

# AgriPath: Charting the path to sustainable agriculture through digital advisory services



## The problem

There are 500 million small-scale farmers in the world, producing 70% of the world's food, but many of them are chronically hungry and lack vital information to boost harvests, earn sufficient income, or address the threats of climate change. Public extension services have dwindled around the globe, leaving many farmers without access to agricultural knowledge and best practices. "Digital advisory services" (DAS) can offer farmers this critical knowledge, but DAS has only reached a small fraction of smallholder farmers in the global south, and women, especially, lack equal access to these solutions. To bridge this information gap, technical and social innovations must be combined, and technology providers need a better understanding of the conditions influencing adoption of digitally supported advisory services, as well as behavior change.

## ArgiPath goals

Grameen Foundation is a key member of the AgriPath applied research consortium (2021-2026), which is led by the Center for Development and the Environment (CDE), University of Bern, funded by Swiss Development Cooperation and GIZ i4ag. Other consortium partners include: ICIPE, UNIL and *farmbetter*.

The goal of the Agripath project is to identify and scale effective and inclusive pathways for digital advisory services to reach men and women farmers through vast, intensive applied-research. To this end, the project will;

- I. support smallholder farmers and agricultural extension workers to increase the adoption of user-centred, gender-sensitive, digital agricultural extension services;
- II. help (agriculture-focused) technology providers better understand ways to translate the use of digital solutions into concrete behavior changes that will improve farmers' productivity, income, and climate resilience.

AgriPath is designed around DAS apps such as *farmbetter*. It is a new application designed to match sustainable land management (SLM) solutions with farmers' needs. Many of the SLM practices on *farmbetter* stem from the WOCAT global database and are contextualized for the project's five target countries across India and sub-Saharan Africa.

## AgriPath's Action-Research Approach

AgriPath, through the work of consortium member UNIL, will engage farmers in multiple contexts and geographies with behavioral experiments to understand their drivers and challenges associated with the update of DAS, and how social norms influence adoption rates of DAS. The research will answer questions on how DAS can better reach and serve women, and how DAS can empower women with respect to household decision-making on farm management.

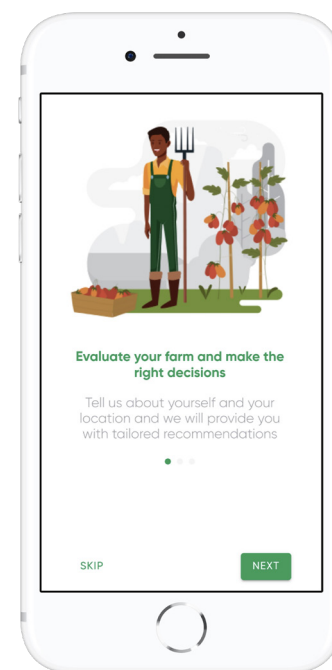
Randomized controlled trial studies, conducted by consortium member ICIPE, will examine three different models for delivering DAS, as well as their potential to drive behavior change towards adoption of sustainable land management practices;

- self-service model (farmers using DAS on their own);
- agent-based model (extension agents using DAS with the farmers);
- hybrid model (farmers using DAS on their own, with agent support).

## AgriPath Outcomes

AgriPath Toolkit: AgriPath studies and experiments will provide country-specific knowledge of farmers' behaviors, and the involvement of women in DAS.

**Grameen Foundation** will apply learnings from the AgriPath project to develop a scaling framework and an evidence-based Toolkit to accelerate uptake of research findings by DAS implementing organizations. As an example, the AgriPath Toolkit will include cost and content considerations when selecting a DAS delivery channel and a practical guide on how DAS can be made more women-farmer centric. The AgriPath Toolkit will be disseminated globally to strengthen efforts of DAS providers to design tailored, human-centered solutions and to support implementing organizations and neighboring countries in scaling sustainable agriculture with DAS.



## AgriPath Impact

- male and female smallholder farmers have access to evidence-based and tailored advice to adopt sustainable agricultural practices.
- ministries of agriculture, the development community and DAS providers promote effective and efficient delivery models to scale up gender sensitive DAS for long term behavior change towards sustainable agriculture.

## AgriPath Beneficiaries:

The primary beneficiaries of the AgriPath project include 250 extension agents from advisory services in five target countries: Burkina Faso, Uganda, Tanzania, India, and Nepal, as well as 50,000 smallholder farmers reached by these agents. To scale its results, the AgriPath project will also engage partners in at least six neighboring countries.

