

PILOT IMPACT EVALUATION OF THE HOME-GROWN SCHOOL FEEDING PROGRAMME IN GUATEMALA

Guatemala has close to universal coverage of school feeding for primary schools.

The Ley de Alimentación Escolar (LAE), introduced in 2017 to promote improved nutritional and health outcomes for students while increasing the procurement of locally produced foods and beverages, requires that 70% of school meal purchases are procured through home-grown school feeding (HGSF).

The World Food Programme's Guatemala country office, in partnership with the Ministry of Education (MINEDU) and Ministry of Agriculture (MAGA), has developed a smartphone app named the School Feeding Management Application (SFMA), which encourages family farmers to particate in the market and facilitate transactions. The app aims to connect schools and registered suppliers and improve procurement processes.

Before introducing the app to all schools nationwide, the WFP Guatemala country office initiated a pilot programme to assess its operational feasibility. As part of the pilot programme, the WFP Office of Evaluation, in

partnership with the World Bank's Development Impact department (DIME), conducted a pilot impact evaluation to document the causal impacts of the app on procurement practices.

The pilot impact evaluation was launched to inform the potential scale-up of the application and the feasibility of an impact evaluation that would assess home-grown school feeding's impact on farmers' income and agricultural practices.

KEY EVIDENCE O

Findings indicate that overall, the usage of the app was low, with only 7 percent of schools reporting to have completed a purchase on the app. Consistent with the low adoption rate, there is little to no change in school procurement behaviours. The pilot did not identify changes in the number of unique suppliers, number of transactions, quantity and value of procurements, as a result of introducing the app. The pilot found modest evidence (though not statistically significant) that the app's features assisted schools to make better procurement decisions by reducing the hours spent on planning. Moreover, the schools with access to the app were more likely to procure alternative food products when they were unable to find specific ingredients in the Ministry of Education's official menus. These product substitutions did not compromise meal diversity.





KEY FINDINGS

What is the take-up of the app among the schools and suppliers where an app demonstration training session was conducted?

The pilot impact evaluation revealed low app usage, with only 7 percent of schools completing a purchase despite 99 percent attending training. Approximately one-third of schools attempted to use the app, but issues like poor internet connectivity and functionality problems limited adoption. Manual record-keeping, still required for accountability, may have also reduced reliance on the app.

On the supplier side, only 24 percent attended training, a prerequisite for app access. Among those trained, only 15 percent attempted to use the app, and only 4 percent successfully completed offers.

Does the use of the app increase the number and/ or value of purchases by schools from local registered suppliers?

Consistent with the low adoption rate, there is little to no change in school procurement behaviours. The pilot did not identify changes in the number of unique suppliers, number of transactions, quantity and value of procurements, as a result of introducing the app. The pilot found that the share of purchases from family farmers is almost the same between schools that had access to the app, and those that did not.

Does the use of the app change procurement efficiency, and how it relates to the type of food procured?

The pilot found modest evidence (though not statistically significant), that the app offered some efficiency benefits. Its features helped school procurement committees plan meal parameters more effectively, potentially reducing planning hours. Schools using the app were also more likely to substitute unavailable ingredients with approved alternatives, guided by a feature listing acceptable replacements. These substitutions did not negatively affect meal diversity, as the diversity scores remained consistent across schools with and without app access.

Are the conditions in place to roll out the app at the national level and conduct a large-scale impact evaluation to measure the impact of home-grown school feeding on farmers' production, sales, and revenues?

Based on the findings from this pilot, the take-up rate for the app is currently too small to enable a feasible impact evaluation assessing the impact of home-grown school feeding on farmers' income and agricultural practices.

EVALUATION DESIGN

The pilot impact evaluation employed a lean impact evaluation approach, using a randomized controlled trial design to assess whether the introduction of the app had any impacts on meals distributed by schools (e.g. quality, quantity, delivery, and diversity of meals). A total of 210 eligible schools in 59 municipalities were randomly selected into two groups:

- NEW SFMA APP: 30 municipalities (108 schools) were randomly assigned to be exposed to the new SFA app.
- **OLD MIS COMPRAS DE PROGRAMMA DE ALIMENTACIÓN ESCOLAR:** 29 municipalities (102 schools) were randomly assigned to continue using the old procurement process, which represents the status quo.

IMPLICATIONS FOR FUTURE PROGRAMMES

To **increase usage**, the programme is encouraged to:

- further develop the app to improve users' experience
- consider reducing redundancy in entering manual and digital records

To reach a greater number of farmers, the programme is encouraged to:

- ensure better farmers' outreach and training involvement
- consider exploring log-in credentials which do not require in-person training
- consider allowing farmers to bid on individual products rather than provide entire menus.

FUTURE DIRECTIONS

The pilot recognised that evidence on the impact of HGSF on the local economy and local farmers would be significantly valuable from a policy perspective. However, the take-up of the app is currently too low to enable an impact evaluation to detect any impact. Therefore, the scale-up of the larger scale impact evaluation is paused until such time that app usage increases and both the WFP Country Office and OEV agree that conditions are favourable for an IE to be usefully undertaken.

SCHOOL-BASED **PROGRAMMES IMPACT EVALUATION WINDOW**

School-based programmes are one of the most extensive social safety nets worldwide. There is a growing need for more evidence to inform the trade-offs in school-based programmes' designs and implementations and understand how they can play a role as a social safety net protecting boys and girls during shocks.

In 2021, the World Food Programme, in partnership with the World Bank, launched the School-based Programmes Impact Evaluation Window to generate a portfolio of impact evaluation evidence to inform policy decisions and programmes. Since then, six experimental impact evaluations have started in The Gambia, Jordan, Burundi, Guatemala, Malawi, and Madagascar.

WFP EVALUATION in partnership with





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