

EVALUATION OF DEMONSTRATION PROJECTS TO END CHILDHOOD HUNGER (EDECH): THE CHICKASAW NATION PACKED PROMISE PROJECT (SUMMARY)

Background

The 2010 Child Nutrition Reauthorization provided funding to test innovative strategies to end childhood hunger and food insecurity. Demonstration projects were funded in Chickasaw Nation, Kentucky, Navajo Nation, Nevada, and Virginia. This report provides the results of the Chickasaw Nation demonstration project, The Chickasaw Nation Packed Promise Project (Packed Promise) that was implemented by the Chickasaw Nation Nutrition Services and its partner, Feed the Children.

Description of Packed Promise

Objective: To reduce childhood food insecurity and hunger, increase families' consumption of nutritious foods, increase the diversity of foods in the home, and ultimately improve diet quality and well-being among children.

Target Population: 40 school districts (115 schools) in 12 counties within the Chickasaw Nation territory in Oklahoma. Within these districts, households with school-age children (both Native American and non-Native American) who were eligible for free school meals or attended a school that participated in the community eligibility provision were eligible to participate in the project.

Intervention: School districts were matched, and then one was randomly assigned to either a treatment (n=20) or control group (n=20). Treatment households (n=2,143) received one food box per eligible child, per month, delivered to the household, which contained (1) shelf-stable foods, including 6 protein-rich items, 2 dairy items, 4 grain foods, 4 cans of fruit, and 12 cans of vegetables; (2) a nutrition education handout (e.g., a recipe); and (3) a \$15 Fresh Check for frozen or fresh fruits and vegetables that participants could redeem at any of 38 Special Supplemental Nutrition Program for Women,

Infants, and Children (WIC)-authorized stores or farmers' markets in the study counties. Control households (n=2,607) did not receive the treatment benefits but still could participate in other available nutrition assistance programs.

Methods

The project operated for 25 months, from February 2016 through February 2018. The evaluation used a rigorous randomized controlled trial design to estimate the impact of Packed Promise on food insecurity among children, and secondarily, on household and adult food insecurity and child dietary intake. Data were collected via baseline and two follow-up telephone surveys and administrative records. For the typical household, the first and second follow-up surveys occurred 13 and 19 months into implementation.

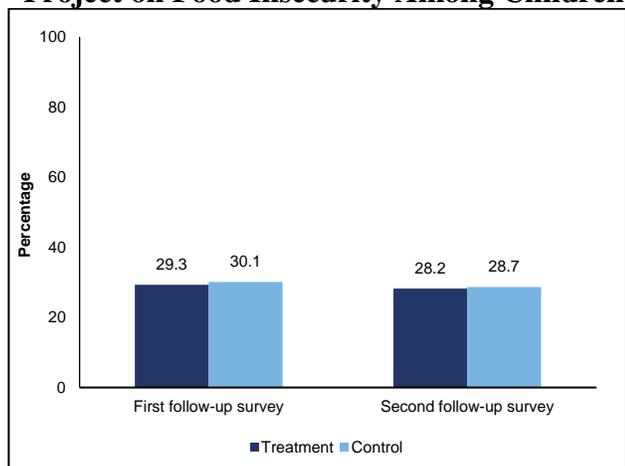
Findings

Packed Promise did not reduce the prevalence of food insecurity among children. About 29 percent of treatment group and 30 percent of control group households reported food insecurity among children (FI-C) at the first follow-up, and this declined to about 28 percent in the second follow-up (Figure 1). FI-C declined from baseline to follow-up in both the treatment and the control groups by 5-7 percentage points. It is possible that an improving economy made it easier for some households to meet their food needs and therefore lessened the impact of the demonstration.

Packed Promise reduced the prevalence of adult and household food insecurity at the first follow-up survey but not at second follow-up. Food insecurity among adults and households was 2.8 and 2.4 percentage points less in treatment versus control households, respectively, at first follow-up. At the second follow-up survey, these differences were less than half a percentage point and no longer statistically significant. It is possible that the maximum impact of Packed Promise was made by

the first follow-up survey, and continued receipt did not further impact adult or household food insecurity.

Figure 1. Impact of the Packed Promise Project on Food Insecurity Among Children

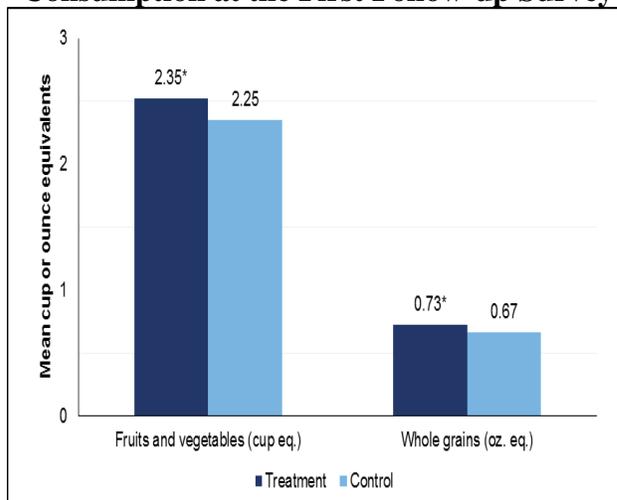


Note: The evaluation sample size at the first and second follow-up surveys was 1,342 and 1,287, respectively. For the control group, it was 1,510 and 1,503, respectively.

Packed Promise led to modest but statistically significant increases in children’s consumption of fruits and vegetables and whole grains. The project led to a 4-percent increase in children’s daily fruits and vegetables consumption and a 9-percent increase in daily whole grains consumption (Figure 2). For fruits and vegetables, this translates to 0.1 cup equivalent per day or three cup equivalents over a month. For whole grains, it translates to 0.06 ounce equivalent per day or one slice of whole wheat bread or 0.4 cup of cooked whole grain pasta over a month.

Packed Promise developed a new and complex infrastructure for ordering and scheduling home delivery of food boxes, a major operational achievement. Over the 25-month demonstration period, 97 percent of households ordered at least one box, with an average monthly participation rate of 59 percent.

Figure 2. Impact on Children’s Food Consumption at the First Follow-up Survey



Note: Evaluation sample for treatment group=1,294 and control group=1,456. *Treatment control difference are all statistically significant (p<0.05).

Packed Promise led to a modest decline of \$22 in households’ monthly out-of-pocket food expenditures. This decline was small relative to the value of additional food from boxes and Fresh Checks, which was \$117 for the average household. This suggests that households were using most of the Packed Promise benefits to supplement the household food supply, not replace it.

Most of the project costs went towards providing food boxes and Fresh Checks. By the end of the evaluation, \$6.3 million was spent, with the largest share spent on packing and shipping the food boxes and redeemed Fresh Checks (70 percent). The remaining funds were spent on other direct costs (3 percent) and labor (27 percent). About 7 percent of total costs were donated or provided in-kind to the project. On average, across 25 months, the cost per participating household (n=2,054) for the Packed Promise project was \$3,103.

For More Information

Briefel, R, Chojnacki, G, Gabor, V, et al. *Evaluation of Demonstration Projects to End Childhood Hunger (EDECH): The Chickasaw Nation Packed Promise Project.* Prepared by Mathematica Policy Research for the U.S. Department of Agriculture, Food and Nutrition Service, April 2019. Project Officer: Michael P. Burke. Available online at: www.fns.usda.gov/research-and-analysis.