



CGIAR Research Initiative on

Author: CGIAR Research Initiative on Diversification in East and Southern Africa

Title: Annual Technical Report 2023: CGIAR Research Initiative on Diversification in East and Southern Africa

Suggested citation: CGIAR Research Initiative on Diversification in East and Southern Africa. 2024. Annual Technical Report 2023: CGIAR Research Initiative on Diversification in East and Southern Africa. Montpellier, France: CGIAR System Organization. https://hdl.handle.net/10568/141681



© 2024 CGIAR System Organization. This publication is licensed for use under a Creative Commons Attribution 4.0 International License (CC BY 4.0). To view this license, visit https://creativecommons.org/licenses/by/4.0.

Disclaimers

This publication has been prepared as an output of the CGIAR Research Initiative on Diversification in East and Southern Africa. Any views and opinions expressed in this publication are those of the author(s) and are not necessarily representative of or endorsed by the CGIAR System Organization.

Acknowledgements

This work is part of the CGIAR Research Initiative on Diversification in East and Southern Africa. We would like to thank all funders who supported this research through their contributions to the CGIAR Trust Fund: https://www.cgiar.org/funders.

Table of contents

CGIAR Technical Reporting 2023	1
Section 1: Fact sheet and budget	2
Section 2: Progress on science and towards End of Initiative outcomes	4
Section 3: Work Package progress	11
Section 4: Key results	20
Section 5: Partnerships	28
Section 6: CGIAR Portfolio linkages	30
Section 7: Adaptive management	32
Section 8: Key result story	34

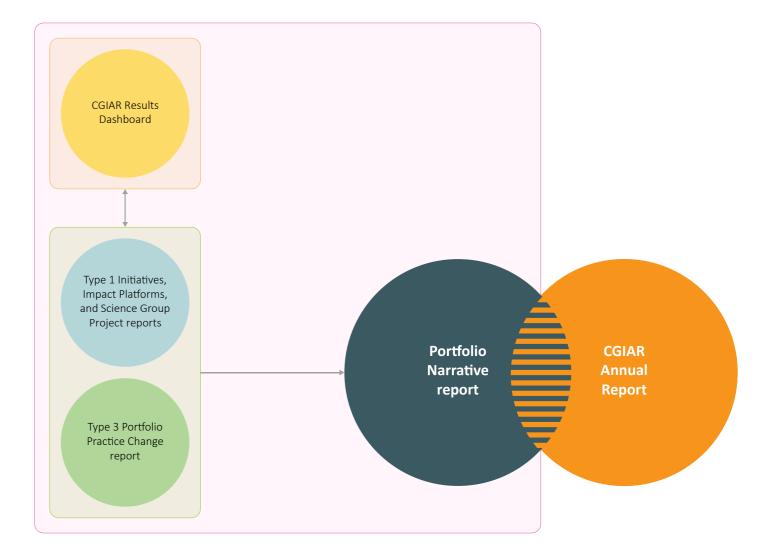
CGIAR Technical Reporting 2023

CGIAR Technical Reporting has been developed in alignment with the <u>CGIAR Technical Reporting Arrangement</u>. This Initiative report ("Type 1" report) constitutes part of the broader <u>CGIAR Technical Report</u>. Each CGIAR Research 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, Impact Platform, and Science Group Project (SGP) reports, with quality assured results reported by Initiatives, Platforms and SGPs 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 Annual Report is a comprehensive overview of CGIAR's collective achievements, impact and strategic outlook, which draws significantly from the Technical Report products above. For 2023, the Annual Report and Technical Report will be presented online as an integrated product.



Section 1: Fact sheet and budget

Ukama Ustawi: Diversification for Resilient Agrifood Systems in East and Southern Africa

Initiative short name

Diversification in Fast and Southern Africa

Initiative Lead

Initiative name

Inga Jacobs-Mata (i.jacobs-mata@cgiar.org)

Initiative Co-lead

Evan Girvetz (e.girvetz@cgiar.org)

Science Group

Resilient Agrifood Systems

Start - end date

01/01/2022 - 31/12/2024

Geographic scope

Regions

East and Southern Africa

Countries

Eswatini · Ethiopia · Kenya · Madagascar · Malawi · Mozambique · Rwanda · South Africa · Tanzania · United

The activity is principally about meeting any of the three CGIAR climate-related strategy objectives—namely, climate

mitigation, climate adaptation, and climate policy—and would not have been undertaken without this objective.

Republic · Uganda · Zambia · Zimbabwe

OECD DAC

Climate marker adaptation score1

OECD DAC Climate marker mitigation score¹

OECD DAC Gender equity

marker score²

Website link

Score 2: Principal

The activity contributes in a significant way 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.

Score 1B: Gender responsive

On the top of the minimum requirements for 1A, the Initiative/project includes at least one explicit gender equality outcome, and the Initiative/project team has resident gender expertise or capacity. The Initiative/project includes indicators and monitors participation and differential benefits of diverse men and women.

https://www.cgiar.org/initiative/21-ukama-ustawi-u2-water-secure-and-climate-resilient-agricultural-livelihoods-ineast-and-southern-africa/

These scores are derived from Initiative proposals, and refer to the score given to the Initiative overall based on their proposal.

EXECUTIVE SUMMARY

In 2023, the CGIAR Research Initiative on Diversification in East and Southern Africa, known as Ukama Ustawi (UU), made substantial strides in agricultural transformation, food security, and sustainable development. Focused on diversifying and intensifying maize-based systems sustainably, UU integrated climate-smart solutions, digital services, and support for small and medium agrienterprises (SMEs), with a strong emphasis on gender equality and social inclusion (GESI) across its activities by scaling and strengthening capacity in science and practice of scaling. The Initiative's Community of Spirit (COS) network, with more than 180 partners, was crucial in this effort.

UU delivered on-farm innovatons and technologies to scale out diversified climate smart technologies and innovatons. It also scaled up into policy processes and investment planning and scaled deep by addressing the normative barriers to inclusive scaling of diversification practices. Notably, 50,513 stakeholders, with at least 40 percent women, adopted nutrient-dense and biofortified crops, alongside climate-smart technology bundles. Seed and mechanization fairs in Zimbabwe, attended by 2,634 farmers (62 percent women), highlighted the impact of sustainable intensification and diversification practices on farmers' lives. The groundbreaking virtual field trips (VFTs) introduced innovative ways to share knowledge on conservation agriculture, crop diversification, mechanization and nutritious agrifood systems.

Digital services reached 2 million value chain actors, with 40 percent women and 40 percent youth represented, including a notable collaboration with Mediae for the Munda Makeover (MMO) TV show in Zambia ,and a climate credit-scoring tool for maize with Financial Access Consulting Services (FACS) and Agora Microfinance Zambia. UU also supported governments and the private sector with understanding how to navigate risk transfer through informing insurance uptake, and launching a digital climate and agro-advisory platform with Zambia Meteorological Department (ZMD) and Zambia Agricultural Research Institute.

Annual Technical Report 2023

The <u>UU scaling fund</u> was launched to elevate agrifood systems innovations across East and Southern Africa (ESA), awarding three US\$125,000 grants to CGIAR Initiatives. This fund aims to enhance the coordination of innovations, with technical support from UU and CGIAR teams. UU's innovation portfolio ballooned to 45 innovations and seven packages designed for scaling readiness and effective implementation, with a systematic approach to assess and ensure the success of each Innovation Package. <u>UU directly supported SMEs through the CGIAR Food</u> Systems Accelerator program (CFSA), securing financial commitments exceeding US\$11M for its first cohort of 10

UU scaled up its support of strategic policy processes in ESA by collaborating with governments and organizations across Zambia, Tanzania, South Africa, and Madagascar to enhance agricultural practices and climate resilience. In Zambia, UU's efforts with ZMD and the United Nations Food and Agriculture Organization (FAO) supported digital agro-advisory services and sustainable farming techniques through the National Framework for Weather, Water, and Climate Services for Zambia (NFWWCS) and the Mechanization Strategy. In Tanzania, UU worked with the Ministry of Agriculture, USAID, and ASPIRE to kickstart the Tanzania Seed Sector Development Strategy to improve seed system delivery. In South Africa, UU aided in revising the Climate Change Strategy for water, promoting collaborative governance. In Madagascar, UU contributed to the national Climate-Smart Agriculture Investment Plan, targeting agrifood systems transformation.

At the regional level, UU convened a policy dialogue on promoting gender- and climate- responsiveness in agricultural policy formulation and implementation with the Association for Strengthening Agricultural Research in Eastern and Central Africa (ASARECA), as well as a validation workshop for the policy practice index tool. Subsequent training of high-level policy-makers and policy analysts in East Africa served to enhance collaborative governance between the ministries of agriculture and NARS. Additionally, UU's Learning Alliance established a knowledge management policy, strengthening agricultural knowledge sharing with partners such as the Forum for Agricultural Research in Africa (FARA), ASARECA, and Centre for Coordination of Agricultural Research and Development for Southern Africa (CCARDESA), underscoring UU's role in bolstering agricultural policy and practice across the ESA

Scaling deep, the GESI framework, co-implemented with Solidaridad, facilitated integration of inclusivity across UU's

Finally, UU is grateful to have received 100 percent designated funding from the United States Agency for International Development (USAID), Deutsche Gesellschaft für Internationale Zusammenarbeit, Norwegian Agency for Development Cooperation (NORAD) and Swiss Agency for Development and Cooperation (SDC), and New Zealand's Ministry of Foreign Affairs and Trade (MFAT). The partnership with MFAT has been particularly catalytic in enabling UU's stretched End of Initiative outcomes (EOIOs) up to 2025.

	2022 ▽	2023	2024 ▽
PROPOSAL BUDGET ▷	\$11.57M	\$13.94M	\$14.49M
APPROVED BUDGET ¹ ▷	\$5.05M	\$11.09M ²	\$10.04M ³

¹ The approved budget amounts correspond to the figures available for public access through the Financing dashboard

¹ The Organisation for Economic Co-operation and Development (OECD) Development Assistance Committee (DAC) markers refer to the OECD DAC Rio Markers for Climate and the gender equality policy marker. For climate adaptation and mitigation, scores are: 0 = Not targeted; 1 = Significant; and 2 = Principal.

² 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.

² This amount includes carry-over and commitments

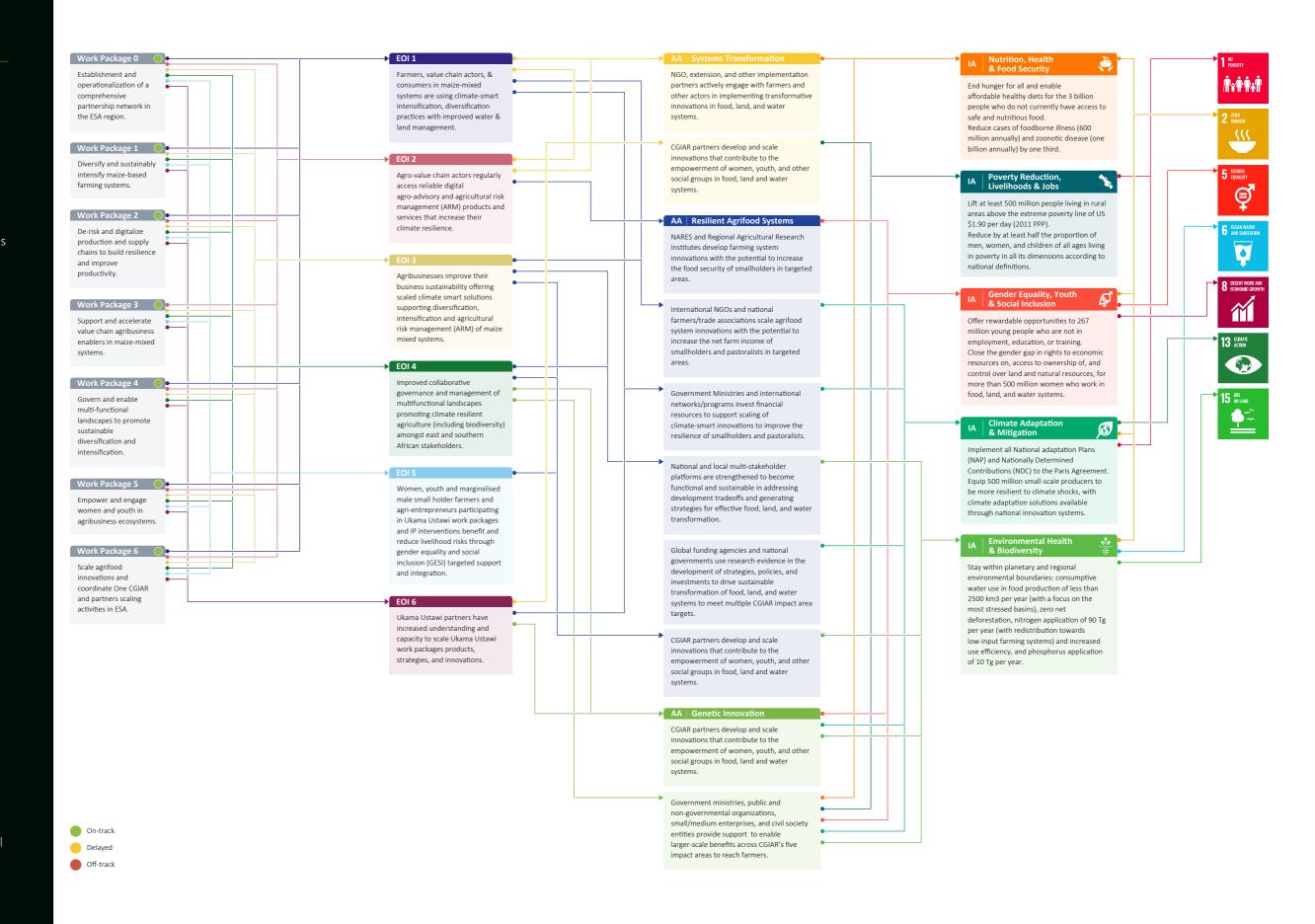
³ This amount is an estimation of the 2024 annual budget allocation, as of the end of March 2024.

Section 2: Progress on science and towards End of Initiative outcomes

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.

Note: A summary of Work Package progress ratings is provided in Section 3.





Summary of progress against the theory of change

In Shona, "Ukama" refers to partnerships, and in Swahili, "Ustawi" means well-being and development. True to its name, in 2023, Ukama Ustawi continued a series of strategic endeavors aimed at catalyzing agricultural transformation, improving food security and nutrition, and advancing sustainable development while fostering partnerships across ESA. Operating as a CGIAR regional integrated Initiative, UU worked closely with the regional director for ESA, CGIAR country convenors, and partners (including national agricultural research systems [NARS]) thus emphasizing a collective approach that transcended individual Centers to achieve impact at scale. This collaborative strategy, rooted in co-location, allowed UU to serve as a dynamic platform for integrating and scaling CGIAR's multifaceted efforts in ESA, ensuring alignment with regional and national priorities to achieve lasting impact.

UU's primary focus is agricultural diversification, through climatesmart technology bundles consisting of inclusive conservation agriculture, small-scale irrigation and mechanization practices, livestock integration, digital agro-advisory services, agribusiness acceleration, policy process support, and capacity strengthening to build resilience and mitigate the impacts of climate change by ensuring no one is left behind. This was achieved through collaborative efforts with CGIAR's global thematic Initiatives, such as Excellence in Agronomy, Seed Equal, Accelerated Breeding, Agroecology, Livestock and Climate, Aquatic Foods, Gender Equality, and Mixed Farming Systems, as well as bilateral projects such as Accelerating Impact of CGIAR Climate Research for Africa (AICCRA), Sustainable Intensification of Smallholder Farming Systems, <u>Understanding and Enhancing Adoption of Conservation Agriculture</u> in Smallholder Farming Systems of Southern Africa (ACASA), Accelerated Innovation Delivery—Initiative, and Technologies for African Agricultural Transformation (TAAT). Across four countries, UU facilitated community outreach programs, such as seed and mechanization fairs to encourage the adoption of conservation agriculture and other diversification techniques, along with collaborative efforts on sociotechnical innovation bundling with the Gender Equality Initiative. Mechanization also played a crucial role in enhancing agricultural productivity, with farmers in Kenya, Zambia, and Zimbabwe adopting mechanized operations through a service <u>provider model</u>, thereby improving farmers' efficiency and output. Innovations and best practices were systematically integrated into UU's portfolio through innovation profiling and scaling-readiness approaches of 45 innovation profiles and seven Innovation Packages. By identifying and showcasing successful agricultural innovations, UU sought to inspire and empower stakeholders to adopt and replicate these <u>science</u> and <u>practices</u> of <u>scaling</u>, driving transformative change at scale. In line with efforts to scale innovations, the UU scaling fund, which was launched through New Zealand's MFAT, dedicated funding to scale agrifood systems innovations. To showcase the work on mechanization and climate-smart agriculture (CSA) and break operational silos, UU pioneered two VFTs, thereby ensuring live and interactive communication.

In parallel, UU enhanced nutritional outcomes, with a particular focus on leveraging the potential of legumes to promote dietary diversity. The Pan-Africa Bean Research Alliance (PABRA) network spearheaded various interventions to promote beans as a way to contribute to food systems' well-being. These initiatives included on-farm demonstrations showcasing best practices, innovative school feeding programs, and training sessions aimed at enhancing knowledge on processing and utilizing nutrient-dense foods. Linked to food systems and nutrition, the <u>CFSA</u> successfully <u>selected 10</u> agribusinesses in the first cohort to strengthen CSA practices and de-risk business models through tailored technical assistance from CGIAR, assistance in investment readiness and engagement of private-sector investors from <u>2SCALE</u>, and <u>support in user experience</u> and gender inclusion from The Rallying Cry. The agribusinesses were paired with UU research staff, who matched their expertise to the businesses' R&D needs. Together, they co-developed and implemented innovations that aim to enhance the businesses' contributions to sustainable agricultural development and financial performance. An example of this is a new variety of vegan milk made from indigenous fruit, which is highlighted along with many others in the Agri-Innovation Report. The endline evaluation study

concluded the agribusinesses were satisfied with the amount of time and sophistication of the technical assistance provided, but they still faced hurdles in leveraging CGIAR expertise to catalyze funding. The second call for applications was launched on 27 November, 2023 in collaboration with Agroecology, which invited agribusinesses in Kenya, Malawi, Rwanda, Tanzania, Uganda, Zambia, and Zimbabwe to apply for support in scaling innovations in conservation agriculture, mechanization, irrigation, climate-smart nutrition, digital agriculture, and agroecology. Additionally, UU's matchmaking with potential funders resulted in initial financial commitments exceeding US\$11M for the 10 selected agribusinesses, which are in due diligence with the respective funders.

Recognizing the critical role of access to finance, UU, in partnership with FACS, is enhancing smallholder credit access that can de-risk farmers through climate adaptation measures in maize-mixed systems. This forms a wider objective to develop a climate-sensitive credit risk scoring system for farmers to promote CSA practices. We piloted this system with 300 farmers and plan to expand it to 10,000 farmers in Kenya and Zambia. UU has also empowered 2 million value chain actors in ESA (49 percent women and 42 percent youth), particularly in Kenya and Zambia, with digital services and agricultural risk management (ARM) in partnership with Mediae Company through television shows such as Shamba Shape Up and

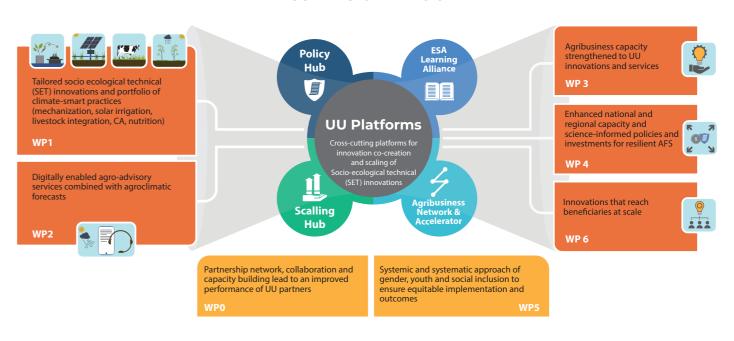
Moreover, UU places a strong emphasis on gender-sensitive approaches to agricultural development through conducting gender-sensitive crop diversification and nutrition workshops in Kenya (here and here) in collaboration with Gender Equality. These workshops aimed to ensure that agricultural interventions were inclusive and responsive to the needs of men, women, and young smallholder farmers. It is being implemented by the Kenya Agricultural and Livestock Research Organization, with support from Africa Conservation Tillage Network, Cereal Growers Association, and Ministry of Agriculture-Climate Change Unit. A GESI framework co-implemented with Solidaridad facilitated the mainstreaming of GESI considerations on social, economic, political, and institutional barriers and opportunities across WPs and within the UU COS, ensuring inclusive and scalable agribusiness innovations in ESA. Additionally, the GenderUp workshop was conducted on responsible

gender scaling strategies in collaboration with Wageningen University & Research (WUR) and University of California, Davis. A meta-analysis was conducted on social, economic, and institutional bottlenecks, barriers, and opportunities to more inclusive scaling within SMEs in the ESA region.

UU also played a pivotal role in shaping agricultural policy and governance frameworks supporting diversification at national and regional levels. The Initiative's governance and enabling environmental research has also evolved since its first year of implementation to a more demand-driven policy support agenda. Notable achievements included support for the Tanzania Seed Sector Development Strategy (TSSDS) with USAID and ASPIRES, which aims to strengthen the seed delivery system in the country, institutional coordination, and private-sector involvement. In addition, UU's support to governments' climate policy landscape was evidenced by the Initiative's involvement in the NFWWCS with AICCRA: the revision of South Africa's Climate Change Strategy for the water sector, in support of the South African Department of Water and Sanitation (DWS); the contribution to the Pretoria Declaration on Water Use in Agriculture and its linkages to nutrition, presented at the UN Water Conference in March 2023 in New York; and the development of Madagascar's national Climate-Smart Agriculture Investment Plan in collaboration with The World Bank, which focuses on technologies for the intensification of climate-resilient crops, other cereals, and livestock. These policy frameworks have all sought to integrate diversification impacts on water, land, and food systems into key climate policy positions at the national level for a more harmonized policy landscape.

The Initiative supported ASARECA with 1) the gender policy and implementation plan and 2) the policy practice index tool for tracking policy formulation and implementation. A regional policy dialogue was organized on promoting gender- and climate-responsiveness in agricultural policy formulation and implementation, hosted with ASARECA. Solidified partnerships with ASARECA, CCARDESA, FARA, AGNES, Kenya Institute for Public Policy Research and Analysis, Agricultural Consultative Forum, and AKADEMIYA2063 aimed to strengthen the agrifood system policy landscape through policy dialogues, policy advisories, and technical support to the enabling

THE UU APPROACH IN A NUTSHELL

































EOIO 1



Farmers, value chain actors, & consumers in maize-mixed systems are using climate-smart intensification, diversification practices with improved water & land management.

EOIO 2



Agro-value chain actors regularly access reliable digital agro-advisory and agricultural risk management (ARM) products and services that increase their climate resilience.

EOIO 3



Agribusinesses improve their business sustainability offering scaled climate smart solutions supporting diversification, intensification and ARM of maize mixed systems.

EOIO 4



Improved collaborative governance and management of multifunctional landscapes promoting climate resilient agriculture (including biodiversity) amongst east and southern African stakeholder.

EOIO 5



Women, youth and marginalized male smallholder farmers and agripreneurs participating in UU WPs and implementing partners' interventions benefit and reduce livelihood risks through GESI targeted support and integration.

EOIO 6



UU partners have increased understanding and capacity to scale UU WP products, strategies, and innovations.

•

Efforts in **promoting** socio-technological bundles on agronomy, nutrition, mechanization and irrigation continued in Zimbabwe, Zambia and Kenya, aiming to benefit

50,000 farmers



Livestock work is expanded to include crop-livestock integration, improved fodder production, improved access to fodder germplasm, and connections to the livestock value chain.



Value chain actors are engaged to promote CSA technologies and mechanization in the private sector, with seed companies participating in seed and mechanization fairs. Training sessions and awareness campaigns on CA/CSA bundles are conducted, reaching out to

60,000 users.

Over 10,000 farmers

are encouraged to adopt improved varieties of sweet potatoes.

Outreach activities on nutrition are intensified through **PABRA**, with plans to reach over

1,000 farmers and 1,000 extension agents/technicians.

Following successful "mother and baby trials," the team is now planning for "grandchildren trials".



MMO, through television and radio, delivers climate information, financial services, and agricultural extension support to over

2 million farmers and value chain actors, with

over 50% being women.

Impact assessment of MMO is

underway. In Zambia, it collaborated with the Ministry of Agriculture and Mercy Corps, offering e-extension systems, apps **website**, and USSD services.



It has trained

800 extension agents and reached

240,000 farmers.

Additionally, it provides agro-advisory services to

240,000

index insurance subscribers via SMS through **Acre Africa**.



In partnership with **Agora Microfinance**, it is implementing climate credit scoring for

14,000 smallholder farmers.

Ten Small-Medium Enterprises (SMEs) were selected for the first cohort of the Science-driven CGIAR Food Systems Accelerator (CFSA) Program for Climate-Smart Agribusinesses, unlocking funds exceeding

US\$11 million

in grants, debt, and equity in partnership with IFDC-2SCALE.



Technical assistance for the CFSA Program was scaled up in collaboration with CGIAR initiatives and partners, extending to



50 additional companies

addressing various issues including Agroecology, Livestock, and Aquaculture. An endline evaluation study of the CFSA program was conducted upon the conclusion of the first cohort. A comprehensive pipeline featuring



46 capital providers and input investors

offering grants, equity, and debt was established in partnership with **IFDC-2SCALE**.



UU's strategic policy support across four ESA countries directly advances EOIO 4 by enhancing collaborative governance and promoting climate-resilient agriculture.

In Zambia, UU's involvement in the development of the **NFWWCS** and the country's Mechanization Strategy has supported **sustainable agricultural practices and policy integration**.



In Tanzania, CGIAR in collaboration with the **USAID Feed the Future** SERA BORA project kickstarted the process to develop the **Tanzania Seed Sector Development Strategy** to **strengthen diversified seed systems**.

At the regional level, UU's validation workshop for the Policy Practice Index Tool championed by ASARECA, and subsequent training of high-level policymakers and policy analysts in East Africa served to enhance collaborative governance between ministries of agriculture and NARS.

Through the UU Learning Alliance, the establishment of a knowledge management policy via the DSpace repository for the CAADP-XP4 Consortium has strengthened regional agricultural knowledge sharing with partners such as FARA, ASARECA and CCARDESA.

In South Africa and Madagascar, UU's contributions to **climate strategies** and Climate Smart Agriculture Investment Plans have **promoted resilient agricultural practices**, underpinning EOIO 4's goal of improved governance and resilient agriculture in ESA.

In collaboration with Solidaridad, the development of a GESI Framework and innovative socio-technical strategies, such as animation videos for bean production, post-harvest, seed selection, land preparation, market access and nutrition, directly supports EOI-O 5 by empowering women, youth, and marginalized male smallholders.

These efforts enhance their agricultural knowledge, ensuring equitable access to resources and information. Country-level support was provided through workshops to



1) refine the Ministry of Agriculture's GESI Guidelines in Ethiopia and



2) launch the **Gender Action Learning Systems (GALS)**in Malawi aiming to **reach**

4000 households, alongside

3) a **youth agripreneur program** in **Malawi** and Zimbabwe.

These interventions are actively reducing livelihood risks by providing targeted support and fostering an inclusive agricultural community. Two gender assessments and GenderUp workshops were conducted to prioritize gender-responsive scaling in mechanization and conservation agriculture.

Seven Innovation Packages and

forty innovation profiles have been developed.



Additionally,

1855 individuals including

1121 female participants

have enrolled in an **e-learning** course on innovation and scaling.

Within CGIAR, **UU Scaling Fund** was launched through **New Zealand's MFAT** funding.

Three winners each to be awarded

US\$ 125,000

The GenderUp scaling readiness approach is being incorporated into all scaling frameworks through workshops and scaling materials.

Wageningen University and CGIAR, in collaboration with UU are investing in advancing the Science and Practice of scaling.

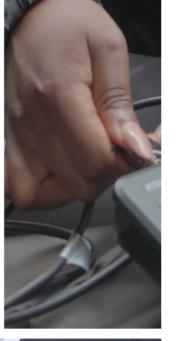
Scientific publications on innovation portfolio management, piloted with UU, are currently undergoing peer review.

Innovation Packages developed in Southern Africa (Malawi, Zimbabwe, and Zambia) in 2023 are paving the way for a **Scaling Strategy completion in 2024**.











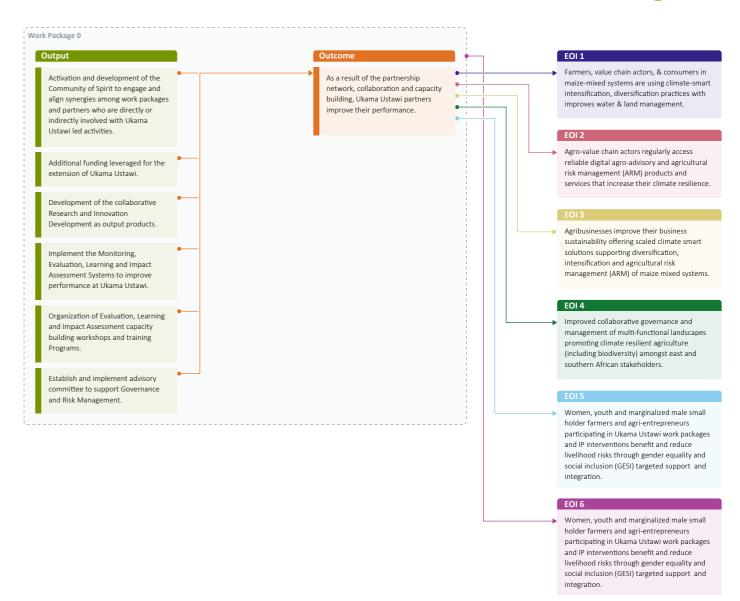


Section 3: Work Package progress

WPO: Establish and operationalize a comprehensive partnership network in the ESA region



On track



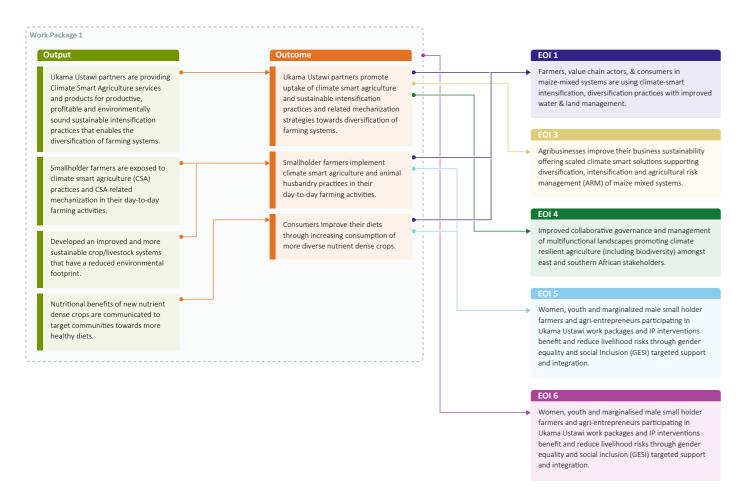
Work Package 0 progress against the theory of change

WPO was created in 2023 to encompass the increasing need to anchor the large partnership network in ESA (UU's COS). Building on the work done in 2022, UU continued to host large partnership meetings, online and in-person, such as the Pause and Reflect workshop attended by 100 people. We have also been working closely with donors to increase our funding for diversification and scaling, and received a substantial amount of dedicated funding from

New Zealand's MFAT. As part of this effort, we organized a three-week field trip for MFAT and the <u>Global Research Alliance</u> in the region, which has served to develop close ties with the government. To improve our storytelling, we systematically reviewed and refined our monitoring, evaluation, learning, and impact strategy going forward, which also included a <u>risk assessment</u> and upskilling of the team.

WP1: Diversify and sustainably intensify maize-based farming systems





Work Package 1 progress against the theory of change

Work Package (WP) 1 used participatory approaches to diversify and sustainably intensify maize-based farming systems in ESA. Starting from Kenya, Malawi, Zambia, and Zimbabwe, WP1 work was expanded to Ethiopia and deepened the crop-livestock integration components. A guideline to establish and manage a multistakeholder platform for coordination of integrated water resources management was completed on request from Ethiopia's Ministry of Water and Energy.

WP1 partners initiated 180 new mother trials and 600 baby trials, now totaling 280 and 4,480 trials, respectively. These on-farm trials evaluated <u>CSA practices</u>, such as <u>conservation agriculture</u> with maize diversification, which incorporated leguminous crops, tubers, and fodder grasses for livestock. Additionally, 22 validation demonstration plots assessed <u>new sweet potato varieties</u>. The Initiative supported six <u>mechanization service providers</u> (mostly women and youth entrepreneurs) to access <u>mechanization starter packs</u>.

WP1 co-financed the irrigation-development quality-management system toolkit (Ethiopia, Kenya, and Uganda). To sustainably manage the ongoing solar pump—based irrigation out-scaling efforts in Ethiopia, the development of a shallow groundwater map was co-financed. In Zimbabwe, two pilot irrigation projects were initiated. Following the successful conclusion of irrigation suitability mapping

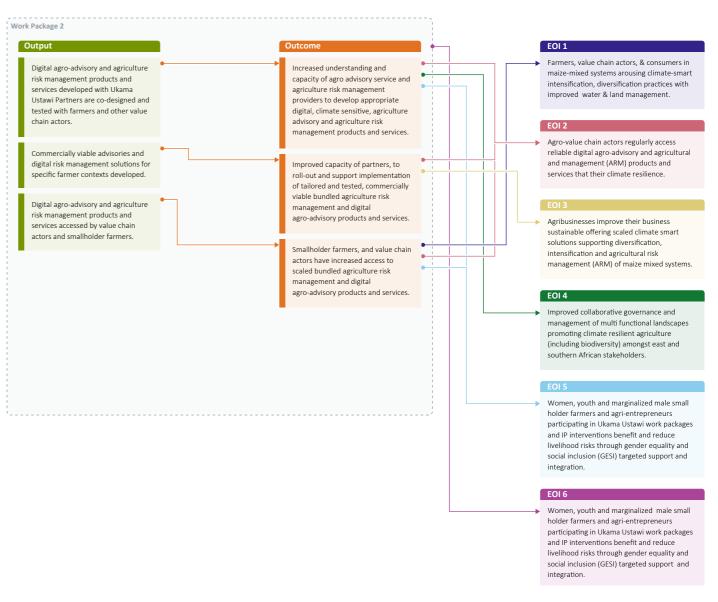
for two districts each in Kenya, Malawi, Zambia, and Zimbabwe, an agricultural system sustainability study with a water management focus was initiated. In 2023, tool development and data collection, covering more than 500 households, was completed to comprehend the level of agricultural intensification and identify context-specific interventions for broader agricultural water management. In addition, solar pumps were installed that can irrigate high-value and nutrient-dense crops on about 3 ha in Zimbabwe.

In Zambia and Zimbabwe, 39 integrated crop-livestock demonstration sites were established, which showcased <u>forage production</u> and use in maize farming systems. About 50,513 stakeholders (at least 40 percent being women) received training on and are using <u>nutrient-dense foods</u>, including micronutrient-rich iron- and zinc-biofortified beans and vitamin A-rich, <u>orange-fleshed sweet potato</u>, alongside implementing climate-smart practices.

The efforts from all the activities led to 15 peer-reviewed publications (such as here and here and here, among others) and journal articles (such as here and here, among others). The visibility of work was enhanced through two virtual field tours and eight in-person field days, five targeted videos, 10 blogs, four newspaper articles, two technical bulletins, and 21 research reports.

WP2: De-risk and digitalize production and supply chains to build resilience and improve productivity





Work Package 2 progress against the theory of change

WP2 has advanced substantially in its focus on the de-risking and digitalization of agriculture through risk management and agroadvisories. The development of a <u>climate credit</u>—scoring tool specifically for maize-mixed systems in Zambia marks one such stride. This tool, created through a partnership with <u>FACS</u> and <u>Agora Microfinance</u>, employs climate risk assessments at the district level, bringing together historical and seasonal forecast data with adaptation measures pertinent to CSA practices. Building on this experience, a workshop was conducted in Ethiopia addressing the <u>de-risking of crop commodities threatened by climate volatility</u> within agricultural commercialization clusters.

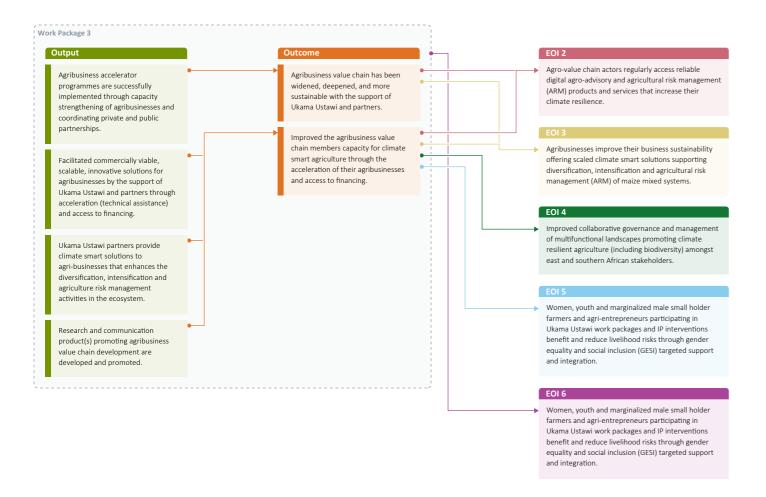
A comprehensive study on <u>strategic agricultural partnerships in East Africa</u> was also concluded. The findings offer critical insights into the nature and impact of such alliances in the agricultural sector. The completion of <u>behavioral ARM analyses</u> and a <u>policy brief</u> aimed at enhancing the uptake of agricultural insurance extended

the UU knowledge base, providing targeted recommendations for expanding insurance mechanisms within the agricultural domain. Gender considerations were also integrated into the Initiative, with a peer-reviewed article reviewing gender-inclusive approaches within agricultural insurance. Concurrently, a technical report on developing flood-index insurance for Zambia is underway, signifying a move toward comprehensive risk management strategies.

The Initiative also deployed a <u>climate agro-meteorological platform</u> in Zambia, which provides key actors with essential tools for anticipating and managing agricultural yields in light of climatic shocks. Dissemination efforts include the broadcasting of agroadvisories through the <u>MMO television series</u> in Zambia and the development of an interactive game, "<u>Shamba Showdown</u>," to educate Kenyan farmers on risk management. A <u>study</u> assessing the influence of the MMO series on Zambian viewers' agricultural behaviors underscores the role of media in enhancing agricultural productivity.

WP3: Support and accelerate value chain agribusiness enablers in maizemixed systems





Work Package 3 progress against the theory of change

In 2023, WP3 successfully launched and executed its inaugural accelerator program across four countries: Kenya, Rwanda, Uganda, and Zambia. The program received 288 applications meeting high-quality prequalification standards. The first cohort consisted of Afri-Farmers Market Ltd, Aggregators Trust Rwanda, Batian Nuts Ltd, East Agriculture Development Company Ltd, Farm Depot Ltd, Forest Africa Zambia Ltd, Shamba Records, Stable Foods, The Insectary Kenya, and Yellow Star Produce and Food Processors Ltd. Of these agribusinesses, 60 percent were women-led or co-led, 20 percent youth-led, 70 percent early-stage, and 30 percent in their growth stages. Additionally, 20 percent of the agribusinesses were developing innovation(s) within irrigation and mechanization, while 60 percent were focused on nutrition CSA, and 20 percent fell in the ARM innovation theme. The agribusinesses were engaged in product value chains, including beans, fruits, groundnuts, horticulture, macadamia nuts, and soybeans, supporting more than 30,000 smallholder farmers in their supply chains to diversify from cultivating maize to more nutritious agricultural products.

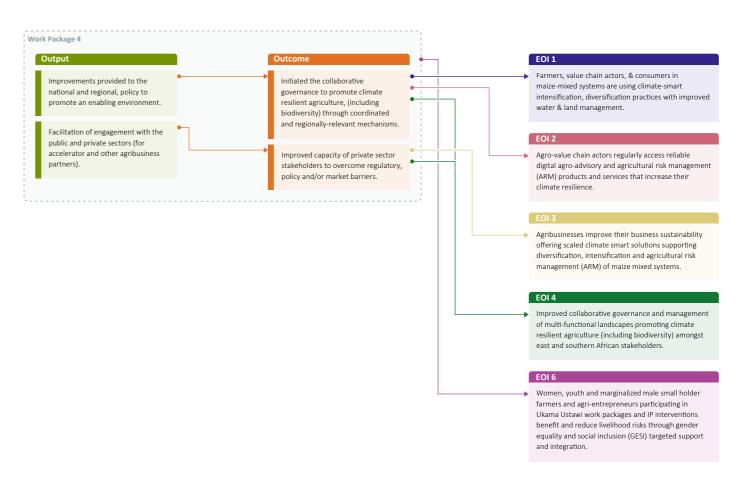
Collaborating with experts from the Alliance of Bioversity International and CIAT (the Alliance), International Water Management Institute (IWMI), PABRA, International Institute of Tropical Agriculture (IITA), and International Maize and Wheat Improvement Center (CIMMYT), WP3 delivered tailored CSA

technical assistance by matching researchers to each agribusiness based on their assistance needs. The second workstream, investment-readiness technical assistance delivered by the International Fertilizer Development Center's 2SCALE (IFDC), focused on preparing agribusinesses to receive investments. All 10 participating entities received personalized action plans addressing financial viability, scalability, and investor appeal. In 2023, the program delivered six group workshops, six field visits and 10 individual sessions tailored to address their CSA technical assistance needs. In addition, seven group workshops, 14 field visits, and 25 individual sessions were conducted to strengthen their investment readiness.

To mobilize additional financing for these agribusinesses from the private sector, the accelerator program, through the support of IFDC-2SCALE, established a pipeline of 46 capital providers across grants, debt, and equity, engaging successfully with 58 percent. This effort resulted in three agribusinesses raising more than US\$11.1 million in debt and grants from national and regional banks, impact investors, and philanthropic funders. Furthermore, 13 strategic connections were made between the agribusinesses and partners in commercial, carbon credit, trade finance, and network organizations by the investment readiness team.

WP4: Govern and enable multifunctional landscapes to promote sustainable diversification and intensification





Work Package 4 progress against the theory of change

WP4 significantly contributed to collaborative governance and climate-resilient agriculture in ESA by supporting improvements in the enabling environment and working closely with its partners (ASARECA; CCARDESA; The Food, Agriculture and Natural Resources Policy Analysis Network [FANRPAN]; USAID; ASPIRES; and AKADEMIYA2063). It directly supported 10 policy processes and 4 enterprises with technical assistance.

At the regional level, to help address policy and knowledge management gaps, UU organized a regional policy dialogue and provided inputs into the ASARECA-led GESI mainstreaming guideline, and a policy practice index tool to capacitate the NARS in tracking policy formulation and implementation success. Moreover, it developed a Learning Alliance concept note to lead the engagement of UU with national agricultural research and extension services (NARES) and regional bodies to address the challenges in knowledge exchange between research organizations and farmers, with a learning event organized at the African Agricultural Science Week and an agreement signed to co-implement the African Union's CAADP XP4 Knowledge Management Framework.

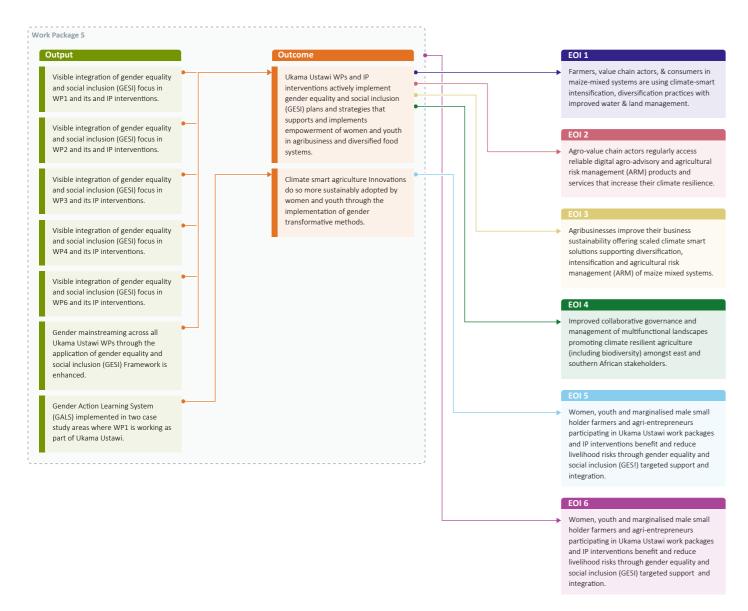
On a national level, WP4 has played a pivotal role in catalyzing partnerships to support climate-resilient transformations. In partnership with ASPIRES-USAID Feed the Future and AGRA, WP4

formed a technical advisory team and started developing the Tanzania Seed Sector Development Strategy, a critical initiative to improve productivity and crop diversification in Tanzania. Similarly, with the South African DWS, the WP hosted a national consultation to revise the Climate Change Strategy for the water sector. To help ensure access to safe and sufficient water and nutritious food for all in Southern Africa, as a proceeding of the Climate-Smart Agriculture Policy Dialogue, WP4 joined a stakeholder network to contribute to the implementation of the Pretoria Declaration on Water Use in Agriculture. In Zambia, it worked with the Ministry of Green Economy and Environment for the development of the National Framework for Weather, Water, and Climate Services to strengthen climate adaptation. The WP also supported WP1 and FAO with the Zambia Mechanization Strategy supporting conservation agriculture by smallholders.

Addressing private sector needs, five agribusinesses under the CFAS received technical assistance around the regulatory environment and market expansion. Moreover, WP4 generated datasets around climate impact on maize and other major food crops in ESA through impact modeling. It published six papers about the institutional bottlenecks in agricultural value chains, six policy dialogue/inception reports, five blog pieces, and three innovation profiles.

WP5: Empower and engage women and youth in agribusiness ecosystems





Work Package 5 progress against the theory of change

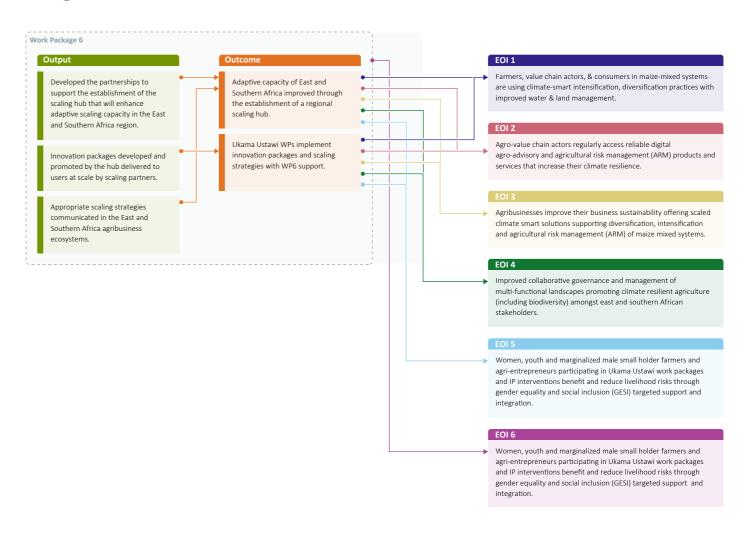
Through WP5's activities in 2023, UU made great strides toward fully integrating GESI within the Initiative's interventions and activities to ensure diversification. This has mainly been achieved by using the GESI framework, which has helped UU's WPs to promote GESI in agribusiness transformation in ESA, and a meta-analysis that was conducted to uncover the social, economic, and institutional bottlenecks, barriers, and opportunities to more inclusive SMEs in the ESA region. Through a validation process at the Gender, Work and Organization Conference, the GESI framework explored why and where change needs to happen to achieve inclusive <u>agribusiness transformation</u> within the Initiative's interventions. Using the learning from this framework and analysis, the UU team incorporated gender and social inclusion across WP activities. To illustrate, in cohort one of the CFSA, GESI provided targeted technical assistance and developed gender action plans. Similarly, GESI considerations have been used in Zimbabwe, where the GESI sustainable scaling methodology, GenderUp, facilitated stakeholder

engagement through structured dialogues to create sensitization around the innovation's impacts and mitigation opportunities.

The GESI team has also laid the groundwork for UU's all-of-society approach by implementing the Gender Action Learning Systems (GALS), a gender-transformative methodology. In 2023, GALS was focused on Malawi, where the team carried out research and conversations with youth, especially around the development of specific interventions for youth engagement in agripreneurship. With our partner Solidaridad, UU also finalized work on promoting strategies on GESI in the agribusiness sector in Kenya and Zambia, highlighting key success stories on livelihood diversification. A gender assessment was done by Solidaridad in Malawi on the main stumbling blocks and opportunities for women and youth in agriculture and agribusiness. The completion of these activities constitutes the first step toward achieving a successful implementation of GALS in 2024.

WP6: Scale agrifood innovations and coordinate CGIAR and partner scaling activities in ESA





Work Package 6 progress against the theory of change

WP6 is a cross-cutting effort to scale agrifood innovations and coordinate CGIAR and partner scaling activities in ESA. WP6 developed a portfolio of 44 innovation profiles in ESA (20 continued, 20 new, and 4 discontinued). The innovations are profiled using CGIAR's IPSR methodology, which includes providing evidence-based processes to determine their level of maturity. This methodology provides comparable criteria to UU for selection of innovations with higher level of maturity to proceed along the scaling pathway. During this process, each innovation is assessed in a specific context, and enablers and bottlenecks are identified. The resulting Innovation Package is scored for innovation readiness and innovation use and this process provides the scaling readiness score. Key scaling bottlenecks are identified, and there is better understanding and capacity to scale the innovation in line with EOIO 6. Seven innovations from WPs 1 through 5 and ACASA were prioritized for packaging through the support of WP6.

The highlight was the launch of the scaling fund, which solicited applications for three global science Initiative innovations as an initial scaling fund, each to be awarded \$US125,000 in 2024. The UU scaling fund is meant to catalyze the scaling of innovations with

a high-impact potential. This fund serves as a platform for CGIAR and scaling partners to receive support in co-creating, negotiating, and financing scaling strategies and action plans. It empowers the regional integrated Initiative to coordinate and support the scaling of CGIAR innovations through partnerships with various stakeholders, including other Initiatives active in ESA, as well as with government, public, and private sectors.

WP6 continued to lead the science of scaling research and innovation portfolio management research in collaboration with WUR. We hired a postdoctoral research fellow in scaling, who will be tasked with developing the regional scaling hub in Nairobi, Kenya. WP6 and WP5 led developments in inclusive scaling research using the GenderUp approach.

The 2nd Annual CGIAR Week of Scaling was held in Nairobi, bringing together more than 80 experts from 18 Initiatives, nine CGIAR Centers, one major bilateral project, and 20 external partners and funders working in ESA to share knowledge. This event contributes to enhancing the scaling conversation and strengthening the scaling community in CGIAR with its partners in ESA.

WP6 assumptions also remain valid, with no updates or additions at this time. We have added indicators to our EOIO 6:

EOIO 6 indicator (1) With UU support, 10 CGIAR innovation teams have developed impactful scaling strategies to improve lives

& livelihoods of farmers in ESA

EOIO 6 indicator (2) \$US25 million invested in scaling work in ESA for a resilient agrifood system

Number of policies, strategies, laws, regulations, budgets, investments, or curriculums modified in design

Other quantitative measure of CGIAR innovation use (such as area)



Work Package progress rating summary

WORK PACKAGE

PROGRESS RATING & RATIONALE

0



Progress rating

Despite being a new WP, the outputs planned for 2023 were achieved.

1



Progress rating

To date, every aspect of the WP is executing the scheduled activities, effectively reaching the goal of engaging 50,513 stakeholders, including farmers, value chain participants, and consumers in adopting climate-smart intensification and diversification practices, focusing on maize-mixed systems, alongside implementing enhanced water and land management techniques. Among these, 40 percent are women, but less than 40 percent are youth. The WP is working with other WPs on strategies to engage more youth.

2



Progress rating

This work is on track and close to reaching its targets regarding engaging value chain actors through various channels, including television and other ARM and agro-advisory products and services.

3



Progress rating

Generally on track for 2023 activities, WP3 has reached and exceeded its EOIO target (US\$7 million in debt, equity, or grants currently in the mobilization process by 2024) and is set to support 40 percent women entrepreneurs. However, it's currently revising its strategy to accelerate an additional 30 agribusinesses.



Progress rating

On track regarding EOIO 4. WP4 has already supported more than four policies or strategies developed or improved and is working toward enabling \$200 million to promote climate-resilient agriculture.

5



Progress rating

On track regarding activities, budget spent, and partnerships. Work completed in 2023 provides solid grounding for follow-on work planned for 2024 (GALS).

6



Progress rating

WP6 meets or exceeds the 2023 Plan of Results in most areas. The framework for scaling strategies will be developed in 2024, preventing its use in 2023 as planned.

Definitions

On track



Delayed

Off track

- Annual progress largely aligns with Plan of Results and Budget and Work Package theory of change.
- Can include small deviations/issues/ delays/risks that do not jeopardize success of Work Package.
- Annual progress slightly falls behind Plan of Results and Budget and Work Package theory of change in key areas.
- Deviations/issues/delays/risks could jeopardize success of Work Package if not managed appropriately.
- Annual progress clearly falls behind Plan of Results and Budget and Work Package theory of change in most/all areas.
- Deviations/issues/delays/risks do jeopardize success of Work Package.

Section 4: Key results

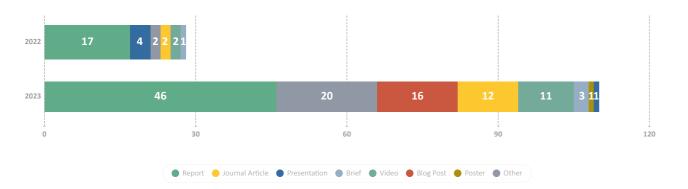
This section provides an overview of results reported by the CGIAR Research Initiative on Diversification in East and Southern Africa in 2023. These results align with the CGIAR Results Framework and Diversification in East and Southern Africa's theory of change. Source: Data extracted from the CGIAR Results Dashboard on 29 March 2024.

In 2023, UU reported 216 results, which included 19 capacity-sharing outputs, 45 innovations developed, 110 knowledge products and 21 other outputs. At the outcome level, the Initiative ensured that nine innovations were used, six policy change outcomes were reported, and six other outcomes were reported.

CONTRIBUTIONS TO THE CGIAR RESULTS FRAMEWORK: NUMBER OF RESULTS BY TYPE



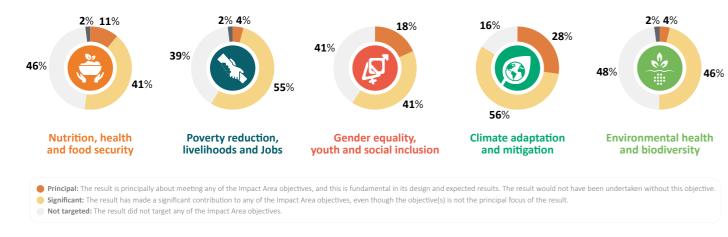
NUMBER OF KNOWLEDGE PRODUCTS BY TYPE



UU forged strong collaboration with various CGIAR Initiatives including Seed Equal; Gender Equality; Low-Emission Food Systems; Fragility, Conflict, and Migration; Excellence in Agronomy; Climate Resilience; Digital Innovation; National Policies and Strategies; and Aquatic Foods, as well as the Gender Impact Platform, the Climate Impact Platform, and the Environment and Biodiversity Impact Platform in 2023 to produce the above results. These collaborations and effort successfully resulted in inclusive scaling of CGIAR innovations.

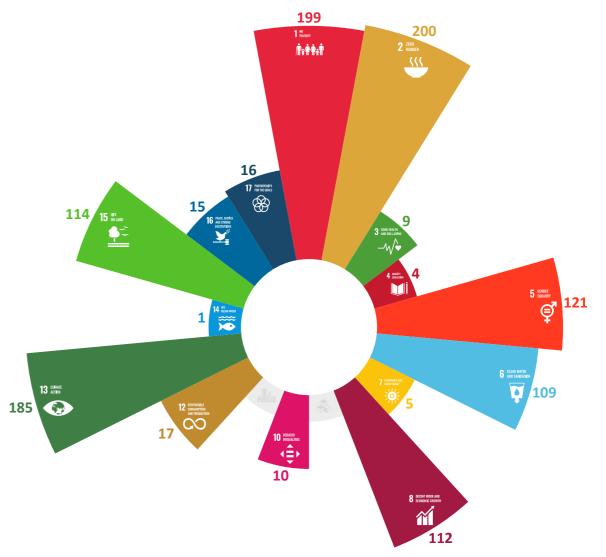
This year, UU reported various types of knowledge products, including 12 peer-reviewed journal articles and 46 research reports and technical documents covering a range of related topics on agricultural diversification, GESI, strengthening policy and governance frameworks, food security, and improving nutrition and climate resilience.

PERCENTAGE OF RESULTS TAGGED TO CGIAR'S IMPACT AREAS



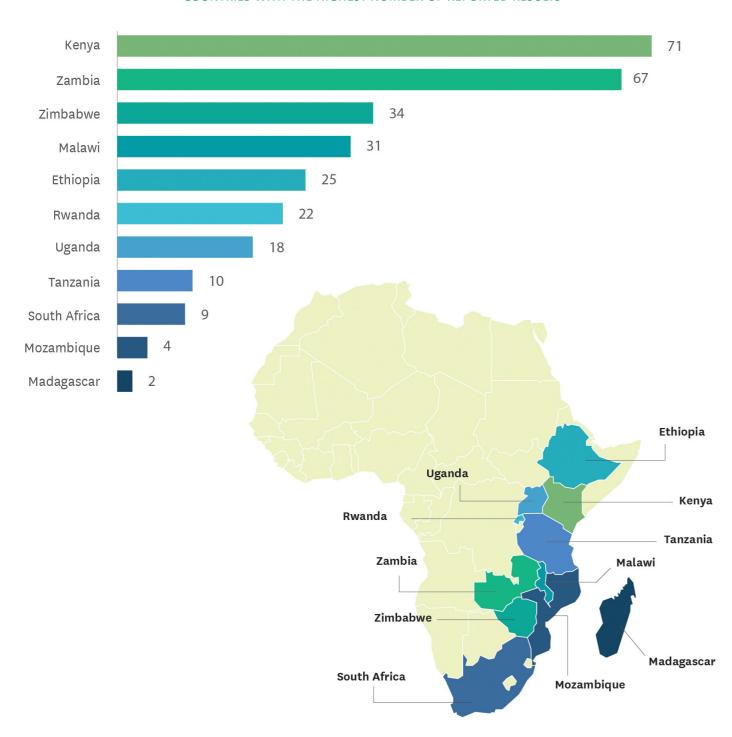
UU's work centers around assessing and applying agricultural diversification practices that are scaled up by women and men, as well as youth. The above graph shows that all the CGIAR Impact Areas are significant or principal in the results reported, particularly climate change, GESI, and poverty reduction, with nearly all the reported results reflecting work toward them.

CONTRIBUTIONS TO THE SUSTAINABLE DEVELOPMENT GOALS (SDGS)



UU contributed significantly to the United Nations Sustainable Development Goals, keeping the main aim of the Initiative to help smallholder farmers transition toward sustainably intensified, diversified, and de-risked agrifood systems. More than 200 results were reported toward achieving SDG 1: No Poverty and SDG 2: Zero Hunger, followed by SDG 13: Climate Action with an impressive 183 reported results in 2023. Just as important are SDG 5: Gender Equality, SDG 15: Life on Land, SDG 8: Decent Work and Economic Growth, and SDG 6: Clean Water and Sanitation, with more than 100 results reported to reach these global goals.

COUNTRIES WITH THE HIGHEST NUMBER OF REPORTED RESULTS



In its initial phase spanning 2022 to 2024, UU strategically prioritized Zambia, Kenya, Zimbabwe, and Ethiopia. Following the receipt of funding from MFAT, the Initiative's duration has been extended through 2025, enabling a significant expansion of its scope. This extension has allowed for an ambitious doubling of targeted outcomes across the EOIOs. As a result, 2023 witnessed UU achieving notable successes, particularly in Kenya, Zambia, Zimbabwe, Malawi, and Ethiopia.

INNOVATION PACKAGE INFORMATION









7

innovation use/packages reported

Diversification in East and Southern Africa

79

Expert contribution to Innovation Packaging and scaling readiness 19

Scaling partners involved in Scaling Innovation

4

Countries for which Innovation Packages have been designed

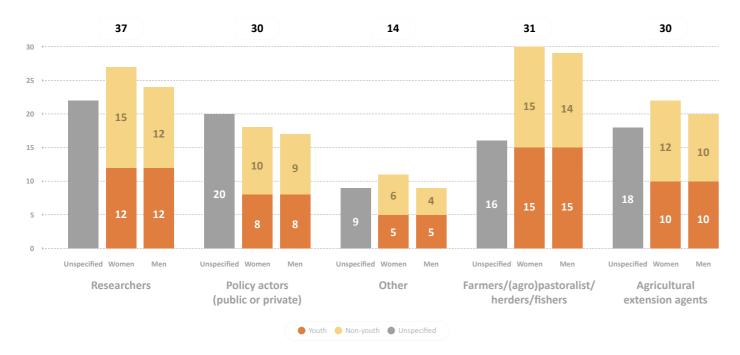
Seven Innovation Packages across four countries were designed through the IPSR pathway. These packages spanned a diverse array of themes, including conservation agriculture, digital agro-advisories via the engaging edutainment platform of the MMO farm makeover show, mechanization starter packs, enhanced intercropping techniques, and economical livestock management strategies. To develop and refine these packages, a collaborative network of 79 experts from varied disciplines and institutions was assembled. This multidisciplinary team has been instrumental in advancing the Innovation Packages toward scalability, ensuring their effectiveness and impact in the targeted countries.

NUMBER OF INNOVATIONS BY READINESS LEVEL

.0		Pipeline overview # of innovations
9	PROVEN INNOVATION The innovation is validated for its ability to achieve a specific impact under uncontrolled conditions	10
8	UNCONTROLLED TESTING The innovation is being tested for its ability to achieve a specific impact under uncontrolled conditions	10
7-	PROTOTYPE The innovation is validated for its ability to achieve a specific impact under semi-controlled conditions	7
6	SEMI-CONTROLLED TESTING The innovation is being tested for its ability to achieve a specific impact under semi-controlled conditions	3
5	Model/Early Prototype The innovation is validated for its ability to achieve a specific impact under fully-controlled conditions	5
4	CONTROLLED TESTING The innovation is being tested for its ability to achieve a specific impact under fully-controlled conditions	3
3	PROOF OF CONCEPT The innovation's key concepts have been validated for their ability to achieve a specific impact	
2	FORMULATION The innovation's key concepts are being formulated or designed	5
1	BASIC RESEARCH The innovation's basic principles are being researched for their ability to achieve a specific impact	1
0	IDEA The innovation is at idea stage	0

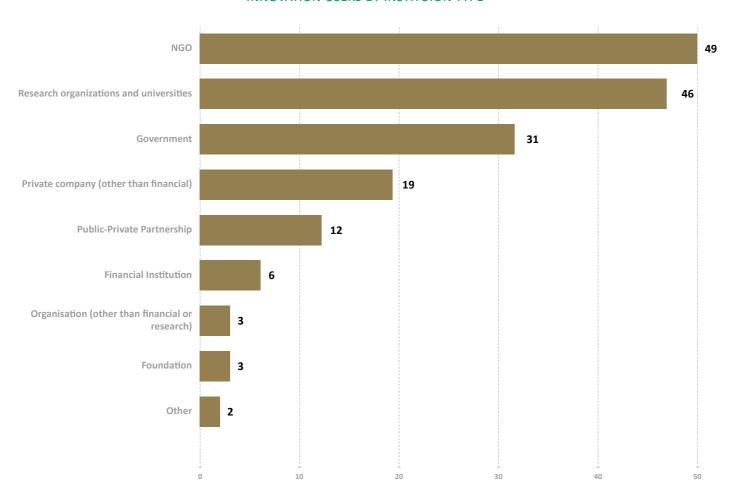
Annual Technical Report 2023

INNOVATION DEVELOPMENT RESULTS FOR SPECIFIC TARGET GROUPS/ACTORS

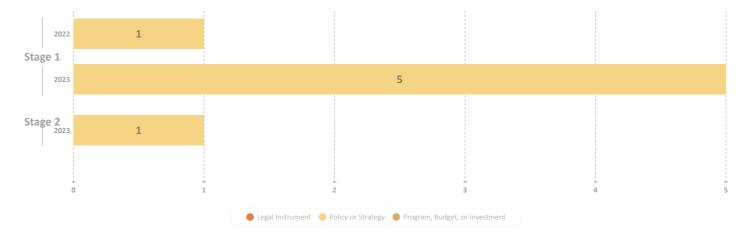


UU has been at the forefront of innovation development, reporting 40 of its own groundbreaking developments as outputs. In addition, it has contributed to the advancement of five innovations led by other CGIAR Initiatives. Impressively, half of these innovations have reached the highest maturity levels—readiness levels 8 and 9—signifying their tested and proven capacity for impactful outcomes. This year also marked an important milestone as five ongoing innovations from 2022 advanced their readiness levels while four were discontinued, underscoring a continuous journey toward innovation scaling excellence. The collective effort of a broad spectrum of stakeholders, including researchers, farmers, various value chain participants, policymakers, and agricultural extension officers, has been crucial. Their equal and vital roles have significantly propelled the implementation and success of these innovations, showcasing the collaborative spirit of the UU Initiative.

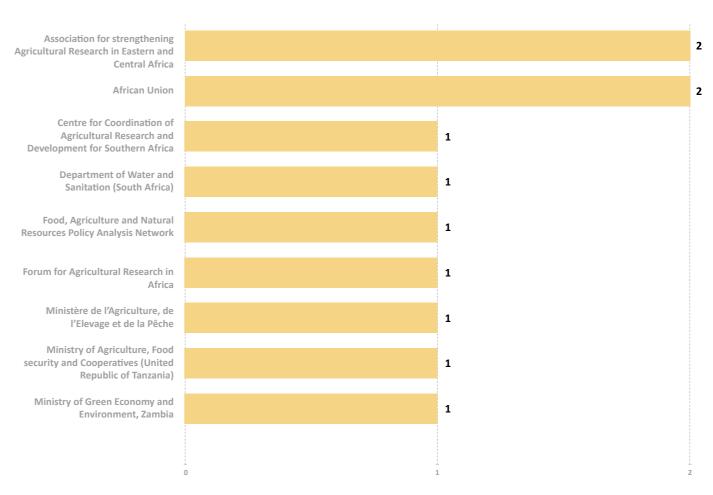
INNOVATION USERS BY INSTITUION TYPE



NUMBER OF POLICES BY STAGE AND BY TYPE

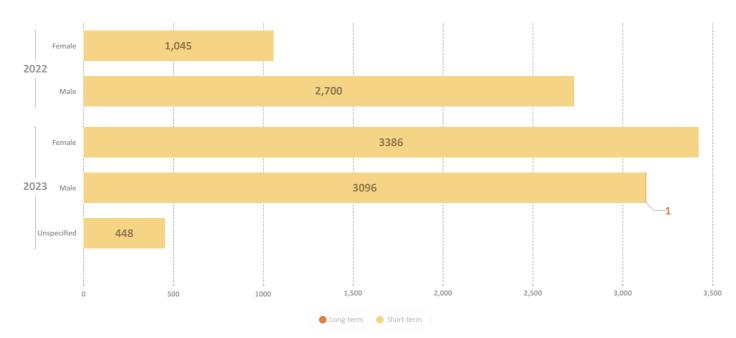


ORGANIZATIONS WHOSE POLICY HAS CHANGED



In 2023, UU significantly contributed to policy development in the region, reporting six major policies or strategies. These include the Pretoria Declaration on Water Use in Agriculture, revising South Africa's Climate Change Strategy for the water sector, and assisting in the development of Zambia's National Framework for Weather, Water, and Climate Services. Additionally, UU's efforts were instrumental in formulating the TSSDS, set to launch in 2024, and supporting the now-enacted Climate Smart Agriculture Investment Plan by the government of Madagascar.

NUMBER OF INDIVIDUALS TRAINED BY THE INITIATIVE



In 2023, the Initiative trained 6,937 individuals, more than doubling the count from the previous year and leading to significant shifts in knowledge and practices. Notably, the training sessions saw a higher participation of women (3,386) compared to men (3,096), highlighting a positive stride toward gender inclusivity. Further emphasizing its commitment to gender equality, UU partnered with the Gender Equality Initiative to support a graduate research fellowship (MSc) focused on investigating the impact of sociotechnical innovation bundles on the economic resilience and empowerment of smallholder farmers in selected Kenyan counties. This collaboration underscores UU's dedication to fostering inclusive development and empowerment through education and innovation.



Annual Technical Report 2023

Section 5: Partnerships



Partnerships and Diversification in East and Southern Africa's impact pathways

The partnership strategy across the various activities focuses on collaborating with a diverse range of organizations to achieve specific goals in agricultural development and innovation. Key partners include NARES, local and regional NGOs, government bodies, and private-sector companies.

In its second year, UU maintained strong partnerships with all NARES, national and county governments in its focus countries, and local and regional nongovernmental organizations (NGOs). The NARES partnered in facilitating training of farmers and other stakeholders, management of trials, data taking, development, and rolling out of innovations at scale.

Additional public partners aimed at strengthening the enabling.
environment regionally and nationally for diversified agrifood systems. UU continued partnering with FANRPAN, a policy advocacy network, and concluded new agreements with regional NARES networks, ASARECA, and CCARDESA, as well as USAID, and ASPIRES, contributing to policymaking around water and climate services, national responses to climate change, seed sector development, gender and social inclusion, and knowledge management, among others. While doing so, the Initiative also worked closely with government and intergovernmental organizations, including

the <u>African Union</u>, the <u>Zambian Ministry of Green Economy and Environment</u>, <u>ZMD</u>, the Ethiopian and Tanzanian ministries of agriculture, and the <u>DWS</u> in South Africa.

Moreover, with AKADEMIYA2063, a regional policy analysis and capacity-strengthening organization, UU produced research datasets and papers around climate impact forecasting and institutional bottlenecks in food value-chain development, providing policy recommendations. The Initiative also began discussions with Mercy Corps' Sprout program for work which we will jointly execute in support of Zambia's Ministry of Agriculture and ZMD to develop its e-extension system. In Ethiopia, work has begun in partnership with the Agriculture Transformation Institute toward the de-risking of the agriculture commercial cluster for the maize value chain in Ethiopia.

The private sector forms a critical pathway for UU's innovations and scaling and the agricultural sector. For example, under the mechanization component, machinery manufacturers supplied the equipment and consented to involvement in the service provider model. We also continued to deliver work on de-risking agriculture investments, and digitalizing agro-advisory services, in continued partnerships with the Mediae Company on the MMO TV show, with FACS and Agora Microfinance bank on climate credit scoring

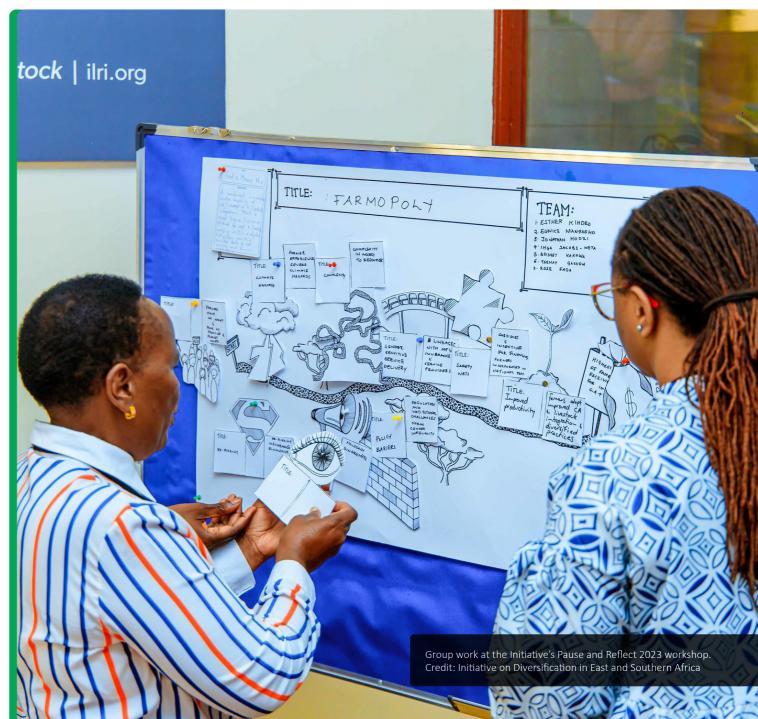
<u>in Zambia</u>, and <u>Busara Center for Behavioral Economics</u> on strategic partnerships in agriculture. In addition, the partnership with Busara and <u>Usiku Games</u> has allowed CGIAR to innovate on the <u>role of</u> gamification in agriculture.

As part of UU's accelerator work, we teamed up with the African accelerator experts, IFDC-2SCALE, for strategic support in the Call-for applications (supported by VC4A), selection of agribusinesses, assistance in investment readiness, and engagement with various private-sector and philanthropic funders. The Rallying Cry worked with the first cohort to provide tailored, demand-driven technical assistance on market needs. They provided the accelerators with

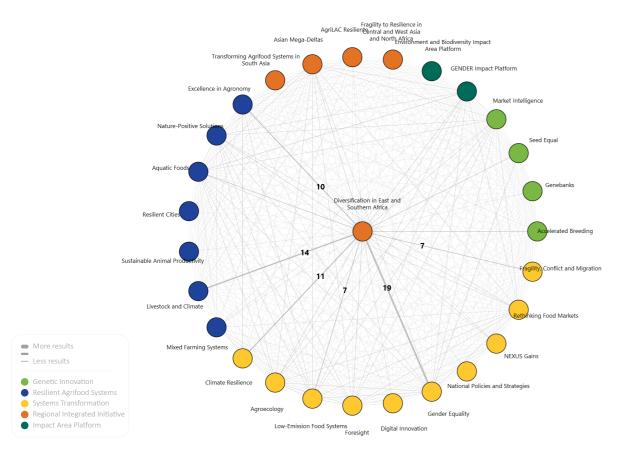
skills that allow their <u>businesses to be responsive and inclusive of</u> <u>gender and youth</u>, while linking them to the financial market.

UU's work is underpinned by <u>Briter Bridges'</u> identification of the scaling landscape within ESA, alongside <u>WUR</u>, forming a critical knowledge partnership for business acceleration. This is underpinned by <u>Solidaridad's</u> knowledge on youth and women's dynamics in smallholder agriculture and their contribution to climate resilience.

Finally, strong partnerships with local, national, and regional media enabled wider dissemination of knowledge and information, which is critical for scaling innovations and raising awareness.



UU'S INTERNAL NETWORK OF COLLABORATIONS



Connections are sized by the number of reported results. Collaborations where only one result was reported with a linkage between two Initiatives are excluded.

Portfolio linkages and Diversification in East and Southern Africa's impact pathways

UU stands out within CGIAR as a regional integrated Initiative dedicated to climate adaptation and mitigation, intertwining its efforts with a host of other Initiatives under the same Impact Area, such as Foresight; West and Central Africa Food Systems Transformation; Livestock and Climate; Fragility, Conflict, and Migration; Climate Resilience; Asian Mega-Deltas; and Low-Emission Food Systems. These collaborations enhance UU's implementation of its assess-apply-scale impact pathway, enriching its approach to mechanization, agribusiness, climate change, adaptation, mitigation, and notably, gender equality and innovation scaling.

In a synergistic effort with the <u>Gender Equality</u> Initiative (with which UU shares 19 results), UU has enriched dialogues on diversification and nutrition in Kenya's <u>Nakuru</u>, <u>Makueni</u>, and <u>Embu</u> counties. This engagement is pivotal for advancing resilient agrifood systems, contributing to UU's goals of realizing <u>climate-smart intensification</u>, <u>diversification</u>, and inclusive practices among value chain actors, especially consumers. Also in collaboration with the Gender Equality and <u>Accelerated Breeding</u> Initiatives, UU has championed diversified, inclusive, and resilient agrifood systems in Kenya, utilizing bundled sociotechnical innovations for impactful agribusiness engagements. UU also worked with other Initiatives, including <u>Livestock and Climate</u> with shared 14 results, <u>Climate Resilience</u> with 11 shared results, <u>Excellence in Agronomy</u> with 10 results, and <u>Low Emission</u>

<u>Food Systems</u> and <u>Fragility, Conflict, and Migration</u> with 7 shared results each.

Furthering its mission, UU has leveraged partnerships with bilateral projects like <u>AICCRA</u> to enhance and scale digital agro-advisory services, reaching millions through programs like <u>Shamba Shape Up</u> in Kenya and the MMO TV show in Zambia.

Similar to the achievements of other CGIAR Initiatives, the level of inter-CGIAR Center collaboration achieved by the UU Initiative set a new standard for pooled funding partnerships within CGIAR's history. This is best exemplified through UU's agribusiness acceleration portfolio, which leveraged the unique scientific prowess of CGIAR Centers such as the Alliance, IWMI, IITA, and WorldFish to provide targeted technical assistance to CFSA partners. The creation of a Scaling Hub post-FARA Agribusiness and Science Week in Durban exemplifies UU's commitment to fostering innovation and scaling readiness across the ESA region. At this event, 11 global science and regional Initiatives gathered for one day to discuss innovation portfolio and scaling readiness (IPSR) in the ESA region. Additional CGIAR attendees included representatives from IITA's TAAT program, CGIAR's sustainable finance team, CGIAR's representative for ESA, and the IITA Commercialization and Agribusiness program. This hub spearheaded the establishment of a scaling fund, unveiled during the Annual Week of Scaling in Nairobi, marking a significant step toward incentivizing innovation development and scaling within the CGIAR

framework. The is an opportunity for any global science Initiative to further develop an innovation for ESA, with one to be chosen from each Science Group. Additionally, the Week of Scaling event brought together 18 CGIAR Initiatives to build connections for scaling innovations. This three-day event allowed deep conversations on how to make scaling inclusive, sustainable, and effective.

This concerted effort among CGIAR Initiatives, bilateral projects, and regional stakeholders illustrates a comprehensive approach to tackling climate change, gender equality, and sustainable development challenges, underscoring the importance of collaboration and shared expertise in achieving scalable, impactful solutions.



Annual Technical Report 2023

Section 7: Adaptive management

RECOMMENDATION

Development of a scaling fund for ESA innovations

SUPPORTING RATIONALE

Recommendation: Establish a scaling fund specifically dedicated to supporting ESA innovations outside of the direct purview of UU. This fund will be overseen by WP6.

Rationale: The primary objective of creating the scaling fund is twofold. First, it aims to broker collaboration on scaling between regional integrated and global science Initiatives operating within the ESA region. This effort seeks to foster a more collaborative and cohesive environment for research and development. Second, the fund is designed to promote and expand the practice of evidence-based scaling within the CGIAR framework. By doing so, we anticipate a broader and more effective dissemination of agricultural innovations, leading to enhanced food security and sustainable development in the region. This provides a concrete scaling mechanism that can be replicated in other regions as CGIAR transitions to Mega Programs.

Continued funding from MFAT until end of 2025

Recommendation: CGIAR's agreement with MFAT has been signed through 2025, ensuring sustained funding and support.

Rationale: This extension is crucial for maintaining the momentum of our current activities, including the scaling fund, project activities in Ethiopia, the internship program, GALS, and numerous partnerships. By securing funding until 2025, we provide a stable financial foundation that allows for the continuation and expansion of these essential projects, which are pivotal in achieving our stretched EOIOs.

Budget rescoping

Recommendation: Conduct a comprehensive rescoping of the budget to address financial limitations impacting key/required "close-out activities"

Rationale: A focused reassessment of our budgetary allocations is necessary to identify and prioritize expenditures. This process will ensure that critical activities, especially those nearing completion, receive the required financial support for successful closure. The rescoping will involve consulting the list of prioritized activities to determine which activities are imperative and allocating resources accordingly.

Rationale: A focused reassessment of our budgetary allocations is necessary to identify and prioritize expenditures. This process will ensure that critical activities, especially those nearing completion, receive the required financial support for successful closure. The rescoping will involve consulting the WP teams to determine which activities are imperative and allocating resources accordingly.

Prioritizing partnerships to reach EOIOs

Recommendation: Emphasize the management of partner delivery and performance, with a specific focus on those partnerships critical to reaching our EOIOs.

Rationale: Strengthening and prioritizing our partnerships is essential for the successful delivery of our projects. By closely managing partner performance, we can ensure that our collaborative efforts are aligned with our strategic objectives and are effectively contributing to our overarching goals. Specific changes for CIP, WorldFish, and ICRISAT include reassessment of budget allocations and performance targets to enhance their contributions to the EOIOs.



32

Section 8: **Key result story**

Cross-cutting platforms drive co-creation and scaling of bundled sociotechnical innovations that drive diversification efforts in East and Southern Africa

UU is driving the co-creation and scaling of bundled socioecological technical (SET) innovations through its cross-cutting platforms: the scaling hub, ESA Learning Alliance, policy hub, and agribusiness network and accelerator.



Primary Impact Area



Other relevant Impact Areas targeted







Contributing Initiative

Diversification in East and Southern Africa (Ukama Ustawi)

Contributing Centers

IWMI · The Alliance of Bioversity International and CIAT · ILRI

Contributing external partners

The Rallying Cry · International Fertilizer Development Center · The World Bank · Bill & Melinda Gates Foundation · Deutsche Gesellschaft für Internationale Zusammenarbeit · United States Agency for International Development · Bezos Earth Fund Ministry of Foreign Affairs and Trade of New Zealand · Swedish International Development Cooperation Agency

Geographic scope



Regions: East and Southern Africa

Countries: Eswatini · Ethiopia · Kenya · Tanzania · Malawi Mozambique · Madagascar · Rwanda · Uganda · South Africa Zambia · Zimbabwe

UU is driving the co-creation and scaling of SET innovations through its cross-cutting platforms: the scaling hub, ESA Learning Alliance, policy hub, and agribusiness network and accelerator. In 2023, the CFSA empowered 10 innovative agribusinesses, and the UU scaling fund facilitated CGIAR and collaborators to co-develop agricultural innovations to scale, which saw 40 percent of CGIAR innovations from the ESA, demonstrating the region's innate potential.

As a climate hotspot, the ESA region is racing to strengthen its food and nutrition security amid the multiple threats posed by climate change. Low productivity among smallholder farmers and insufficient private investment in the food system require food systems transformation through a collaborative and coordinated effort to drive sustainable and inclusive agriculture in the region. CGIAR's agricultural innovations; technical expertise with a team of more than 9.000 scientists, researchers, and technicians; and a global network of partners offer agribusinesses the support they need to overcome climate change risks and focus on sustainable, efficient

De-risking business models via the CFSA

Reaching the SDGs and spreading climate-friendly solutions that leave no one behind requires considering the needs of everyone involved and ensuring that plans lead to concrete improvements. The CFSA program provides agribusinesses with the potential to innovate personalized solutions that promote CSA practices. CFSA's tailored approach empowers agribusinesses to grow in a sustainable and environmentally conscious way. In this context, CFSA facilitates the co-designing and scaling of strategies to overcome strategic bottlenecks, and helps develop targeted monitoring and evaluation tools and skills for project and stakeholder management, adaptive management, and communication.

In 2023, CFSA leveraged more than US\$11.1 million to strengthen 10 agribusinesses from Kenya, Rwanda, Uganda, and Zambia by providing technical assistance through CGIAR and external partners and conducting a total of 73 group workshops, field visits, and individual and peer network sessions. The first cohort of CFSA kicked off in Rwanda in February 2023. The CFSA call for applications yielded a staggering 849 applications, of which 288 met the highquality standards for prequalification. Sixty-nine percent of the applicants featured at least one woman on the founding team. The selected agribusinesses came from Kenya, Rwanda, Uganda, and Zambia. Of these, 60 percent were led or co-led by women, and 30 percent by youth, with 50 percent in early-stage and 50 percent in

CFSA's efforts resulted in a pipeline of 46 potential funding partners offering grants, debt, and equity in ESA and 41 percent engaged in matchmaking with the agribusinesses for financing to scale CSA

solutions. Together with four CGIAR and two external partners, CFSA also supported tailored technical assistance through 13 group workshops, 55 field visits, and five peer network sessions to help 10 agribusinesses scale and grow their CSA practices and de-risk their business models. UU trained more than 3,000 women, along with approximately 2,800 men, and reached more than 1,150,000 innovation users.

The innovations focused on improving farming efficiency and water usage for increased yields while simultaneously reducing the need for manual labor, achieved by mechanization, irrigation solutions,

Scaling up of CGIAR innovations for food systems transformation through the scaling fund

Scaling plays an integral part of UU efforts to transform the socioeconomic landscape and grow the economy in the 12 ESA countries. To this end, ensuring that new ideas in agriculture reach more people is critical for improving agricultural research for

In February 2024, the scaling fund announced the winners of a first round of funding to take agricultural innovations to scale in Africa. Following a rigorous evaluation process by a committee composed of UU staff and external scaling experts, three applications out of a total of 28 submissions from within CGIAR were selected to take agricultural innovations to scale in ESA.

Highlights of the UU scaling fund include the development of the GESI framework for scaling, strengthening capacity in the science and practice of scaling, GenderUp for inclusive scaling in the AR4D, innovation portfolio management (with two peer-reviewed scientific publications), an e-learning course in innovation and scaling (with 1.855 enrollments), and 39 innovation developments with seven Innovation Packages. The scaling fund trained 12 PhDs and three postdoctoral scientists, analyzed five agricultural innovation curriculums, and upskilled 3,000 experts from the research, government, development, and private sectors.

Creating an enabling environment

UU provides governments with policy support to drive climateresilient agricultural transformation. In 2023, UU directly impacted six policy changes through the TSSDS with USAID and ASPIRES to strengthen the seed delivery system, institutional coordination, and private-sector involvement; the NFWWCS in collaboration with AICCRA; South Africa's revised Climate Change Strategy for the water sector with the DWS; the Pretoria Declaration on Water Use in Agriculture and its linkages to nutrition, presented at the UN Water Conference in March 2023 in New York; and Madagascar's National Climate Smart Agriculture Investment Plan in collaboration with the World Bank.



We are excited to be part of the program, as it offers us the opportunity to acquire extensive knowledge on modern and improved technological strategies for climate-smart agriculture and resilience to climate change. This knowledge will empower us to enhance our training programs on good climate-smart agronomic practices, reaching an additional 2,000 small-scale farmers. Our goal is to promote sustainable agriculture, increase productivity, and ensure guaranteed market access in cereal and other grain value chains. In addition, participating in the accelerator program allows us to establish valuable partnerships through networking avenues. These partnerships will enable us to champion access to healthy nutrition and food security, working toward a better future for all.

Florence Okot, Yellow Star Produce and Food Processors founder and CFSA beneficiary



Front cover photo

Grace Saizi and her two daughters in a Conservation Agriculture Mother trial with maize-groundnut/pigeonpea doubled-up legume system. Grace worked with us since 2007 in Lemu Village, Balaka District, Southern Malawi and has now handed over the button to her daughters to continue with UU.

Credit: Christian Thierfelder/ CIMMYT

Back cover photo

Farmers sowing seeds using a locally led community solar water system.

Credit: Initiative on Diversification in East and Southern Africa

