IDIAF, INSTITUTO DOMINICANO DE INVESTIGACIONES AGROPECUARIAS Y FORESTALES , REPÚBLICA DOMINICANA

More productive and efficient organic banana as small growers become more digital

Technologies to reduce losses due to red rust and increase productivity by improving soil health are being made available to banana families through the Ma$ Banano application that facilitate data recording and analysis

150
Organic banana producers reducing losses and improving the health of their soils

45
Technicians applying continuous improvement and benchmarking

15
Producer associations applying continuous improvement and benchmarking

500
Additional banana boxes / ha / year produced

Observations and data taken routinely to guide continuous improvement and facilitate benchmarking

The implemented initiative

Research teams in the Dominican Republic, Peru, and Ecuador are designing a monitoring routine to register the implementation and effectiveness of the integration of soil health and red spot management practices into the banana production calendar. Indicators observed monthly, every three months, and yearly support continuous improvement by growers who identify their opportunities to improve. Based on the performance parameters across all their growers, the associations can leverage benchmarking, a strategy that encourages improvement by proposing comparisons among growers, especially those with above-average numbers

Smartphone App Ma$ Banano to guide the more timely implementation of bunch bagging and banana residue and fertilizer management aimed at reducing losses to red rust thrips and improving both soil health and banana productivity

The technological solution

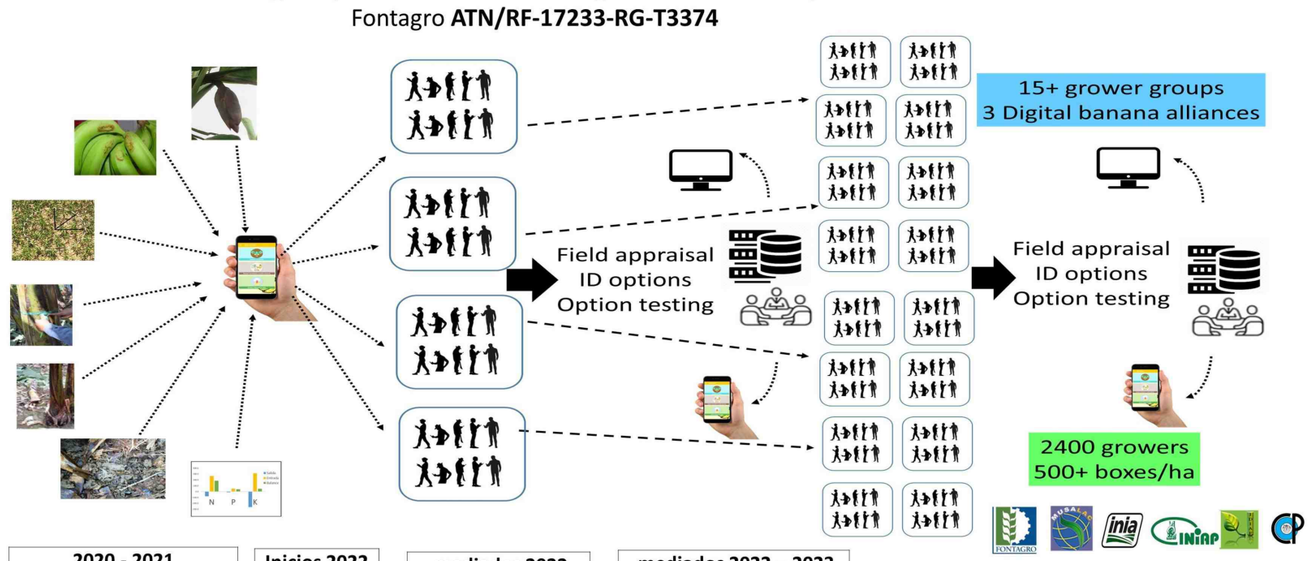
To scale these innovations of red rust and soil health, we are converting the routine of collecting key data, monitoring the effectiveness of practices, and recording costs and income into an application for mobile phones for the capture and transmission of data weekly to a database in each producer association. Real-time reports to be used by producers, their associations and sector platforms will facilitate discussions on the effectiveness of the work both on the farm and in packaging and in the association.

In the first stage, 50 producers in each country are piloting the application for a year. A diagnosis of cluster management and soil health and productive parameters in each producer forms the basis for the formulation of an improvement plan. At the end of the first cycle, each producer and technicians in the area will convene 10-20 neighboring producers to share their experience and propose a new round of diagnosis, monitoring, continuous improvement, and benchmarking.

Facilitating the scaling of ecological technologies among family producers with digital tools

Advances in scaling of practices to manage red rust thrips and soil health

Fontagro **ATN/RF-17233-RG-T3374**



2020 - 2021
design formats appraisal & follow-up
Baseline organic banana & agriculture 4.0
Training 15 technicians 15 technical coordinators

Inicios 2022
release ***Ma$ Banano***
Alliance digital banana

mediados 2022
Appraisal 150 pilot growers
Identification options
benchmark Alliance

mediados 2022 – 2023
Options testing 150 growers
analysis continual improvement benchmark grower groups
analysis continual improvement benchmark Alliance

2023
2250 growers linked to 150 pilot growers
Appraisal option testing & ID
analysis continual improvement benchmark grower groups
analysis continual improvement benchmark Alliance

MÁS INFO

Results

After 24 months of intermittent field activities, the national research teams have selected and trained 52 technicians from 12 grower associations and cooperatives in methods for the diagnosis, follow-up, and monitoring of promising practices for managing red rust thrips and soil health. Seven training videos are available online under “Youtube Fontagro Banano Escalamiento”. Each national team, in consultation with grower associations, has identified 50 pilot producers (23, 6, and 18% female for Ecuador, Peru, Dominican Republic) who will pursue the integration of the practices into their routines through the use of the app Ma$ Banano. They will work with their associations to scale the practices and the use of the app to the other producers. The app available since January 2022 in Google Play as Más Banano CP LANREF was validated by national scientists before its release. The different partners in each country are collaborating to manage the hosting of the app and analyze the data

Main donors

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Participating Organizations