shopping for WIC foods (skip to Q36)  
DK/Ref

Q29 Have you had any challenges finding or purchasing any of the WIC foods since the COVID pandemic started? (I can list the WIC foods if that would be helpful (may be needed for brand new participants.)  
No  
Yes Please describe (NPI staff will have a list to prevent conversation on foods that aren’t WIC items)  
DK/Ref

a. [Show if yes to Q29] Don’t read off the list below unless asked. Just mark off which items  
- Fruits  
- Vegetables  
- Milk  
- Cheese  
- Yogurt  
- Eggs  
- Breakfast Cereal  
- Whole grain bread, whole wheat or corn tortillas, or brown rice (this is one category of whole grain foods)  
- Peanut Butter  
- Beans/peas/lentils  
- Beans/peas/lentils: Describe_____  
- Breakfast cereals: Describe_____  
- Canned/ Jarred meats (e.g. fish): Describe_____  
- Canned/Jarred Fruits and Vegetables: Describe____  
- Cheese: Describe_____  
- Eggs: Describe_____  
- Fruit: Describe_____  
- Juice 100%: Describe_____  
- Milk(cow): Describe_____  
- Milk(Soy): Describe_____  
- Peanut butter: Describe_____  
- Tofu: Describe_____  
- Vegetables: Describe_____
100% Juice
Tofu/Soy milk

Infants < 12m:
Infant formula (captured later)
Jarred fruits and vegetables
Jarred meats

Q30 Some food stores are trying to make it easier to access WIC food items during the COVID pandemic. Are food stores in your area offering any of the following? (Read options) (Mark all that apply)

- A special section in the store for WIC foods...
- Preordering WIC foods by phone or online for pick up at the store or curbside...
- Paying online for WIC foods with delivery to your home...
- Other, Describe________

Q31 Are you aware that because of the COVID pandemic, WIC has temporarily expanded brands and package sizes that can be purchased if the WIC food is not available at the store?

- No (skip to Q33)
- Yes How did you find out about this? (go to Q32)

Q32 Have you used your WIC Card to purchase any food items from this temporarily expanded WIC food list?

- No
- Yes Which items? ______________________

Q33 Has the California WIC App helped you understand which foods you can buy with your WIC card?

- No Haven’t used WIC App (skip to Q36)
- No Other reason. Please describe____________
- Yes Please describe____________________

Q34 How satisfied are you with the WIC App?
Would you say... (read responses):

- Very satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Very unsatisfied

Q35 How would you improve the WIC App?

- Describe

Q36 [Show if Q13 infant <12 months on the program] Have you run into challenges getting WIC-approved infant formula during the COVID pandemic? (If no, probe if using formula)

- No Using formula
- No Breastfeeding/not using formula
- Yes What have you done to deal with this? (Probes to include if not shared: Have you had to water down formula, feed infant less, introduce other foods you weren’t planning to introduce yet, faced store item-limits and had to come to the store more)
<table>
<thead>
<tr>
<th>Q37</th>
<th>Many people have been purchasing more food during the COVID pandemic to stock up. Have you stocked up on additional food because of COVID?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>DK/Ref</td>
</tr>
</tbody>
</table>

a. [Show if yes to Q37] Would you say you stocked up enough for up to 1 week, 2 weeks, or more than 2 weeks?  

|     | Enough for up to 1 week                                                                                                           |
|     | Enough for up to 2 weeks                                                                                                          |
|     | Enough for more than 2 weeks                                                                                                      |
|     | DK/Ref                                                                                                                           |

<table>
<thead>
<tr>
<th>Q38</th>
<th>Compared to what you usually buy, have you bought more, less or about the same amount of shelf-stable foods (such as rice, dried or canned beans, or other canned or frozen goods) during the COVID pandemic?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Bought about the same</td>
</tr>
<tr>
<td></td>
<td>Bought more. Why? ____________________________________________________________________________________________</td>
</tr>
<tr>
<td></td>
<td>Bought less. Why? ____________________________________________________________________________________________</td>
</tr>
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<td>DK/Ref</td>
</tr>
</tbody>
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<thead>
<tr>
<th>Q39</th>
<th>Due to COVID, WIC is temporarily providing more money to WIC families for fruits and vegetables. In the past month, was the increased amount...:(read responses)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Not enough. Please describe ______</td>
</tr>
<tr>
<td></td>
<td>Just right. Describe how you used this additional money ______</td>
</tr>
<tr>
<td></td>
<td>Too much. What made it hard for you to spend more? Describe ______</td>
</tr>
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<td></td>
<td>DK/Ref</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Q40</th>
<th>Compared to what you usually buy have you bought more, less or about the same amount of fresh fruits and vegetables during the COVID pandemic? (If bought more, probe if they think this is different from the amount they ate before)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Bought about the same</td>
</tr>
<tr>
<td></td>
<td>Bought more. Why? ____________________________________________________________________________________________</td>
</tr>
<tr>
<td></td>
<td>Bought less. Why? ____________________________________________________________________________________________</td>
</tr>
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<td>DK/Ref</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Q41</th>
<th>Compared to what you usually buy, have you changed the beverages you purchase during the COVID pandemic? (If yes, probe if drinking habits have changed or if they are just stocking up more than before but drinking the same amount)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>Yes What were the changes and why? ______</td>
</tr>
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<td></td>
<td>DK/Ref</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Q42</th>
<th>Households often throw away some of the food that they buy. Compared to the amount of food you usually throw away. Have you thrown away more, less, or about the same amount of food during the COVID pandemic?</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Throw away about the same which is very little (Mark if volunteered)</td>
</tr>
<tr>
<td></td>
<td>Thrown away about the same</td>
</tr>
<tr>
<td></td>
<td>Thrown away more. Why? ____________________________________________________________________________________________</td>
</tr>
<tr>
<td></td>
<td>Thrown away less. Why? ____________________________________________________________________________________________</td>
</tr>
<tr>
<td></td>
<td>DK/Ref</td>
</tr>
</tbody>
</table>

| Q43 | I’m going to read you several statements that people have made about their food situation. For these statements, please tell me whether the statement was often true, sometimes true, or never true for your household in the last month—that is, the last 30 days. [USDA 2-item plus item on cutting size of meals] |

29
a. “We worried whether our food would run out before we got money to buy more.” Was that often, sometimes, or never true for your household in the last 30 days?  
- Often true 
- Sometimes true 
- Never true 
- DK / Ref

b. “The food that we bought just didn’t last, and we didn’t have money to get more.” Was that often, sometimes, or never true for your household in the last 30 days?  
- Often true 
- Sometimes true 
- Never true 
- DK/Ref

c. In the last 30 days, did you or other adults in your household ever cut the size of your meals or skip meals because there wasn’t enough money for food?  
- No 
- Yes 
- DK/Ref

Q44 Since the COVID pandemic have you or anyone in your household gotten free groceries from a food pantry, food bank, church, or other place that helps with free food?  
- No. (Skip to Q45) 
- Yes 
- DK/Ref

Q45 Earlier this year, before the COVID pandemic, did you or your family participate in any of the following programs (read items)? (For each program the respondent reported, ask a as applicable)  
- CalFresh (also called SNAP/EBT/food stamps): yes/no/DK Ref  
- CalWorks (also called TANF, pronounced tan-if): yes/no/DK Ref  
- Medicaid or Medi-Cal: yes/no/DK Ref  

a. [Show if yes to Q45] Are you still participating in this program?  
- No 
- Yes 
- DK/Ref

Q46 Since the start of the COVID pandemic, have you tried to apply for any additional assistance program besides WIC, like CalFresh (also known as EBT or food stamps) or Pandemic-EBT?  
- No (Skip to Q47) 
- Yes 
- DK/Ref

a. Which programs? [READ OUT EACH ONE] (For each program the respondent reported becoming newly eligible for, ask b-c as applicable)  
- CalFresh………………………………………..… Yes/No/DK-Ref  
- Pandemic-EBT…………………………………... Yes/No/DK-Ref  
- Senior Farmers Market Nutrition Program  
- …………………………………………………Yes/No/DK-Ref
CalWorks..............................................Yes/No/DK-Ref
Medicaid or MediCal..............................Yes/No/DK-Ref
Free or reduced price school meals.....Yes/No/DK-Ref
Other ________________________________

b. How did you learn about this program? Describe
DK/Ref

c. Are you now participating in this program? No
Yes
DK/Ref

Now I have a question about COVID and immigration
Q47 Before COVID, did you ever not enroll in WIC or stop getting WIC because of immigration concerns? No
Yes Please describe_______
DK/Ref

I have a few multiple-choice questions about how you are feeling, as COVID has been hard for most families.
(source Patient Health Questionnaire-2 (PHQ-2)
Q48 Over the past two weeks, how often have you been bothered by any of the following problems?
a... having little interest or pleasure in doing things (Read responses) Not at all
Several days
More than half the days
Nearly every day
DK/Ref

b... feeling down, depressed or hopeless (Read responses) Not at all
Several days
More than half the days
Nearly every day
DK/Ref

Would you like a number for someone at the LA County Department of Mental Health you can speak with: (800) 854-7771 OR TEXT “LA” TO 741741

Thank you for sharing this information with us. I just want to ask you some final questions about you and your family. You are allowed to skip any of the questions.
Q49 What is the highest level of education you have completed or the highest degree you have received? (IF HIGH SCHOOL, ASK: Did you graduate or get a GED?) No formal schooling
8th grade or less
Grades 9-12 but not a high school grad
High school graduate/GED
Some college/trade school/ associate degree
(4-year) college graduate
Post graduate/ professional degree
DK/Ref
Q50  For classification purposes, we’d like to know what your racial background is. Are you White, Black or African American, Hispanic or Latino, Asian, Pacific Islander, American Indian or an Alaskan native, or a member of another race or a combination of these? (Mark all that apply)

   White
   Black/African American
   Asian
   Pacific Islander
   American Indian/Alaskan Native
   Hispanic/Latino
   Other (specify) ______________
   DK/Ref

Q51  How many people living in your household are between the ages of:
    (Read off options) (if pregnant count once child is born)

   0-4 years __________
   5-17 years __________
   18-65 years __________
   65 and older_________
   DK/Ref

Q52  What is your ZIP code?
     ______________________
    Describe____________
    DK/Ref

Closing
Q53  At the end of our study, we will share overall findings with the WIC program. Do you have any suggestions for how we might share the findings with WIC participants?
     Describe________
     DK/Ref

Q54  Is there anything else you would like to add or any questions you have?
     Describe________
     DK/Ref

Separate Document
Q55  [IF QUESTIONS ASKED DURING SURVEY]:
     It sounded like you had questions about [LIST ITEMS]. Would you like WIC to contact you and answer your questions?
     [IF YES, MARK THE ITEMS THEY HAVE QUESTIONS ABOUT]

   WIC Card
   WIC App
   Protection for renters or employment
   Expanded WIC food list
   Other__________________
   Participant did not have questions

Q55a Phone number

Thanks so much for sharing your thoughts today. You will be receiving $25 for your time. I can either mail you a gift card or email or text you an electronic gift card. Which would you prefer?

IF mail selected: I am stopping the recording now and noting your address in a separate document so your none of your personal information will be connected to your survey responses. Could you tell me the name and address to send this gift card to?

First name, Last name________________________________________
Street Address________________________________________________
City_________________________________________________________
IF email selected: I am stopping the recording now and noting your email address in a separate document so your none of your personal information will be connected to your survey responses. Can you please tell me the email address to send this gift card to?

Email Address _____________________________________________

IF text selected: I am stopping the recording now and noting your phone number in a separate document so your none of your personal information will be connected to your survey responses. Can you please tell me the mobile phone to send this gift card to?

Mobile Phone _____________________________________________

Thanks again for your participation in our survey!

Notes (If needed)

_________________________________________________________________________