



INITIATIVE ON  
Rethinking  
Food Markets



# CGIAR Initiative on Rethinking Food Markets

ANNUAL TECHNICAL REPORT 2022



# CGIAR Technical Reporting 2022

CGIAR Technical Reporting has been developed in alignment with the [CGIAR Technical Reporting Arrangement](#).

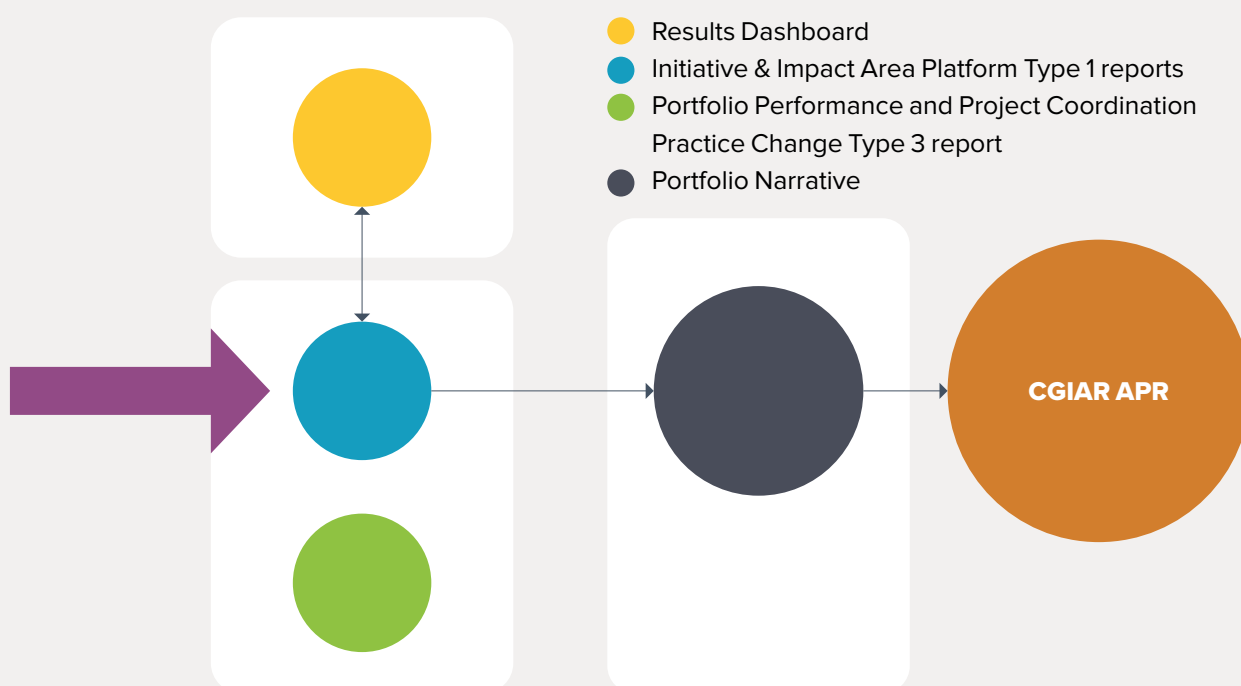
This Initiative report is a Type 1 report and constitutes part of the broader CGIAR Technical Report. Each CGIAR Initiative submits an annual Type 1 report, which provides assurance on Initiative-level progress towards End of Initiative outcomes.

The CGIAR Technical Report comprises:

- Type 1 Initiative and Impact Area Platform reports, with quality assured results reported by Initiatives and Platforms available on the CGIAR Results Dashboard.

- The Type 3 Portfolio Performance and Project Coordination Practice Change report, which focuses on internal practice change.
- The Portfolio Narrative, which draws on the Type 1 and Type 3 reports, and the CGIAR Results Dashboard, to provide a broader view on portfolio coherence, including results, partnerships, country and regional engagement, and synergies among the portfolio's constituent parts.

The CGIAR Technical Report constitutes a key component of the CGIAR Annual Performance Report (APR).



US\$	2022	2023	2024
Proposal Budget from initial submission	US\$9,212,832	US\$9,989,784	US\$10,797,385
Approved 2022 Budget	US\$ 6,673,539 (FINPLAN); forecasted Budget execution: \$5,640,977		

2022 Disbursement Target based on Approved FinPlan

# Section 1 Fact sheet

Initiative name	Rethinking Food Markets and Value Chains for Inclusion and Sustainability
Initiative short name	Rethinking Food Markets
Action Area	Systems Transformation
Geographic scope	<p><b>Regions targeted in the proposal:</b>  <b>Central and West Asia and North Africa;</b> East and Southern Africa; Latin America and the Caribbean; South Asia; West and Central Africa</p> <p><b>Countries targeted in the proposal:</b> Bangladesh; Ethiopia; Guatemala; Honduras; Nigeria; Uganda; Uzbekistan</p> <p><b>Regions with results reported in 2022:</b> East and Southern Africa; Europe; Latin America and the Caribbean; North America; South Asia; Southeast Asia and Pacific; West and Central Africa</p> <p><b>Countries with results reported in 2022:</b> Bangladesh; Ethiopia; Guatemala; Honduras; India; Nigeria; Uganda; Uzbekistan</p>
Start date	Jan. 1, 2022
End date	Dec. 31, 2024
Initiative Lead	Rob Vos – <a href="mailto:r.vos@cgiar.org">r.vos@cgiar.org</a>
Initiative Deputy	Jenny Wiegel – <a href="mailto:j.wiegel@cgiar.org">j.wiegel@cgiar.org</a> during 2022 Christine Chege – <a href="mailto:C.Chege@cgiar.org">C.Chege@cgiar.org</a> from 2023
Measurable three-year End of Initiative outcomes (EOI-Os)	<p><b>EOI outcome: Benefits to farmers and workers in agrifood sectors.</b></p>
	<p><b>EOI-O 1: Income and employment benefits to farmers, workers, and small and medium-sized enterprises (SMEs)</b></p> <p>In households of farmers and of the self-employed and workers in agrifood sectors, 15,000 people (at least 45% women and 20% youth) benefit from piloted Work Package 1 innovations in GVC in three geographies.</p>
	<p><b>EOI-O 2: Income and employment benefits to farmers, workers, and SMEs</b></p> <p>In households of farmers and of the self-employed and workers in agrifood sectors, 15,000 people (at least 45% women and 20% youth) benefit from piloted Work Package 3 innovations in domestic market VCs in three geographies.</p>
	<p><b>EOI-O 3: Benefits from the uptake of digital logistics and financial services</b></p> <p>Pilot innovations in digital technologies for a) logistics and b) finance, benefiting at least 4,000 workers in agrifood SME jobs in Bangladesh, Nigeria, and Uganda. At least 45% of the pilot beneficiaries are women and 20% youth.</p>
	<p><b>EOI-O 4: Improved policies and scaling preparedness</b></p> <p>Policymakers in six geographies have changed policies to enable the scaling of innovations adopted by 10,000 smallholder farms and agrifood SMEs.</p>

OECD DAC Climate marker adaptation score*	<b>Score 0:</b> Not targeted: The activity does not target the climate mitigation, adaptation, and climate policy objectives of CGIAR as put forward in its strategy.
OECD DAC Climate marker mitigation score*	<b>Score 1:</b> Significant: The activity contributes significantly to any of the three CGIAR climate-related strategy objectives – namely, climate mitigation, climate adaptation, and climate policy, even though it is not the principal focus of the activity.
OECD DAC Gender equity marker score*	<b>Score 1A:</b> Gender accommodative/aware: Gender equality is an objective, but not the main one. The Initiative/project includes at least two explicit gender-specific outputs and (adequate) funding and resources are available. Data and indicators are disaggregated by gender and analyzed to explain potential gender variations and inequalities.
Website link	<a href="https://www.cgiar.org/initiative/29-rethinking-food-markets-and-value-chains-for-inclusion-and-sustainability/">https://www.cgiar.org/initiative/29-rethinking-food-markets-and-value-chains-for-inclusion-and-sustainability/</a>
<p>*The Organisation for Economic Co-operation and Development (OECD) Development Assistance Committee (DAC) markers refer to the OECD DAC <a href="#">Rio Markers for Climate</a> and the <a href="#">gender equality policy marker</a>. For climate adaptation and mitigation, scores are: 0 = Not targeted; 1 = Significant; and 2 = Principal. The CGIAR GENDER Impact Platform has adapted the OECD gender marker, splitting the 1 score into 1A and 1B. For gender equality, scores are: 0 = Not targeted; 1A = Gender accommodative/aware; 1B = Gender responsive; and 2 = Principal. These scores are derived from <a href="#">Initiative proposals</a>, and refer to the score given to the Initiative overall based on their proposal.</p>	



Initiative researchers with  
coffee producers in Honduras.  
Photo credit: Jenny Wiegel



## Section 2 Initiative progress on science and towards End of Initiative outcomes



### Overall summary of progress against the theory of change

Food systems make up about one-fifth of the global economy and are the world's largest source of employment. Many of the world's poor depend on the food system for their livelihoods, in terms of income and/or employment. However, despite increasing agricultural productivity and technological and institutional innovations, most of the rural and urban workers employed in the agrifood sector and their families remain poor and cannot afford the cost of a nutritious diet. Many women and youth work in the food system but

Initiative researchers with coffee producers in Honduras.  
Photo credit: Jenny Wiegel

face hurdles in accessing resources and receiving decent pay. The sector's current operations are leaving a major environmental footprint, contributing to climate change and depletion of natural resources. Urbanization and shifting diets are profoundly changing food markets and value chains, which are supplying new types of food and revolutionizing production and distribution systems, including with growing use of digital technologies.

To address these major food system challenges, the Rethinking Food Markets Initiative is generating evidence on the innovations, incentives and

Ugandan farmers.  
Photo credit: ©CIAT/GeorginaSmith



policies most effective for steering food market functioning toward the creation of equitable income, employment, and business opportunities for smallholders, small businesses (SMEs) and workers, and especially for women and youth among them, along agrifood value chains, while also reducing the food sector's environmental footprint.

Initiative researchers are working to provide new knowledge on combinations of innovations and policies to leverage sustainable growth and income opportunities in agrifood supply chains and support services (e.g., logistics and finance). Specifically, during the first year of implementation, the Initiative has made the following progress on its pathway toward achieving those objectives across its four Work Packages, each of which contributes to one End of Initiative (EOI) outcome for the Initiative.

- **Work Package 1: Making globally integrated value chains inclusive, efficient, and environmentally sustainable.** Expanding high-value markets oriented at international markets present opportunities for smallholders and agrifood SMEs to gain remunerative employment, climb out of poverty, and improve their diets. The Initiative has worked with global and local partners and stakeholders to identify existing constraints in three country and value-chain cases (shrimp in Bangladesh, **oil seeds** in Ethiopia, and **coffee** in Central America) and initiated the co-design of bundles of innovations to be tested for effectiveness, viability, and scalability to achieve the mentioned objectives starting in the second year of the Initiative. A further scoping study is underway for the case of the fruits and vegetables value chain in Uzbekistan. Adapted to each specific case, the bundles of product and process innovations consist of: (a) innovations to improve vertical coordination and inclusive market access and value-chain contracting among value-chain actors; (b) certified product quality upgrading, including for food safety and sustainability; and (c) digital applications for

product tracing and market information. The pilots that are being fielded in three of these cases (Bangladesh, Ethiopia, and Central America) should provide new evidence and insight into scalable opportunities for strengthening global food value chains in ways that lower barriers for small-scale producers and SMEs, including women and youth, to participate in and benefit from them. Implementation of the fourth case (Uzbekistan) is dependent on additional funding. The pilots implemented in collaboration with local stakeholders are expected to directly benefit 15,000 people in households of self-employed, owners, and workers of participating farms and agrifood businesses by the end of the Initiative. By addressing gender- and age-specific hurdles in access to resources, information, and knowledge as part of the innovation design, the Initiative team is confident it will be able to reach beneficiary shares of 45% for women and 20% for youth.

- **Work Package 2: Innovation for inclusive and sustainable growth of domestic food value chains.** The rapid advance of urbanization, income growth, and foreign investment in low- and middle- income countries (LMICs) present huge employment and income opportunities along domestic food value chains. Researchers of the Initiative have completed extensive scoping studies diagnosing existing constraints to the development of inclusive and sustainable value

chains in two of three selected cases with high potential for value-added generation and improving diets: dairy in Uganda, and fruits and vegetables in Nigeria. The scoping study for the case of biofortified beans in Honduras and Guatemala is in the process of being completed. Together with global and local partners and stakeholders, Initiative researchers have identified (or, in the case of Central America, are in the process of identifying) bundles of product and process innovations to address those constraints. As relevant to each context, the innovation bundles consist of combinations of: (a) inclusive value chain contracting providing better market access at fair economic conditions to smallholders and SMEs ; (b) better vertical supply-chain integration through improved logistics (including solar-powered cold storage and transport, cooling rooms near markets) to achieve better income opportunities, and reduce food losses and environmental footprint; (c) certified product quality upgrading (improved seeds for fruits and vegetables; biofortified beans; improved, and quality control for, milk); and (d) improved logistics to reduce food losses. The goal is to examine the effectiveness and synergies among these domestic food value chain innovations and lower the barriers for small-scale producers and SMEs to participate in and benefit from them. By the end of the Initiative, the piloted innovations are expected to have benefited 15,000 households of farmers, SME business-owners, and workers across the selected value chains, including a targeted 45% women and 20% youth among them. Income and employment benefits are expected to emerge from expanded market access for improved quality, better-priced products, and more efficient value chain services, while environmental footprint is expected to be reduced through

reduce food loss, renewable energy use, and increased productivity.

- **Work Package 3: Innovations and policy design for development of cross-value chain services to leverage new employment and income opportunities.** This area of research focuses on understanding how emerging innovations in cross-value chain services can be designed to increase employment and income opportunities within the agrifood sector, particularly among women and youth. Although digital services are essential for increasing the efficiency of value chains, they are often not accessible or relevant to smallholders and agrifood SMEs. Researchers are assessing and testing the potential for different modalities of inclusive business models for digital applications for delivering financial and logistics services in Bangladesh, Nigeria, and Uganda, in order to generate better income and employment for these value chain actors and targeting women and youth in particular. By the end of the Initiative, at least 4,000 workers, of which 45% are women and 20% are youth, are expected to see significant improvements in income and employment opportunities in the provision and use of digital platforms for logistics support and finance in the three piloted cases.
- **Work Package 4: Knowledge tools for policy coherence and market reform for inclusive and sustainable food market transformation.** Researchers here are working to fill pressing knowledge gaps by establishing: (a) a global knowledge platform that – with active engagement of stakeholders – collects and shares evidence on the effectiveness of policies and innovations for inclusive and sustainable food system transformation; and (b) a new integrated global database and modeling tools that measure and analyze the potential for income and

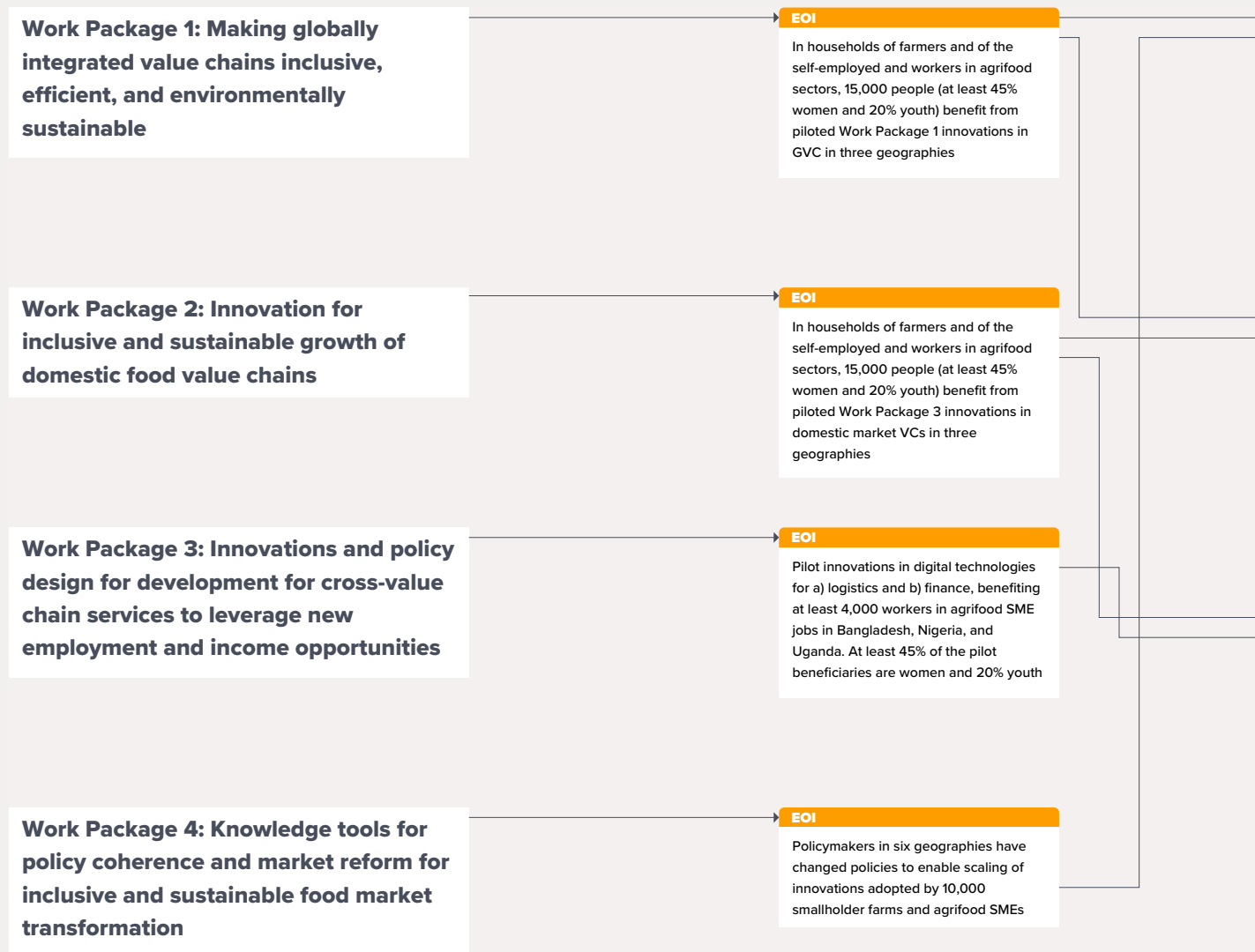


employment generation, reducing environmental footprint, and prioritizing policy support across value chains and markets. During 2022, the **knowledge platform** was established and launched in partnership with ISEAL Alliance. As part of the global database, a set of **internationally comparable policy indicators** that help assess the type of incentives provided to agricultural producers and value chain actors was expanded and enhanced in partnership with FAO, the IDB, OECD and the World Bank and was applied for global scenario analysis showing potential win–win–win outcomes of repurposing existing support for better food system outcomes through poverty reduction, increased accessibility of healthy diets, and lower greenhouse gas emissions. The knowledge platform, database, and global and country-level modeling tools will be deployed for assessments of the scalability of the innovations tested under Work Packages 1–3 and to inform policies and public and private investment decisions in support of the creation of inclusive and sustainable food value chains and markets. This way, the Initiative expects to have enabled policymakers and food system actors in the six target geographies to make well-informed policy and regulatory reform decisions facilitating the scaling-up and value-chain adoption of the piloted innovations.

The above signals the **scientific progress** made in identifying bundles of innovations and developing tools for assessing impact and testing of scalability. The actual **progress towards EOI outcomes** is not yet directly measurable as the pilots of bundled innovations in the selected cases are currently being staged. Yet, the Initiative team has high confidence that the EOI outcomes are well within reach, since the identified bundled innovations are being co-designed with the active engagement of partners and stakeholders, including governments, farmer and other producer organizations, private businesses, financial institutions, local research institutes, and development agencies, as relevant to each of the pilot cases. This should help secure preparedness among food system actors to scale up the piloted innovations. In year two, the Initiative will undertake assessments of the market- and food system-wide expected benefits (and potential tradeoffs) of the innovations once brought to scale in each of the selected country contexts. These assessments will feed into stakeholder dialogues about the need for targeted policy support to fortify incentives for widespread adoption of the bundled innovations and to secure major contributions to the key outcomes of the Systems Transformation Action Areas related to poverty reduction, improved nutrition, better income opportunities for women and youth, and climate change mitigation and adaptation.

## Initiative-level theory of change diagram

This is a simple, linear, and static representation of a complex, non-linear, and dynamic reality. Feedback loops and connections between this Initiative and other Initiatives' theories of change are excluded for clarity.








EOI — End of Initiative outcome

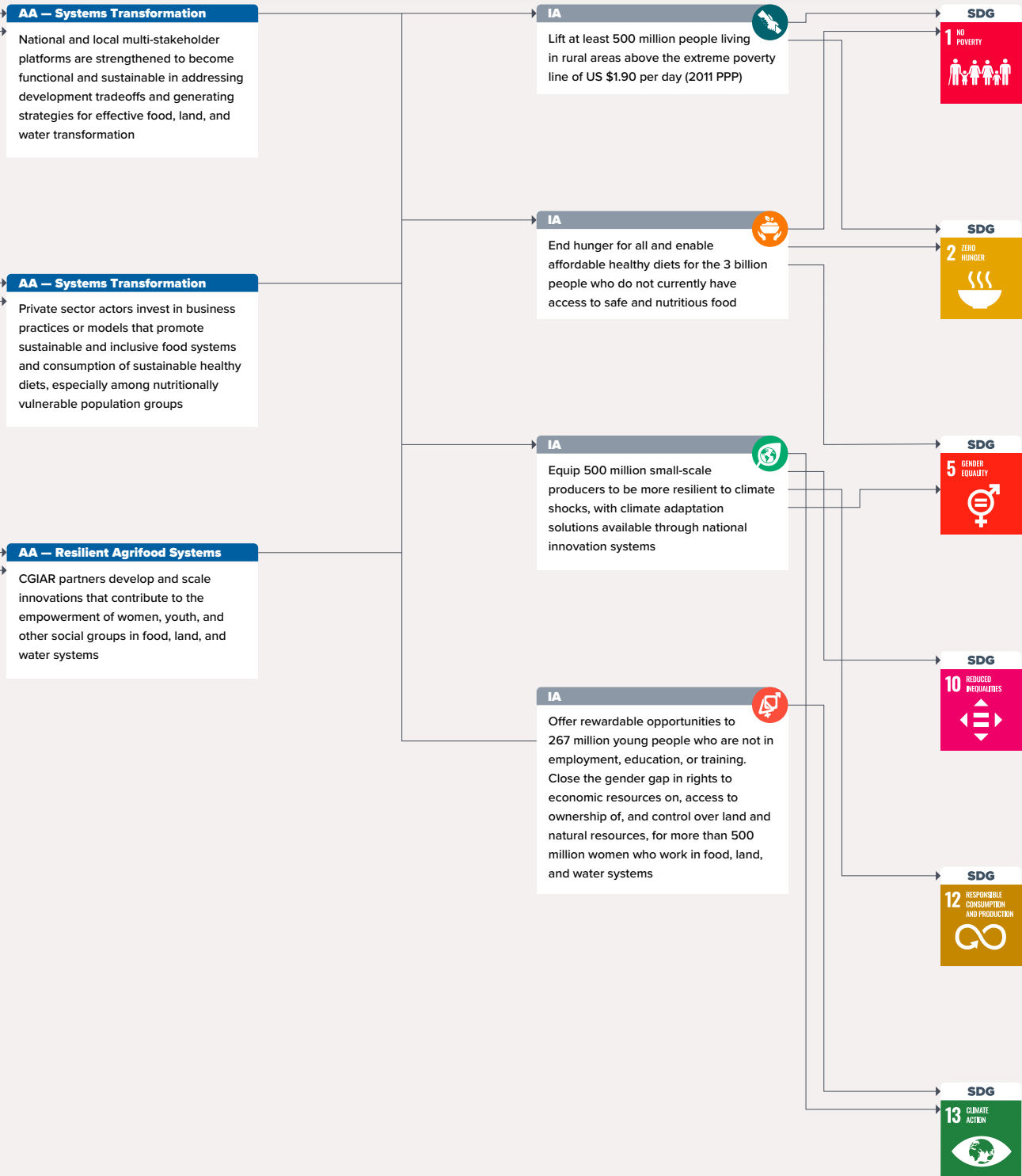
AA — Action Area

IA — Impact Area

SDG — Sustainable Development Goal

-  Nutrition, Health, and Food Security
-  Poverty Reduction, Livelihoods, and Jobs
-  Gender Equality, Youth, and Social Inclusion
-  Climate Adaptation and Mitigation
-  Environmental Health and Biodiversity

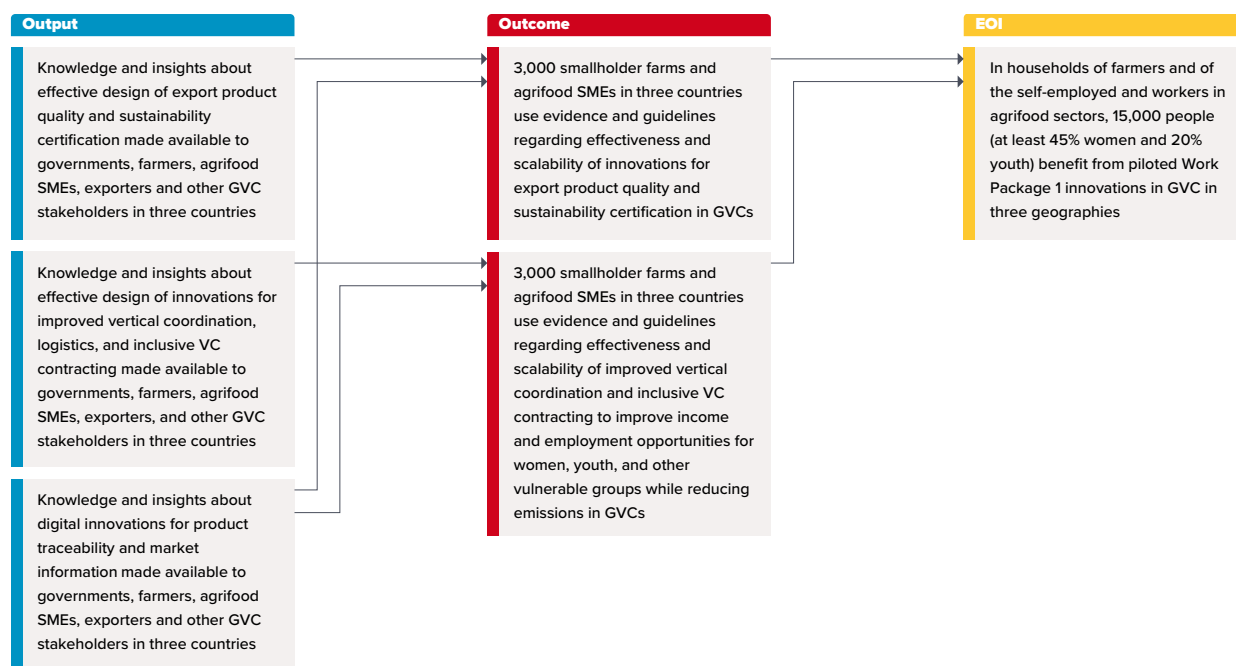
Teams from CGIAR's three Action Areas — System Transformation, Resilient Agrifood Systems and Genetic Innovation — worked to develop an improved set of Action Area outcomes in October 2022. Since this was near the end of the reporting cycle for 2022, it was decided not to update the theories of change based on these new Action Area outcomes. The exception to this is Genetic Innovation — for this Action Area, as the new outcomes had already been widely discussed among the relevant Initiatives, and with its advisory group of funders and other stakeholders, the decision was made to update their outcomes in time for the 2022 reporting cycle.



# Section 3 Work Package-specific progress

## Work Package 1:

### Making globally integrated value chains inclusive, efficient, and environmentally sustainable



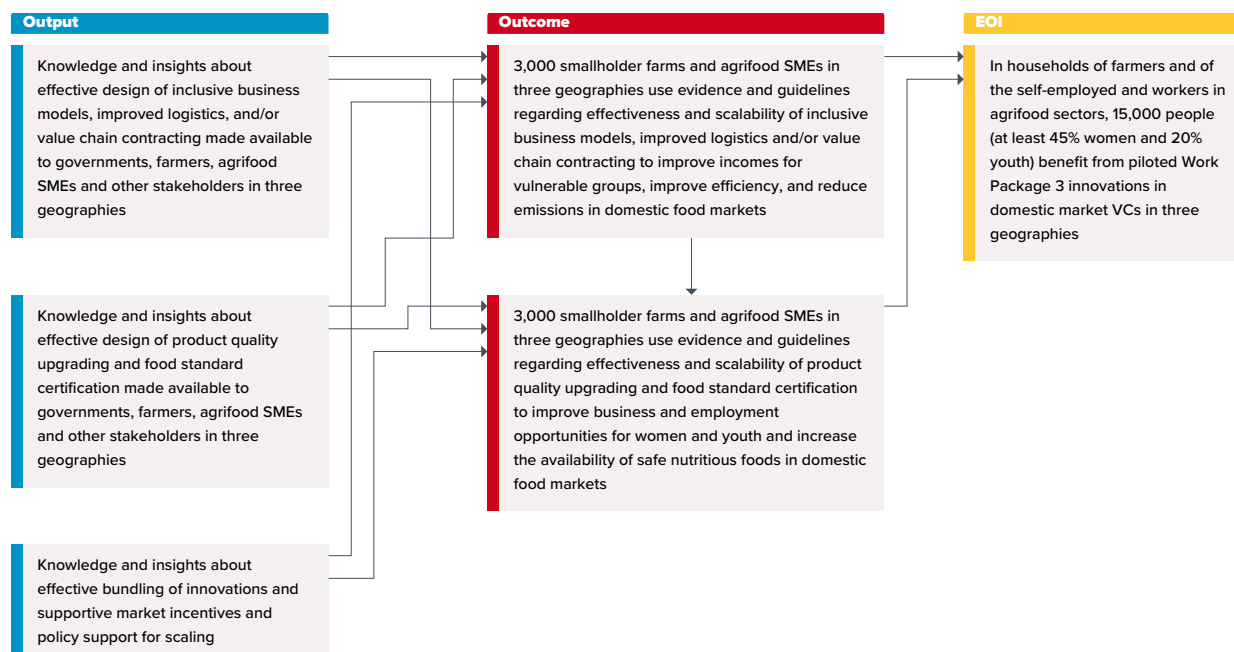
### Work Package 1 progress against the theory of change

The objective of Work Package 1 is to identify and test promising innovations to improve selected global value chains by making them more efficient, more inclusive, and/or more sustainable. Work Package 1 focuses on studies of coffee in Central America, sesame and vegetable oil in Ethiopia, shrimp in Bangladesh, and fruits and vegetables in Uzbekistan. The theory of change is that, by selecting scalable innovations, working with local partners, and rigorously demonstrating the benefits of these innovations, the Initiative will maximize the likelihood that they will be widely adopted by value chain participants in target countries and elsewhere. Scoping studies and stakeholder consultations have identified significant potential for innovations that help strengthen vertical coordination of supply chains, improve product quality, and provide digital market information services. During 2022, stakeholder workshops were carried out in Honduras, Guatemala, and

Ethiopia (two), while individual stakeholder meetings were held in Bangladesh and Uzbekistan. Scoping studies and innovation design for the **coffee value chain in Honduras** and the **sesame seeds and oil value chain in Ethiopia** were completed, while those for Bangladesh were completed following a stakeholder consultation in January 2023. The scoping study of the fruit and vegetable sector in Uzbekistan is expected to be completed in mid-2023. The pilots are expected to benefit the livelihoods of at least 5,000 households of farmers and owners and workers of SMEs across each of the three value chains, in particular through improved market access, increased value added from product quality upgrading, and improved access to market information, with special attention to creating opportunities for women and youth. First evidence on innovation performance in all three country contexts will be generated in 2023. Considering a delayed start, the implementation of this work package is on track in terms of identification of key bottlenecks to be addressed, but delayed in terms of the innovation design.

## Work Package 2:

### Innovation for inclusive and sustainable growth of domestic food value chains



### Work Package 2 progress against the theory of change

The objective of Work Package 2 is to identify and test promising innovations to improve selected domestic value chains by making them more efficient, more inclusive, and/or more sustainable. Work Package 2 is comprised of case studies focused on the value chains for fruits and vegetables (F&V) in Nigeria, dairy in Uganda, and beans in Honduras and Guatemala. The overarching objective of Work Package 2 is to provide guidance on effective and scalable transformation of domestic agrifood value chains, to include innovation in business models, logistics and infrastructure, production technologies, contracting, and certification, and other institutional arrangements that facilitate quality upgrading, reduced environmental impacts, and increased benefits for farmers and SMEs.

In 2022, as planned, Initiative researchers were able to gather, review, and synthesize previous

research and secondary data, and carry out stakeholder consultations as part of scoping studies undertaken with the objective of identifying potential innovations for testing in 2023 and 2024. The stakeholder consultations included workshops, as well as focus group discussions and key informant interviews that were held with value chain actors and other stakeholders in Nigeria, Uganda, and Honduras. The resulting scoping studies identified key bottlenecks in the current functioning of the mentioned value chains and the potential for making those more inclusive and sustainable through bundled innovations in **Honduras** in the form of product upgrading (biofortification and quality certification), more inclusive value chain contracts, and post-harvest handling by producers and traders of beans; in **Nigeria** through improved seeds, extension services, solar-powered cold chain development and digital tools for improved market information and access in F&V supply chains; and in Uganda through the bundling of quality and value upgrading for fresh milk, inclusive

contracting arrangements. All draft scoping reports were completed in 2022, and, following further discussions with stakeholders, final scoping and innovation studies will become publicly available in the first half of 2023. Research and impact evaluation designs were prepared for the innovations to be piloted in Uganda and in Nigeria. Baseline data has been collected already in Uganda and for two of the innovation bundles in the F&V value chain to be piloted in Nigeria's F&V chain. The pilots are expected to benefit the livelihoods of at least 5,000 households of farmers and owners and workers of SMEs across each of the three value

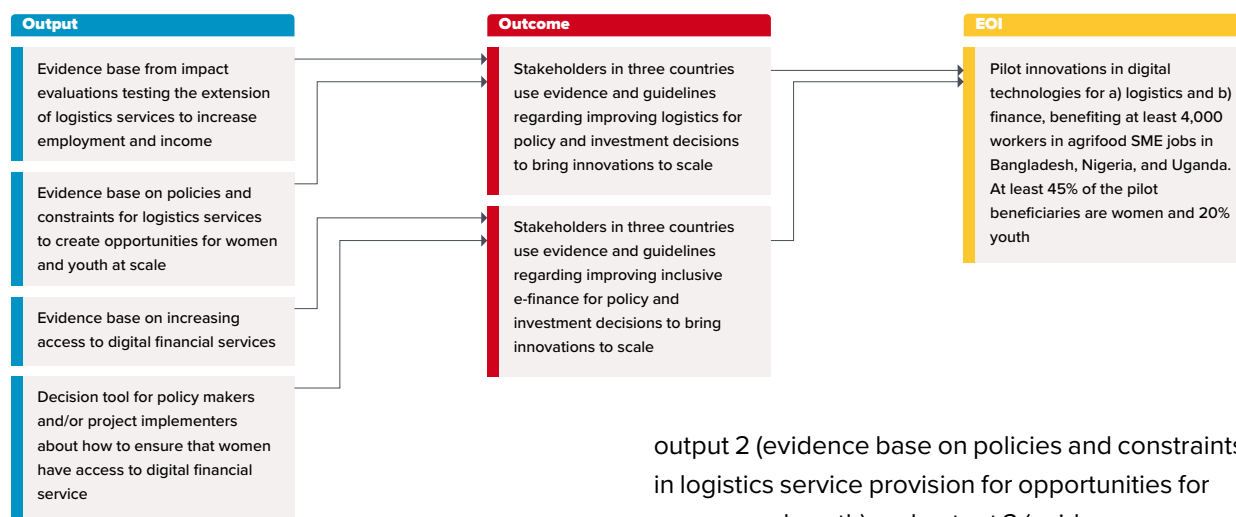
chains through improved market access, increased value added from product upgrading and fewer food losses and more inclusive value-chain contracting arrangements, with special attention to creating opportunities for women and youth. First evidence on innovation performance in all three country contexts will be generated in 2023.

Considering the delayed start of the Initiative, the implementation of this work package is considered to be, by and large, on track, having completed the scoping studies and innovation design and begun some of the baseline survey collection for the impact assessments.



### Work Package 3:

## Innovations and policy design for development for cross-value chain services to leverage new employment and income opportunities



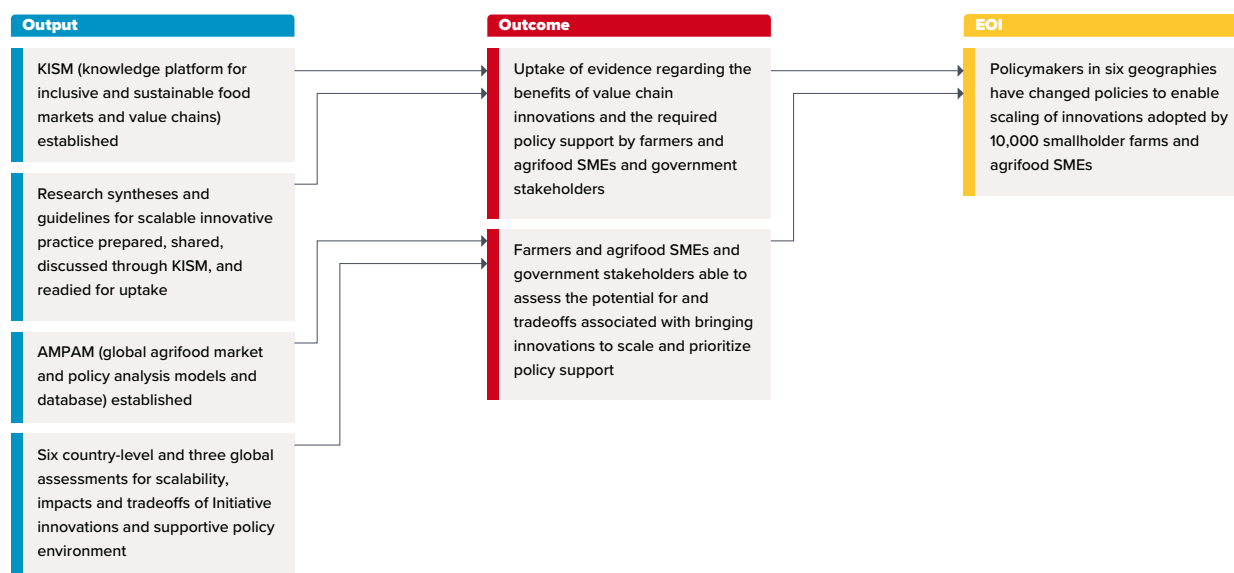
### Work Package 3 progress against the theory of change

The goal of Work Package 3 is to provide rigorous evidence around the need for and impact of innovations in logistics and financial services that can create employment and income opportunities in value chains, with a focus on opportunities for women and youth. Work in 2022 included scoping studies in three countries, which evaluated the landscape for possible innovations in these areas and investigated potential partnerships. Researchers have generated knowledge products providing a **conceptual framework** for evaluating the possibilities of logistics and finance innovations for opening opportunities for income generation, and used secondary data to evaluate price gaps and opportunities for value capture from farm-gate to consumer. All this work contributes to the development of output 1 of Work Package 3 (evidence base on extension of logistics services to increase employment and income) and also informs the design of innovations to be piloted as part of

output 2 (evidence base on policies and constraints in logistics service provision for opportunities for women and youth) and output 3 (evidence on increasing access to financial services). The country teams in Bangladesh, Nigeria, and Uganda also conducted partner reviews and built relationships with stakeholders and potential private sector partners. This was done through a series of one-on-one meetings in Bangladesh and meetings and multi-stakeholder workshops in Uganda and Nigeria. Design of an evaluation of a livestock sector financing mechanism (with a logistics component) that targets access for women and youth was completed in **Bangladesh**, and baseline survey and project implementation began and will be ongoing through 2023. The scoping study on options for innovations in logistics and e-finance in **Nigeria** and for innovations in digital financial services in **Uganda** were completed. The evaluation design and implementation of the piloted innovations in Nigeria (and possibly Uganda) are expected to be completed in early 2023. This work will all contribute to outputs 2 and 3 and ultimately the EOI outcome. Work toward output 4 of the Work Package (policy tools to help facilitate access to women and youth to digital financial services) will commence during 2023.

## Work Package 4:

### Knowledge tools for policy coherence and market reform for inclusive and sustainable food market transformation



### Work Package 4 progress against the theory of change

Work Package 4 aims to enable farmers and agrifood SMEs and policymakers to use evidence about the benefits of value chain innovations and the required policy support through: the establishment of a knowledge platform for inclusive and sustainable food markets and value chains (KISM) for stakeholder dialogue (output 1); research syntheses and guidelines (output 2); food market-wide databases and modeling tools (output 3); and model-based scenario and policy analyses of scalability of value chain innovations and benefits and tradeoffs of smart repurposing of existing agricultural policy support (output 4). In year one, the Initiative managed to develop the **KISM platform** (it was formally launched on March 7, 2023). It initiated three research syntheses on available evidence about the dynamics of food value chain innovations (and bundled combinations thereof)




and their impacts on employment, livelihoods, and environmental sustainability. These studies are developed in close consultation with researchers and stakeholders engaged in the design of innovations and interventions for the case studies undertaken under Work Packages 1–3. These reviews are set to be completed in Q1 of 2023. The **analytical frameworks** for the global and country-level model-based scenario analyses (MIRAGRODEP, RIAPA) were adapted to fit the purposes of the Initiative (output 3), and one global scenario analysis on repurposing of agricultural support and impacts on employment, poverty, food security, and climate change mitigation was undertaken and published (output 4). In support of this analysis, a policy indicator database (**AgIncentives**) was updated, while a start was made with the estimation of indicators measuring the degree of inclusivity and sustainability of agrifood systems worldwide but is awaiting completion in Q1 of 2023.



# Work Package progress rating

WORK PACKAGE	TRAFFIC LIGHT / RATIONALE
1	 <ul style="list-style-type: none"> <li>• Work Package 1 activities are proceeding largely on track. Two of the four scoping studies were completed in 2022 and a third one in January 2023. The Uzbekistan scoping study (which is funded at a lower level) will be completed by mid-2023. The identification of innovations to test and the launch of the baseline surveys in the other three studies will be carried out in the first half of 2023.</li> </ul>
2	 <ul style="list-style-type: none"> <li>• Four scoping studies were completed in 2022, with final shareable versions scheduled for completion in Q1 2023. Five innovations in two countries were identified (quality measurement equipment for milk collection centers in Uganda; cooled transportation for F&amp;V in Nigeria; solar powered cold storage for F&amp;V in Nigeria; solar dryers for F&amp;V in Nigeria; plastic crates for F&amp;V in Nigeria), with corresponding research designs established to test them. Baseline data was collected for the milk-quality incentives testing in Uganda. Baseline data for the intervention in Nigeria will be collected in the first half of 2023. The identification of innovations to test in Central America, along with baseline surveys and interventions, will be carried out in the first half of 2023.</li> </ul>
3	 <ul style="list-style-type: none"> <li>• Work Package 3 activities are proceeding largely on track. Scoping activities were completed in all three countries in 2022, along with the development of other background and grounding activities. Development of the impact evaluation and beginning of baseline data collection were completed in Bangladesh, however project design and data collection in the other settings were delayed until early 2023. Delays were caused by slow effective start of the Initiative's operations following approved staffing plan and FINPLAN budget by Q2 of 2022.</li> </ul>
4	 <ul style="list-style-type: none"> <li>• Considering the slow effective start of the Initiative's operations following the approved staffing plan and FINPLAN budget by Q2 of 2022, the delivery of outputs for this Work Package is broadly on track (KISM, policy indicator database, global and country model frameworks), and several other outputs are well under way (research syntheses and guidelines, agrifood economic database, country scenario analyses).</li> </ul>

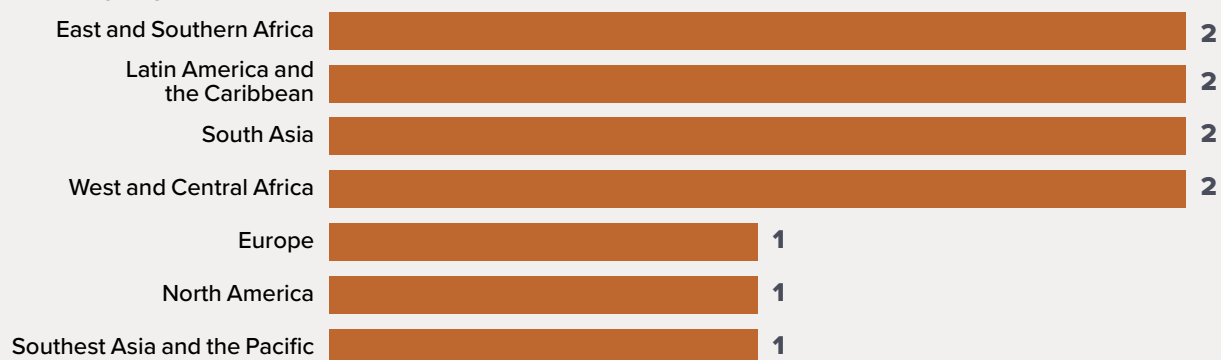
## KEY

<b>On track</b>	 <ul style="list-style-type: none"> <li>• Annual progress largely aligns with Plan of Results and Budget and Work Package theory of change</li> <li>• Can include small deviations/issues/ delays/risks that do not jeopardise success of Work Package</li> </ul>
<b>Delayed</b>	 <ul style="list-style-type: none"> <li>• Annual progress slightly falls behind Plan of Results and Budget and Work Package theory of change in key areas</li> <li>• Deviations/issues/delays/risks could jeopardise success of Work Package if not managed appropriately</li> </ul>
<b>Off track</b>	 <ul style="list-style-type: none"> <li>• Annual progress clearly falls behind Plan of Results and Budget and Work Package theory of change in most/all areas</li> <li>• Deviations/issues/delays/risks do jeopardise success of Work Package</li> </ul>

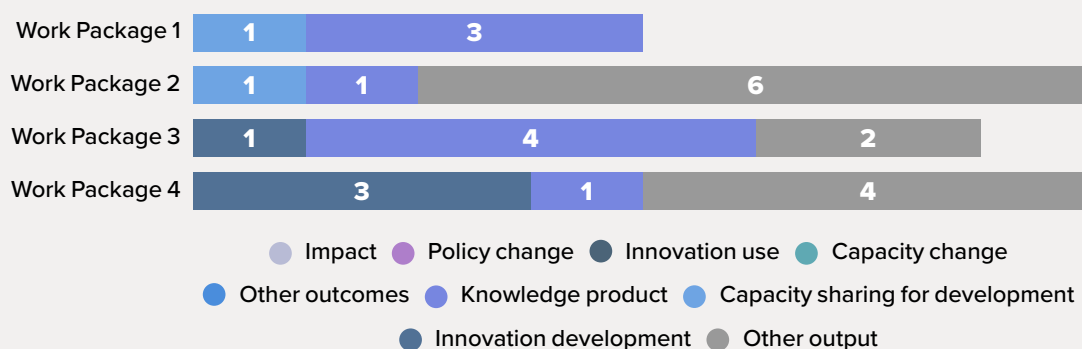
## Section 4 Initiative key results

This section provides an overview of 2022 results reported by Rethinking Food Markets. These results align with the CGIAR Results Framework and Rethinking Food Markets' theory of change. Further information on these results is available through the [CGIAR Results Dashboard](#).

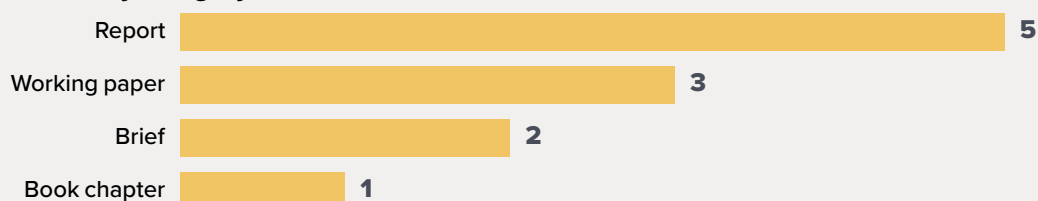
### Results by region



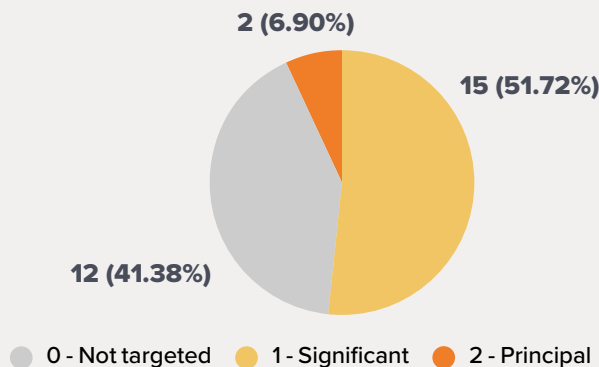
### Results by Work Package



### Knowledge products by category



### Results by gender tag

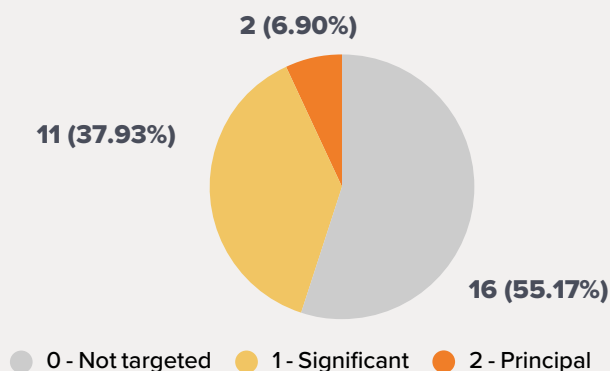


**0 = Not targeted:** The activity/result does not target gender equality.

**1 = Significant:** The activity/result contributes in significant ways to gender equality, even though it is not the principal focus of the activity.

**2 = Principal:** Gender equality is the main objective of the activity/result and is fundamental in its design and expected results.

### Results by climate change tag

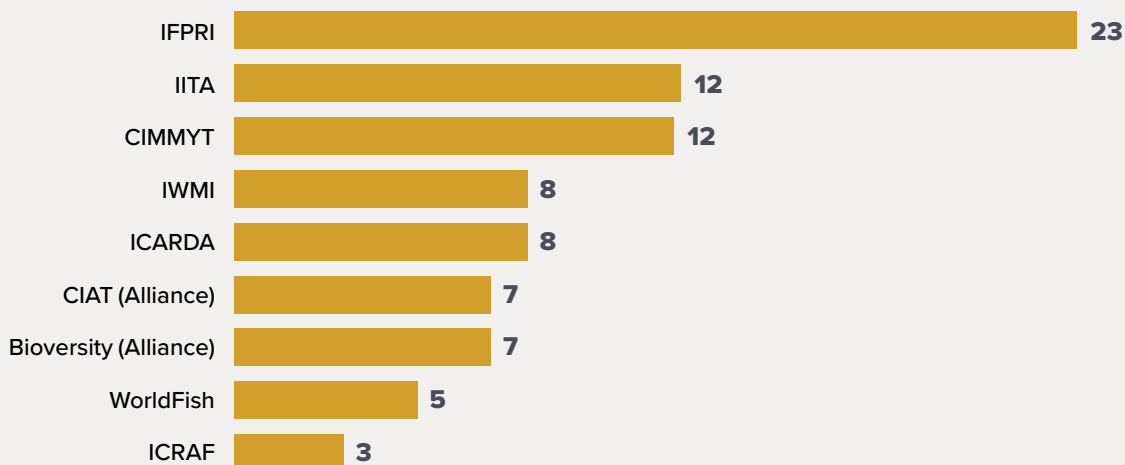


**0 = Not targeted:** The activity does not target climate mitigation, adaptation, and climate policy goals of the CGIAR as put forward in its strategy.

**1 = Significant:** The activity contributes in significant ways to either one of the three CGIAR climate-related strategy objectives — namely, climate mitigation, climate adaptation, and climate policy, even though it is not the principal focus of the activity.

**2 = Principal:** The activity is principally about meeting either one of the three CGIAR climate-related strategy objectives — namely, climate mitigation, climate adaptation, and climate policy, and would not have been undertaken without these objectives.

### Contributing CGIAR Centers



### Capacity development



**Results by country**



Quick cooking beans save time, fuel & boost nutrition.  
Photo credit: ©CIAT/GeorginaSmith

# Section 5 Impact pathway integration – External partners

## Partnerships and Rethinking Food Markets’ impact pathways

The Initiative works with a broad range of partners. These vary depending on the needs of the research portfolio of each Work Package. For the design of the bundles of process and product innovations for the selected value chains, in each case a combination of international and local innovation, scaling, and demand partners are involved, including private sector partners. As shown in the figure below, in the case of the F&V value chain and logistics in Nigeria under Work Packages 2 and 3, for instance, these include:

- **Pre-harvest:** Introduction of improved seed varieties, extension services, improved market information for farmers, and quality certification in partnership with Wageningen University Research (WUR) and the World Vegetable Centre (WVC) as innovation partners; with Bunkasa (a local logistics firm) and East West Seeds International as both innovation and scaling partners; and with farmer groups and policymakers as demand partners.
- **Post-harvest handling:** Use of plastic crates for on- and off-farm handling and storage with Bunkasa; (solar-powered) cold chain development (storage, transport, cooling rooms) with innovation

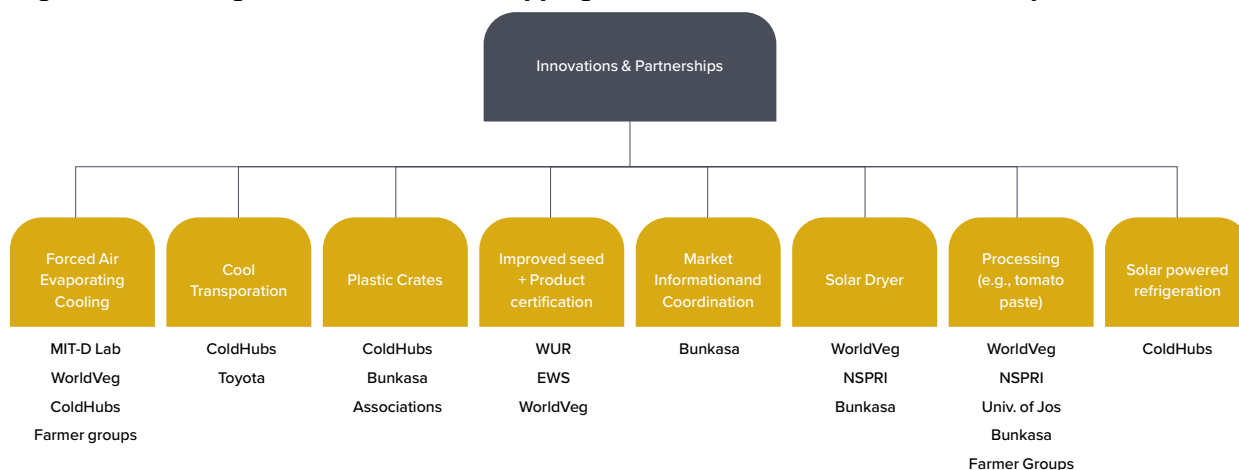
and scaling partners Coldhubs (a local logistics firm for cold chain development) and Toyota (solar panel delivery), with MIT-D Lab and WVC as innovation partners, and with farmers groups and trader associations as demand partners.

- **Post-harvest processing:** Introduction of solar-powered dryers and processed product development (such as tomato paste), with the Nigerian Stored Products Research Institute (NSPRI), the University of Jos (Plateau State, Nigeria), and Bunkasa as innovation and scaling partners; with WVC as innovation partner; and with local farmer groups and SME processors as demand partners.

These innovations should contribute to: better vertical integration of the F&V value chain in the country; improved income and employment opportunities in an expanded market activity; better food security and nutrition; and reduction of greenhouse gas emissions (through use of renewable energy and reduced food loss and waste).

While not always as dense, this type of partnership network has been (or is being) established for the other selected value chain cases as well.

### Nigeria fruits & vegetable value chain: Mapping of interventions and collaborators/partners



## Section 6 Impact pathway integration – CGIAR portfolio linkages



### Portfolio linkages and impact pathways

The Initiative has established linkages with several other Initiatives of the CGIAR research portfolio.

The main collaborations are with:

- **Foresight Initiative:** Sharing of the country-modeling framework (RIAPA) and co-development of the agrifood economic database.
- **National Policies and Strategies (NPS) Initiative:** Sharing experiences with policy dialogues based on model-based scenario analyses (RIAPA).
- **SHIFT and FRESH Initiatives:** Sharing of research approaches and innovation design in supply chains for nutrition-rich and high-value foods (specifically, dairy and F&V)
- **Digital Transformation Initiative:** Collaboration on research design for inclusive business models for digital platforms.

Agricultural biodiversity in a Peruvian market  
Photo credit: Bioversity International/A. Camacho

- **Mitigate+ Initiative:** Joint development of emission-intensity database for selected value chains.
- **HER+ Initiative:** Sharing of approaches for inclusive business model design and institutional frameworks to overcome constraints in access to resources and income and employment opportunities for women and youth.

Even though the Rethinking Food Markets Initiative does not overlap with these other Initiatives in value chain or country focus, the sharing of research approaches and methodologies, databases, and experience with policy and stakeholder dialogues is of mutual benefit.

## Section 7 Adaptive management

**The Initiative management team completed its Reflect process during a retreat organized on March 21–23, 2023, in hybrid form. A total of about 40 researchers and experts took part. Most connected online, while the Initiative management team and the local Central American team gathered in Tegucigalpa, Honduras. The retreat served to take comprehensive stock of the progress made so far, to share findings from scoping studies and the process of innovation design, and to discuss research methods, engagement with stakeholders, collaboration with other CGIAR Initiatives, and a thorough review of the Initiative’s theory of change.**

The on-location gathering of the management team allowed for consultations with stakeholders in one of the focus countries and enabled field visits to the sites of concentration of (envisaged) beneficiaries of the innovations to be piloted through the Initiative. Through a meeting with the Minister of Agriculture of Honduras and her cabinet members, a dialogue with stakeholders from public, private, and civil society, a visit to the wholesale market, and visits with farmers, cooperatives, and exporters, the Initiative management team was able to engage stakeholders in the Reflect process, providing insights into the relevance of the proposed research agenda, as well as our engagement strategy with stakeholders to ensure the Initiative is recognizing the country-specific challenges and dynamics and taking these into consideration in the innovation design and policy analysis.

The Reflect process confirmed the overall assessment made in this report; that is, the Initiative

is well on track toward the targeted EOI outcomes. With respect to the 2022 workplan, there has been some delay in a number of activities, especially the completion of co-created innovation design for the selected case studies and start-up of baseline surveys. As a result, the Initiative’s approved budget was also underspent, by approximately US\$1.8 million with respect to the forecasted budget execution prepared in Q2 of 2022, and by approximately US\$2.8 million with respect to the approved FINPLAN budget for the Initiative of US\$6.7 million for 2022. This delay in budget execution has been caused by the late effective start of activities, while awaiting approval of the Initiative’s staffing plan and final budget.

The Initiative team is confident, however, that it will be able to accelerate implementation and catch up during 2023, assuming it can count on its projected budget for 2023 (US\$6.3 million) and the full carry-over from 2022. With this budget, the Initiative will also be able to make the recommended adjustments for accelerated implementation listed below.

The Reflect process confirmed the validity of the stated theory of change and, hence, this will continue serving as the Initiative’s guide for the work moving forward. The main challenge ahead will be accelerated implementation, while preserving a focus on co-creating innovations with stakeholders, maintaining rigor in research methods, assessments of potential for scalability and policy analysis, and ensuring sharing of knowledge and capacities with stakeholders. To this end, the Initiative adjustments are as follows:

RECOMMENDATION	SUPPORTING RATIONALE
<b>Theory of change confirmed – no change</b>	The theory of change seems to be working well and output development seems well on track toward the stated EOI outcomes.
<b>Where possible, increase targeted beneficiaries</b>	Testing the effectiveness of multiple (bundled) innovations may require larger coverage of beneficiaries (and control groups) and, in turn, this may enhance potential impact of the Initiative compared with initially stated EOI outcomes in terms of beneficiaries. Work Package teams are to identify the need and opportunity for this enhancement by Q2 of 2023, but without jeopardizing quality and rigor in impact assessment, and as budgetary resources allow.
<b>Engage in more continuous within-Initiative learning</b>	The Reflect process revealed the need for more intensive sharing of design of research methods and innovation bundles across Work Packages and value-chain cases. This knowledge-sharing process will also be used for peer-to-peer quality control of the Initiative’s outputs. To this end, regular (monthly) information-sharing and learning sessions will be held from hereon, also involving partners.
<b>Intensify knowledge-sharing and dialogues with partners and stakeholders</b>	While consultations with partners and stakeholders are taking place at the level of the individual case studies, efforts will be stepped up to intensify knowledge-sharing across country and value-chain contexts with the active engagement of all partners and stakeholders, using the knowledge platform (KISM) as a vehicle. Such active engagement is needed for the creation of a true community of practice for capacity development and sharing, which KISM aims for.
<b>Enhanced focus in Central America</b>	For Central America, the Initiative had planned to concentrate on Honduras and Guatemala, covering in both cases the coffee and “basic grains” (maize and beans) value chains. This was based on initial stakeholder consultations during the design stage of the Initiative. Following the scoping studies, further stakeholder discussions, and assessment of impact potential, a decision has been taken to concentrate focus on the coffee and beans value chains in Honduras. During 2024, the findings for Honduras will be shared with stakeholders in Guatemala and regionally in support of scaling, but without planning innovation design in the latter case, at least not for the present cycle of the Initiative.
<b>Achieving greater synergies across Work Packages</b>	The Reflect process identified potential for achieving synergies between value-chain innovations piloted by Work Packages 2 and 3, specifically in improvements in logistics and e-finance promoting inclusive vertical integration of the selected value chains in Nigeria and Uganda.
<b>Stepping-up collaboration with other Initiatives</b>	While there has been collaboration with other Initiatives, as indicated in Section 6 above, this has been relatively low-key so far. In 2023 and 2024, these collaborations will be intensified, especially regarding application of country-wide modeling analyses for impacts of scaled innovations and policy support and creation of the agrifood economic database with the Foresight and NPS Initiatives; sharing of experiences in research and innovation design with SHIFT, FRESH, HER+ and Digital Transformation; and synergies with regionally integrated Initiatives will be formalized now that innovation agendas are defined on both sides.

**COVER PHOTO:** A roadside fruit and vegetable market in Matunga, Mumbai, India. Photo credit: IITA



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