



AID BY TRADE FOUNDATION

Case study: Research on women empowerment among female CmiA cotton farmers

FINAL REPORT

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Acronyms

SDE	Five Domains of Empowerment
AbTF	Aid by Trade Foundation
AIC	Association Interprofessionnelle du Coton
CCCP	CmiA Community Cooperation Programme
CIP	Continuous Improvement Plan
CmiA	Cotton made in Africa
FGD	Focus Group Discussions
PPS	Probability Proportionate to Size
ToC	Theory of Change
A-WEAI	Abbreviated Version of the Women's Empowerment in Agriculture Index





0 Executive Summary

Background

Syspons GmbH was commissioned by the Aid by Trade Foundation (AbTF) to carry out a study on women empowerment among female cotton farmers that are associated with the Cotton made in Africa initiative (CmiA). CmiA is an initiative of the Aid by Trade Foundation that aims to improve the socio-economic situation of smallholder cotton farmers by providing them with know-how on improved and sustainable farming practices. A central aspect of this is the promotion of gender equality and the empowerment of female cotton farmers. In general, the initiative builds on the idea that fashion brands and retailers buy CmiA-verified raw cotton and process it into textiles, while paying a licensing fee to use the seal. CmiA then reinvests this licensing revenue in the cotton-growing regions of Africa South of the Sahara in accordance with social business principles. To achieve its goals, CmiA (1) provides Managing Entities with guidance and materials to train smallholder farmers on a diverse range of topics, (2) conducts a regular verification process to assess whether the Managing Entities in the partner countries fulfil the CmiA standards, (3) supports the implementation of the CmiA Community Cooperation Programme (CCCP) that promote improved education, health and livelihoods in the cotton farming communities, and (4) facilitates peer exchanges between Managing Entities (and also among other stakeholders) in the partner countries.

Purpose

This study has three objectives: First, it serves to generate knowledge about women's situation in the farming communities in Benin and Mozambique. Secondly, it assesses the contribution of CmiA to women empowerment in the two selected partner countries (Benin and Mozambique). Both of these objectives are retrospective in nature, investigating the status quo and what has been achieved so far. The third objective of the study is to generate evidence-based learnings and recommendations. To this end, the study draws data-driven conclusions and recommendations that can be taken up by AbTF to improve and/or refine CmiA's work in the future (prospective aspect).

Methodological Design

The study was conducted between June 2023 and January 2024 and was based on a mixed-method approach, combining both qualitative and quantitative forms of data collection and analysis. Syspons and its local experts conducted two extensive case studies in Benin and Mozambique, which entailed an analysis of relevant documents and data, exploratory and in-depth qualitative interviews as well as focus group discussions with farmers, and a household survey among the cotton farmers in each country. The design of the survey was based on the Women's Empowerment in Agriculture Index (A-WEAI) and complemented with CmiA-specific questions. The A-WEAI provides a standardized and comprehensive assessment of various dimensions of women empowerment that allows for a consistent assessment across countries and regions.

The primary data collection process took place semi-remotely, with a local on-site data collection team and Syspons staff based in Germany. The data was analysed using a theory-based approach, combining four elements: A contribution analysis based on CmiA's specific Theory of Change for this evaluation, a process-tracing approach to assess alternative hypotheses, as well as the calculation of the Women's Empowerment in Agriculture Index (A-WEAI).





Key Results

General situation of female cotton farmers in the CmiA partner countries Benin and Mozambique

Overall, the data shows that women are similarly involved in cotton farming as men, with only few exceptions. Both in Benin and Mozambique, there are only selective differences between men and women in the tasks they perform in farming. Regarding women's position in the productive environment and the interaction with the Managing Entities, their situation is also similar to those of men. However, women face specific challenges more acutely, such as the lack of information regarding processes established by the Managing Entities, problems in selling cotton, and restricted access to obtain credits. As in many societies today, women in the farming communities also still experience gender-based discrimination to some extent. Moreover, the results confirm the existence of gendered inequalities in questions of ownership and decision-making power over productive resources. In terms of their role in the communities (socio-cultural structures), the study results show that women are strongly integrated in the communities and that female leadership in communities has been increasing over the past years. However, the extent of leadership is lower than that of men with fewer women feeling comfortable speaking in public. Moreover, women continue to have less autonomy over the use of their time than men.

In this sense, the study reveals a mixed picture of women's overall situation in cotton farming including both positive changes towards female empowerment and persisting inequalities. Through the analysis, several **facilitating and hindering factors** for women's empowerment could be identified.

One key obstacle is the persisting traditional gender roles and the corresponding gendered division of labour. Even though changes are observable in both countries, societal expectations regarding men's and women's responsibilities remain influential, leading to women experiencing a double burden of field and domestic work and a lack of time-management autonomy. As traditional norms and power dynamics change very slowly, they continue to impede gender equality. Another hindering factor is the interplay of gendered challenges in the productive environment. While norms about gender roles are slowly changing, women's lack of ownership of land and access to it as well as other crucial productive inputs and equipment remain a structural challenge.

Despite these structural obstacles, the data also sheds light on several facilitating factors which in the short and medium term can improve women's situation in cotton farming in the CmiA partner countries. The first crucial facilitating factor is women's financial independence. One mechanism to enhance their independence is payment systems in which financial transactions are done per individual. Another mechanism that supports women's financial independence is the diversification of income-generating opportunities, which help women becoming more self-sufficient. Furthermore, formalising women's involvement in cotton farming through promoting contracts also constitutes a facilitating mechanism in this regard. The second facilitating factor for positive change regarding the situation of women in cotton farming is awareness and empowerment efforts, such as the implementation of policies, trainings, campaigns, and other sensitization activities, as they contribute to changing norms, attitudes and practices around the role of women in the communities.

Contribution of CmiA interventions to women's empowerment

Through different mechanisms and activities - namely trainings, CmiA verification process, and community projects - CmiA seeks to foster women's (economic) empowerment in farming communities. Having analysed CmiA's contributions in this regard, the study finds strong interlinkages between the mechanisms deployed by CmiA in Benin and Mozambique and achievements towards the expected outcomes. The results show that the Managing Entities have implemented trainings that explicitly address gender-related aspects throughout different trainings, resulting in a, self-perceived, high application rate of the acquired skills and



knowledge by both men and women. In parallel to conducting trainings, the data also shows that the Managing Entities in both countries improve their adherence to policies and practices that are requested by the CmiA standards to advance towards gender equality. Moreover, the data demonstrates that the Managing Entities in both Benin and Mozambique are taking several measures to support female farmers, such as encouraging women farmers to put their names in the contract/ in the farmer database, having female facilitators and extension agents, and aiming at the creation of women cooperatives. The study also confirms that the application of new skills acquired through trainings supports women in developing new financial streams of income, thus contributing to their financial independence and control over the use of income. Moreover, the newly acquired skills and an increased household income contribute to shifts towards joint decision-making over agricultural production as well as joint decision-making over time allocation. As such, the data indicates that the majority of women gain some social and financial recognition for their work as cotton farmers and that both the trainings and the mechanisms of the CmiA verification process positively contribute to this.

In addition, the study results also underline the essential role of non-discriminatory policies as a pre-condition to foster a protective working environment for women in cotton farming. The Managing Entities in both countries have demonstrated progress in establishing and implementing anti-discrimination measures, with particular emphasis on equal opportunities. Here too, it appears that the CmiA verification process has played a central role in fostering this development. Despite persisting challenges, diverse external influencing factors, and the lack of robust long-term data, the contribution mechanisms underlying CmiA's work were partially confirmed by the study.

On the impact level, the results demonstrate high levels of plausibility that CmiA is contributing to advancing gender equality in the communities, as well as decent working conditions. Regarding a safe working environment for women, the results show a mixed picture. Overall, there is a need for more thorough and systematic evidence to assess the long-term impacts of CmiA's work.

Overall, the study demonstrates both positive developments and persisting challenges regarding the situation of women in cotton farming communities in Benin and Mozambique. As the analyses provide insights on the multifaceted interplay of income diversification, family dynamics, decision-making processes and other factors influencing women's situation in the communities, the study results underline the significance of empowering women through knowledge and skills development as well as structural regulations for systematic change.

Recommendations

Farmers' Trainings:

Accelerate/Scale-up CmiA's awareness and empowerment efforts in the form of trainings, for instance by

- a. Supporting women in leadership and entrepreneurship skills development: The study demonstrates that the financial diversification and recognition of women is a key mechanism through which they are empowered, this mechanism should therefore be strengthened. Trainings in this field could also adopt a 'training of trainers' approach or coaching formats.
- b. Working with men on changing gender roles and dynamics: The report indicates positive examples of evolving gender relations and dynamics in cotton farming households that could be harnessed. For instance, CmiA should continue to support sensitization efforts on women's role in the communities, including the sharing of care work in the household (a gendered division of labour), education (need for girls to attend school), and decision-making, all of which are crucial conditions for greater involvement of women in cotton farming.



Verification Process and Beyond:

- a. Creating spaces for dialogue and exchange on gender-related issues with and among the Managing Entities: CmiA should continue to foster dialogue through workshops or other formats, including across countries (e.g., regional conferences), to bring the topic of women's empowerment and its importance to the Managing Entities' attention. Based on the insights from the study, such dialogue formats among the Managing Entities could have the potential to share good practices, foster motivation, and create even more ownership of the topic.
- b. Addressing the (gendered) challenges in the cotton farming productive environment: The results show that women face specific challenges more acutely than men, such as lacking information regarding processes, lack of ownership over productive resources, and perceptions of gender-based discrimination. Hence, CmiA should discuss whether selected verification criteria of the CmiA standards could be adapted, where needed, to account more specifically for these challenges.
- c. Continuing to support women's financial autonomy: for instance, through the diversification of income sources or tailored payment systems. CmiA can support this for instance by bringing in the expertise of external advisors to showcase opportunities for change to the Managing Entities or by creating networks to exchange good practices. This area of improvement would also be well-fitted for a potential community project.
- d. Reinforcing the communication on standard requirements, policies, and procedures from the Managing Entities towards the farmers to raise awareness on rights and responsibilities: The report shows that policies and regulations often exist, but farmers lack knowledge of them. Hence, sensitizing all levels of the production system would lead to better ownership and more comprehensive compliance with the regulations.
- e. Strengthening the official contracting of female farmers: The report shows that once women are officially registered in the database, Managing Entities can directly communicate with them, facilitate access to trainings, and provide direct payment to the female farmers. This can strengthen their financial and social recognition as well as their position in the farming production system.

Community Projects:

Focusing on gender-related topics in the community projects: The report indicates that the community projects benefit from great visibility among the farmers in CmiA-supported cotton areas. However, the data does not yet provide sufficient evidence of tangible effects on women's empowerment. So far, the effects of the community projects on women in the communities are observed ad-hoc and not on a systematic basis. To change this, CmiA should therefore:

- a. Initiate a call for proposals for community projects that are related to gender equality / women empowerment: This could motivate the Managing Entities and/or the farming communities to develop their own ideas on how to strengthen women's position in cotton farming communities while maintaining CmiA's needs-based approach to community projects.
- b. Support community projects that aim at strengthening women cooperatives / women groups: The data does not yet point to sustained collaboration between Managing Entities and women groups, despite their existence and relevance being recognized in both countries. Hence, strengthening these groups has the potential to further advance gender equality in the target communities.



General Recommendations:

- a. Improving the availability of data on the effects of CmiA's work on women's empowerment: CmiA should take the results presented in this report as a baseline and follow up on this in the coming years with further studies to allow a results-based monitoring and planning.
- b. Continuing to strengthen the involvement of intermediary entities in CmiA-supported activities: In particular in Benin, where the structure of the cotton production system is different than in other countries, intermediary entities have a significant role and power in the system. Hence, CmiA should strengthen its collaboration with these entities. In addition to CmiA's specific Theory of Change developed for this study, a formal stakeholder mapping in each partner country could form the basis for a more strategic engagement with different organisations. This could further clarify the strategic added value of each of the stakeholders to ensure their strengths are capitalized.
- c. Communicating the results of the study: Based on qualitative accounts and regular communication with the local data collection team, there is a high level of interest from stakeholders to be informed on the results of the study and potential follow-up actions. This could be an opportunity for a follow-up engagement to take up the topic of women's empowerment with the Managing Entities as well as the participating communities.





1 Introduction

1.1. THE CMIA INITIATIVE

Cotton is grown in Africa South of the Sahara by about 3.4 million smallholder farmers and even five times more people are directly or indirectly living from cotton.¹ Thus, cotton farming is an important part of many countries' economies and constitutes the livelihood for many smallholder farmers. Amongst the workers and farmers in the agricultural sector, women make up roughly half of the workforce, while also assuming numerous household activities. However, they face disproportionately greater obstacles than men regarding their productivity and development (i.e., access to productive resources, access to education or networking due to social norms, etc.). To improve the living conditions of these female smallholder farmers and contribute to advances towards gender equality, the Cotton made in Africa initiative (CmiA) aims to address various root causes and forms of gender inequality.

1.2. OBJECTIVES OF THE STUDY

This study was commissioned by AbTF due to a growing interest in the gender situation in cotton growing communities. This growing interest stems from multiple factors. First, gender indicators are part of the CmiA standards, but there is still a lack of robust data on gender equality in the farmer communities. Second, in light of the recently adopted Feminist Development Cooperation Policy in Germany, it becomes increasingly more important to clearly identify the contribution of CmiA to gender equality. Hence, the objectives of the study are to assess the contribution of CmiA to women empowerment, to generate knowledge about women in the farming communities in Benin and Mozambique (retrospective aspect) and to generate evidence-based learnings and recommendations (prospective aspect).

1.3. STUDY DESIGN

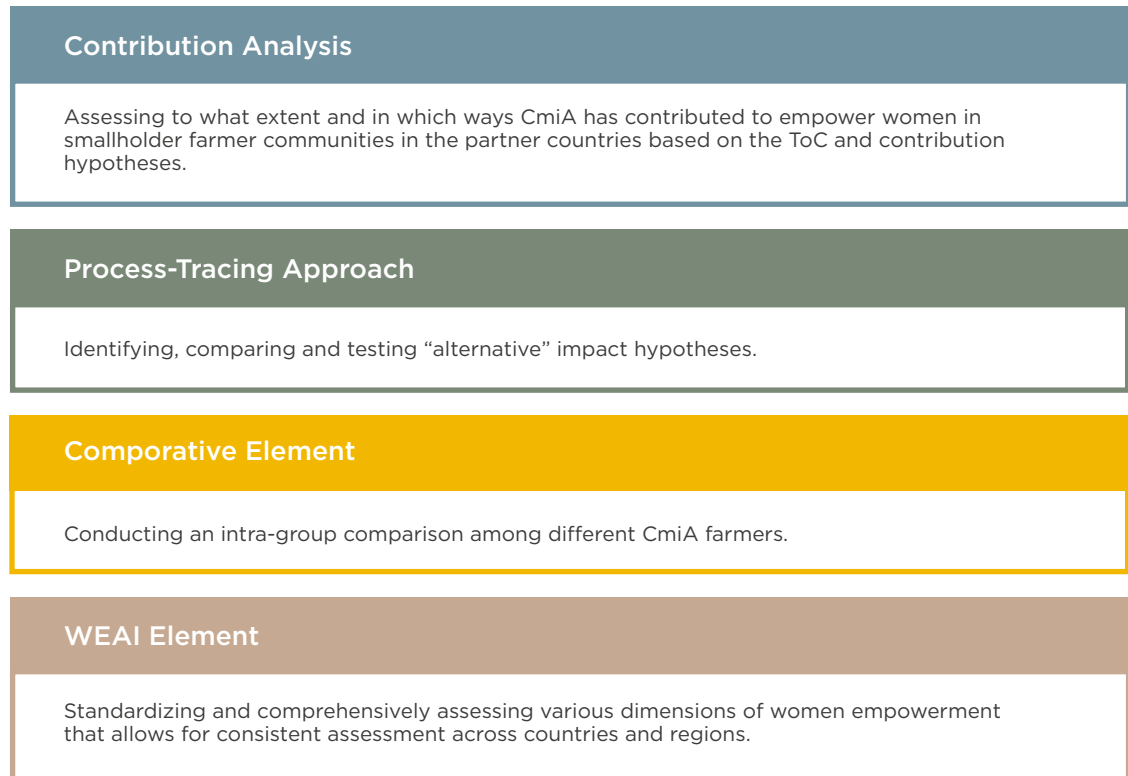
Four elements were combined to develop the design of this study: a contribution analysis, a process-tracing approach, comparative elements, and elements from the Women's Empowerment in Agriculture Index (A-WEAI) (see Figure 1).

¹ Cotton made in Africa (2019): Initiative. URL: <https://www.cottonmadeinafrica.org/en/about-us/the-initiative>





FIGURE 1: STUDY DESIGN



CmiA aims to empower women cotton farmers through four main mechanisms: (1) trainings: CmiA provides Managing Entities with guidance and materials to train smallholder farmers on sustainable and efficient cotton production. The training materials are presented in a way that fosters gender equality and women empowerment (i.e. gender-related aspects are included in training materials and contents, not only regarding topics that explicitly relate to women); (2) verification of CmiA standards: Gender equality aspects are anchored in the criteria of the CmiA standards and are specifically addressed in the areas of equal work conditions, gender-sensitive grievance mechanisms, support of women’s groups, and awareness raising and outreach; (3) CmiA support to Community Cooperation Programme (CCCP): CmiA supports the implementation of projects that promote the education, health, and livelihood of women in the cotton farming communities; and, (4) Peer Exchange: CmiA facilitates peer exchanges between Managing Entities to promote behavioural changes amongst its main stakeholders.² As such, CmiA’s approach promotes gender equality and improvement of living conditions for the CmiA target groups as part of the overall approach to develop more sustainable cotton production structures and improve farmers’ livelihoods.

The contribution analysis was mostly used to assess the causal relationship between CmiA interventions and its intended outcomes (e.g., social and financial recognition of women’s labour in cotton farming). At the same time, the contribution analysis allowed the study to gain insights on the overall situation of female farmers in the CmiA partner countries, including the challenges faced by female cotton farmers in Benin and Mozambique.

² Cotton made in Africa (2021): Position Paper on Gender Equality.
URL: https://cottonmadeinafrica.org/wp-content/uploads/CmiA_Gender_Equality_A4_Final_EN.pdf



To achieve a common understanding of the intended outcomes and impacts of the CmiA initiative and how they are to be achieved, a Theory of Change (ToC) was developed for this study to illustrate the initiative's effort to empower female cotton farmers (referred to as 'study-specific ToC' in the following)³. The Theory of Change (ToC) played a central role in the contribution analysis, as it explains how different CmiA activities interact to contribute to the empowerment of female cotton farmers. The ToC was presented, discussed and validated in a workshop with staff members of Aid by Trade Foundation (AbTF) in August 2023. This ToC served as a basis for this study and consists of various independent although interconnected components. The elements of the ToC include:

- **Input:** the financial, human, and material resources used for the intervention.
- **Activity:** Actions taken/work through which inputs are mobilized to produce specific outputs.
- **Output:** The products, capital goods and services which result from the intervention.
- **Outcome:** The likely or achieved short-term and medium-term effects of an intervention's outputs.
- **Impact:** Long-term effects of the intervention. These can be positive or negative, direct or indirect, intended or unintended.

To contribute to women empowerment in cotton farming communities, CmiA has different objectives at the outcome level, which are respectively supported by the initiative's outputs. As agreed with AbTF, this study focused on four outcomes that reflect the greatest interest of CmiA (framed in red in Figure 2):

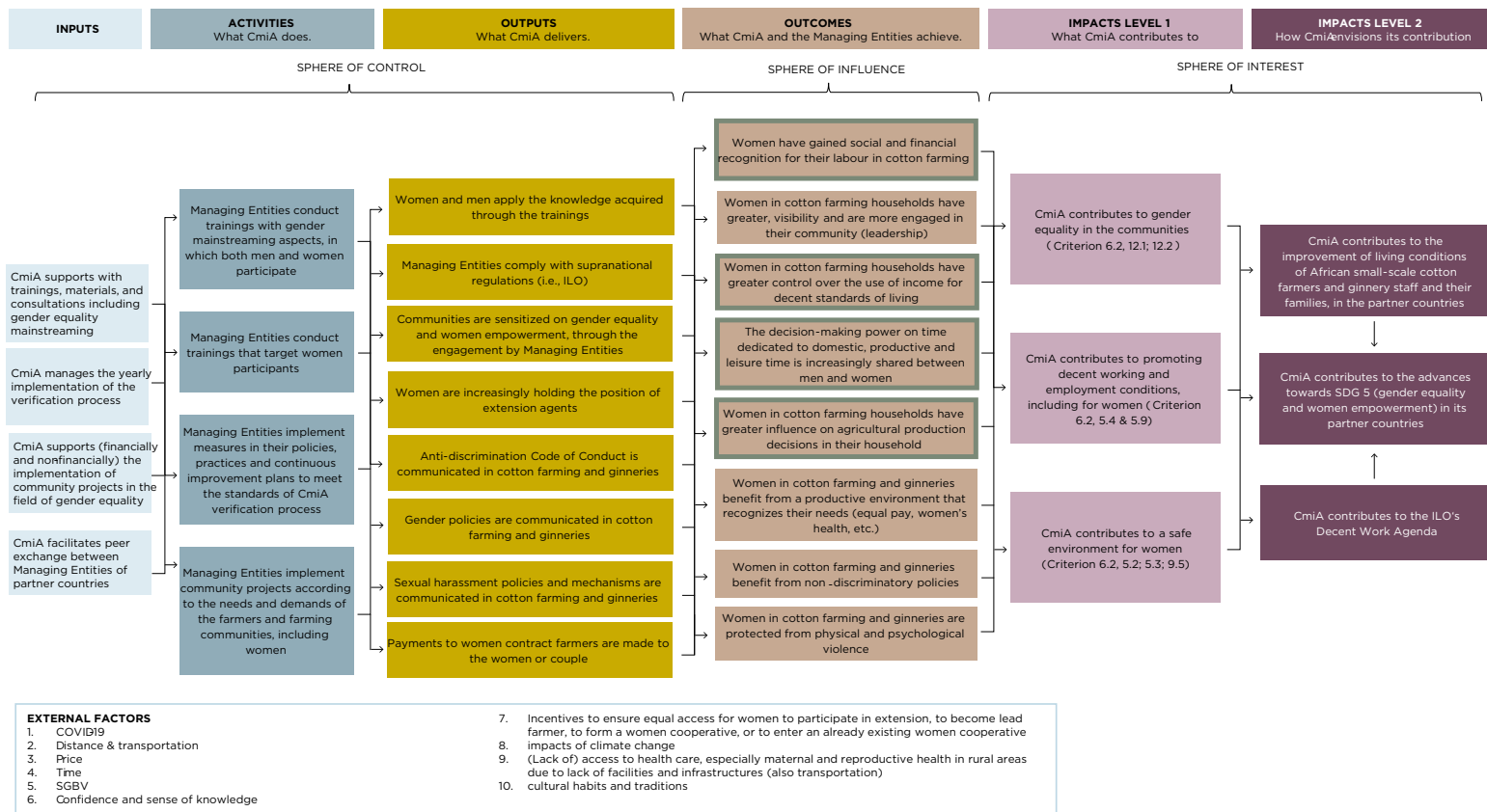
- Women have gained social and financial recognition for their labour in cotton farming.
- Women in cotton farming households have greater control over the use of income for decent standards of living.
- The decision-making power on time dedicated to domestic, productive and leisure time is increasingly shared between men and women.
- Women in cotton farming households have greater influence on agricultural production decisions in their household.

The Theory of Change also displays the CmiA inputs necessary to carry out these activities, which are the following: Trainings, materials, and consultations including gender mainstreaming measures; managing the yearly implementation of the verification process; financial and non-financial support for the implementation of the CCCP projects; facilitation of peer exchanges between Managing Entities.

³ The Theory of Change mentioned in this report strictly refers to the ToC developed for this specific study (hence labelled 'study-specific ToC' in the text). It should not be confused with the general CmiA Theory of Change.



FIGURE 2: STUDY-SPECIFIC THEORY OF CHANGE ON CMIA CONTRIBUTION TO THE EMPOWERMENT OF WOMEN COTTON FARMERS (UPDATED AUGUST 2023):



In order to have a systematic approach to identify impact hypotheses and alternative approaches, the study combined the contribution analysis with a process-tracing approach. Process tracing is a generative / mechanisms approach that sets out to untangle the causal links between putative causes and outcomes (e.g., CmiA’s intervention and behavioural change), by identifying intervening causal factors. This systematic approach focuses on identifying and analysing impact hypotheses and alternative hypotheses. Combining the contribution analysis with process tracing has the methodological advantage of: (1) allowing for a more rigorous analysis of the impact hypotheses, by breaking down their proposed causal links into smaller increments; and (2) identifying other important factors influencing the situation of women in the farming communities. For the four selected outcomes identified in the study-specific ToC, the corresponding contribution hypothesis and an alternative hypothesis were developed, as follows:

➔ **The first contribution hypothesis (1) is:** If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings with gender-related topics, in which both men and women participate. In turn, if women and men apply the knowledge acquired through the training, and Managing Entities apply policies in line with CmiA standards, women have gained social and financial recognition for their labour in cotton farming. The alternative hypothesis (1.1) is: If local actors provide their knowledge and awareness on gender norms, then social norms change. In turn, women have gained social and financial recognition for their labour in cotton farming.

➔ **The second contribution hypothesis (2) is:** If CmiA manages the yearly implementation of the verification process, then the Managing Entities implement measures in their policies, practices and continuous improvement plans to meet the criteria of the CmiA standard. Furthermore, if participants in trainings apply their new knowledge and awareness on gender-related issues into their household dynamics, and if there is an increase in the number of women with official contracts, then women in cotton farming households



have greater control over the use of income for decent standards of living. The alternative hypothesis (2.1) is: If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings that include gender-related aspects, in which both men and women participate. In turn, if women and men apply the knowledge acquired on the diversification of local economies, then women in cotton farming households have greater control over the use of income for decent standards of living.

→ **The third contribution hypothesis (3) is:** If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings that include gender-related aspects, in which both men and women participate. In turn, if women and men apply the knowledge acquired through the trainings, then the decision-making power on time dedicated to domestic, productive and leisure is increasingly shared between men and women. The alternative hypothesis (3.1) is: If the Managing Entities support women groups with know-how and resources, then the groups become multipliers and contribute to greater awareness regarding gender equality in the general environment of the cotton farming supported by CmiA. In turn, the decision-making power on time dedicated to domestic, productive and leisure is increasingly shared between men and women.

→ **The fourth contribution hypothesis (4) is:** If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings that include gender-related aspects, in which both men and women participate. In turn, if women and men apply the knowledge acquired through the trainings, and Managing Entities apply policies in line with CmiA standards, then women in cotton farming households have greater influence on agricultural production decisions in their household. The alternative hypothesis (4.1) is: If women participate in supporting activities of the Managing Entities supported by CmiA, and if training participants apply their new knowledge and awareness on gender-related issues into their household dynamics, and if women have access to land, then women in cotton farming households have greater influence on agricultural production decisions in their household.

As a tool that constitutes a validated, innovative and widely acknowledged instrument to assess women's empowerment in agriculture, the research team used the Women Empowerment Agriculture Index (A-WEAI) to develop its concept for primary data collection activities. The A-WEAI offers a standardized and comprehensive assessment of various dimensions of women empowerment that allows for consistent assessment across countries and regions (see chapter 1.4. below for more details on the A-WEAI).

In addition to the contribution analysis and the process tracing approach, the research team has integrated a comparative element (counterfactual approach) in the study design. The comparative element was designed as an intra-group comparison (e.g., sub-groups of CmiA cotton farmers with varying training participation) to assess which stakeholders benefit from CmiA's engagement and to which extent.

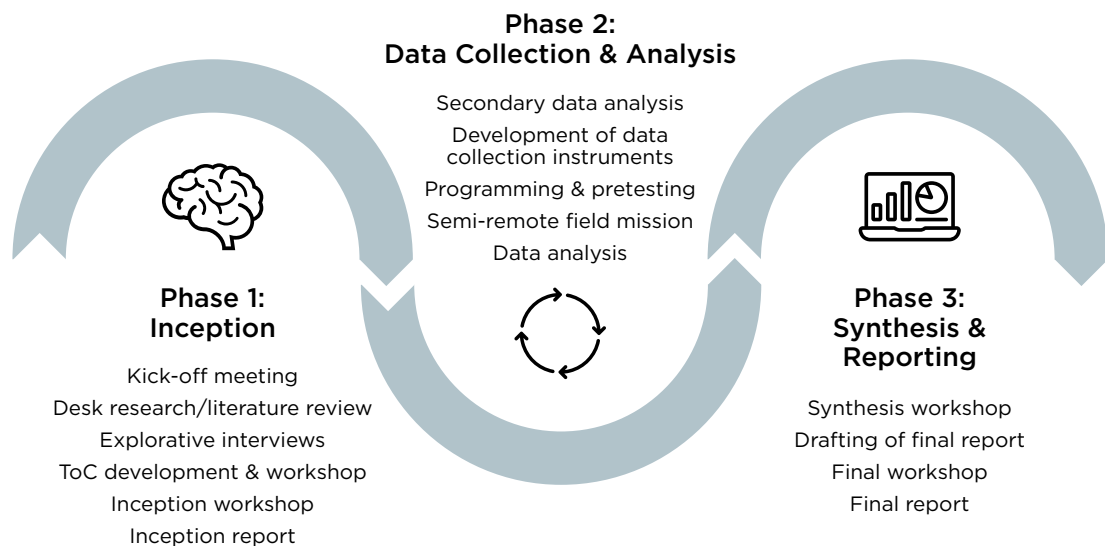
Lastly, the research team has used three approaches of triangulation to minimize systematic errors in the interpretation of data: method triangulation (i.e., use of different methods such as interviews, secondary data analysis and focus group discussions), data triangulation (i.e., include the perspectives of the various relevant stakeholders) and researcher triangulation to increase the reliability of the results (through a synthesis workshop among the research team members to consider different interpretations of the analysed information).



1.4. METHODOLOGICAL APPROACH

The case study focused on two countries (Benin and Mozambique) out of the 11 countries in which CmiA operated in when the study was commissioned. The two countries were chosen based on the general interest of the initiative, and as a representation of CmiA’s two cotton growing regions (one country from Western/Central Africa and one from Eastern/Southern Africa). To assess the contribution of CmiA to women empowerment among female cotton farmers, as well as to generate knowledge on the situation of women among cotton farming communities, the study adopted a mixed-methods approach, combining quantitative and qualitative methodologies. The quantitative approach included a farmer survey in each country. The qualitative approach consisted in qualitative interviews, focus group discussions, and the analysis of internal documents such as Managing Entities’ policies. The case studies were conducted in three phases:

FIGURE 3: METHODOLOGICAL APPROACH OF THE STUDY



The inception phase aimed at adapting the study design (including the study-specific Theory of Change) and the data collection instruments (survey questionnaire and interview guides) in coordination with AbTF, and the preparation of the data collection phase. This involved developing a study design as well as making practical decisions, such as on the case study countries and the precise methodological steps and time frame. The refining of the ToC allowed the team to: (1) identify key impact hypotheses underlying CmiA’s work as well as alternative hypotheses, and (2) develop an analytical matrix, which served as a framework for organizing and analysing data collected during the data collection phase. Data collection in the inception phase consisted of the analysis of relevant documents and explorative interviews with seven CmiA stakeholders. The results of the inception phase were summarized in an inception report, outlining the subject of the study, the methodological steps as well as the data collection instruments.

The objective of the data collection phase was to populate the ToC with robust data in order to find out the extent CmiA to which contributed to women empowerment and what characterized the overall situation of female cotton farmers in the selected countries. To this end, the quantitative and qualitative data were collected in Benin and Mozambique, following the mixed-methods approach.



The design of the farmer survey was based on the abbreviated version of the Women's Empowerment in Agriculture Index (WEAI) and was complemented with CmiA-specific questions. The WEAI stands as an innovative tool, measuring the roles and extent of women's involvement in agriculture across two sub-indices and spanning five empowerment domains, i.e., the disempowerment index and the gender parity index within households. The WEAI was launched by the International Food Policy Research Institute (IFPRI), Oxford Poverty and Human Development Initiative (OPHI), and USAID's Feed the Future, in February 2012.

The study conducted by Syspons on behalf of AbTF strategically integrated the abbreviated version of the WEAI, i.e., the **A-WEAI**, into the study design for several reasons. Firstly, using the A-WEAI ensures comparability with potential future studies. Secondly, it allows to employ a reliable and contextually appropriate tool that aligns with the unique nuances of the research objectives. Thirdly, the abbreviated version of the index is better suited for the specific research objectives of CmiA for this study as well as the available resources and timeframe. To implement the A-WEAI, the study consulted the A-WEAI instructional guide written by Malapit et. Al, 2020⁴ and then integrated the A-WEAI questions into the farmer survey while tailoring the A-WEAI original categories to the CmiA context. Then the study similarly tailored the A-WEAI calculation tools, i.e., translated the "stata" files for preparation and calculation into R and modified the scripts to match the survey questions. For a detailed elaboration of the technical method underlying the A-WEAI, please see Annex I.

In addition to the use of the A-WEAI modules in the farmers' survey, several questions were added on CmiA-related aspects (e.g., trainings conducted, processes of the Managing Entities) to answer the study questions regarding CmiA's contribution to women empowerment in the farming communities (please see Annex II for more details).

The sampling strategy for the farmer survey follows a Cluster Sampling with Probability Proportionate to Size (PPS). This technique involves dividing farmers from a Managing Entity into clusters, such as regions or communities, and are purposefully selected, where the probability of being selected is proportionate to the cluster size. In this way, larger clusters are more likely to be selected than small clusters. The goal was to survey at least 300 farmers in each country, sampled from the farmers list of the Managing Entities, on the basis of two sampling levels (clusters and individual farmers) and capturing various respondent profiles, (e.g. farmers that have participated in a varying degree in trainings, different age groups, different family status) to allow for an intra-group comparison of CmiA farmers.

The farmer survey was carried out by Syspons consultants (semi-remotely) in cooperation with two local experts and five enumerators in each country. The enumerators were trained by Syspons and the local experts and their selection took into consideration gender balance and knowledge of local languages. The survey was conducted as a conversation with the individual smallholder farmers (male and female) and contained mostly quantitative elements.

The data preparation process started at the end of the data collection. As there were some variations from the originally planned random sampling, the team used a post-stratification approach in the analysis to account for these differences. Instead of using the sampling weights, which were not available for every respondent due to deviations from the protocol, survey weights were calculated based on the stratification variables such as gender and location. The purpose of incorporating these post-stratification survey weights was to calculate statistics that more accurately reflect the target population within their respective contexts and adjust for over- and under-sampling of certain groups (i.e., women). Through this approach, the

⁴ Malapit, Hazel J.; Kovarik, Chiara; Sproule, Kathryn; Meinzen-Dick, Ruth Suseela; and Quisumbing, Agnes R. 2020. Instructional guide on the abbreviated Women's Empowerment in Agriculture Index (A-WEAI). Washington, D.C.: International Food Policy Research Institute (IFPRI). <http://ebrary.ifpri.org/cdm/ref/collection/p15738coll2/id/129719>



non-random selection of some respondents is considered, e.g., in a few instances individuals were interviewed on the spot even if they were not originally on the sample list. In addition, it adjusts for non-response behaviour, assuming that non-response is random within the strata. As a result, all statistics are calculated using these survey weights to make the statistics more representative of the target population.

The qualitative data collection consisted of semi-structured qualitative interviews supplemented with focus group discussions, which were complementary to the farmer survey. They delivered answers to the questions on how the mechanisms supported by CmiA led to the intended results, while also allowing to capture unexpected results, and additionally uncovering facilitating and hindering factors. The qualitative interviews were carried out by local consultants, supported and guided by Syspons. A total of 26 interviews were conducted in both countries, with a wide range of stakeholders, including Managing Entities and intermediaries, CmiA Focal Points, Field Officers, Technical Advisors and Trainers. In addition, a total of 31 focus group discussions were conducted with cotton farmers in both countries, ensuring that an equal number of men and women participated.

The reporting phase aimed at interpreting, triangulating, and assessing the data collected in the previous phases, mainly through an internal synthesis workshop at Syspons. The data was systematically analysed to assess the outputs, outcomes and impacts of CmiA as well as to generate knowledge on the general situation of female cotton farmers in Mozambique and Benin. This formed the basis to draw sound conclusions and actionable recommendations that could inform future interventions and decision-making, as well as satisfying the need for data regarding women empowerment in CmiA interventions. To this end, this study report summarizes these findings, conclusions and recommendations.

To ensure a high quality of data collection and analysis of the semi-remote study, the following quality assurance mechanisms were put in place:

- **Clear and regular communication:** Through weekly check-ins between Syspons and the local consultants during the preparation of the data collection to identify potential challenges and address them in a timely manner. During the data collection, daily check-ins were held with the local consultants, to the extent possible.
- **Training of the enumerators:** Syspons provided training materials and guidance to ensure that the enumerators were familiar with the data collection toolkit.
- **Online data collection:** Data was collected on digital devices and uploaded only when the internet connection was stable. This way data distortion was avoided.
- **Data cleaning and consolidation:** Syspons provided a quality assurance of the data set once digitally uploaded and further asked for consolidation from the local data collection team when needed.
- **Participatory approach:** Through continuous involvement and feedback it was ensured that diverse perspectives were included, which increased the quality of the data.





1.5. IDENTIFIED LIMITATIONS

From the outset of the study, the team identified that there is no viable baseline data regarding the situation of women in the farming communities before the CmiA intervention, in the targeted countries. Against this background, integrating the A-WEAI into the study design provided a rich source of information to contextualise the results of the intervention in the targeted countries.

A further limitation is that the results of the case studies can only be generalized to a limited extent, as local context factors can vary in each of the countries where CmiA is active in and even across the different regions where the data collection took place. Through data triangulation, the robustness of the results was ensured. In addition, the method of weighing the sample during the analysis of the quantitative data was used. With this weighing technique, survey weights were incorporated, and statistical inference was applied to draw conclusions about the overall population using statistical methods. One approach is to calculate statistics for the sample and then extend those conclusions to the general population, asserting that the sample accurately represents the broader demographic characteristics, such as gender composition. In the case of this study, when the decision was made to oversample a specific group, like females, there were implications on the sampling frame, particularly considering that most villages lack female producers. In such cases, there was a need to weigh the data to ensure a fair representation, although this could lead to a reduction in the overall sampling frame. As such, the data presented in this report are weighted data, meaning that they are extrapolated to represent the overall population from which the sample was taken. When reviewing the report, please note that in the graphics, the absolute numbers correspond to the actual surveyed individuals, while the percentages and proportions are based on the weighted data, which aims to represent the entire population.

2. Results of the Study

This chapter presents the results of the study, structured along the different research interests defined in the inception phase (i.e., general situation of women in the CmiA partner countries and CmiA's contribution to women empowerment). The analysis refers to the two case studies selected for this study (Benin and Mozambique). Therefore, the results specifically refer to the situation in these two countries and cannot be generalized to other CmiA countries. The results stem from the analysis of project documents and secondary data, the farmer survey (including the calculation of the A-WEAI index) as well as qualitative interviews and focus group discussions.

2.0 A-WEAI SCORES

As stated in section 1.4, part of the study was designed using the abbreviated Women's Empowerment in Agriculture Index (A-WEAI), which entails two sub-indices: the Five Domains of Empowerment (5DE), and the Gender Parity within households. The **first subindex**, known as the **5DE** (Five Domains of Empowerment), evaluates the extent of women's empowerment in five key domains related to agriculture. These domains encompass: (1) decision-making regarding agricultural production, referred to as the **Input in Productive Decisions**; (2) access to and authority over productive resources, which includes 2 subdomains referred to as the **Ownership of Assets** and the **Access to and Decisions on Credit**; (3) control over income utilization, referred to as the **Control over the Use of Income**; (4) Leadership roles in the community, referred to



with the domain **Group Membership**; and, (5) allocation of time, referred to with the domain **Workload**. It also assesses the extent to which women are empowered in those areas even if they do not meet the overall empowerment goal. The **second subindex**, referred to as the **Gender Parity Index (GPI)**, measures gender equality within the households surveyed (Malapit et. Al, 2020) (please see details in Annex I).

The A-WEAI results in an aggregate score, based on the two sub-indices. As this score constitutes a specific quantitative result that can stand alone – independent from the results on additional CmiA-related survey questions and qualitative interviews – the A-WEAI results of this study are presented in this separate sub-chapter. In the following chapters, 2.1 and 2.2, further results will then be explained and linked to the A-WEAI score.

When interpreting the A-WEAI score and related analysis, it is important to consider the methodological background explained in Annex I. The calculation of the A-WEAI score produces an assessment of whether the survey participants have reached a certain threshold (depending on a predefined inadequacy cut-off for each empowerment domain), indicating their so-called level of adequacy.⁵ This threshold is measured in relation to certain indicators derived from the survey questions.⁶ This means that the A-WEAI scores need to be understood in relation to these pre-defined thresholds, which are expected to shed light on how “empowered” women are (first subindex), and how strong gender equality is in the participating households (second subindex). However, the result of the A-WEAI analysis is only interpreted within these thresholds. For example, a higher score in the domain of Ownership of Assets does not imply that women solely own more items than men, because the threshold to calculate the adequacy in this domain is based on joint ownership not sole ownership. The A-WEAI analysis also does not provide qualitative insights and detailed information on influencing factors and context-specific differentiations. Hence, the statistical analyses of the survey results conducted by the research team and the qualitative interviews – apart from the A-WEAI standard calculation – provide valuable additional information (see chapters 2.1 and 2.2).

Results of the A-WEAI analysis:

To calculate the A-WEAI index, several steps had to be implemented, which are mentioned in Annex I. Table 1 provides the percentage of participants who have met the adequacy threshold in each empowerment domain of the first sub-index, disaggregated by gender and country. It also contains an average of the individual adequacy score across all domains. The individual adequacy score essentially refers to the average percentage of domains in which the surveyed farmers achieved adequacy.

⁵ Please note that the word “inadequacy” is used here for the mere purpose of maintaining the same terms as the A-WEAI, and by no means reflects a characterization of the people who participated in the survey.

⁶ Refer to table O in Annex I, where the inadequacy cut-off is defined in each empowerment domain.





TABLE 1: FIVE DOMAINS OF EMPOWERMENT 5DE (STEPS 1 AND 2 OF CALCULATING THE FIRST SUBINDEX OF THE A-WEAI). PERCENTAGE OF PARTICIPANTS WHO ACHIEVED ADEQUACY IN EACH DIMENSION PER COUNTRY AND GENDER, BASED ON THE SURVEY CONDUCTED IN OCTOBER 2023

Country	Benin		Mozambique	
	Men	Women	Men	Women
Production: Input in Productive Decisions	100%	100%	100%	97%
Resources: Ownership of Assets	100%	92%	100%	97%
Resources: Access to and Decisions on Credit	67%	54%	60%	57%
Income: Control over the Use of Income	100%	100%	94%	90%
Leadership: Group Membership	100%	95%	92%	95%
Time: Workload	27%	<1%	45%	52%
The weighted Average of the Individual Adequacy Score across all domains⁷	83%	74%	84%	88%

After calculating the individual adequacy scores, several steps were undertaken to compute the first subindex, 5DE. The first part of Table 2 presents the steps taken for the calculation process for the first subindex (5DE). First, a predefined cut-off based on the individual adequacy scores across all domains (presented in Table 1) was applied. Individuals were categorized as either "Empowered" or "Disempowered" based on this cut-off, and the Percentages of those Achieving and Not Achieving Empowerment were calculated. Subsequently, the Mean Disempowerment Score, representing the average individual inadequacy score for those who are not empowered, was computed. The Disempowerment and Empowerment indexes (5DE) were then derived using the Percentage of People Not Achieving Empowerment and the Mean Disempowerment Score. For more comprehensive technical details, please refer to Annex I.

Compared to the pilot study, conducted by Malapit et al in 2014⁸, where the 5DE scores were calculated in Bangladesh (0.83) and Uganda (0.83), CmiA female farmers in Benin achieved similar 5DE scores, while in Mozambique, the 5DE score for women was even higher, at 0.94. It is important to note that all non-percentage value scores represented in Table 2 range from 0 to 1. The results for the CmiA farmers in this study thus indicate high scores.

The second part of Table 2 presents the analysis of the second subindex, the GPI, which measured the extent to which female and male farmers achieved parity within the household. The GPI calculation involved several steps. Firstly, only dual households, in which both men and women were interviewed, were considered. Secondly, the Percentage of Women with no Gender Parity was calculated. Afterwards, households where women did not achieve parity were identified, and the gap between men and women in individual (in)adequacy was calculated. Finally, the GPI was computed using the Average Empowerment Gap and the Percentage of Women with no Gender Parity.

The Percentage of Women with no Gender Parity was very low in Mozambique (5%), compared to Benin (45%), and to the pilot study of the A-WEAI in Bangladesh and Uganda (37%, 34% respectively). Both Benin and Mozambique recorded lower gender gap scores (0.17, 0.15) than Uganda and Bangladesh (0.31, 0.22). The overall GPI score in Mozambique and in Benin was higher than those of the pilot study.

⁷ The weights are based on the importance of each domain in calculating the individual adequacy score, consult table 0 in Annex I for more information.

⁸ Malapit, Hazel J.; Sproule, Kathryn; Kovarik, Chiara; Meinzen-Dick, Ruth Suseela; Quisumbing, Agnes R.; Ramzan, Farzana; Hogue, Emily and Alkire, Sabina. 2014. Measuring progress toward empowerment: Women's empowerment in agriculture index: Baseline report. Washington, D.C.: International Food Policy Research Institute (IFPRI). <http://ebrary.ifpri.org/cdm/ref/collection/p15738coll2/id/128190>

Finally, A-WEAI was calculated as the weighted sum of the 5DE and the GPI. The overall A-WEAI score in Mozambique was 0.94, which was higher than the pilot study scores in Bangladesh and Uganda (0.84) and also higher than in Benin, which was 0.84.

TABLE 2: FIVE DOMAINS OF EMPOWERMENT (5DE) INDEX, THE GENDER PARITY INDEX (GPI), AND FINAL A-WEAI SCORE⁹

Country	Benin		Mozambique	
Gender	Men	Women	Men	Women
Part1: Subindex 1: Five Domains of Empowerment 5DE				
n (Number of Observations)	86	161	108	167
Empowerment Index (5DE)	0.89	0.94¹⁰	0.92	0.83
Disempowerment Index (M0: 1- 5DE)	0.11	0.06	0.08	0.17
Percent Not Achieving Empowerment (H)	37%	23%	29%	55%
Percent Achieving Empowerment (1-H)	63%	77%	71%	45%
Mean Disempowerment Score (A)	30%	28%	27%	33%
Mean Empowerment Score (1 -A)	70%	72%	73%	67%
Part2: Subindex 2: Gender Parity Index (GPI)				
n (Number of Observation)¹¹		49		75
Percentage of Women with no Gender Parity (H_gpi)		5%		45%
Average Empowerment Gap (I_gpi)		0.17		0.15
Gender Parity Index		0.99		0.93
A-WEAI score (0.9 x 5DE + 0.1 x GPI)		0.94		0.84

In summary, the analysis reveals that the A-WEAI score exhibits a notably high value in both countries, with Mozambique standing out as particularly noteworthy in this regard. These findings may suggest a positive outlook for CmiA's female cotton farmers. However, it is crucial to exercise caution and recognize that even slight alterations in the methodological process could potentially yield more nuanced outcomes.

Furthermore, to gain a comprehensive and accurate understanding of the situation faced by female cotton farmers, it becomes imperative to delve deeper into various facets of their lives, both quantitatively and qualitatively. Such a holistic approach is essential to paint a reality-based and detailed portrait of their circumstances.

- ⁹ Five Dimensions of Empowerment (5DE): each row of the results refers to the different steps implemented, and it is important not to use the same logic for all values. Consult Annex I for a better technical understanding.
- ¹⁰ Please note that the scores in Mozambique in the Subindex 1 take into consideration women-only-lead households, which are about 46% of the sampled women in Mozambique.
- ¹¹ The number of observations here refer to the number of women who were interviewed together with their husbands in dual households. The reason of the deviation from the total number of observations used to calculate the 5DE, is that many of the women who lived in dual households were interviewed alone without their spouse. Hence cannot be used to calculate the GPI, check the Annex for further technical clarifications.



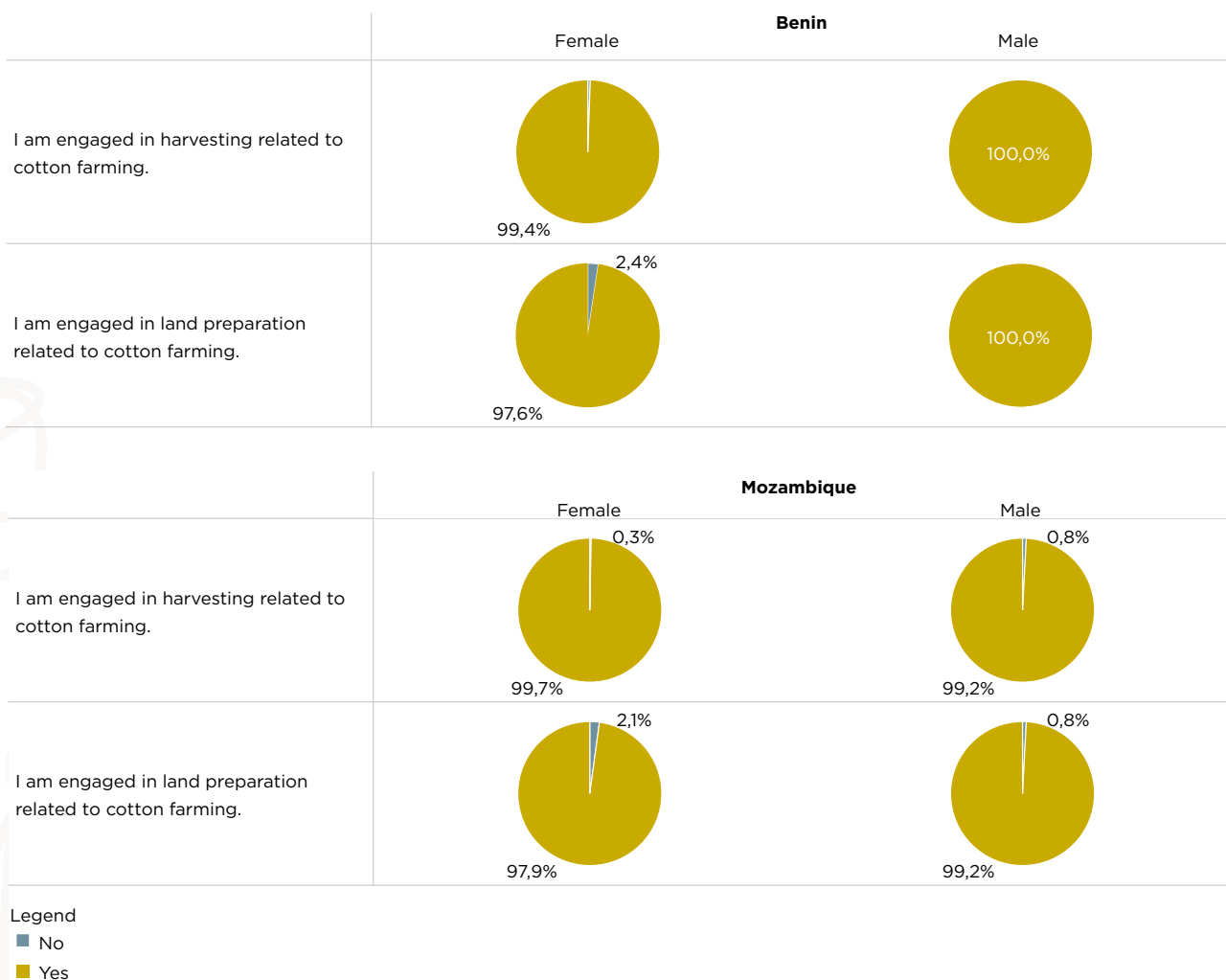
2.1 GENERAL SITUATION OF FEMALE COTTON FARMERS IN THE CMIA PARTNER COUNTRIES

2.1.1. Role in Cotton Farming

This subchapter describes the role that women in Benin and Mozambique assume in cotton farming in line with CmiA standards by focusing on four central aspects: (1) women’s overall involvement; (2) their ownership of and decision-making power over productive resources; (3) their influence on agricultural production decisions; and (4) their control over the use of income generated from cotton farming.

Overall, the data shows that women are similarly involved in cotton farming as men, with only few exceptions. The degree of involvement is assessed along different dimensions, namely: the different tasks performed in farming; the time and workload spent on cotton plots; the extent to which they receive cotton sales revenues; and, whether they hold a contract with the Managing Entities. According to the survey data, both in Benin and Mozambique, there are only selective differences between men and women in the tasks they perform in farming. There are almost no differences in preparing the land, planting and harvesting (see Figure 4).

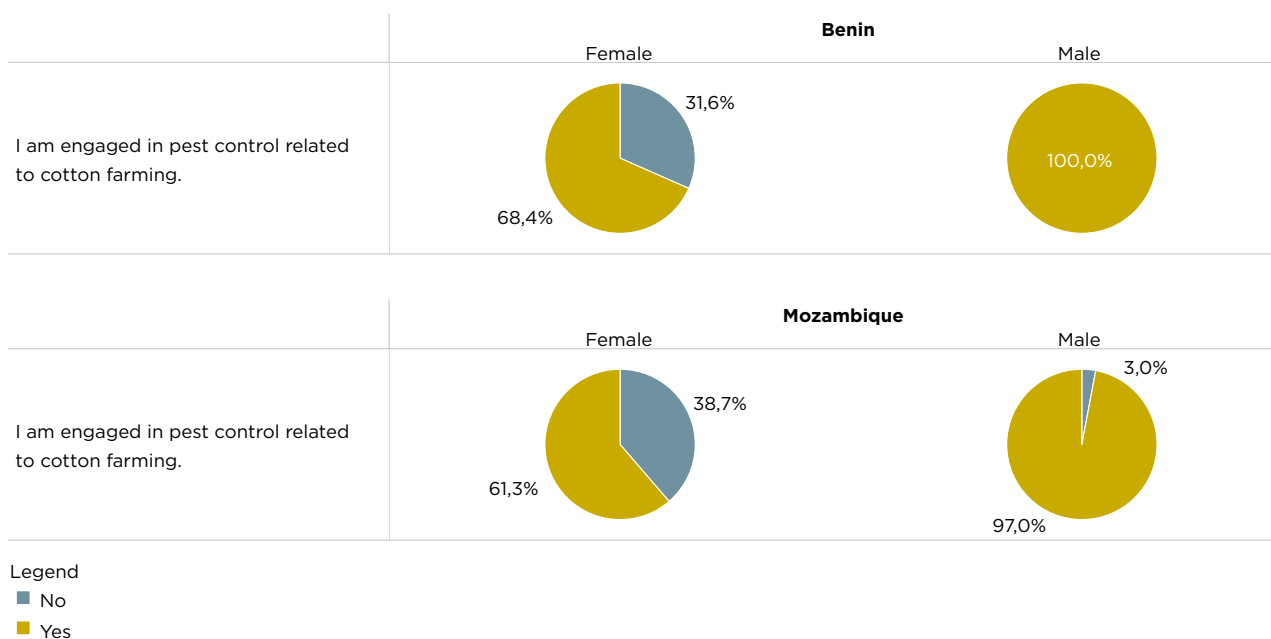
FIGURE 4: INVOLVEMENT IN DIFFERENT TASKS OF THE FARMING PROCESS



The survey data, however, does indicate a difference between genders regarding pest control with a divergence between men and women of 31.6 % in Benin and 38.7 % in Mozambique (see Figure 5).



FIGURE 5: INVOLVEMENT IN PEST CONTROL



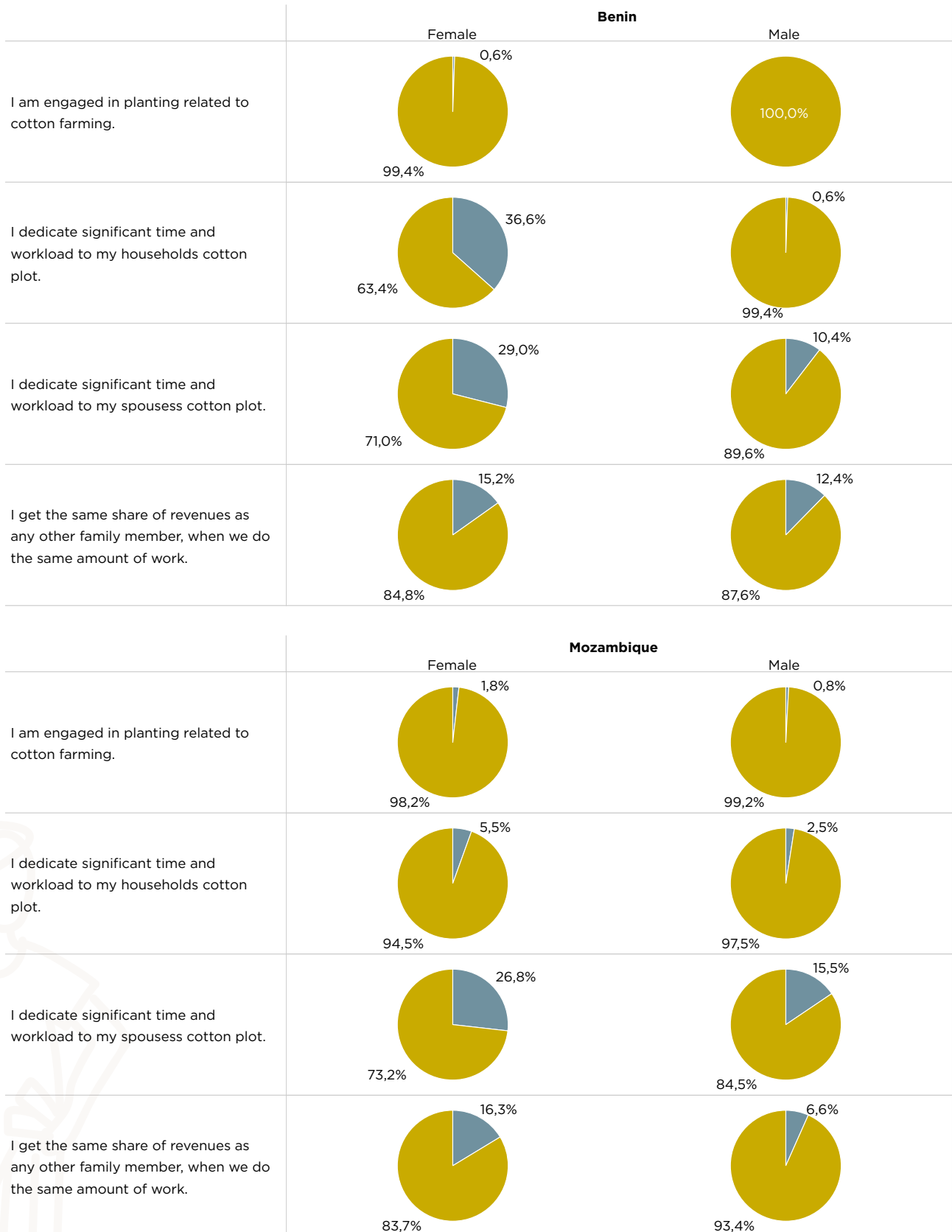
The qualitative data sustains these findings. While the involvement in the tasks performed might vary, interview partners and participants assured that women carry out **all tasks across the production processes**, except in the control and application of pesticides. The exclusion of these tasks for women usually reflects a shared understanding in the communities that women who are pregnant or breastfeeding should not spray pesticides. At the same time, the qualitative data from Benin suggests that in organic farming, women can carry out pest control activities more easily due to lower health risks. Overall, different interview partners indicate that there has been a development in the past few years, explaining that women have been assuming tasks they were not involved in in the past.

Apart from the tasks performed, both quantitative and qualitative data also indicate that women spend **similar time and workload** on their households' or spouses' cotton plots as men. For instance, in Mozambique, 73.2 % of women and 84.5 % of men explained they dedicate significant time and workload on their spouses' cotton plot (see Figure 6). Equally, women receive the same shares of revenues from cotton farming as any family member when doing the same amount of work. In Benin, 84.8 % of women and 87.6 % of men reported to receive the **same share of revenues**, for the same amount of work. In Mozambique, the figures are similar with 83.7 % of women and 93.4 % of men reporting to receive the same revenues for the same work (see Figure 6). As for Mozambique, interview partners explained that these revenues often constitute the sole source of income, while for Benin the revenue sources are more diversified with women also producing soya, shea butter or soap.





FIGURE 6: TIME SPENDING, WORKLOAD AND SHARING OF REVENUES

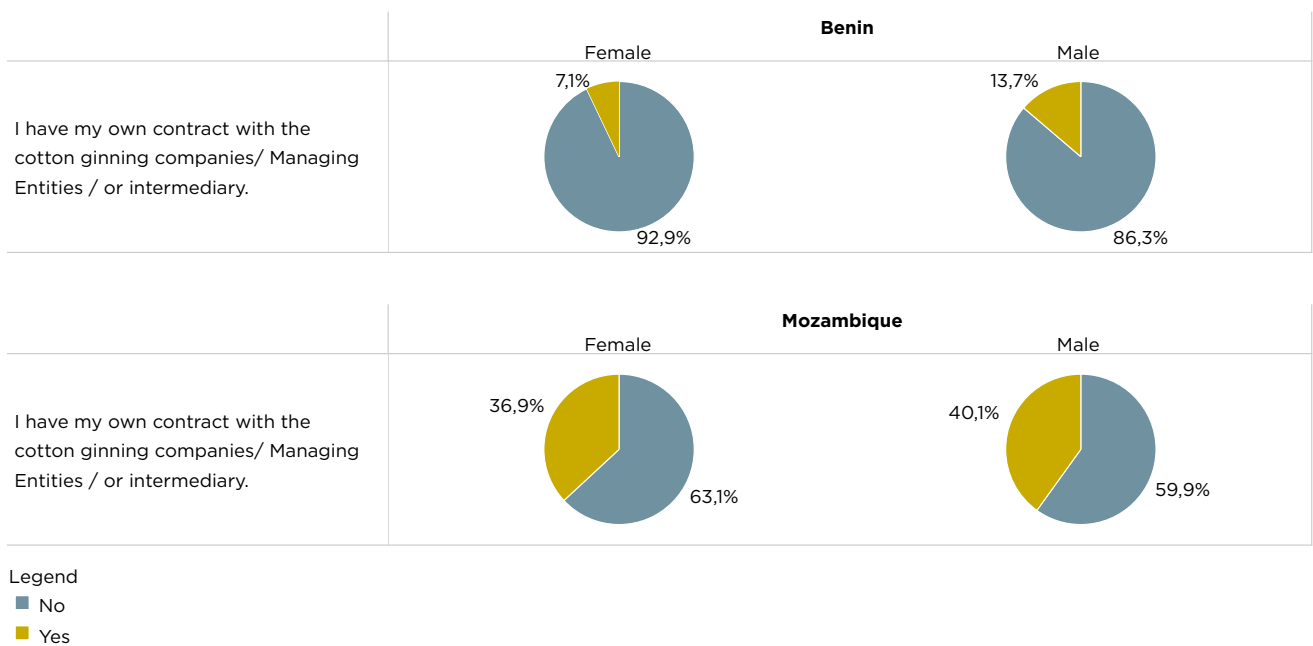


Legend
■ No
■ Yes



The quantitative data indicates no major differences between male and female cotton farmers regarding the **possession of a contract with one of the Managing Entities**. As noted above, the possession of a contract is another indicator of involvement in cotton farming as it makes the involvement official as well as guaranteeing rights. Very few survey respondents (both men and women) confirm to have their own contract – only 7.1 % in Benin and 36.9 % in Mozambique (see Figure 7). However, this result is surprising, as the document review and the interviews indicate that **most farmers do have contracts**, either with the Managing Entity or collectively through cooperatives, as it is primarily the case in Benin. As such, the survey results may reflect a misunderstanding of the survey questions by some farmers, or a varied understanding of the concept “contract” (e.g., written vs. verbal agreements; individually or collectively concluded). Further, the qualitative accounts from the interviews indicate that men hold official contracts more frequently than women.

FIGURE 7: POSSESSION OF A CONTRACT WITH ONE OF THE MANAGING ENTITIES



While the detailed analysis of the survey results shows that women’s overall involvement in cotton farming is similar to men’s, the distribution of ownership of and decision-making power over productive resources is more unequal. Productive resources refer to items that can be used to generate income, including agricultural land, livestock, farm equipment, means of transportation as well as consumer durables and electronic devices. At first sight, when looking at the corresponding A-WEAI score, there is a relatively high adequate achievement score regarding the ownership of asset. Basically, 100% of men in both Benin and Mozambique, 92% of women in Benin, and 97% of women in Mozambique achieve adequacy in this domain. However, when looking more closely at the data, the survey results show a more differentiated picture. In both Mozambique and Benin, the survey data indicates an inequality between the genders across the different types of resources. For example, in the case of agricultural land in Benin, 76.8 % of male farmers living in shared households stated they own land themselves compared to only 2.1 % of women (see Figure 8).



FIGURE 8: OWNERSHIP OF AGRICULTURAL LAND (SHARED HOUSEHOLDS ONLY)



Legend

- Other household member
- Partner/Spouse
- Partner/Spouse and other household member(s)
- Self
- Self and other household member(s)
- Self and other outside people
- Self and partner/spouse jointly
- Self, partner/spouse and other outside people
- Someone (or group of people) outside the household
- No one in my household owns the item

By contrast, most women explained that the land they access is owned by a partner or spouse (70.3 %) or jointly (22.7 %). In Mozambique, 10.8 % of women living in shared households state they own land themselves, compared to 31.8 % of men. The survey data shows a similar distribution across larger items, e.g., means of production or livestock, while women’s self-ownership or joint ownership only increases with smaller items, such as small consumer durables or cell phones. This general lack of women’s ownership over productive resources, especially of higher value, is sustained by the qualitative data. As one interview partner from Benin explained, socio-cultural norms such as inheritance rules play a crucial role in limiting women’s ownership of land – and even if land is given to women, it is often of poor fertility. By identifying a general lack of women’s ownership over productive resource, the analysis differs from the A-WEAI index in a twofold way. On the one hand, the analysis refers to sole ownership as well as shared household ownership only. On the other hand, the threshold in the data analysis applied here is more rigorous than the adequacy cut-off of the A-WEAI domains. According to the A-WEAI cut-off, a person already achieves “adequacy” in the ownership domain, if he or she jointly or solely owns at least one item excluding small assets.



The pattern of unequal ownership, as the survey data shows, expands to the **decision-making power over productive resources** or as mentioned in Table 1 in the WEAI chapter 2.0, **Input in productive decisions**. Here again, when looking solely at the adequacy score of the A-WEAI, it appears that most survey participants in Benin and Mozambique have a high adequacy level, meaning that women have a certain degree of decision-making power over productive resources. Almost 100% of women and men in Mozambique, and 100% of men in 97% of women in Benin meet the adequacy threshold in this domain. However, a more detailed analysis and further qualitative insights show that this seemingly positive result must be interpreted carefully. As such, the data shows that, in general, men exercise most of the sole decision-making on the different items of productive resources. For instance, as for the decision about buying farming inputs, 74 % of men living in shared households¹² in Benin and 23 % in Mozambique stated they decide on their own compared with only 15 % of women in Benin and 1 % in Mozambique. Nevertheless, when it comes to joint decision-making, the survey data from Mozambique indicates that most decisions across the above-mentioned items are taken jointly instead of men taking solely the decision. This means that women have a role in taking decisions jointly. This reflects the advice that is usually promoted by the Managing Entities to strengthen the role of women in the household, namely that men and women in the same household should take decisions jointly (instead of men taking decisions alone).

FIGURE 9: DECISION-MAKING REGARDING THE PURCHASE OF FARMING INPUT



Legend

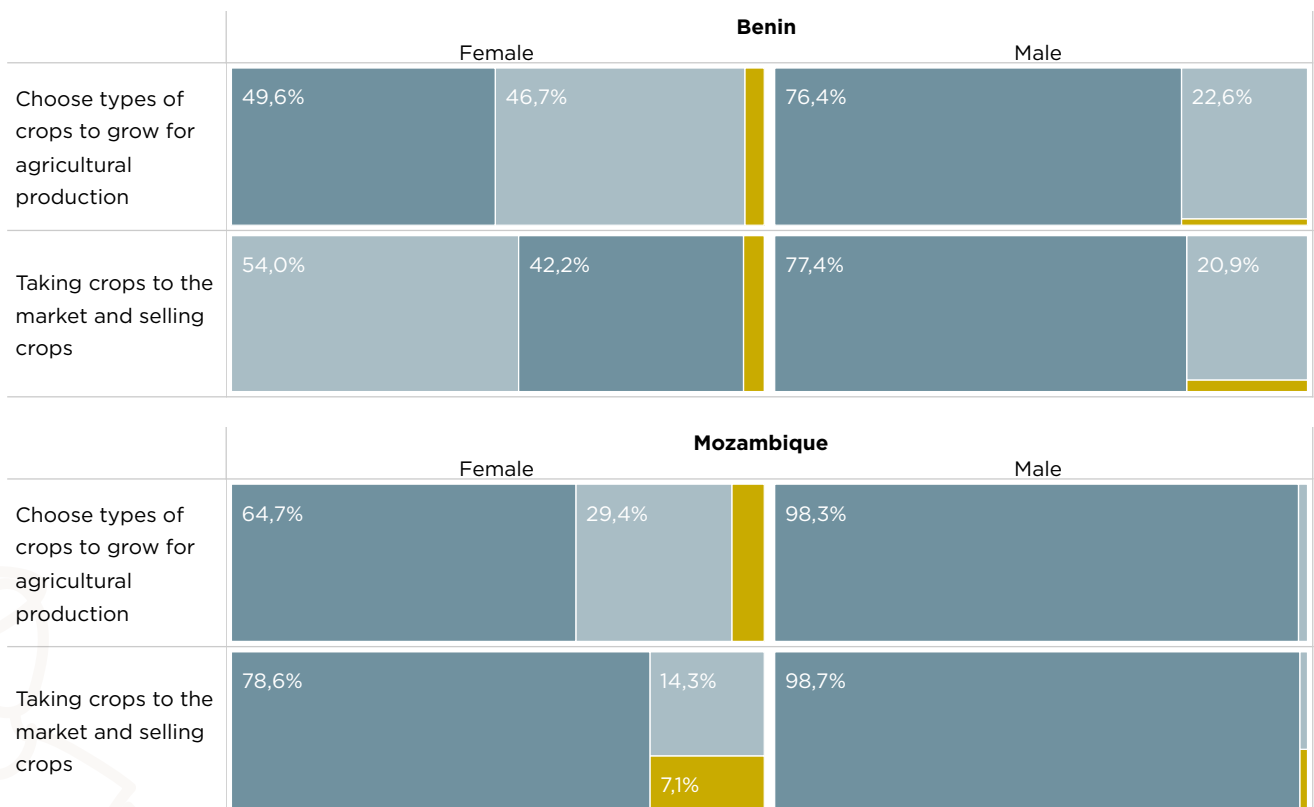
- Partner/Spouse
- Partner/Spouse and other household member(s)
- Self
- Self and other household member(s)
- Self and partner/spouse jointly
- Someone (or group of people) outside the household

¹² Shared households or dual households are used alternatively in the texts; they refers to households who have male and female adult(s) as primary persons in the household. It is used sometimes to see if the results differ from the results of women-only-led households.



With regards to the adequacy score of the A-WEAI on productive decisions, the results show that women in both countries have an influence over agricultural production activities. Agricultural production activities not only cover the purchasing of items relevant to farming but also decisions about the types of crops to grow for agricultural production, how to organise the sale and whether to engage in livestock raising. Almost 100% of women and men in Mozambique, 100% of men and 97% of women in Benin achieve the A-WEAI adequacy level. Overall, the analysis of the data confirms this trend. However, the calculation of the A-WEAI score does not provide insights as to extent to which women are able to take decisions on their own in these areas. When looking more closely at the results, the data shows that the **extent to which women they take decisions by themselves** remains below that of men. According to the survey data, most women agree or strongly agree that they have influence on decision-making across these activities. For instance, 97 % of women in Benin and 94 % in Mozambique agree or strongly agree on having a say in choosing what crops to grow. For transporting and selling, the rates are similar with 96 % agreement in Benin and 93 % in Mozambique (see Figure 10). These figures only change slightly when excluding women-only households from the data.

FIGURE 10: DECISION-MAKING RELATED TO PRODUCTION

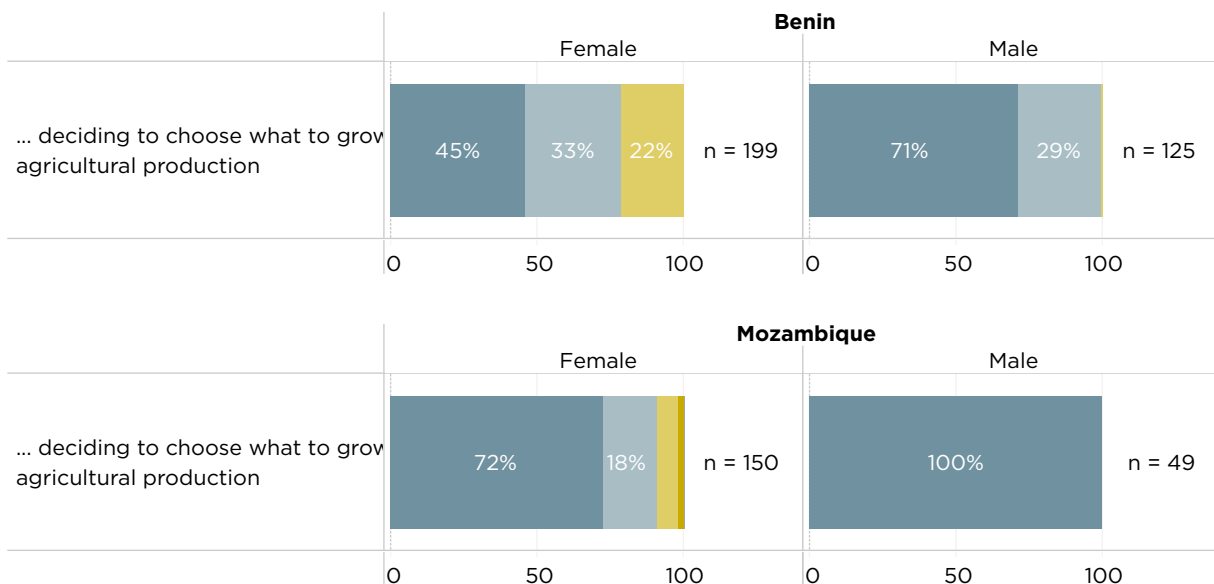


Legend

- Input in most or all decisions
- Input into some decisions
- No input or input in few decisions

For Benin, however, the data shows lower rates of influence over decision-making on livestock raising, since 16 % of women strongly disagree with having a say in this matter. The qualitative data in this respect indicates that discriminating socio-cultural norms, as mentioned above, may play a role in this context. This interpretation is confirmed when looking at the extent to which women perceive that they are able to make **their own decisions**, in contrast to having only a say. While the agreement rates across the various agricultural activities stay relatively constant for Mozambique, a higher percentage of women in Benin disagree that they make decisions on their own. For example, when looking at the choice of crops, the results show that 22 % of women in shared households in Benin explained that they can make personal decisions only to a small extent (see Figure 11). In contrast, only 4 % explained that they have no or little input on having a say in this matter (see Figure 10). While some agricultural activities in Benin are mediated through cooperatives, the data shows that men, on average, make more decisions on their own, compared to women.

FIGURE 11: OWN PERSONAL DECISION-MAKING

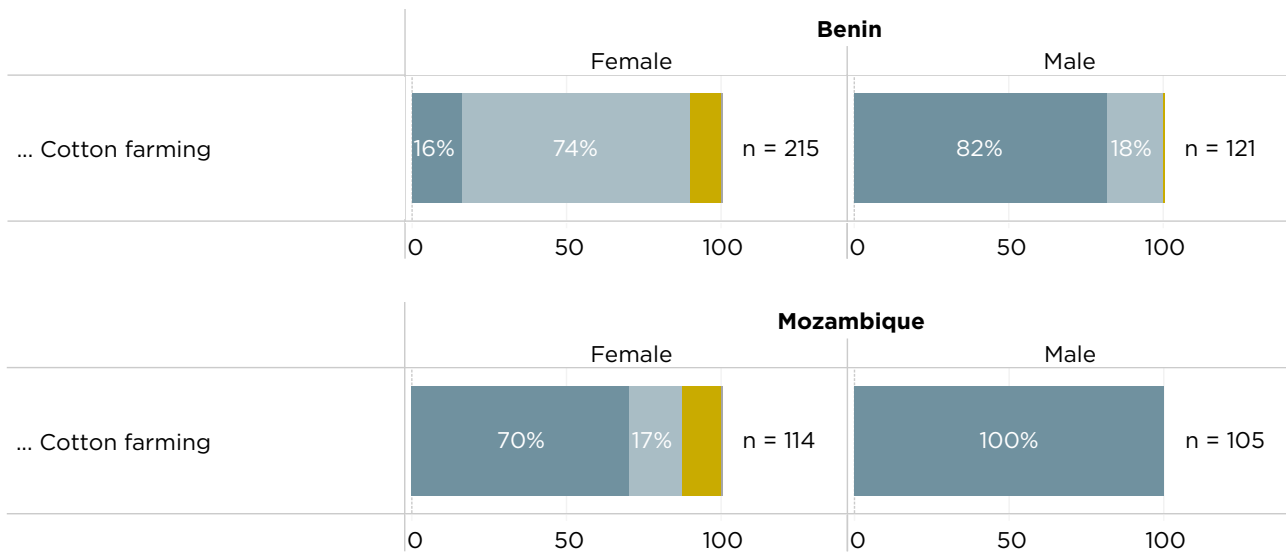


- Legend
- To a high extent
 - Medium extent
 - Small extent
 - Not at all
 - No answer / I do not know

On the fourth aspect relevant to assessing women’s role in cotton farming, i.e., the **control over the use of generated income**, the data of dual households only shows that both male and female farmers in Benin and Mozambique agree or strongly agree to have decision-making power of the use of income. However, women make fewer decisions on their own, indicating a lower degree of autonomy. Having control over income means having decision-making power over the earnings as well as over major and minor household expenditures. Generally, men in both countries perceive they have control over the use of income to a higher extent than women. For example, in Mozambique, 100 % of men and 70 % of women living in shared households stated that they have a high level of control of income generated from cotton farming. In Benin, 82 % of men and 16 % of women in Benin gave the same answer (see Figure 12).



FIGURE 12: DECISION-MAKING ON INCOME GENERATED FROM COTTON FARMING



Legend

- Input in most or all decisions
- Input into some decisions
- No input or input in few decisions
- No answer / I do not know

As for the **concrete spending of income** generated from farming and non-farming activities, the data shows that women mostly make joint decisions, i.e., with partners or spouses, across different aspects. Yet, there are differences between the genders in the scope of expenditures. In this sense, the decision-making on spending income shows a similar pattern to the decision-making power over productive resources, as shown in Figure 9 above. Regarding major household expenditures in shared households, i.e., the purchase of large appliances like refrigerators, 30 % of men in Mozambique and 54 % of men in Benin state that they make those decisions on their own compared to less than 1 % of women in both Mozambique and Benin. By contrast, this gap notably reduces when asked for minor household expenditures, i.e., the purchase of food or other goods for daily consumption: 15 % of men in Mozambique and 14 % in Benin make such decisions on their own, compared to 9 % of women in Mozambique and 23 % in Benin (see Figure 13). In this case, the A-WEAI score for control over the use of income sustains the finding that both men and women have a shared agency when it comes to the concrete spending of income as per Table 1 (high adequacy level): 100 % of men in Benin and Mozambique, 92% of women in Benin and 97% of women in Mozambique.¹³

13 Please note that all A-WEAI calculations are based on all household types. This includes both shared households and women-led households, while the analysis sometimes looks at shared households only.

FIGURE 13: DECISION-MAKING ON MAJOR AND MINOR EXPENDITURES (ONLY SHARED HOUSEHOLDS)



Legend

- Other household member
- Partner/Spouse
- Partner/Spouse and other household member(s)
- Self
- Self and other household member(s)
- Self and other outside people
- Self and partner/spouse jointly
- Someone (or group of people) outside the household

2.1.2 Position in the Productive Environment

After outlining women’s overall role in cotton farming, this subchapter takes a closer look at the position of women within the productive environment and in their interactions with the Managing Entities. To this end, this section tackles the challenges in selling to the Managing Entity as well as gender differences in: (1) the purchase of cotton, (2) the volume and quality, and (3) the management of repayments and pre-financed inputs.

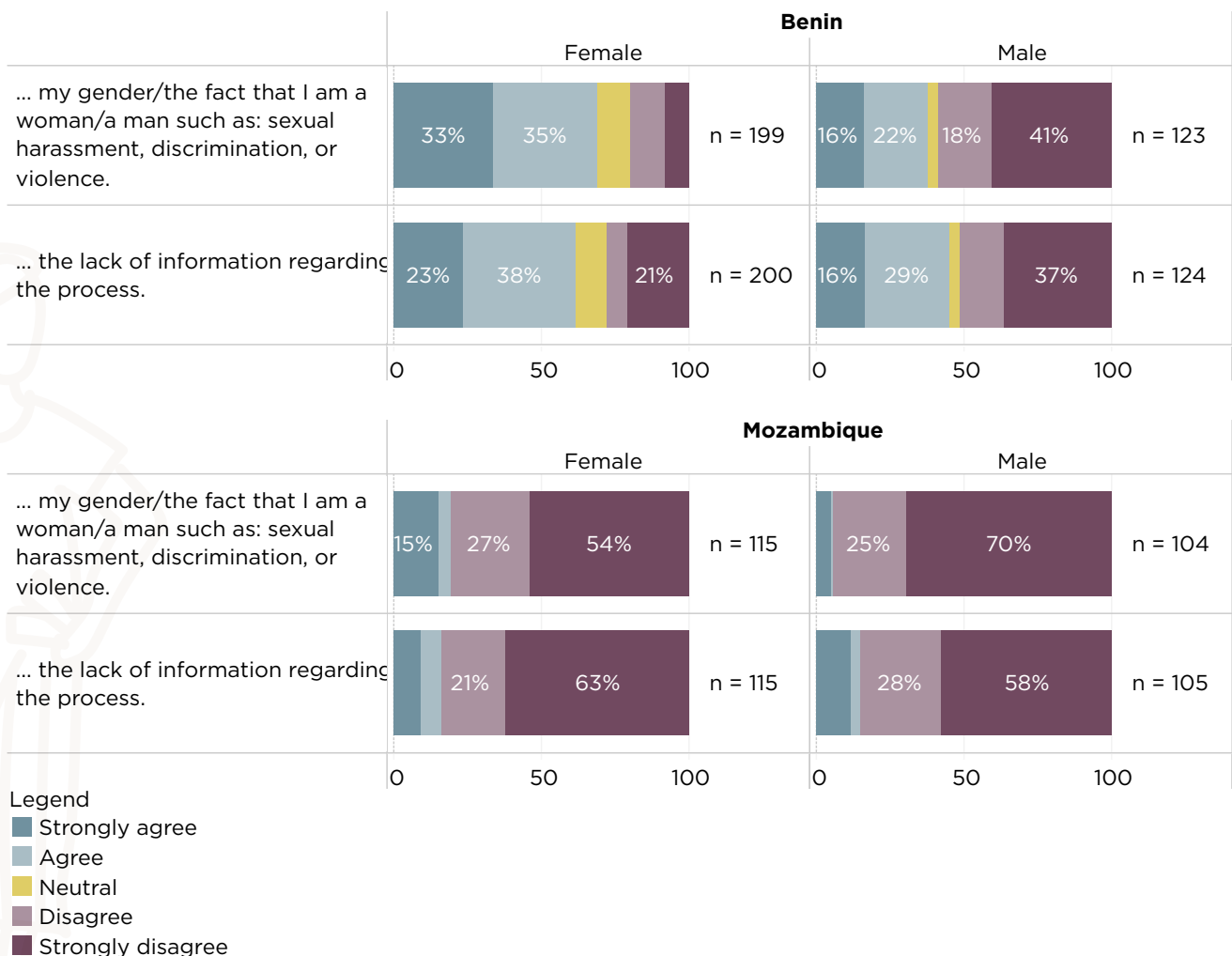
Overall, women’s position in the productive environment and their interaction with the Managing Entities is similar to that of men. However, women face specific **challenges** more acutely, such as lacking information regarding processes from the Managing Entities, and negative experiences of gender-based discrimination. Farmers face challenges when selling to the Managing Entities. Challenges refer to transportation, pricing, harvest, delivery time, lack of information or personal confidence to close deals, or gender-specific forms of discrimination, among others. In general, the survey data shows that cotton farmers in Benin experience these different challenges more acutely than in Mozambique. The challenges most reported in Benin are obstacles in transportation, harvest, and delivery time, considering 90 % of both male and



female farmers state that they experience these challenges. While transportation is also the most experienced challenge in Mozambique, the values are notably lower than other items with 36 % of men and 33 % of women agreeing they face barriers here. According to the interviews, obstacles in transportation are primarily caused by a lack of transportation means, poor road conditions, and delays in harvest and payment have an influence.

While, in some regard, male and female farmers encounter similar obstacles, there are **specific challenges** for female suppliers, i.e., lack of information and experiences of gender-based discrimination. Regarding the latter, 68 % of women in Benin and 15 % in Mozambique face such challenges compared to 38 % of men in Benin and 5 % in Mozambique (see Figure 14). In the interpretation of these numbers, it needs to be considered that the survey asked for subjective experiences of harassment, violence, or discrimination jointly, specifically related to their gender (in one question). Hence, the data does not reveal the exact nature of these experiences. In the qualitative interviews, gender-based discrimination was occasionally mentioned by female farmers, while no instances of harassment or violence were reported. Although women seem to be affected more strongly, the survey results (especially for Benin) show that men are also affected by such experiences. One possible interpretation of these results is that the perception of discrimination goes beyond the gender dimension (e.g., a person can also feel discriminated against because of his/her social status). Another interpretation is that there were possibly misunderstandings in the survey implementation (e.g., male farmers might have referred to women in their answer instead of referring to their own situation). In addition, the figures for Mozambique also need to be interpreted against the background that sales activities are traditionally carried out by men, thus reducing women's exposure to challenges in selling cotton.

FIGURE 14: CHALLENGES WHEN SELLING TO THE MANAGING ENTITY OR INTERMEDIARY (ONLY SHARED HOUSEHOLDS)





Regarding the **actual sale of the cotton to the Managing Entity** as well as the **volume and quality of the cotton produced**, there is no indication of gender differences, neither in Benin nor Mozambique. As one interview partner from Benin explained, women are just as responsible as men for their cotton heaps and do not experience any discriminating treatment by the Managing Entities. Another interview partner even noted that some women are perceived as being more assertive than men.

For the final aspect, **the management of repayments of pre-financed inputs**, the data points to a similar direction, indicating no challenges in repaying pre-financed inputs. The main reason for the absence of problems is that inputs are provided on credit by intermediaries, i.e., the cooperatives in Benin and the lead farmers in Mozambique and are written off after the cotton sale. In this sense, there is no pre-financing of inputs necessary on the side of the cotton farmers. However, the data indicates that women generally face more difficulties in accessing inputs given the above-mentioned inequalities in ownership and decision-making over different types of resources. In this sense, while there are no gender differences in managing the repayment of pre-financed inputs, there are differences regarding the ownership and handling of such inputs between the genders.

2.1.3. Position in Socio-cultural Structures

This subchapter deals with women's position in the socio-cultural structure in their communities. In particular, this subchapter focuses on two important aspects, which are: (1) women's roles in leadership in their communities, and (2) their autonomy over the use of time.

Overall, the data shows that women are strongly integrated into the communities and that female leadership in communities has been increasing over the years. However, the extent of leadership is lower than that of men considering fewer women feeling comfortable speaking in public. Moreover, women continue to have less autonomy over the use of time than men.

The extent of leadership in communities is assessed by: (1) the membership in community groups, (2) the comfort in speaking up in public regarding community matters, and (3) the comfort of speaking up in public to protest the misbehaviour of authorities or elected officials.¹⁴

In the context of A-WEAI, the adequacy score in the dimension of leadership is 100% and 95% for men and women respectively in Benin and 92% for men and 95% for women in Mozambique, suggesting a high adequacy achievement in the leadership dimension. The leadership adequacy score in the A-WEAI considers a person adequate if they are a member of at least one group. The A-WEAI (in contrast to the classic WEAI) does not take the factor of public speaking into consideration.

Therefore, a more detailed examination of the survey results, concerning group membership and comfort in public speaking, offers a deeper level of nuance in the analysis. Regarding group membership, the data indicates that both genders show an organised involvement in the communities, albeit with differences. In Benin, for instance, most survey respondents are members of a producer group (agricultural, livestock, fishery), that is 96.1 % of men and 73.7 % of women. In Mozambique, most respondents are organized in religious groups, (97.1 % of men and 92.8 % of women). In some groups, women show a higher level of membership than men, such as water user groups in Mozambique (38.7 % of women compared to 32.4 % of men) or mutual help/insurance groups in Benin (39.6 % of women compared to 31.5 % of men).

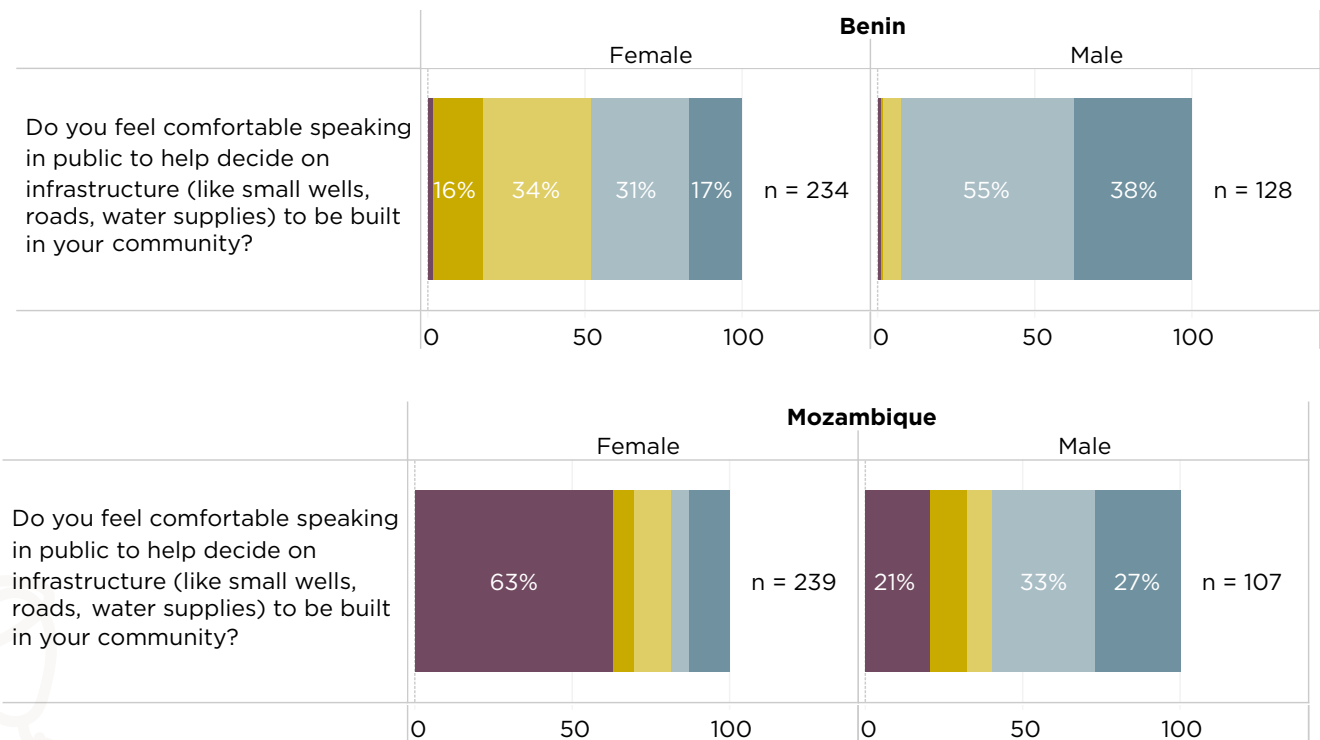
¹⁴ For the abbreviated version of the WEAI (A-WEAI), which was used in section 2, only the group membership is considered to measure adequacy in the leadership dimension. However, for further analyses, the study also considered the criteria of speaking in public regarding community matters and to protest against misbehaviour as used in the classic WEAI.



When it comes to speaking in public about community matters as well as for protesting, however, the survey data shows that women in both Mozambique and Benin feel less comfortable speaking in public.

As for speaking up in public to help decide on infrastructure building in the community, e.g., small wells, roads, or water supplies, around 70 % of women in Mozambique explained that they do not feel comfortable at all, or with a great deal of difficulty compared with around 32 % of men. Most men in Mozambique, around 60 %, stated they feel very or fairly comfortable speaking up on such matters compared to only 19 % of women. While the data shows that there are strong differences between the two countries, the pattern remains the same in Benin: 17 % of women explained that they do not feel comfortable at all, or with a great deal of difficulty compared to only 2 % of men. The vast majority of men in Benin (93 %) stated that they feel very, or comfortable speaking up on infrastructure decisions compared to 48 % of women (see Figure 15).

FIGURE 15: FEELING COMFORTABLE SPEAKING UP IN PUBLIC REGARDING INFRASTRUCTURE DECISIONS.



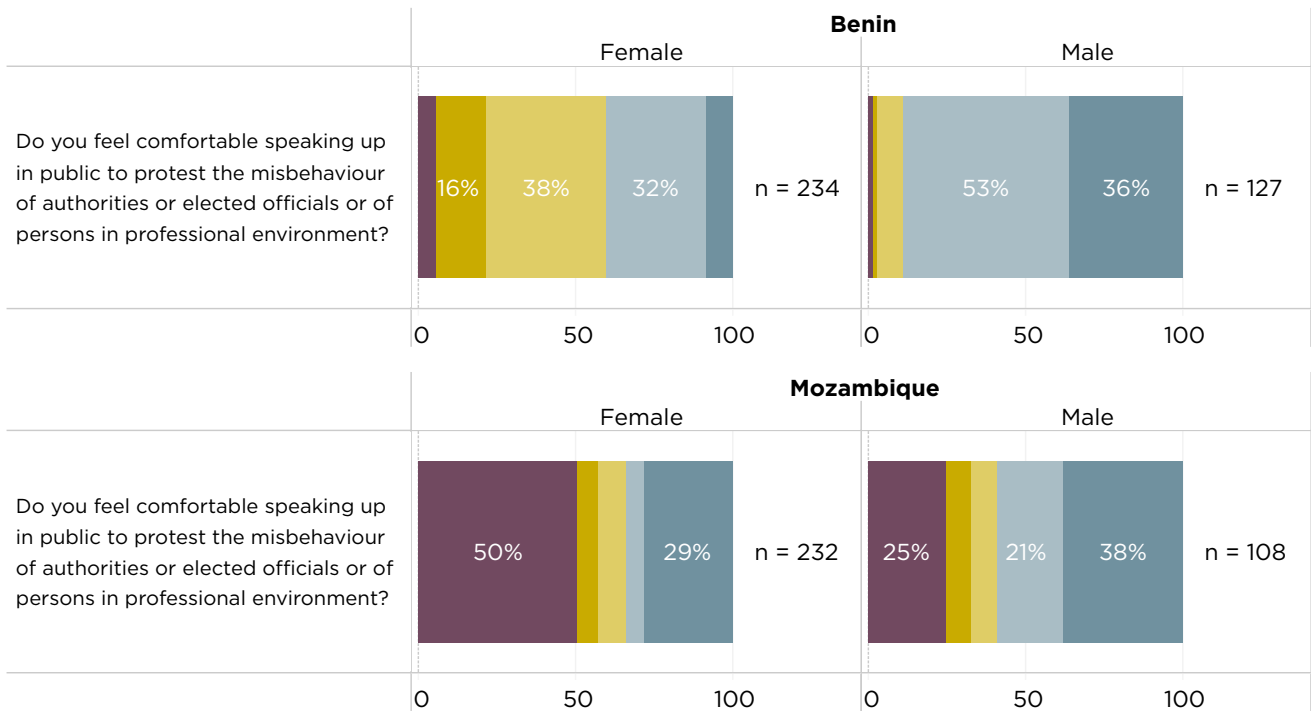
Legend

- No, not at all comfortable
- Yes, but with a great deal of difficulty
- Yes, but with a little difficulty
- Yes, fairly comfortable
- Yes, very comfortable

This distribution remains almost unchanged regarding the comfort of **speaking in public to protest the misbehaviour of authorities, elected persons, or persons in a professional environment**. Again, farmers in Mozambique feel less comfortable than farmers in Benin – and clear gender differences remain visible in the data for both countries. In Mozambique, around 57 % of women stated they do not feel comfortable at all or with a great deal of difficulty protesting misbehaviour compared with 32 % of men. Again, the majority of men in Mozambique (59 %) stated they feel very or fairly comfortable compared to 34 % of women. In contrast, in Benin, 21 % of women explained they did not feel at all comfortable or with great difficulty compared to only 3 % of men. 89 % of men in Benin feel very or fairly comfortable compared with 40 % of women (see Figure 16).



FIGURE 16: FEELING COMFORTABLE SPEAKING UP IN PUBLIC TO PROTEST MISBEHAVIOUR



Legend

- No, not at all comfortable
- Yes, but with a great deal of difficulty
- Yes, but with a little difficulty
- Yes, fairly comfortable
- Yes, very comfortable

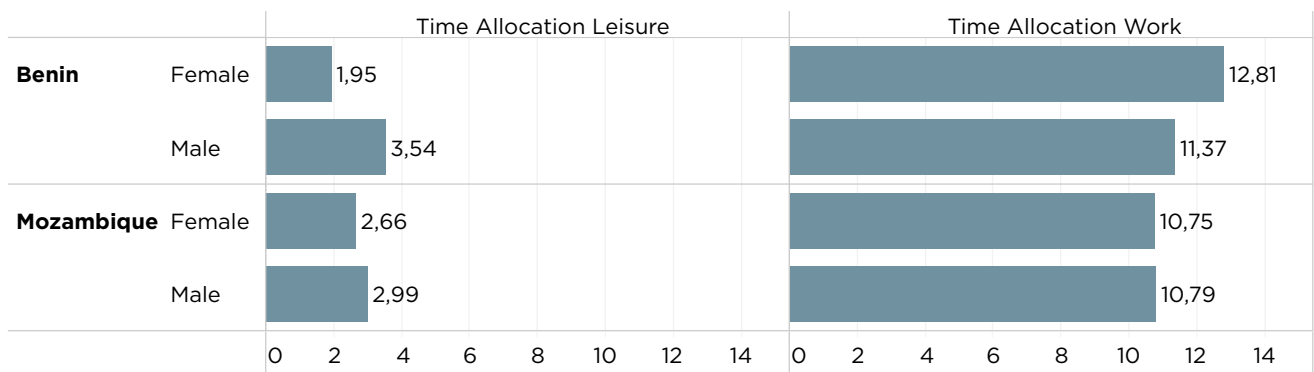
The qualitative data from the interviews and FGDs does not explain in detail these differences in leadership roles. However, interview partners and participants from both Benin and Mozambique outlined the concrete roles women assume as well as attempts to promote women’s roles, indicating **opportunities for change**. For Benin, interview partners explained that women hold different positions of responsibility in the in the markets covered by CmiA, such as treasurers, secretaries, or presidents. While some FGDs also confirmed changing roles in farming, e.g., women assuming the role of farm managers in the communities, other FGD participants were rather sceptical about such changes. Even though women in Mozambique are less comfortable speaking in public, indicating a lower level of leadership in the communities, interview partners in Mozambique stressed attempts to encourage women to assume leadership roles as well as to engage in further activities to earn extra income. Overall, women in both Benin and Mozambique are involved in their communities but to a lesser extent in leadership roles as men - but there are opportunities to change this.

As for women’s autonomy over the use of time, the A-WEAI adequacy score in the dimension “time” is relevant to look at. The score shows a different level of adequacy in Benin and Mozambique. Only 1 % of women in Benin achieve adequacy in the time allocation dimension compared to 27% of their male counterparts, while women in Mozambique seem to do much better in terms of adequacy in time allocation with an adequacy score of 52%. The latter is even slightly better for women than men in Mozambique, who scored 45% on the time allocation domain. According to the A-WEAI calculation guide, adequacy in the time domain is determined by whether a person spends less than 10.5 hours a day in productive and care work, which serves as the standard threshold for time poverty. The time adequacy scores for all genders in both countries are the lowest across all A-WEAI domains, suggesting room for improvement.



The scores partially confirm the results from the further quantitative and qualitative results: The data shows that women, on average, have less **leisure time** than men and face challenges in balancing productive activities and domestic chores, which traditionally remain female tasks. On average, women in Benin work almost 13 hours a day, that is spending time on both productive and domestic tasks, whereas men dedicate around 11 hours to work. In Mozambique, women and men report the same time dedication to work, i.e., around 11 hours. However, while women and men spend similar hours working, the data for both countries show that women have less leisure time than men. In Benin, women have around 2 hours of leisure time whereas men report around 3.5 hours. In Mozambique, this gap is narrower with women having 2.6 hours and men 2.9 hours of leisure time per day (see Figure 17). Regarding the level of satisfaction with their leisure time, both women and men in Benin and Mozambique stated that they are mostly satisfied. Yet, for Benin, there is a gap in high satisfaction since 48 % of men state being very satisfied with their leisure time compared to only 6 % of women.¹⁵

FIGURE 17: TIME ALLOCATION BETWEEN LEISURE AND WORK (IN HOURS)



The qualitative data supplements the survey data in the sense that it points to the **underlying gender roles and dynamics at play**, thus explaining the gender differences in time allocation. Despite the above-mentioned finding that women in Benin and Mozambique are engaged in productive activities, interview partners from both countries describe the ongoing prevalence of traditional gender roles and the corresponding assignment of domestic work to women. As one interview partner from Benin explained: “People know what the men’s and the women’s tasks are”. In a similar vein, one interview partner from Mozambique explained that women are actively participating in cotton farming while at the same time needing to save time for domestic work. Even though another interview partner from Mozambique described that women go home earlier from the field, to take care of children and domestic chores. The results from interviews and FGDs clearly show that women face a **double burden of field and domestic work**. One FGD participant from Mozambique described that sometimes women are overwhelmed by domestic work, which leads to delays in productive tasks or the need to ask for help in the fieldwork. In Benin, one interview partner confirmed that women have very little free time, and one FGD participant explained that balancing farming and domestic activities forces women: “To be active from dawn on”. While these accounts showcase the ongoing impact of traditional gender roles in Mozambique and Benin, change is happening on a small scale. As one interview partner from Benin explained, men are assisting their wives in tasks traditionally assigned to women such as fetching water, suggesting that: “Lines are moving”.

¹⁵ A methodological note: The survey asked the respondents to estimate the time dedicated to each activity. The allocation of activities to the categories ‘productive’, ‘domestic’, and ‘leisure’ was done afterwards in the analysis. So, it needs to be noted that the categories may be understood differently depending on the specific local context.



2.1.4. Facilitators and Obstacles to Women Empowerment

This subchapter describes the overall hindering and facilitating factors for women's situation in cotton farming in Benin and Mozambique. While some factors affect all farmers similarly, such as low soil fertility, transportation challenges, or training efforts, there are factors particularly hindering and facilitating women's roles in cotton farming and farming communities.

One hindering factor is **traditional gender roles** and the corresponding **gendered division of labour**. Even though changes are observable in both countries, societal expectations regarding men's and women's responsibilities remain influential, leading to women experiencing a double burden of field and domestic work and a lack of time autonomy. As one interview partner from Mozambique explained, social and cultural norms around gender can impede women from taking a more active role. Regarding productive activities, another interview partner from Benin stated that if women are occupied with housekeeping tasks, they are not able to get inputs for their own production, making it difficult for them to assert their status as producers. In this sense, traditional norms and power dynamics continue to impede women from participating in cotton farming activities. One interview partner in fact observed that: "We see some women now deciding how to spend their time. But it should also be noted that the weight of tradition means that women quite often have to rely on their husbands for certain decisions" (Cotton farmer Benin).

Another hindering factor is the interplay of **gendered challenges in the productive environment**. Traditional gender roles also transpire into the productive environment, or as one interview partner from Benin explained, women's opportunities are restricted in the patriarchal environment. While norms about gender roles are changing (see paragraph below), women's lack of ownership of land, access to it, and to other crucial productive inputs and equipment remains a structural challenge. As one interview partner from Benin puts it, "Access to land is a bone in women's throats". Further challenges for female farmers in the productive environment are problems in selling cotton, restricted access to obtaining credits, as well as a lack of information by the Managing Entities. As in many societies today, women in the farmer communities also still experience gender-based discrimination more strongly than men.

Despite these structural obstacles, the quantitative and qualitative data also shows different facilitating factors which in the short and medium term can improve women's situation in cotton farming in Benin and Mozambique.

The first facilitating factor is the observable **change in attitudes** towards women and the roles they assume. While traditional gender roles remain perpetuated, there are, at the same time, shifts in the perception of the role of women in farming activities. As shown above, women assume responsibility across different farming activities, with few exceptions, such as pest control. In this sense, women have become actively involved in traditionally male-dominated tasks. Such shifts are especially enabled through the support of husbands, adequate payment mechanisms, and training, thus indicating the interplay of different facilitating factors. For Mozambique, one interview partner also referred to the support among women, explaining that women are encouraging each other to obtain education and to become more involved in cotton farming for income generation. Moreover, a higher engagement of men in traditionally female-assigned tasks, e.g., in the household, also plays a role, especially regarding women's time autonomy. Qualitative insights highlight evolving roles for women in both countries. Women in Benin hold positions of responsibility in the cooperatives indicating changing dynamics. In Mozambique, attempts are made to encourage women to assume leadership roles and engage in additional income-generating activities. Further, the example of the "school of husbands" initiative, engaging men in discussions on women's activities, signals a proactive approach by Managing Entities to promote mutual support within households. Although female involvement in leadership roles is less pronounced than male's, there are discernible opportunities for change.





The second crucial and facilitating factor for the improvement of women's general situation in cotton farming is their financial independence. As shown above, the lack of ownership and control over resources, including finances, remains an obstacle for women. The qualitative data indicates different mechanisms that can be implemented by the Managing Entities or the farmers themselves to change this situation, leading to more financial independence. One mechanism is the payment systems in which financial transactions are done per individual by the Managing Entities. Furthermore, formalising women's involvement in cotton farming through promoting contracts for women also constitutes a mechanism by the Managing Entities to support the **financial independence** of women, as one interview partner from Mozambique highlighted. Another mechanism is the diversification of income-generating opportunities by the farmers themselves. As one interview partner from Benin explained, women become more self-sufficient through activities such as producing soya cheese, shea butter, or soap.

The third facilitating factor for positive change regarding the situation of women in cotton farming is **awareness and empowerment efforts**. Such efforts seek to create awareness about gender challenges and to promote gender equality including the implementation of policies, trainings, campaigns, and other sensitization activities. Concrete examples from the CmiA partner countries are the recruitment of more female staff in Managing Entities, as mentioned in one interview in Mozambique. Other examples are support systems and training courses on female leadership and entrepreneurship, as mentioned for organic cotton farming in Benin.

2.2. CONTRIBUTION OF CMIA INTERVENTIONS TO WOMEN EMPOWERMENT

This subchapter analyses the contribution of the CmiA support to the objectives that CmiA expects to achieve in terms of women empowerment. The chapter starts with the assessment of the achievement of the planned activities and outputs and then provides an overview of the achievement of the outcomes, as listed in the study-specific Theory of Change (see Chapter 1). Using a contribution analysis, the report then describes to what extent the mechanisms employed by CmiA have led (or not) to the expected outcomes (through the assessment of the selected contribution hypotheses presented in Chapter 1.3).

2.2.1. Achievement of Activities & Outputs

Trainings

One of the main intended contributions in CmiA's intervention logic is the support to the Managing Entities to conduct **farmer trainings that mainstream gender-related aspects** (e.g., through consultations, materials, advice, and financial contributions). Based on the available documents (such as internal documentation of trainings by Managing Entities), the study found that **several trainings that directly and indirectly address gender equality-related contents** have taken place in the last three years. According to most interview partners, **training content** on gender-related aspects is mainstreamed in different trainings, such as classes on the prevention of child labour, decent work, and agroecological practices. The training topics with relevance for women's empowerment cover for example, non-discrimination policies, gender equality, prevention of child labour, prevention of hard work, and special care for pregnant women as well as prevention of domestic violence. Furthermore, some training content is rather indirectly related to women in cotton farming, e.g., advising women to focus on organic agriculture because it uses less harmful pesticides. In **Benin**, the Managing Entities have implemented trainings with gender-related content between 2021 and 2023, albeit in varying frequency. For example, one Managing Entity has conducted trainings on "Gender and Child Labour as well as a training called "Farmer Business School" on a regular basis. In contrast, for the other Managing Entity, there is little evidence of regular trainings or workshops. In **Mozambique**,



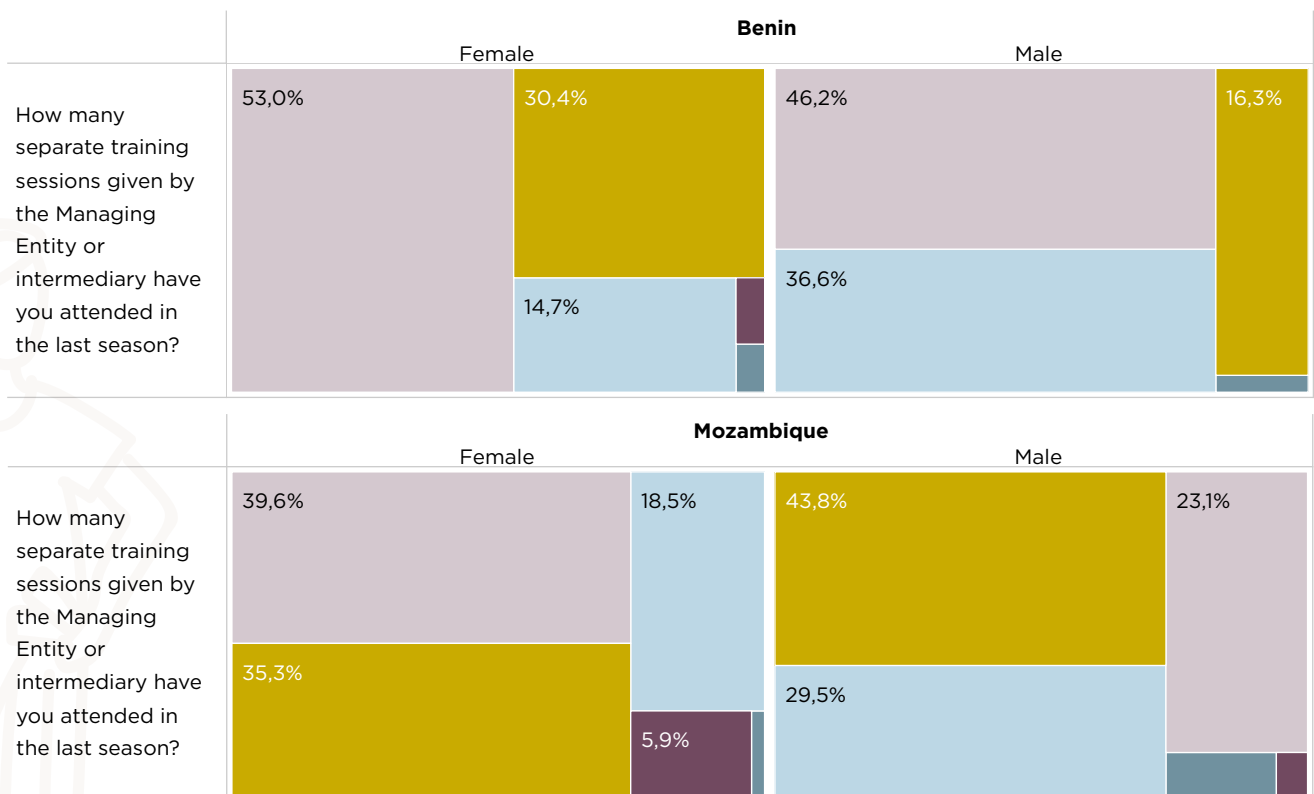
three rounds of trainings on “Gender and Child Labour” were implemented between 2020 and 2023. Further, interview partners mentioned the implementation of trainings on “decent work”, which included gender-related aspects.

Participation in the Trainings

With regards to the **participation in these trainings**, the data shows that trainings in Benin and Mozambique were, for the majority, open to both male and female farmers, with no specific courses only for women. However, in Benin, the attendance lists from 2021 and 2022 of one training format indicate that only female participants attended, which suggests that this was a training targeting specifically women. In 2023, the trainings attendance lists include both men and women.

The survey results further show that almost all responding farmers have participated in at least one training in the last farming season. In Benin, most women (53%) and men (46%) have participated in 4-6 training sessions. However, more men have participated in 7-10 training sessions (37%), than women (15%). Women, in turn, are more likely to have participated in 1-3 training sessions (30%), than men (16%). In Mozambique, a similar picture emerges: Most male farmers have participated in 7-10 trainings (30%) or 1-3 trainings (44%) here. In comparison, most female farmers in Mozambique have participated in 1-3 trainings (35%) or 4-6 trainings (40%) (see Figure 18). In general, most interview partners stated that participation of both men and women is lower during land preparation (due to high workload), and after they have sold the cotton (before the start of the new season). Very few survey respondents stated that they had never participated in a training (see Figure 18). In **Benin**, some interview partners state that in cases where men attend the trainings, they then transfer the knowledge to their wives.

FIGURE 18: NUMBER OF CMIA TRAININGS ATTENDED



- Legend
- 0
 - 1-3
 - 4-6
 - 7-10
 - more than 10

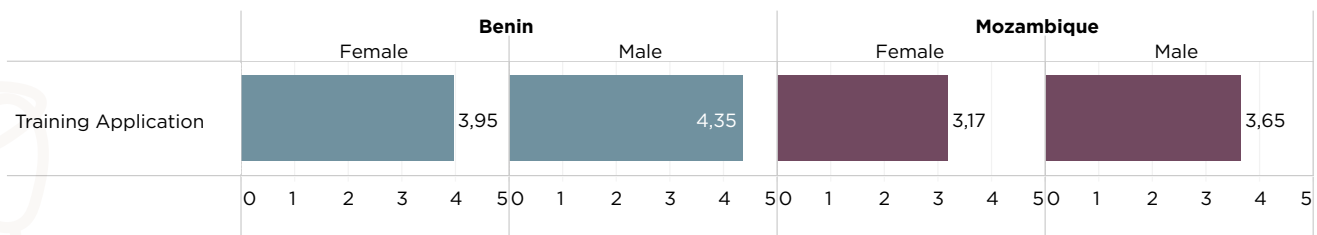


The qualitative interviews also provided insights into **facilitating factors and obstacles to participation in the trainings**, especially for women. One of the most important obstacles is the traditional gender roles in the farming communities, which imply that women are usually in charge of childcare and household work. In turn, this means that women often face challenges balancing their time between field work and domestic tasks. In this context, women often do not have sufficient time to participate in trainings. In addition, there are practical challenges of finding someone to take care of the children, while visiting a training. Besides the traditional norms, the fact that female farmers are often not officially contracted by the Managing Entity poses an obstacle to their training participation. If only the husband is officially registered with the Managing Entity, this means that any official information and communication will be directed towards the man. Hence, interview partners argued that officially contracting the women engaged in cotton farming (i.e., registering the women in the database of the Managing Entity) will increase the chances of their training participation, as the Managing Entity can directly inform them and invite them to the trainings. Against this background, recent efforts of CmiA, together with the Managing Entities, to change attitudes and perceptions of the role of women in farming – for example, through awareness raising during the trainings – are seen as a facilitating factor by many interview partners.

Application of Acquired Knowledge and Skills

Following the participation in the trainings, CmiA expects that the participants will then apply the newly acquired knowledge and skills. In the following section, the results presented are based on the self-assessment of the survey participants. Overall, the survey results show a rather positive picture. Nonetheless, differences between men and women exist, considering the application rates among men are somewhat higher than among women. Across all topics covered in the trainings, female farmers in Benin show an average application of 3,95 (on a scale from 1 to 5, with 5 indicating strong agreement with the application of skills and knowledge). Male farmers, in contrast, show a higher application rate of 4,35 on average. In Mozambique, the differences are not so pronounced, as women have an application rate of 3,17 compared to 3,65, on average, for men (see Figure 19).

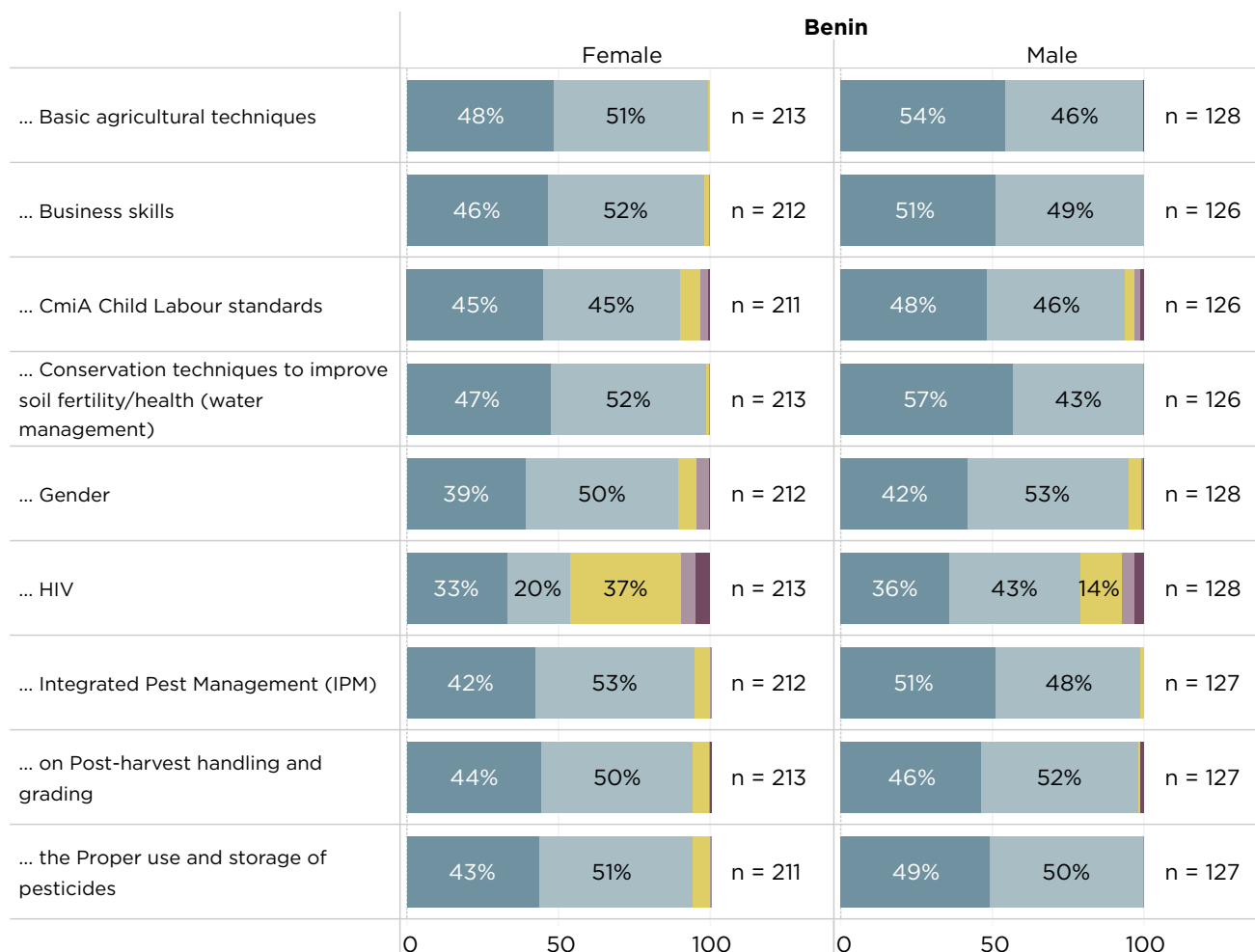
FIGURE 19: TRAINING APPLICATION (INDEX VALUE)



The differences between the different training topics are minimal, as showed in Figure 20 below. The study results indicate that the application rates are similarly strong across the different training topics (e.g., different agricultural techniques), including new knowledge on gender issues.



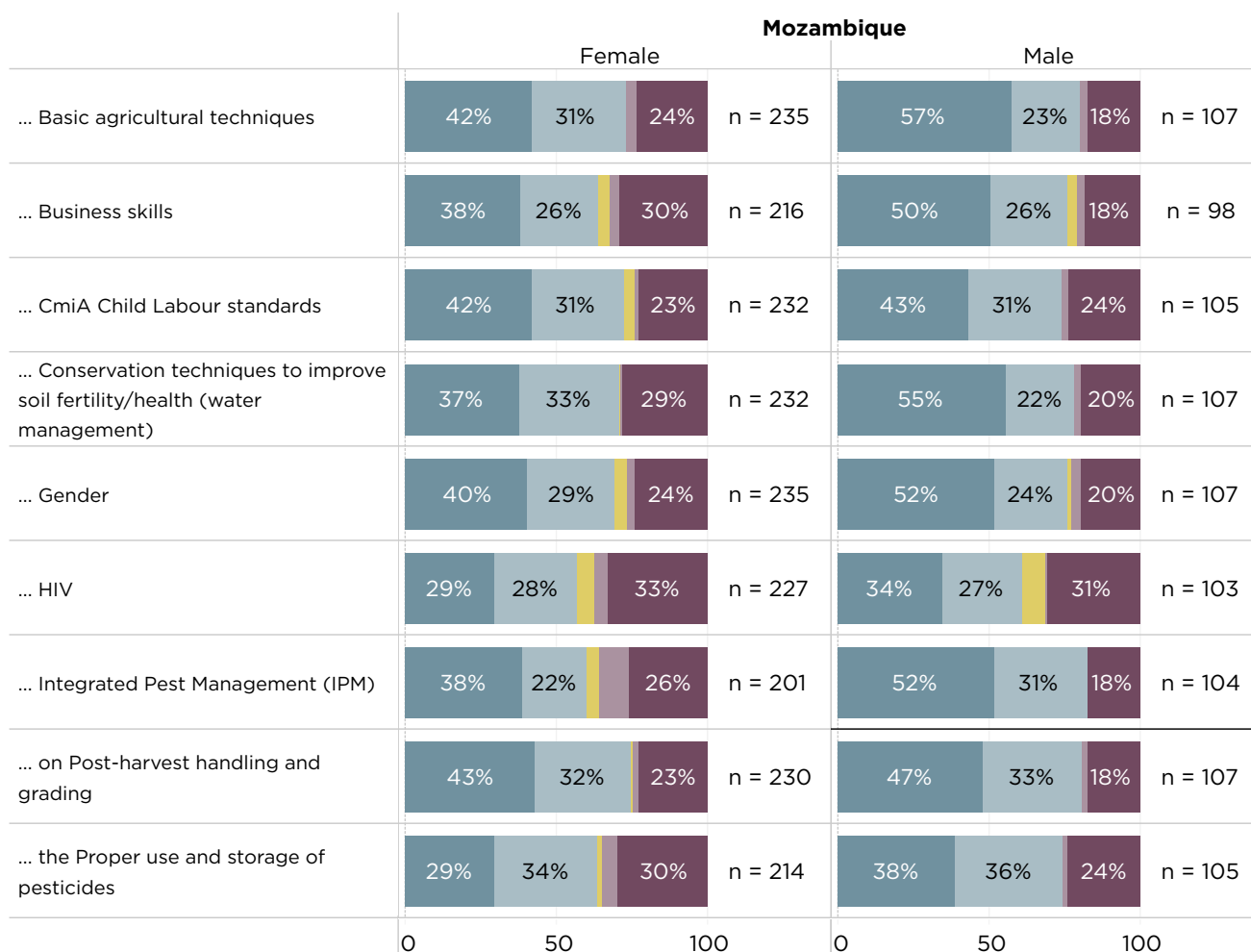
FIGURE 20: APPLICATION OF SKILLS



Legend

- Strongly agree
- Agree
- Neutral
- Disagree
- Strongly disagree





In addition, even for trainings that are perceived to be less used by the survey respondents, the data still confirms the application of the training content, to some extent. For instance, the application of knowledge about HIV appears lower in both Benin and Mozambique, compared to other trainings. Nonetheless, more than half of the responding men and women in both countries confirm that they apply what they have learned on HIV in the trainings. This is a relevant finding, especially in the context of women’s empowerment, as sexual and reproductive health of women is an important factor in strengthening women.

In Benin, the survey results (Figure 21) further show that the application of skills increases with the number of attended trainings. This suggests that the more trainings a person attends, the greater the application of skills. According to the survey data, this holds true up to 10 trainings, since attendance to more than 10 trainings does not seem to further increase the application of skills. The data shows that after 10 trainings, the numbers are similar to those that have participated in 4 to 6 trainings.¹⁶ In Mozambique, the data shows a different trend since the higher the number of trainings attended, the lower the agreement with the extent to which the participants apply the skills acquired. However, considering the low number of respondents that have participated in more than 10 trainings (n=6), the interpretation of this result remains to be further investigated.

¹⁶ However, it needs to be noted that the absolute number of respondents that have participated in 10 trainings and more is considerably low.



FIGURE 21: APPLICATION OF SKILLS IN RELATION TO NUMBER OF ATTENDED TRAININGS



Legend
 ■ Strongly agree
 ■ Agree
 ■ Neutral
 ■ Disagree
 ■ Strongly disagree

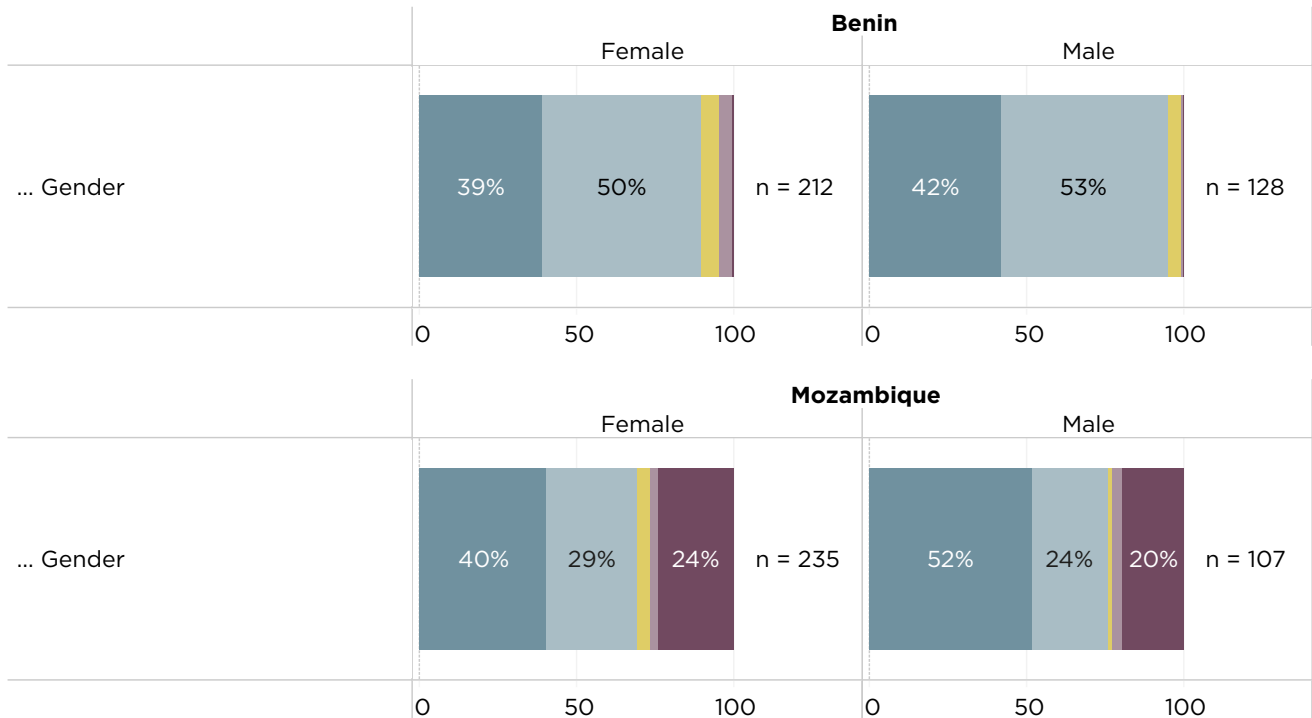
The results from the interviews and focus group discussions confirm the findings from the survey. The interview partners and focus group participants mention a variety of agricultural practices that they have changed as a consequence of the trainings – for instance, practices of soil fertility management, pest management, water management, handling of pesticides, crop rotation, and composting. Overall, most farmers agree that the trainings have helped them to better utilize the potential of their fields. In addition to the purely agricultural techniques, the farmers also mention behavioural changes in business-related aspects of farming. For example, some farmers explain that the training motivated them to participate in a saving program to avoid socio-economic shocks from crop failure or low market prices. Many farmers also confirm that the trainings have helped them to increase their awareness of child labour, discrimination, environmental protection, and health risks (especially for women). In this context, the interviews showed that most farmers are aware of the restrictions that apply to the preparation and application of pesticides (i.e., children and women with young children or pregnant, as well as sick and old people should not be involved in the handling of pesticides).



Awareness Raising & Sensitization on Gender Roles

Apart from transmitting practical knowledge and skills on cotton farming, the trainings also intend to **raise awareness and sensitize the farmers on gender equality and foster women's empowerment**. According to the survey results, the large majority of farmers both in Benin and Mozambique report applying their knowledge on gender issues acquired in the trainings, namely 89% of female and 95% of male farmers in Benin confirm this. In Mozambique, 69% of female and 76% of male farmers confirm the application as well (see Figure 22).

FIGURE 22: TRAINING APPLICATION: I HAVE APPLIED THE SKILLS AND KNOWLEDGE ACQUIRED IN THE TRAINING ON ...



- Legend
- Strongly agree
 - Agree
 - Neutral
 - Disagree
 - Strongly disagree

Despite the positive results in the application of the knowledge acquired in the trainings described above, the level of sensitization regarding gender equality still appears to be greatly influenced by traditional gender norms in the farming communities in both countries. This is illustrated by the survey results, especially in Benin. For example, in Benin, 43% of the women and 33% of the men agree or strongly agree that only women are responsible for care work (taking care of elders and children). In Mozambique, only 12% of the women and 16% of the men hold this opinion. In terms of housework, 67% of female and 58% of male farmers in Benin think that only women should do domestic chores. In contrast, 25% of female and 23% of male farmers in Mozambique agree with this statement. Nonetheless, the large majority in both countries believes that women are entitled to time for themselves on an equal basis (even more in Benin than in Mozambique) (see Figure 23).



FIGURE 23: GENDER ROLES



- Legend
- Strongly agree
 - Agree
 - Neutral
 - Disagree
 - Strongly disagree

Based on the qualitative interviews and focus group discussions, it seems that traditional norms on gender have changed in the past years; however, this process happens very slowly. Interview partners, both in Benin and Mozambique, mentioned, for example, positive progress concerning the workload for women and a more equal understanding of roles within the families. They explained that the role of men has also changed within the families, regarding the division of tasks and decision-making processes. For example, some men now help with tasks like fetching water and childcare, which are traditionally female tasks. It was explained that this is based on a greater awareness of health risks for women (e.g., during pregnancy). Several interview partners also mentioned that there are now more cooperative attitudes towards women, meaning that they are allowed to participate in decision-making processes in the community, and to occupy official positions. In this context, the example of the village of Sinende in **Benin** highlights the changes in gender roles and decision-making processes resulting from women's financial autonomy. Here, entrepreneurial training has empowered women to become farm managers and active contributors to the family income, which was perceived to bring greater value to the



role of women in the household, which is illustrated with more regular joint decisions making; and women equipped with financial autonomy who exhibit greater self-confidence in making choices related to household matters. This shift not only challenges traditional gender norms but also creates a more egalitarian and inclusive environment. With the capacity to invest in education and other activities without relying solely on their husbands, several women report improved family dynamics. For example, children attend school more regularly, learning to read and write, and the community experiences a sense of empowerment and reduced fear of debt, particularly in the context of organic cotton farming.

While these positive examples exist, many interview partners argued that the traditional norms in the communities are still very strong and require a lot of time and effort to be changed towards a more gender-equal society. Some interview partners also indicated that the traditional roles are so internalized and that they are not perceived as something that would require a change. In general, gender-related issues are still very sensitive and there is a lot of caution and avoidance in the communities to touch upon these matters.

Policies and Practices of the Managing Entities

With regards to the **level of sensitization of the Managing Entities and their capacity to foster further advances in gender equality**, the data indicates that they are mostly aware of gender-related challenges and the need for empowering women. Hence, they have taken various measures to encourage women to take a stronger position in farming and the communities as such. According to the interview partners, CmiA was a strong supportive factor in facilitating this, as CmiA sensitized and “pushed” the Managing Entities to take certain measures to pass the verification process, and through regular consultation and exchange opportunities with other Managing Entities.

More concretely, CmiA explicitly intends to contribute to women’s empowerment by supporting the **Managing Entities to implement measures in their policies, practices, and continuous improvement plans to meet the CmiA standard requirements**. It should be noted that the study focuses on farmers at the field level, so the data collection was only done at the field level. However, ginneries are occasionally mentioned in the report when deemed relevant (especially regarding the Managing Entities’ policies). AbTF defines its expected contribution to women empowerment throughout several of its CmiA standard criteria, most significantly in the following:

- **Criterion 5.2:** The Managing Entity implements a policy of non-discrimination and supports disadvantaged groups.
- **Criterion 5.3:** The Managing Entity ensures a respectful working environment without harassment or corporal punishment and with transparent disciplinary measures.
- **Criterion 5.4:** The Managing Entity engages in partnerships and collaborations promoting decent working conditions.
- **Criterion 5.9:** The Managing Entity ensures that all employees and workers enjoy fair conditions of employment with regard to wages and contracts.
- **Criterion 6.2:** The Managing Entity promotes gender equality, empowers women, and raises awareness on gender issues amongst CmiA-contracted farmers, employees, and workers.
- **Criterion 9.1:** The Managing Entity adopts an integrated production and pest management (IPPM) plan.





The data indicates significant advances towards the fulfilment of **criterion 6.2**, which focuses on the promotion of gender equality by Managing Entities, the empowerment of women, and awareness-raising on gender issues amongst CmiA-contracted farmers, employees, and workers. In particular, the documents show that all Managing Entities have adopted a gender policy. However, the data also indicates that the gender policies are not systematically communicated to all relevant stakeholders. The documents show that the gender policies developed by the Managing Entities are not systematically communicated among the farmers in Benin, while it appears that in Mozambique, the existence of a written gender policy is communicated during the trainings at field level.

In addition, the promotion of gender equality is also supported by the appointment of a gender focal point, with specific roles and responsibilities, who reports to the senior management in the Managing Entities. The gender focal person coordinates gender equality issues and women empowerment activities in the cotton company. This person also tries to ensure equal access to the trainings for female and male contracted farmers. The Managing Entities have also further developed procedures, policies and strategies to promote gender equality, such as a procedure for equal access to trainings, and strategies to formalise women groups. Lastly, other measures for women's empowerment, such as the inclusion of gender equality and prevention of child labour in the trainings, as well as equal pay and equal access to trainings are also documented across the other criteria that promote women's empowerment (see paragraphs below).

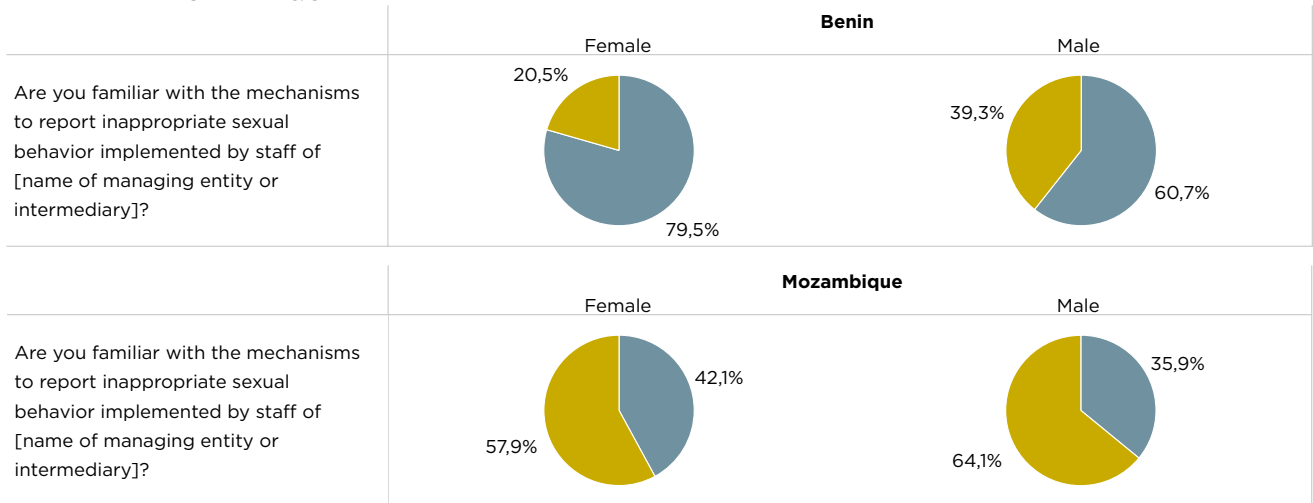
Secondly, according to the documents reviewed, most of the Managing Entities in Benin and Mozambique have **adopted a policy of non-discrimination** in 2023, both at field and ginnery levels. In both countries, the Managing Entities have developed a written non-discrimination policy, which is communicated during trainings at field level but no communication procedure to systematically share it at ginneries or field levels has been documented. In Benin, when no anti-discrimination policy has been developed, the farmers' contracts nonetheless include an anti-discrimination clause, and no discrimination convictions have been reported. To a certain extent, there are indications that efforts are provided by Managing Entities, especially in Mozambique, to identify and support disadvantaged groups. This is the case for the example through the support to formalise women groups in Mozambique and to actively encourage female farmers to put their names in the contract / the farmer database (instead of their husbands), as this makes them the direct recipients of official communication, training offers, and financial transactions.

Thirdly, regarding the **measures to support anti-harassment** (criterion 5.3), the data from the document review and the qualitative interviews show mixed results in Benin since neither of the Managing Entities has adopted a staff policy that includes sexual harassment at the field level, but a policy exists at ginnery level. Nevertheless, the documents demonstrate that there have been **communication** efforts to prevent sexual harassment from both Managing Entities in Benin. In Mozambique, the Managing Entity has adopted a staff policy that clearly prohibits sexual harassment and has communicated to the field level that no sexual harassment is tolerated, and that disciplinary actions can be applied. The extent to which the anti-(sexual) harassment procedures have been effectively communicated to the farmers is shown in the survey results (see Figure 24 below). As such, when asked about their level of familiarity with the mechanism to report inappropriate sexual behaviour conducted by staff of the Managing Entity, the results show that in Benin, the respondents are rather unfamiliar with the mechanisms at their disposal. The level of knowledge of the anti-(sexual) harassment mechanisms is even lower among women since only around 20% of the female participants declare that they are familiar with the mechanisms, compared to about 40% of men. In Mozambique, the results show a different situation, since the participants of the survey seem to be rather aware of the mechanisms. Furthermore, it appears that both men and women have similar levels of familiarity with the mechanisms (around 64% and 58%, respectively).





FIGURE 24: LEVEL OF FAMILIARITY WITH ANTI-HARASSMENT MECHANISMS IN BENIN AND MOZAMBIQUE



Legend
■ No
■ Yes

Fourth, based on the documents reviewed, the study finds that the **Managing Entities have not entirely fulfilled the improvement indicator¹⁷ on outreach efforts for decent work (criterion 5.4)**, which covers the existence of alliances or partnerships established with any relevant organisations promoting decent working conditions. In **Benin**, the documents do not include data on this activity or indicate that indications of alliance or partnership on decent work have not yet been established. The 2022 documents indicate that some supervisors nonetheless raise producers’ awareness of child labour. In **Mozambique**, the documents reviewed do not consistently include data on this activity, similarly as in Benin. There are, however, some indications of participation in alliances (for instance, with the government) and events related to decent work.

Moreover, **efforts have been made for all employees and workers to enjoy fair conditions of employment regarding wages and contracts (criterion 5.9 and 6.2)**. According to the documents, in both countries, equal pay is provided for equal work. In **Benin**, the field-level income is managed by cooperatives. In **Mozambique**, the Managing Entity assesses total remuneration (wages plus in-kind benefits) against an available Living Wage Benchmark, and workers in the ginneries are issued with contracts. It should be noted that the efforts towards the fulfilment of this criterion are only partially documented (i.e., not every year).

Lastly, regarding the **adoption of an integrated production and pest management (IPPM) plan (criterion 9.1)**, the documents reviewed do not report on this criterion for the past three years. However, the interview partners do point out that women are protected from the application of pesticides during the cotton production process, and men are aware of the dangers to the health of women.

Finally, another key mechanism through which CmiA, together with the Managing Entities, intends to contribute to women’s empowerment, is the implementation of **community projects**. These projects are usually co-funded by CmiA, in collaboration with the Managing Entities, and aim to have a positive social effect on the farming communities. They can take different forms and target different focus areas. In the context of this study, the extent to which community

17 The CmiA standard differentiates between core and improvement indicators.



projects targeted the needs of women was examined. Information collected on the scope and impact of these projects was limited, so the analysis rests on the document analysis and some qualitative interviews. Overall, the data remains limited on the concrete effects of these projects on long-term women's empowerment. In **Benin**, projects implemented included for example, the set-up of mills in villages, which reduce the need for labour, and therefore allowing them to attend school. Based on secondary data, it is expected that the saved time for the time-consuming cotton farming labor will enable more girls to attend school.¹⁸ Most qualitative interviews highlight the significant visibility of these projects among the communities and the linkages with women empowerment. In **Mozambique**, the Managing Entity carried out several projects in the areas of education, health, gender, and the environment. For example, the company provided solar lamps to the farmers at subsidized prices, and also at flexible repayment schemes. Further, CmiA co-financed a project for school electrification and the construction of a Primary School in the Cuamba district. Also, local schools and female students are supported to facilitate access of girls to education. In general, the community projects intended to benefit both men and women in the community.

In addition, the qualitative data also underline the significant contribution of the support to Eco-Activists to women empowerment in female cotton farmers in CmiA-supported areas in Mozambique. In 2019, CmiA and the Managing Entity developed a recycling project in Mozambique. This project motivates farmers to collect empty pesticide containers and return them to a collection station for further recycling. These so-called "eco-collection points" are operated by women from local farming communities, the Eco-Activists. The farmers and the women operating the eco-collection points receive a bonus payment for returned containers from the local cotton company. According to interviews, the project was perceived to not only promote environment protection practices but also the promotion of women in leadership positions and the promotion of the diversification of income. Moreover, the qualitative interviews also indicate that the Managing Entity in Mozambique has taken steps to formalise groups of women Eco-Activists as a women group. According to qualitative interviews, this formalisation efforts is also pursued since Eco-Activists are playing a significant role in encouraging other women and creating conditions for women to become more participative and improve their conditions in adhering more to training and accessing farming to access their income. The position of Eco-Activist is also promoted during the trainings conducted by the Managing Entity.

According to qualitative data, the measurement of the results of the community projects is done at the partner level on the activities conducted and results obtained at the output level. This monitoring on the project level is complemented by aggregated impact studies commissioned by CmiA.

In conclusion, according to the documents reviewed and the interview partners, the Managing Entities in both countries have improved their adherence to the standards supporting women's empowerment over the past three years, in particular regarding the adoption of gender policies (criterion 6.2) and non-discrimination practices (criteria 5.2 and 5.9) (such as equal pay, equal access to contracts and opportunities for trainings). In Benin, the data shows a noticeable difference in better adherence to the criteria at the ginnery level compared to the field level. In Mozambique, there are important advances between 2021 and 2023, in particular concerning the identification of disadvantaged groups, such as women, and communication efforts.

¹⁸ UN Women. Think about people first: Empower Rural women, October 2023, Accessible at: <https://africa.unwomen.org/en/stories/op-ed/2023/10/think-about-people-first-empower-rural-women>: Pesticide Action Network UK, Cotton in Benin, West Africa, 2022. Accessible at: <https://www.pan-uk.org/cotton-in-benin/>



2.2.2. Achievement of Outcomes & Assessment of Contribution Hypotheses

The analysis shows that the activities supported by CmiA aiming at the development of capacity women and the application of the acquired skills have largely reached their goals. Through the application of various skills, the women participating in the trainings have reached various results: they have 1) improved their agricultural and production practices to diversify their economy and adopt a more sustainable production system; 2) amplified their voice in decision-making processes related to agricultural processes and over productive resources, in the use of income, and allocation of their time.

Based on the results of the activities and outputs presented above, the study found that in the past years, the **Managing Entities have implemented trainings that address gender aspects** (with few exceptions) (see status of activities/outputs described in chapter 2.2.1). **Training content on gender-related aspects is generally mainstreamed** in different trainings, although a specific training on “Gender and Child Labour” was also conducted in some cases. The data further shows that both women and men participate in these trainings. Almost all responding farmers have participated in at least one training in the last farming season, but men, on average, participate in more training sessions than women. Moreover, the data also indicates that the **farmers perceive to apply the knowledge and newly acquired skills from the trainings**, according to the self-assessment of farmers, to a large extent (see 2.2.1). However, the application rates among men are somewhat higher than among women (the differences are more pronounced in Benin). The results suggest that the application rates are similarly strong across the different training topics (e.g., different agricultural techniques), including new knowledge on gender issues. The only exception in this regard is knowledge of HIV, which has a particular relevance for female health. Here, fewer men and women confirm to apply what they have learned in the trainings.

In turn, the qualitative interviews highlighted the perception that **women who have acquired new skills in agricultural and entrepreneurial practices have been able to develop new financial streams of income**. Once the acquired skills are applied, the **households often have more sources of revenue available to them** (e.g., through a diversification of crops or other sources of income). Both in Benin and Mozambique, the interviews highlight that newly acquired skills for women are a driver for greater financial means. Furthermore, according to the data, women benefit from gaining agricultural knowledge, as they can apply certain skills not only to cotton growing but also to other crops. For instance, in Benin, female cotton farmers who are also engaged in shea butter production and soya cheese have experienced a diversification of income sources. The ability to cultivate crops beyond traditional practices, often not only results in improved yields but also in a more resilient and sustainable financial portfolio for women, according to several interview partners. The interview partners also state that women who participated in trainings make better use of their potential as farmers than those who have not participated, or who have only indirectly acquired knowledge from their husbands. The qualitative interviews in Benin and Mozambique confirm this trend by underlying that the new financial streams of income acquired by the women allow them to contribute to the household income, but also to gain a certain financial independence.

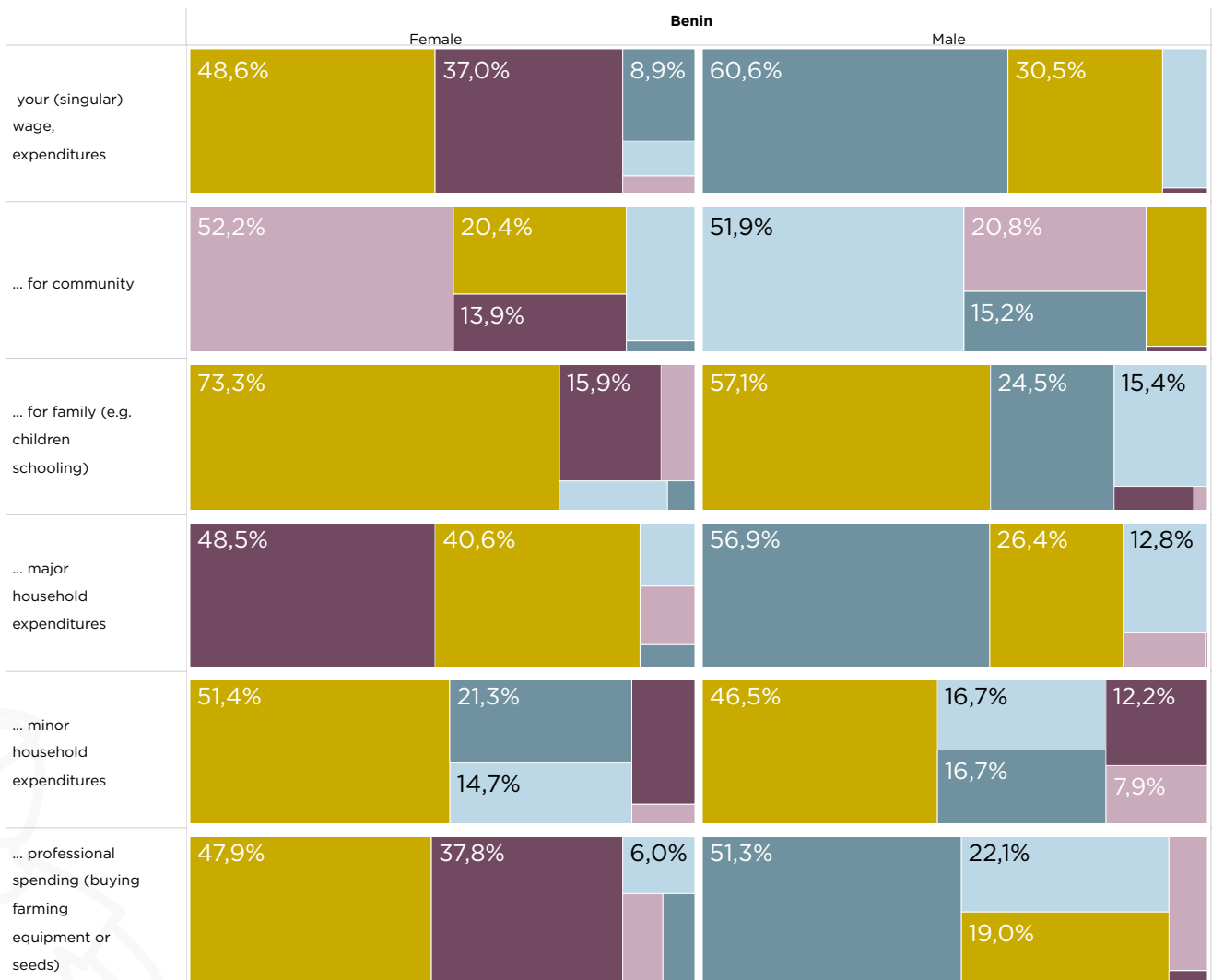
Moreover, proceeding from these results, the data reveals that **as women’s skills increase, so does their contribution to decision-making power within households**. The results from the study show that through their **increased financial contributions to household expenses, women are often regarded as valuable partners in decision-making processes**. The financial autonomy gained through trainings appears to positively influence the family dynamics towards the empowerment of women. For example, the fact that women decide to send children to school or invest in their activities without their husbands seems indicative of a newfound self-reliance.



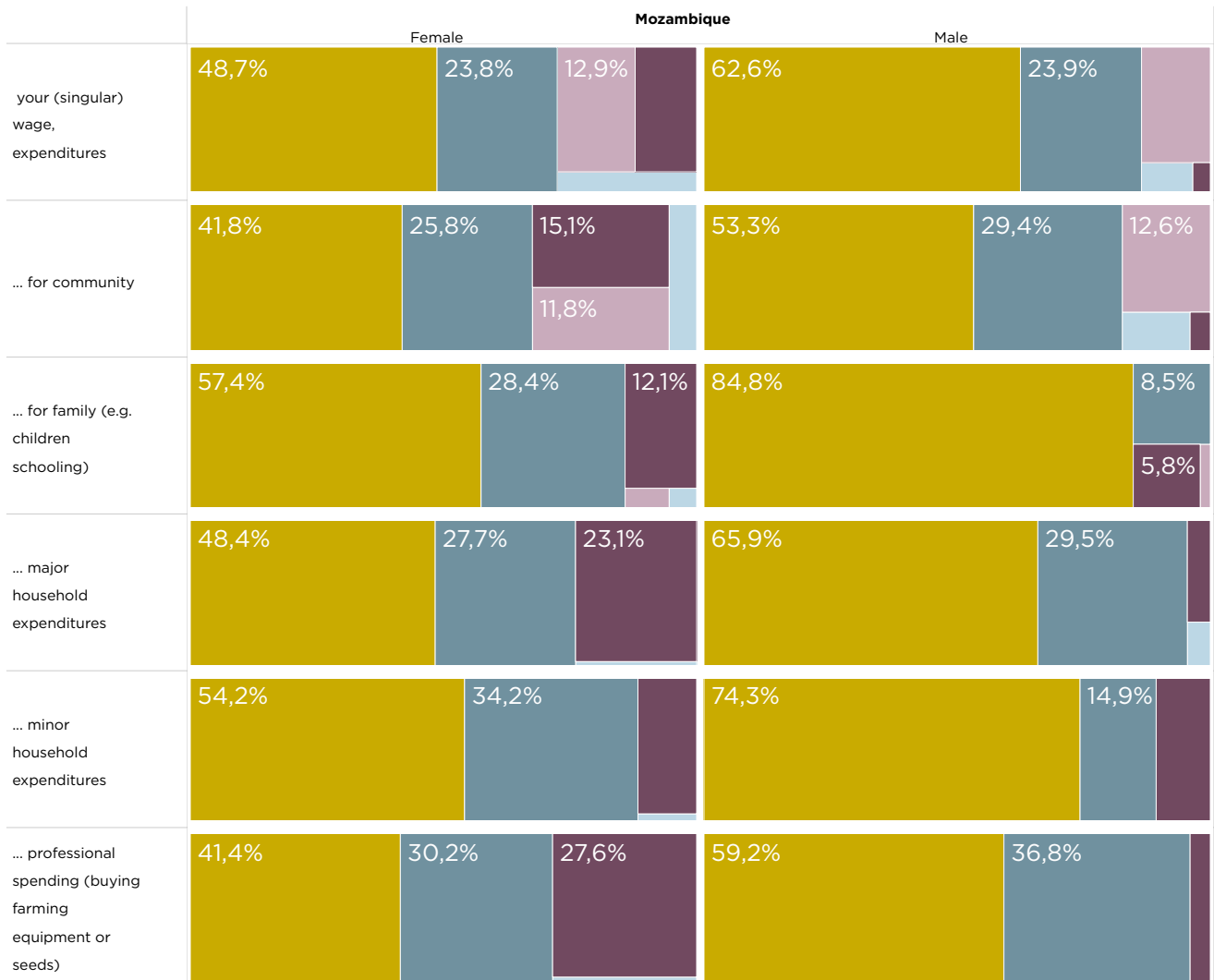
The following paragraphs highlight the greater involvement of women in decision-making over four dimensions, mutually reinforcing each other.

Firstly, the survey data shows that **women have the greatest sole decision-making power over income when it concerns minor household expenditure** (21% in Benin and 34% in Mozambique) and their personal wage or expenditure (8% in Benin and 24% in Mozambique). There is a noticeable difference between countries, with female respondents in Mozambique reporting a higher proportion of sole decision-making over the use of income in all categories compared to Benin.

FIGURE 25: CONTROL OVER THE USE OF INCOME



- Legend
- Partner/Spouse
 - Self
 - Self and partner/spouse jointly
 - Other people inside or outside the household
 - Self and other people inside or outside the household

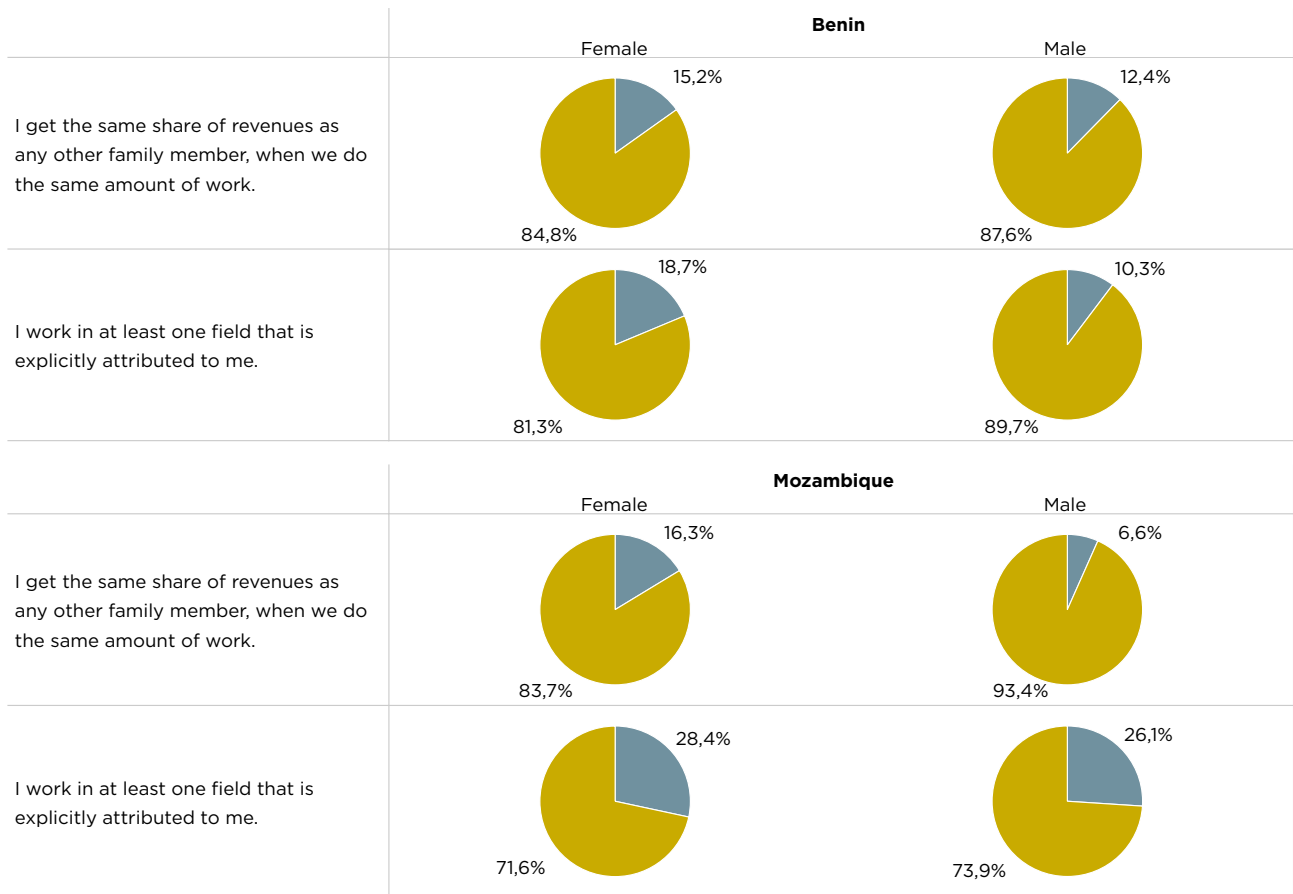


- Legend
- Partner/Spouse
 - Self
 - Self and partner/spouse jointly
 - Other people inside or outside the household
 - Self and other people inside or outside the household

Secondly, the data indicates that the majority of **women gain some social and financial recognition for their work as cotton farmers**. The survey provides more concrete insights in this regard. According to the survey results, the majority of women work in fields that are explicitly attributed to them (around 81% in Benin, and 72% in Mozambique). Further, the large majority of female farmers in Benin (approx. 85%) and in Mozambique (approx. 84%) confirm that they get the same share of revenue as any other family member when they do the same amount of work. The numbers for male farmers are only slightly higher regarding these two aspects (see Figure 26). Larger gender-based differences exist when it comes to the payment process as such: In Benin, approx. 69% of women indicate that they receive their income personally on a regular basis, compared to 99% of men. The remaining 31% of women state that another member of the family usually receives the revenue for the farming work (mostly their husband), which suggests a lack of financial recognition for the women’s work, for this group. In Mozambique, the differences are less pronounced. Here, approx. 66% of women (compared to around 74% of men) state that they personally receive the payment. Another 17% of the women state that only another family member usually receives the payment for the cotton farming work (as compared to 5% of the men) (see Figure 27).



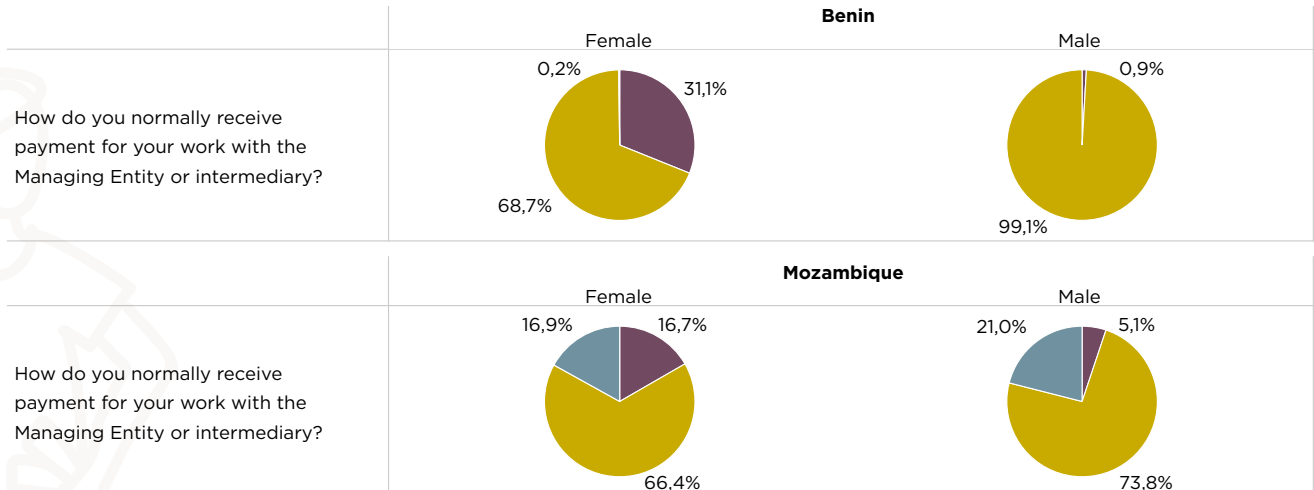
FIGURE 26: INVOLVEMENT IN COTTON FARMING



Legend

- No
- Yes

FIGURE 27: PAYMENT PROCESS



Legend

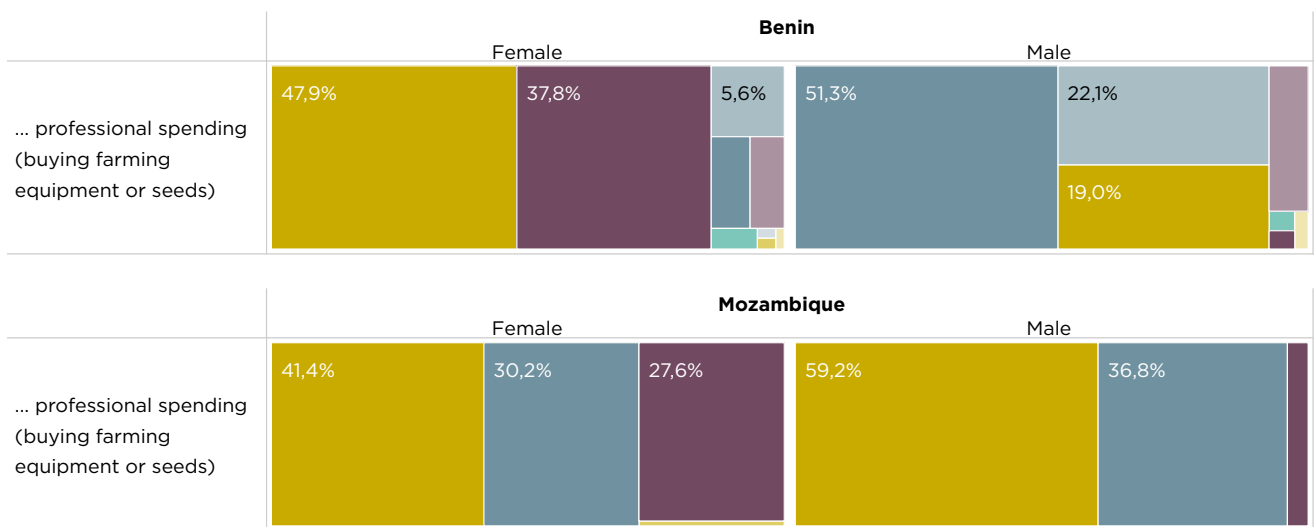
- (a) A member of my family usually receives my income and is responsible for income management in the household.
- (b) I receive my income personally on a regular basis.
- Both (a) & (b)

Tied to the question of social and financial recognition is also the question of who possesses a contract with the Managing Entity. As explained before, in Chapter 2.1.1, the quantitative data indicates no major difference between male and female cotton farmers regarding the possession of a contract. However, interview partners both in Benin and Mozambique point to gendered differences, stating that male farmers hold official contracts more often than female farmers.



Thirdly, in addition to greater decision-making power over the use of income and their role in cotton farming, the survey results confirm that women also have decision-making **influence across agricultural production activities** in both countries. Agricultural production decisions not only cover the purchasing of items relevant to farming but also decisions about the types of crops to grow for agricultural production, how to organise the sale, and whether to engage in livestock raising. According to the survey data, most women agree or very much agree that they have an influence on decision-making across these activities (see Figure 9, Figure 10, Figure 11, and Figure 12 in section 2.1). The results show that women make decisions jointly with their husbands, however, the survey results further show that the decisions regarding the acquisition of **agricultural equipment** are still largely taken by men (Figure 28 below).

FIGURE 28: DECISION-MAKING OVER PROFESSIONAL SPENDING



Legend

- Partner/Spouse
- Partner/Spouse and other household member(s)
- Self
- Self and other household member(s)
- Self and other outside people
- Self and partner/spouse jointly
- Self, partner/spouse and other outside people
- Someone (or group of people) outside the household
- Other household member

Thirdly, regarding the **decision-making power over productive resources**, there are indications that decisions are increasingly taken jointly within the households, while the sole decision-making in shared households remains mostly exercised by men, across different thematic fields – that is deciding about borrowing money, its use, as well as purchasing activities. The survey data from **Mozambique** also indicates that most decisions across the above-mentioned fields are taken jointly instead of men making the decision alone. This means that women do not make decisions on their own but do have a role in making decisions jointly, as promoted by CmiA and the Managing Entities. A similar result was found for **Benin**, where women mostly take part in the decision-making of almost all activities. However, the data shows lower rates of decision-making on livestock raising – 16 % of women state that they either have input in few decisions or no input at all in this matter – one explanation might be that socio-cultural norms, as mentioned above, may also play a role in this context.



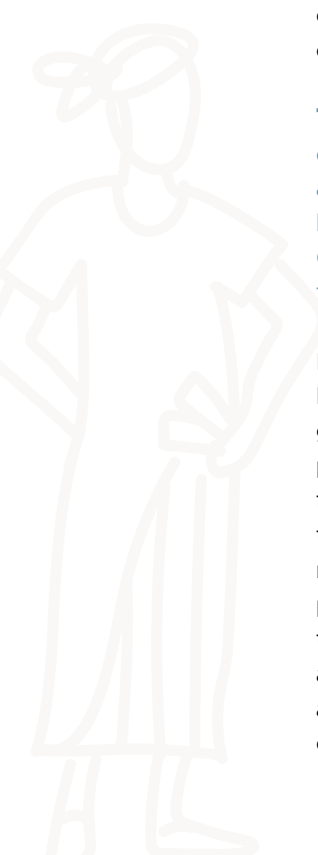
Lastly, with regards to the **decision-making power of women on the allocation of their time**, the data shows that their distribution of time at the farm has changed following participation in the CmiA-supported trainings. The results are more positive in Benin than in Mozambique. Hence, it seems plausible that the trainings have a positive effect on women's ability to decide how they want to divide their time between domestic, productive, and leisure activities.

The qualitative data further indicates that the **Managing Entities are taking several measures to encourage and support female farmers**, which facilitates their social and financial recognition. For example, Managing Entities actively encourage female farmers to put their names in the contract/the farmer database (instead of their husbands), as this makes them the direct recipients of official communication, training offers, and financial transactions. For two Managing Entities, there is an increase in the number of female facilitators and extension agents. In addition, some Managing Entities also support the creation of women cooperatives and their activities to some extent (albeit this cannot be confirmed for all Managing Entities). The presence of gender officers at the Managing Entities further aims to encourage female participation in decision-making processes, other income-generating activities, and capacity strengthening. In addition, the qualitative data indicates that the application of policies in line with CmiA standards also supports the intended goal to increase the level of women's influence on agricultural decisions. As presented in Chapter 2.2.1, the **Managing Entities in both countries have increased their engagement in supporting women's empowerment over the past three years**, in particular regarding the adoption of gender policies (criterion 6.2) and non-discrimination practices (criteria 5.2 and 5.9). Compliance with the criterion promotes the widespread mainstreaming of gender equality principles and provides the potential for the upscaling of efforts of the Managing Entities towards the promotion of gender equality. An interview partner observed, in fact, that: "Without CmiA, SAN-JFS could not have done that in such a short time. CmiA provided procedures to follow, periodic visits to the regions, and access to a network. Hence, CmiA's support really increased the motivation and initiative at SAN-JFS to fulfil the criteria (Stakeholder, Mozambique)."

To conclude, the data shows that the activities supported by CmiA have contributed to noticeable results for the empowerment of female cotton farmers, although they cannot yet be generalized to the entire group of women farmers in the supported areas in Benin and Mozambique. More specifically, the contributions of CmiA to the results were framed by four contribution hypotheses, selected during the first phase of this study. The conclusions on each of the four hypotheses are based on the results presented in the previous sections.

The first hypothesis states that: If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings with gender mainstreaming aspects, in which both men and women participate. In turn, if women and men apply the knowledge acquired through the training, and Managing Entities apply policies in line with CmiA standards, women have gained social and financial recognition for their labour in cotton farming.

In general, the results from the interviews and focus group discussions indicate that the Managing Entities aim at ensuring equal access for male and female CmiA contracted farmers to cotton growing contracts, inputs, and input pre-finance. According to the interview partners, CmiA plays a crucial role in motivating and stimulating the Managing Entities to take active measures to increase female farmers' social and financial recognition, as the fulfilment of the criteria of the CmiA standard presents a strong incentive for the Managing Entities. Nonetheless, cultural norms and traditions still pose an obstacle to women taking more prominent roles in the farming process (e.g., as lead farmers), as explained before. Regarding the connection between the trainings and additional measures of the Managing Entities (as part of the standards system), it appears plausible that the application of new skills and knowledge (e.g., entrepreneurial skills, awareness of gender roles) improves women's social and financial recognition in the farming communities. The improved skills and knowledge are linked to a diversification of women's





income (better entrepreneurial skills) and an increased awareness of women's rights and needs. This, in turn, plays a role in changing the household power dynamics and improving women's financial autonomy. While these links seem plausible, the study results do not provide enough robust evidence that this mechanism functions effectively and systematically. **Hence, the first contribution hypothesis is partially confirmed.**

The second contribution hypothesis states: If CmiA manages the yearly implementation of the verification process, then the Managing Entities implement measures in their policies, practices and continuous improvement plans to meet the criteria of the CmiA standard. Furthermore, if participants in trainings apply their new knowledge and awareness on gender-related issues into their household dynamics, and if there is an increase in the number of women with official contracts, then women in cotton farming households have greater control over the use of income for decent standards of living.

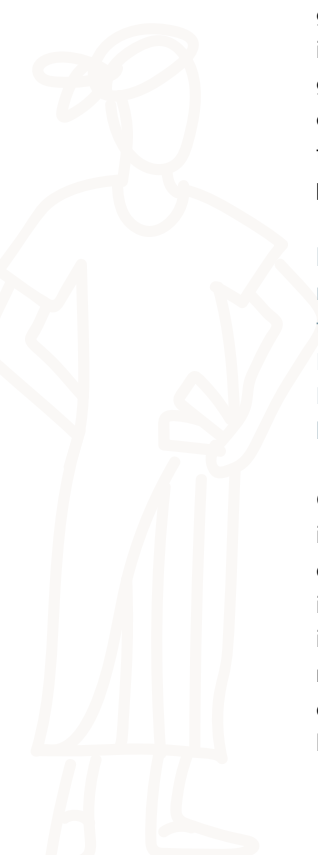
In general, the results of the study show that the newly acquired skills of the training participants have contributed, in some cases, to the diversification of income of female cotton farmers. In parallel, the promotion of gender equality standards by the Managing Entities is perceived to improve the influence of women on the use of income in their households. In this context, the study results demonstrate that, overall, women perceive that they have a say in the decisions on the use of income in both countries, although to a lesser extent than men. In Benin, the results show that most women are involved in some of the decisions but not all of them (mostly regarding other crops than cotton and non-farm-related activities), whereas the results in **Mozambique** show that women are involved in most or all decisions (mostly regarding food crop farming and cotton as a cash crop). Therefore, **the second contribution hypothesis is partially confirmed.**

The third contribution hypothesis is: If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings that include gender-related aspects, in which both men and women participate. In turn, if women and men apply the knowledge acquired through the trainings, then the decision-making power on time dedicated to domestic, productive and leisure is increasingly shared between men and women.

The data indicates that the social and financial recognition that the female cotton farmers have gained has prompted some women to expand their decision-making power in the household, including on the topic of time allocation. Although the data clearly highlights that traditional gender roles remain a deciding factor in time allocation, some signs of change are observed concerning the positive effect of trainings on women's ability to decide how they want to divide their time between domestic, productive, and leisure activities. **Overall, hypothesis 3 can be partially confirmed.**

Finally, the fourth contribution hypothesis states: If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings that include gender-related aspects, in which both men and women participate. In turn, if women and men apply the knowledge acquired through the trainings, and Managing Entities apply policies in line with CmiA criteria, then women in cotton farming households have greater influence on agricultural production decisions in their household.

Overall, the study reveals a development in decision-making dynamics among women engaged in cotton farming, with the trend towards joint decision-making on agricultural production decisions. Qualitative insights emphasize the pivotal role of CmiA-supported activities in influencing these changes. Notably, the acquisition of new skills and the generation of additional income within households contribute to an increased influence of women in agricultural decision-making processes. However, while men and women increasingly make decisions together, the qualitative interviews highlight that the traditional values still pose constraints on systemic and large-scale transformation. **Hence, hypothesis 4 can be partially confirmed.**





Lastly, as part of the scope of this study, the team also assessed the plausibility that **other factors might be able to explain the results** presented above, beyond the support of CmiA. For this purpose, the research team and CmiA jointly selected four alternative hypotheses that could plausibly shed light on other mechanisms that could explain the results explained above. The conclusions on each of the four alternative hypotheses are summarized below:

Concerning other explanations for women’s social and financial recognition of their labour in cotton farming, the team explored the following first alternative hypothesis. It states that if local actors provide their knowledge and awareness on gender norms, then social norms change. In turn, women have gained social and financial recognition for their labour in cotton farming.

In this regard, interview partners explain that social norms (culture, traditions) regarding the role of women are slowly changing in both Benin and Mozambique. In this development, not only the trainings of Managing Entities, partially funded by CmiA, play a role, but also education in schools, awareness campaigns through media, and public discourse. For example, in Benin, interview partners explained that most of the farmers take part in various cotton-growing training sessions. NGOs, agricultural sector projects, and the ATDA (Agence Territoriale de Développement Agricole) organize such training sessions. However, further evidence of other specific programmes, organisations, or actors that currently provide knowledge and awareness on gender norms in the selected farmer communities is missing. As such, the alternative hypothesis can be **partially confirmed** at this point but would need further investigation to make a final assessment.

With regards to the second alternative hypothesis, it states: If CmiA supports with trainings, materials, and consultations on gender-related topics, then Managing Entities conduct trainings that include gender-related aspects, in which both men and women participate. In turn, women and men apply the knowledge acquired on the diversification of local economies, then women in cotton farming households have greater control over the use of income for decent standards of living.

As explained in contribution hypothesis 2 (control over the use of income) above, the mechanism referred to in the alternative hypothesis, can also be **partially confirmed**. As such, there are some indications that some women have diversified their financial income and, in turn, received greater financial recognition. This is explained by the fact that their increased financial contributions to household expenses lead women to be regarded as valuable partners in decision-making processes. To some extent, the data shows that for some women, greater consideration has led to greater control over the use of income in the household. However, these findings are not yet observed systematically for all female cotton farmers supported by CmiA.

The third alternative hypothesis is: If the Managing Entities support women groups with know-how and resources, then the groups become multipliers and contribute to greater awareness regarding gender equality in the general environment of the cotton farming supported by CmiA. In turn, the decision-making power on time dedicated to domestic, productive and leisure is increasingly shared between men and women.

As presented in 2.2.1 on the assessment of the CmiA standard requirements, the data indicates that the support to women groups by the Managing Entities has not systematically taken place, either due to the non-existence of women groups or their limited involvement in the agricultural processes. **Hence, this alternative hypothesis cannot be confirmed.**





The fourth alternative hypothesis is: If women participate in supporting activities of the Managing Entities supported by CmiA, and if training participants apply their new knowledge and awareness on gender-related issues into their household dynamics, and if women have access to land, then women in cotton farming households have greater influence on agricultural production decisions in their household.

As presented in contribution hypothesis 4 above, the study reveals a certain shift towards joint decision-making in cotton farming. According to the qualitative data, this development was influenced by CmiA-supported activities, i.e., by empowering women through new skills. These factors plausibly contribute to an increased influence of women in agricultural decision-making processes, therefore confirming the first part of the contribution hypothesis. In addition, the study assessed whether the ownership of agricultural land also contributes to women influencing the decision-making over agricultural decisions in the households. According to the results of the study, it seems plausible that the greater the ownership of land by women, the larger their decision-making power over agricultural decisions. Both in Benin and in Mozambique, the survey shows that women landowners make decisions alone on more agricultural decisions than when they are not landowners, most notably on farming inputs and livestock raising. In **Benin**, some of the decisions do not appear to be correlated with land ownership since women are included in joint decisions with or without land ownership by the women, for instance, for decisions on Integrated Pest and Production Management or use and storage of pesticides and taking crops to markets and selling the crops. In **Mozambique**, the proportion of women who make all agricultural decisions alone varies between 72 and 87% when they are the landowners; whereas in **Benin**, the proportions are lower across all items since they range between 9 and 68% for women landowners. Nevertheless, these results are limited, and as explained in chapters 2.1.4 and 2.2.1, traditional values still constrain a broader transformation. In particular, the qualitative interviews still indicate that if prioritizing is necessary, priority is given to the husband's lot. **Therefore, this hypothesis can be partially confirmed.**

2.3 OTHER RESULTS AT OUTCOME AND IMPACT LEVEL

Beyond the outcomes examined through the contribution analysis above, this chapter deals with further results on the outcome and impact level.

2.3.1 Achievement of other Outcomes: Strengthening of a Protective Working Environment for Female Cotton Farmers

The assessment of women's experiences in cotton farming reveals a nuanced picture of their working conditions. Overall, the data from the survey and document analysis suggest a generally satisfactory level of appreciation among women regarding their productive environment. However, a deeper dive into the qualitative data indicates challenges with regards to equal income and equal opportunities. The following paragraphs delve into different aspects of the results observed in the data, ranging from results at the Managing Entity level (institutional) to results at the farmers level (operational).

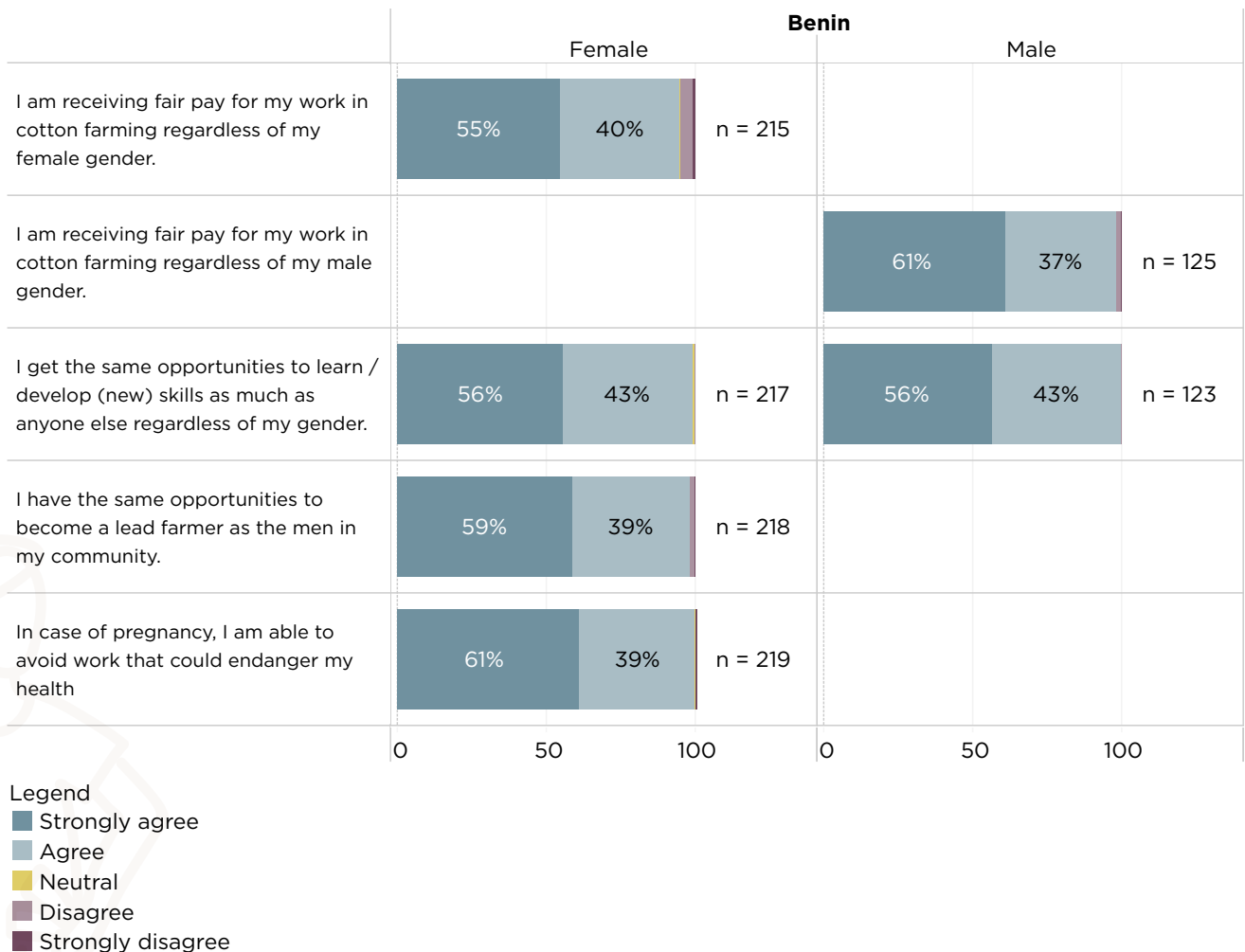
First, one of the pre-conditions for female cotton farmers to benefit from a protective working environment is to guarantee they work under conditions that respect their needs and do not discriminate against them based on their gender. As described in section 2.2.1, the **Managing Entities in both countries have made significant advances towards establishing anti-discrimination policies.** According to the documents reviewed, the Managing Entities have adopted, in 2023, policies of non-discrimination at the field level. Based on the documents, the policies have a particular focus on equal pay, equal access to contracts, and opportunities for trainings. This is also supported by the qualitative data, as there is no perception of gendered

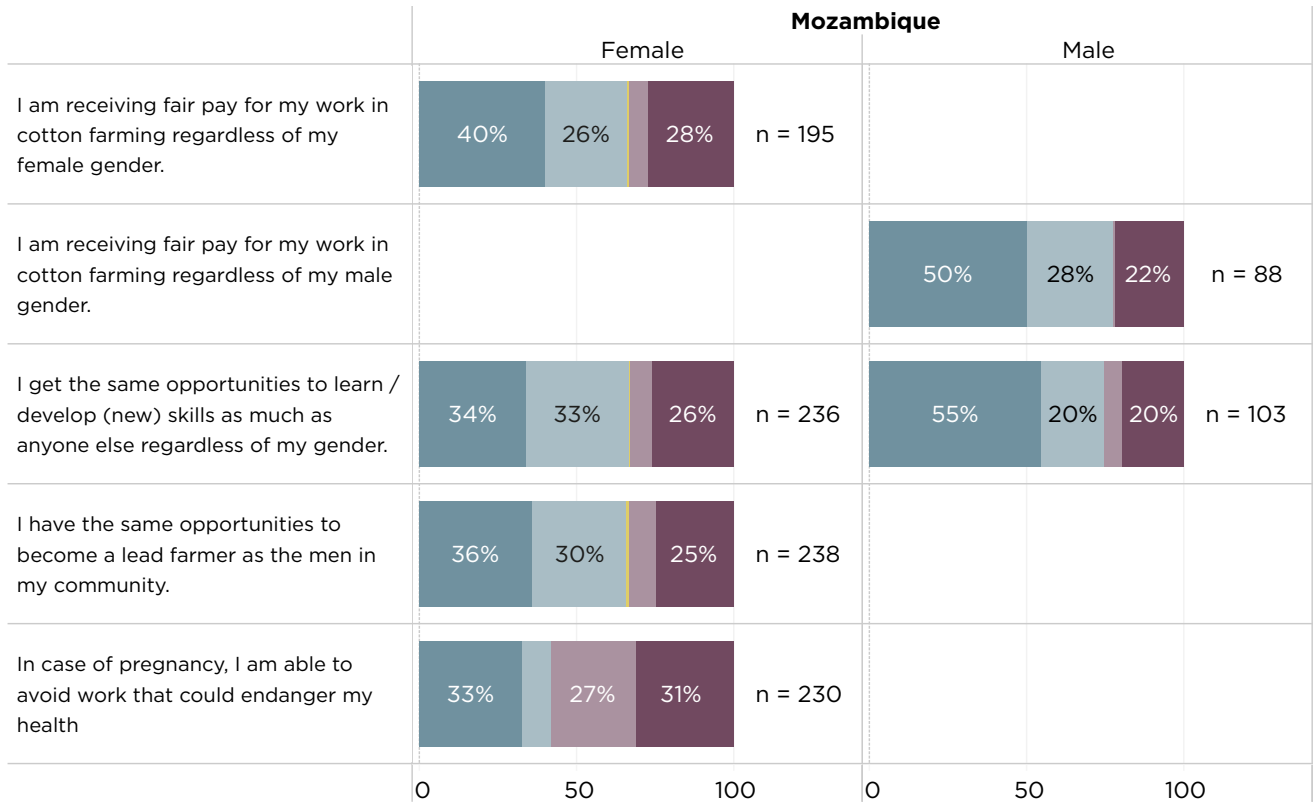


discriminatory practices by the Managing Entities (albeit there is generally a higher perception of gender-based discrimination among female farmers than among male farmers, according to the survey results presented in chapter 2.1). Also, the data reveals that the communication of these policies down to the field is not yet systematically achieved in either of the two countries. This also aligns with the low level of familiarity of the survey respondents with these policies (see section 2.2.1, pp 52 - 53).

The study also examined the extent to which female cotton farmers are satisfied with these policies and how the Managing Entities prioritize policy decisions. The study finds that overall, **women’s experiences, in terms of opportunities and economic empowerment, are positive.** One interview partner from **Benin** explained that women are just as responsible as men for their cotton heaps and do not experience any discriminatory treatment by the Managing Entities (albeit there is generally a higher perception of gender-based discrimination among women, according to the results of the farmer survey in chapter 2.1). In both countries, **respondents are most satisfied with equal opportunities to develop their skills** (see Figure 29).

FIGURE 29: SATISFACTION CONCERNING WORKING CONDITIONS





Legend
 ■ Strongly agree
 ■ Agree
 ■ Neutral
 ■ Disagree
 ■ Strongly disagree

In **both countries**, the highest level of satisfaction is expressed for the statement: “I have the same opportunities to develop skills” and “I have the same opportunities to become a lead farmer”.

Concerning **equal access to trainings**, the data indicates that this topic has also benefited from a certain level of prioritization by the Managing Entities. This also corresponds with the results presented in previous sections of the report, which underline that men and women both participate in trainings and state that they have equal access to them (see section 2.2.1). This is also the item that received the highest level of satisfaction from the survey respondents, both men and women (see Figure 29 above). It can therefore be concluded that **female cotton farmers mostly benefit from an environment that does not discriminate against them in their access to skills development**.

The promotion of **equal pay for field workers, regardless of their gender**, was identified as a priority both through the revision of the policy documents and the qualitative interviews. The study also finds that there is generally no discrimination against women from the Managing Entities concerning their payment for cotton farming, as women and men are usually paid the same for the same labour, as presented in section 2.1.1. This aligns with the survey data presented in Figure 29 above (95% of female respondents in Benin and 66% in Mozambique agree with the statement “I receive fair pay for my work in cotton farming”). The survey data hence showcases women’s overall satisfaction with equal and fair pay.

It can therefore be concluded that because of the priorities identified in the non-discrimination policies of the Managing Entities, equal access of women to learning opportunities and equal pay is granted.

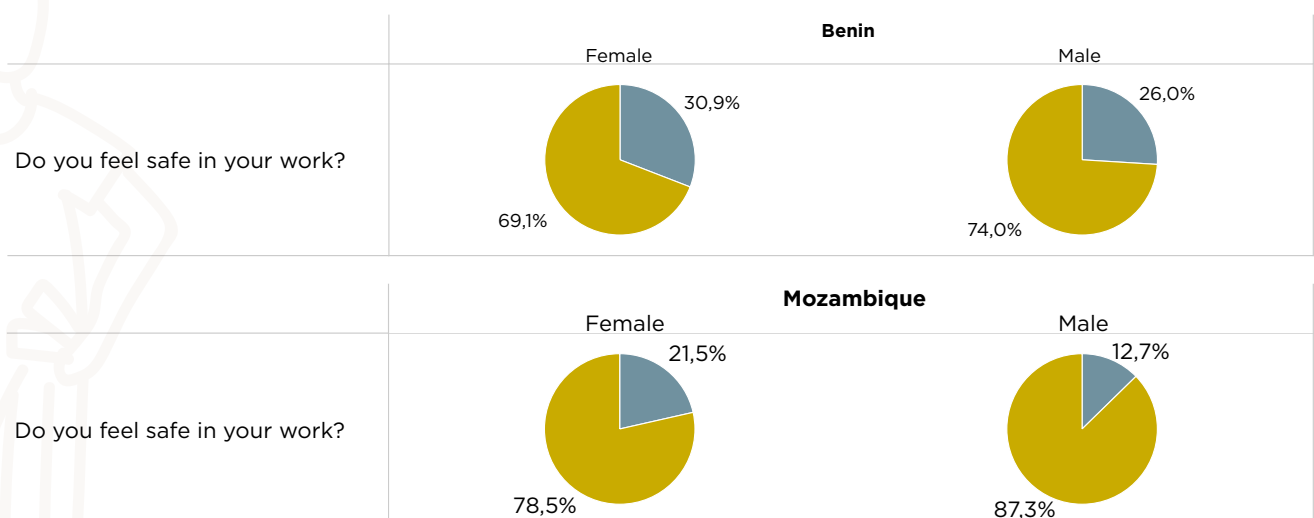


In the same vein, the study also finds that **respect for psychological and physical safety of women is correlated with a safe working environment**. Regarding the measures to support anti-harassment (see 2.2 above, criterion 5.3), the data from the document review and the qualitative interviews show mixed results in **Benin**, since neither of the Managing Entities or intermediaries have adopted a staff policy that clearly prohibits sexual harassment at field level. Nevertheless, the documents demonstrate that efforts have been made by both Managing Entities in Benin to at least communicate the goal of preventing sexual harassment. In **Mozambique**, the Managing Entity has adopted a staff policy that clearly prohibits sexual harassment and has communicated to the field level that no sexual harassment is tolerated and that disciplinary actions can be applied.

Despite the efforts provided by the Managing Entities to communicate their institutional policies, the **level of familiarity with the mechanisms is low in both countries**. In **Benin**, most of the survey respondents, especially women, are not familiar with mechanisms to report inappropriate sexual behavior (20% of women, compared to 40% of men state knowing about them). This result is also aligned with the qualitative insights presented in the paragraphs above, according to which there is a perceived gap between policy and practice. In contrast, in **Mozambique**, a little more than half of the respondents are familiar with the mechanisms (58% of women and 64% of men, see Figure 24 in section 2.2.1).

Despite the lack of knowledge of the mechanisms, **the majority of survey respondents indicate that they feel quite safe at work**. With regards to the perception of safety in relation with the Managing Entities, most female farmers think that the Managing Entities would react and help them if their safety was at risk due to their gender. Figure 30 indicates that the majority of farmers in both countries feel safe at work, with a small difference between Benin and Mozambique (around 70% agreement in **Benin** across men and women, and 83% across men and women in **Mozambique**). The numbers also demonstrate a slight difference between men and women, as women, on average, feel less safe than men. Nonetheless, there is a noteworthy proportion of women who do not feel safe at work (31% of women in Benin and 21% of women in Mozambique). Notably, women in **Benin** report feeling slightly less safe than men, particularly in cases where there is less prevalence of mechanisms for safety, which is linked to the findings from the document analysis. As such, the survey data on the safety perception of women in cotton farming offers a mixed picture of protection from physical and psychological violence.

FIGURE 30: PERCEPTION OF SAFETY AT WORK

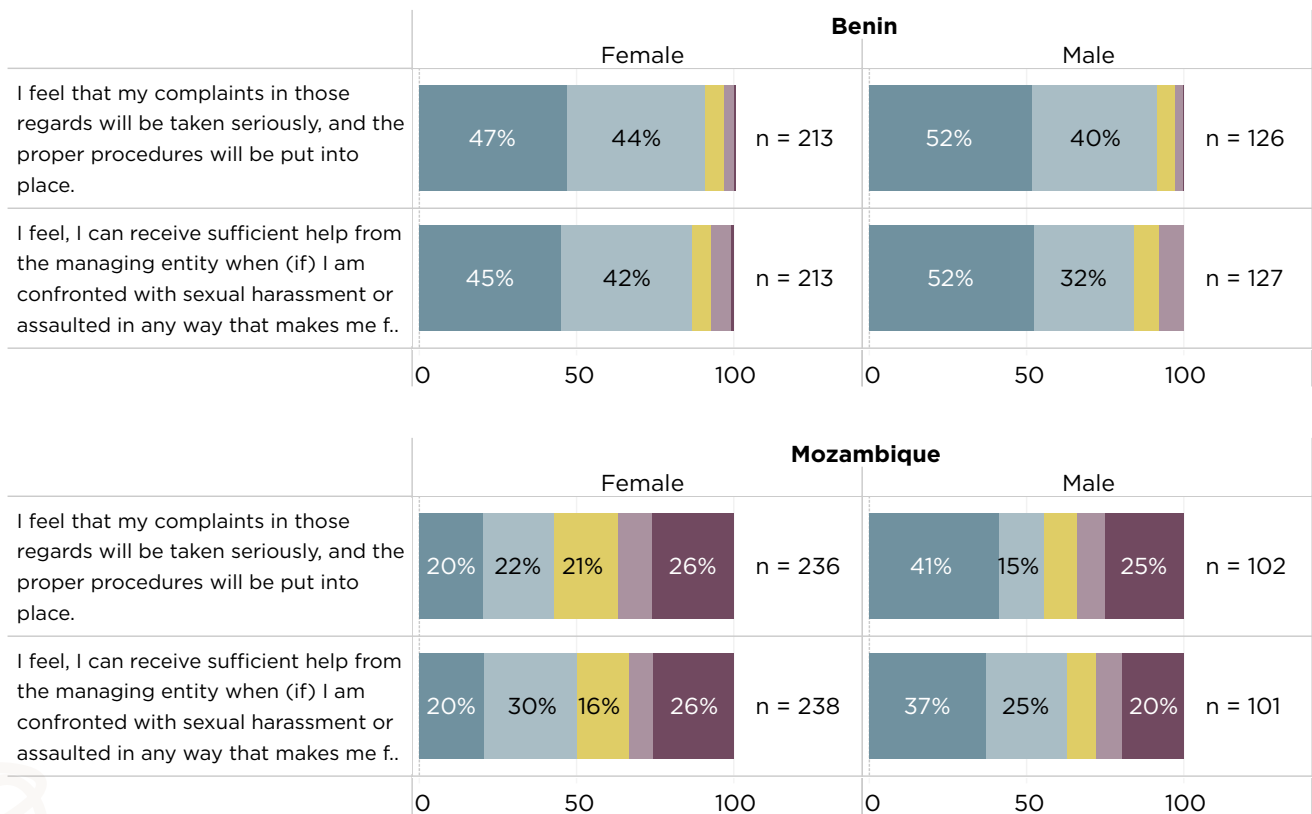


Legend
■ No
■ Yes



Beyond the relative perception of safety at work, the survey also shows that the majority of respondents feel like they would receive help from the Managing Entities in case of sexual harassment situations and trust that a proper procedure to respond would be put in place. As displayed in Figure 31 below, in **Benin**, both male and female respondents largely feel taken seriously (91% of women and 92% of men) and expect that they would receive assistance from the Managing Entities should they suffer sexual harassment (87% of women and 84% of men). In **Mozambique**, the proportion of women who believe they would receive sufficient help if harassed is much lower (50%). The percentage of men who think they would receive help from the Managing Entities in case of sexual harassment is slightly above average (62%).

FIGURE 31: PERCEPTION OF MANAGING ENTITY SUPPORT



- Legend
- Strongly agree
 - Agree
 - Neutral
 - Disagree
 - Strongly disagree

2.3.2 Effects at Impact Level

The level of impact is not a focus of the study per se, considering that an assessment of the impacts is beyond the scope of the study since it is too early to evaluate them due to the long-term nature of the onset of effects and long impact chain. Nonetheless, preliminary conclusions can be drawn at the impact level by combining the various data of this study. The validity of the impact hypotheses can be assessed on the grounds of plausibility.

As a first objective at the impact level, **CmiA expects to contribute to gender equality in the farming communities** (Criteria 6.2, 12.1; 12.2) and, therefore, also plausibly contribute to advances towards SDG 5 (see also chapter 2.2.1). Based on the analyses presented in this report,



this is partially plausible, since there are positive examples of social and financial recognition of women in their communities. Nevertheless, as pointed out in the report, the data does not show a systematic effect of the activities at the expected scale of the entire group of women supported by the activities of CmiA. In terms of social recognition and advances towards gender equality in the communities, the data shows that women participate in the trainings on a regular basis, equally as often as men. This has contributed to increasing the visibility of women in cotton farming. In addition, the training courses on technical skills, leadership, and female entrepreneurship (in organic farming) are incentives for participation since, based on a self-assessment, the acquired skills are perceived to be applied to a great extent and contribute to diversifying the financial income of the women. As presented in section 2.2.2, the financial recognition of women is a key mechanism for the greater voice of women in their households. Combined with awareness-raising and adherence to the CmiA standards at the level of the Managing Entities, a tentative positive development can be observed with regards to gender equality in the households supported by CmiA activities, and, to a lesser extent, in the communities in general. This also plausibly contributes to creating **a safe environment for women** (Criteria 6.2, 5.2, 5.3, and 9.5), which is the second intended impact by CmiA.

In this regard, the study underlines the essential role of non-discriminatory policies as a precondition to foster a protective working environment for women in cotton farming. Linked to the CmiA verification process, the Managing Entities in both countries have demonstrated efforts to establish and implement anti-discrimination measures, with particular emphasis on equal opportunities. Regarding the psychological and physical safety of women in cotton farming, the study reveals a mixed picture, where despite low familiarity with institutional mechanisms established by the Managing Entities, the majority of women trust the Managing Entities to respond effectively to potential safety risks, including instances of sexual harassment and still feel safe in their work on their field.

Third, **CmiA also aims at contributing to the promotion of decent working and employment conditions generally and especially for women** (Criteria 6.2, 5.4 & 5.9). The study finds that **this impact is plausible, considering the institutional and practical application of the CmiA verification process**. At the **policy level of the Managing Entities**, the promotion of equal treatment of women in accordance with their needs can be observed, as the Managing Entities strive to fulfill the CmiA criteria. As presented in 2.2.2 and 2.3.1, the Managing Entities have made advances towards securing a safe and non-discriminatory environment for women in cotton farming, notably through the application of the CmiA standards. This is further reinforced by the verification process, which emerges as a significant factor contributing to the promotion of a decent working environment and employment conditions within the context of cotton farming. The regularity of verification missions ensures the continual enforcement of standard requirements. In addition, qualitative data points to the upscaling potential of the application of CmiA standards to other regions in **Benin**, which signals a commitment to a broader coverage and adherence to CmiA standards for sustainable production systems.

However, challenges in information dissemination and knowledge persist at various levels. Field facilitators and field staff lack awareness of the standard criteria. This is potentially due to the large number of criteria, which could hinder the effective implementation of sustainable practices. At the field level, qualitative accounts highlight that some farmers have a greater understanding of the criteria than others.

Overall, it is therefore partially plausible that CmiA contributes to a certain extent to these overarching objectives:

1. the improvement of living conditions of African small-scale cotton farmers and ginnery staff and their families in the partner countries; and
2. the advances towards SDG 5 (gender equality and women empowerment) in its partner countries.



2.3.3 Unintended Results

Lastly, the study explored the extent to which unintended positive or negative effects of the CmiA interventions on the situation of female farmers can be observed. Negative or positive unintended results stemming from CmiA's involvement could not be found.

3 Conclusions

This study had the objective of generating knowledge about the situation of female cotton farmers in Benin and Mozambique and assessing CmiA's contribution to women empowerment through its different mechanisms and activities. Based on the analyses presented above, several conclusions can be drawn regarding both research interests.

As for the **general situation of female cotton farmers** in Benin and Mozambique, the study results demonstrate that women are similarly involved in cotton farming work as men and similarly integrated into productive environments. At the same time, the results confirm the existence of gender inequalities in the areas of ownership, decision-making power over productive resources, and women's leadership in farming communities. In this sense, the study reveals a mixed picture of women's overall situation in cotton farming, including both positive changes towards female empowerment and persisting inequalities. On the one hand, the findings clearly demonstrate concrete improvements in the situation of women, such as increased financial independence and the expansion of economic activities in recent years. Also, the data shows that attitudes towards women in cotton farming are positively shifting in both countries. On the other hand, traditional gender roles and the corresponding gendered division of labour largely remain in place, with women still having less agency and financial autonomy than men, lower levels of communal leadership, and less influence on their own time allocation.

Through different mechanisms and activities, i.e., trainings, the CmiA verification process, and community projects - CmiA seeks to foster women's (economic) empowerment in farming communities. Having analysed CmiA's contributions in this regard, the study **finds strong interlinkages between the mechanisms deployed by CmiA in Benin and Mozambique and the achievement of the expected outcomes**. The results show that the Managing Entities have implemented trainings that explicitly address gender-related aspects throughout different trainings, resulting in a high application rate of the acquired skills and knowledge by both men and women. Furthermore, the data also shows that the Managing Entities in both countries have improved their adherence to policies and practices that are requested by the CmiA standard to improve gender equality.

Against the background of these implemented mechanisms, the data indicates that the majority of women gain some **social and financial recognition for their work as cotton farmers**. Moreover, the data demonstrates that the Managing Entities in both Benin and Mozambique are taking several measures to support female farmers, such as encouraging female farmers to put their names in the contract/ in the farmer database, having female facilitators and extension agents, and supporting the creation of women cooperatives. The study also confirms that the application of new skills acquired through trainings supports women in developing new financial streams of income, thus **contributing to financial independence and control over the use of income**. Moreover, the study shows that new skills and increased household income contribute to shifts towards joint **decision-making over agricultural production** and decision-making over time allocation. In addition, the study results also underline the essential role of non-discriminatory policies as a pre-condition to foster a protective working environment for women in cotton farming. The Managing Entities in both countries have demonstrated significant progress in establishing and implementing anti-discrimination measures, with particular emphasis on equal opportunities and equal pay. Despite persisting challenges, diverse external influencing factors,



and the lack of robust long-term data, the contribution mechanisms underlying CmiA's work were partially confirmed by the study.

At the impact level, the results demonstrate **high levels of plausibility** that CmiA is contributing to gender equality in the communities as well as decent working conditions. Regarding a safe working environment for women, the results show a mixed picture of the current situation. Overall, there is a need for more thorough and systematic evidence to assess the long-term impacts of CmiA's work.

Finally, there is no evidence of any negative or positive unintended consequences of CmiA's engagement.

Overall, the study demonstrates both positive developments and persisting challenges regarding the situation of women in cotton farming communities in Benin and Mozambique. As the analyses provide insights on the multifaceted interplay of income diversification, family dynamics, decision-making processes, and other factors influencing women's situation in the communities, the study results underline the significance of empowering women through knowledge and skills development as well as structural regulations for systematic change.

4 Recommendations

The recommendations presented in this section are the results of two case studies on women empowerment among female CmiA cotton farmers in Benin and Mozambique. These recommendations were derived from the findings and conclusions presented in this report and shall indicate areas of improvement to support CmiA in its efforts to empower female cotton farmers.

The recommendations are clustered along the three different CmiA mechanisms, in addition to a general category.

1

FARMERS' TRAININGS:

The study findings show that the trainings supported by CmiA have a positive influence on the empowerment of female cotton farmers. It is therefore recommended to:

Accelerate/Scale-up CmiA's awareness and empowerment efforts in the form of trainings, for instance by:

- a. Supporting women in leadership and entrepreneurship skills development: The study demonstrates that the financial diversification and recognition of women is a key mechanism through which they are empowered. Trainings in this field could also adopt a 'training of trainers' approach or coaching formats.
- b. Working with men on changing gender roles and dynamics: The report indicates positive examples of evolving gender relations and dynamics in cotton farming households that could be harnessed. For instance, CmiA should continue to support sensitization efforts on women's role in the communities, including the sharing of care work in the household (a gendered division of labour), education (need for girls to attend school), and decision-making, all of which are crucial conditions for greater involvement of women in cotton farming.



2

VERIFICATION PROCESS AND BEYOND:

The study results demonstrate that the verification process plays a crucial role at several levels: At the Managing Entity level, the process helps to develop a safe and non-discriminatory environment. At the field level, it helps to encourage the systematic application of the core concepts underlying the CmiA standards. The study therefore suggests that CmiA intensifies its collaboration with the Managing Entities on:

- a. Creating spaces for dialogue and exchange on gender-related issues with and among the Managing Entities: CmiA should continue to foster dialogue through workshops or other formats, including across countries (e.g., regional conferences), to bring the topic of women's empowerment and its importance to the Managing Entities' attention. Based on the insights from the study, such dialogue formats among the Managing Entities could have the potential to share good practices, foster motivation, and create even more ownership of the topic.
- b. Addressing the (gendered) challenges in the cotton farming productive environment: The results show that women face specific challenges more acutely than men, such as lacking information regarding processes, lack of ownership over productive resources, and perceptions of gender-based discrimination. Hence, CmiA should discuss whether selected verification criteria of the CmiA standards could be adapted, where needed, to account more specifically for these challenges.
- c. Continuing to support women's financial autonomy: for instance, through the diversification of income sources or tailored payment systems. CmiA can support this for instance by bringing in the expertise of external advisors to showcase opportunities for change to the Managing Entities or by creating networks to exchange good practices. This area of improvement would also be well-fitted for a potential community project.
- d. Reinforcing the communication on standard requirements, policies, and procedures from the Managing Entities towards the farmers to raise awareness on rights and responsibilities: The report shows that policies and regulations often exist, but farmers lack knowledge of them. Hence, sensitizing all levels of the production system would lead to better ownership and more comprehensive compliance with the regulations.
- e. Strengthening the official contracting of female farmers: The report shows that once women are officially registered in the database, Managing Entities can directly communicate with them, facilitate access to trainings, and provide direct payment to the female farmers. This can strengthen their financial and social recognition as well as their position in the farming production system. conditions for greater involvement of women in cotton farming.





3 COMMUNITY PROJECTS:

Although the study has collected only limited data on the community projects, there are some positive indications that the community projects benefit from great visibility among farmers and are potentially linked to advances towards gender equality in the farming communities. The study therefore recommends to:

Focusing on gender-related topics in the community projects: The report indicates that the community projects benefit from great visibility among the farmers in CmiA-supported cotton areas. However, the data does not yet provide sufficient evidence of tangible effects on women's empowerment. So far, the effects of the community projects on women in the communities are observed ad-hoc and not on a systematic basis. To change this, CmiA should therefore:

- a. Initiate a call for proposals for community projects that are related to gender equality / women empowerment: This could motivate the Managing Entities and/or the farming communities to develop their own ideas on how to strengthen women's position in cotton farming communities while maintaining CmiA's needs-based approach to community projects.
- b. Support community projects that aim at strengthening women cooperatives / women groups: The data does not yet point to sustained collaboration between Managing Entities and women groups, despite their existence and relevance being recognized in both countries. Hence, strengthening these groups has the potential to further advance gender equality in the target communities.





GENERAL RECOMMENDATIONS:

Beyond the specific recommendations above suggested along the core mechanisms supported by CmiA, three general recommendations are suggested to improve the support of CmiA towards women's empowerment in cotton farming communities.

- a. Improving the availability of data on the effects of CmiA's work on women's empowerment: CmiA should take the results presented in this report as a baseline and follow up on this in the coming years with further studies to allow a results-based monitoring and planning.
- b. Continuing to strengthen the involvement of intermediary entities in CmiA-supported activities: In particular in Benin, where the structure of the cotton production system is different than in other countries, intermediary entities have a significant role and power in the system. Hence, CmiA should strengthen its collaboration with these entities. In addition to CmiA's specific Theory of Change developed for this study, a formal stakeholder mapping in each partner country could form the basis for a more strategic engagement with different organisations. This could further clarify the strategic added value of each of the stakeholders to ensure their strengths are capitalized.
- c. Communicating the results of the study: Based on qualitative accounts and regular communication with the local data collection team, there is a high level of interest from stakeholders to be informed on the results of the study and potential follow-up actions. This could be an opportunity for a follow-up engagement to take up the topic of women's empowerment with the Managing Entities as well as the participating communities.



ANNEXES

ANNEX I: THE A-WEAI

Background:

As stated before, part of the study was designed using the abbreviated Women's Empowerment in Agriculture Index (A-WEAI), which entails two sub-indices: the Five Domains of Empowerment (5DE) and the Gender Parity within households. The **first subindex** evaluates the extent of women's empowerment in five key domains related to agriculture, known as the **5DE** (Five Domains of Empowerment). These domains encompass (1) decision-making regarding agricultural production, referred to as the Input in **Productive Decisions**, (2) access to and authority over productive resources, which includes two subdomains referred to as the **Ownership of Assets** and the **Access to and Decisions on Credit** (3) control over income utilization, referred to as the **Control over the Use of Income** (4) Leadership roles in the community, referred to with the domain **Group Membership**, and (5) allocation of time, referred to with the domain **Workload**. It also assesses the extent to which women are empowered in those areas, even if they do not meet the overall empowerment goal. The **second subindex**, referred to as the **Gender Parity Index (GPI)**, measures gender equality within the households surveyed (Malapit et., Al, 2020). The A-WEAI also produces an aggregate score, which is reported either at the national or regional level. It relies on individual-level data obtained through interviews with men and women residing in the same households. The aggregation of the two sub-indices results in an overall A-WEAI score.

The A-WEAI has been tested in 50 countries, and its evolution has led to the development of three versions, each tailored to different emphases within the realm of women's empowerment.

Use of the A-WEAI in the CmiA study

The study conducted by Syspons on behalf of AbTF strategically integrated the abbreviated version of the WEAI, i.e., the **A-WEAI**, into the study design for several reasons. Firstly, this choice ensured comparability with potential future studies. Secondly, it allowed the research team to employ a reliable and contextually appropriate tool that aligns with the unique nuances of the research objectives. Thirdly, the abbreviated version of the index is better suited for the specific research objectives of CmiA, as well as the available resources and timeframe. To implement the A-WEAI, the study consulted the A-WEAI instructional guide then integrated the A-WEAI questions into the farmer survey while slightly tailoring the A-WEAI original categories to the CmiA context. The study then similarly tailored the A-WEAI calculation tools, i.e., translated the "stata files" for preparation and calculation into R and modified the scripts to match the survey questions.

As such, Table 0 below provides an overview of the domains that were adopted from the A-WEAI instructional guide and tailored to the survey developed for this study. It gives an overview of the 5DE dimensions (first index, as explained above) and the corresponding indicators and survey questions. Each dimension (empowerment domain) is constituted of indicator(s). Each indicator is constituted of sub-indicators, which are the survey questions.

Each indicator enables the assessment of whether the participants have reached a certain threshold (**predefined inadequacy cut-off**), indicating their **level of adequacy**²⁰. This means that the A-WEAI scores need to be understood in relation to these pre-defined thresholds, which are expected to shed light on how "empowered" women are (first subindex) and how strong gender

¹⁹ For more information about the development and the versions of the A-WEAI, please consult <https://www.ifpri.org/project/A-WEAI>

²⁰ Please note that the word "inadequacy" is used here for the mere objective of maintaining the same terms as the A-WEAI, and by no means tries to reflect a real label of the people who participated in the survey.



equality is in the participating households (second subindex). However, the result of the A-WEAI analysis is only interpreted within these thresholds. For example, a higher score in the domain of Ownership of Assets does not imply that women solely own more items than men, because the threshold to calculate the adequacy in this domain is based on joint ownership, not sole ownership.

TABLE: 0: 5DE DOMAINS, INDICATORS, SURVEY QUESTION, AGGREGATED METHOD, INADEQUACY CUT-OFF AND WEIGHTS IN THE A-WEAI

Domains	Indicator name	Survey questions	Question No.	Aggregation method	Inadequacy cut-off	Weight
Production	Input in productive decisions	Did you yourself participate in [ACTIVITY] in the past 12 months (that is, during the last one/ two cropping seasons)? <i>buy farming inputs; choose types of crops to grow for agricultural production; take crops to the market and sell crops; engage in livestock raising; use Integrated Pest Management; Proper use of storage and pesticides; Post-harvest handling and grading</i> When decisions are made regarding [ACTIVITY], who is it that normally takes the decision? Did you have a say in making decisions about these activities? To what extent do you feel you can make your own personal decisions regarding these activities if you want(ed) to	19, 20, 21, 22	Achievement in one of the categories	Inadequate if individual participates BUT does not/has not at least some input in decisions; or she does not make the decisions nor feels she could.	1/5
Resources	Ownership of Assets	Who owns most of the [ITEMS]? <i>Agricultural land; Large livestock; Small livestock; Chickens etc.,; Farm equipment (non-mechanized); Farm equipment (mechanized); Nonfarm business equipment (any other equipment used for other businesses); House (and other structures); Large consumer durables; Small consumer durables (radio); Cell phone; Other land not used for agricultural purposes; Transportation</i>	15	Achievement in any if not only one small asset (chickens, non-mechanized equipment, and no small consumer durables)	Inadequate if household does not own any asset or if household owns the type of asset BUT she/he does not own solely or jointly	2/15
	Access to and Decisions on Credit	From which [SOURCE] has anyone in your household taken any loans or borrowed cash/in-kind? Who in your household made the decision to borrow from [SOURCE]? Who in your household makes the decision about what to do with the money/ item borrowed from [SOURCE]? <i>Non-governmental organization (NGO); Informal lender; Formal lender (bank/financial institution); Friends or relatives; Group-based micro-finance or lending including village Savings and Loans Associations (VSLAs)/Savings and Credit Cooperative Organizations (SACCOs)</i>	16, 17, 18	Achievement in any	Inadequate if household has no credit ²¹ OR used a source of credit BUT she/he did not participate in ANY decisions about it	1/15
Income	Control over use of income	Did you have a say in decisions on the use of income generated from the following activities on the household level? <i>Food crop farming; cotton as a cash crop; Cash other crop farming; Non-farm economic activities; Wage and salary employment.</i> When decisions are made regarding the following aspects of household life, who normally takes the	23, 24, 25	Achievement in any if not only one minor household expenditures	Inadequate if participates in activity BUT has no input or little input in decisions about income generated, or does not feel she/he can make decisions regarding wage,	1/5

□

²¹ In the survey questions, the study considered persons who did not choose any of the credit sources options as having no credit at all.



employment and major household expenditures

decision? *your (singular) wage or salary employment, expenditures major household expenditures (such as a large appliance for the house like a refrigerator) minor household expenditures (such as food for daily consumption or other household needs) for family (e.g., children's schooling) for the community (e.g., small wells, roads, water supplies) professional spending (buying farming equipment or seeds)* | To what extent do you feel you can make your own personal decisions regarding these aspects of household life if you want(ed) to?

Leadership	Group membership	In which of these groups are you an active member? <i>Agricultural / livestock/ fisheries producer/mkt group; Water; Forest users'; Credit or microfinance group; Mutual help or insurance group (including burial societies); Trade and business association; Civic/charitable group; Local government; Religious group; Other women's group; Other group</i>	26	Achievement in any	Inadequate if is not part of AT LEAST ONE group; inadequate if no groups reported in community	1/5
Time	Workload	Please give us your best estimate on how much time you would spend on the following [ASPECTS] in a typical day (starting yesterday morning at 4 am, finishing at 3:59 am of the current day). <i>Sleeping and rest; Eating and drinking; Personal care; School (also homework); Work as employed; Own business work; Farming/livestock/fishing; Shopping/getting service (incl health services); Weaving, sewing, textile care; Cooking; Domestic work (incl fetching wood and water); Care for children/adults/elderly; Travelling and commuting; Watching TV/listening to radio/reading; Exercising; Social activities and hobbies; Religious activities; Other, specify below</i>	29	NA	Inadequate if works more than 10.5 hours a day	1/5

A-WEAI Data preparation and calculations:

As mentioned in the introduction to this chapter, the aggregation of the two sub-indices provides the A-WEAI score. In the following paragraphs, the specific steps for the calculations of each sub-index and the provision of the A-WEAI score are explained. The explanation will help in understanding the logic used for obtaining the A-WEAI score and the technical steps for those who are interested in the methodology.

The process of data preparation and calculating the A-WEAI involved many steps that relied on various sources for technical guidance, including the A-WEAI instructional guide, the calculation stata files, and the discussion paper authored by Alkire et al. in 2012. The following explanation aims at comprehensively outlining and describing these steps in a manner that provides clear and easily understandable insights, without delving into overly technical details.

Data preparation

To ensure data quality for the A-WEAI calculation, a series of preparation steps were conducted in R script-based software, adhering to Syspons' internal standards for data analysis, and were validated through peer reviews. After the data collection phase concluded, a thorough process of data validation

and plausibility tests was implemented. This process involved, for example cleaning the data by removing tests conducted by enumerators and eliminating empty surveys and duplicates, thereby ensuring the integrity and accuracy of the dataset. Additionally, each empowerment domain within the A-WEAI framework was aligned with relevant questions, as outlined in Table 0 inspired by the A-WEAI instructional guide and corresponding with the provided Stata code. This alignment was critical for a precise analysis of each domain. In the specific case of the time domain, a stringent procedure was applied, where any individual data that did not provide a full 24-hour activity report was excluded from the analysis. This step was crucial to guarantee the accuracy and relevance of the time domain data, ensuring a reliable and comprehensive assessment of time-related empowerment in the A-WEAI calculation.

Calculation

Part 1: subindex calculating the Five Domains of Empowerment in Agriculture (5DE):

Steps of calculating the 5DE (the “empowerment score”)

1. Calculation of the *adequate achievement score* (hereafter “*the adequacy score*”) in each empowerment domain

In the initial step of calculating the adequacy score within each domain, the study referred to the inadequacy cut-off values listed in Table 0 above. These values were provided by the A-WEAI instructional guide. The calculation of the adequacy for each domain was always done on an individual level, by starting to look at the answers to the survey questions related to this domain. Each individual question outlined in Table 0 would obtain a value of 1 if a participant scored above the cut-off of that question. Conversely, a value of 0 was assigned if the individual did not meet this cut-off. For each indicator, the answers to the questions are aggregated according to the aggregated method in Table 0.

The following Table 1 **provides the percentage of participants who have met the adequacy threshold in each empowerment domain**, categorized by gender and for both countries. It is important to note that these scores represent only the initial phase in the calculation of the A-WEAI index.

2. Calculating the *Inadequacy Achievement Score* in all domains (referred to as “*ci*” in the instructional guide)

Following the calculation of the individual adequacy score per empowerment domain, the study then moved on to calculate the ***Individual Adequacy Scores*** across all empowerment domains, which are an individual aggregate of all domains in which the individual has scored an “adequate” level. Not all empowerment domains have the same importance in the considerations for the aggregate score. Therefore, different weights are used, as indicated in Table 0 above (these weights are provided by the A-WEAI instruction guide). The ***Individual Adequacy Scores*** represent the weighted **percentage of domains in which a person has attained adequacy**.

Similarly, participants’ ***Inadequacy Achievement Score*** were calculated, representing the weighted sum of inadequacy values across these same domains. This score reflects the weighted **percentage of empowerment domains in which a person did not meet the adequacy threshold, and therefore received an “inadequate score”**.

The initial number of valid responses was 717 in both countries. This calculation of the ***Inadequacy Achievement Score (ci)*** was applied to a sample size of 522 survey responses, of which 247 persons were located in Mozambique and 275 people in Benin, where all domains had valid responses. Those excluded



from the sample were individuals with at least one missing domain. This sample also excludes wrongly entered time data (170 persons) in the time allocation domain.²²

TABLE 3: FIVE DOMAINS OF EMPOWERMENT 5DE (STEPS 1 AND 2 OF CALCULATING THE FIRST SUBINDEX OF THE A-WEAI): PERCENTAGE OF PARTICIPANTS WHO ACHIEVED ADEQUACY IN EACH DOMAIN PER COUNTRY AND GENDER

Country	Benin		Mozambique	
	Men	Women	Men	Women
Production: Input in Productive Decisions	100%	100%	100%	97%
Resources: Ownership of Assets	100%	92%	100%	97%
Resources: Access to and Decisions on Credit	67%	54%	60%	57%
Income: Control over the Use of Income	100%	100%	94%	90%
Leadership: Group Membership	100%	95%	92%	95%
Time: Workload	27%	<1%	45%	52%
The weighted Average of the Individual Adequacy Score across all domains ²³	83%	74%	84%	88%

3. **Defining a Disempowerment Cut-Off according to the inadequacy achievement score (referred to as "k" in the instructional guide):**

In the current stage of the A-WEAI calculation, a **Disempowerment Cut-Off** was defined. During this step, a threshold for the **Inadequacy Achievement Score** (ci) was determined, to categorize individuals as disempowered or empowered.

The convention utilized by the pilot projects of the A-WEAI for **Disempowerment Cut-Off** is k=20. In practical terms, this means that an individual would be labelled as disempowered if their **Inadequacy Achievement Score** (ci) exceeded 20%, or they were labelled inadequate in 20% of the domains.

4. **Defining Disempowered and Empowered Persons Headcount depending on the Disempowerment Cut-Off (referred to as "H" and "1-H" in the instructional guide):**

In this step, the number of individuals who failed to meet the **Disempowerment Cut-Off** was calculated. Specifically, the count encompassed individuals whose **Inadequacy Achievement Score** had reached or exceeded 20%. These individuals were then categorized as **Disempowered Persons**.

Following this, the proportion of **Disempowered Persons** was computed relative to the total number of individuals within their respective subgroups, which included both countries and gender categories. This proportion is commonly known in A-WEAI literature as the **Disempowered Persons Headcount (H)** and was designated as **Percent Not Achieving Empowerment** in part 1 of Table 2 below.

□

²² The time allocation question asked the surveyed individuals to fill out the time dedicated to 18 activities. If the sum of the time for all activities did not add up to 24h (1440), the person was excluded when calculating the score for the time domain and for the ci, but not in the overall analysis.

²³ The weights are based on the importance of each domain in calculating the individual adequacy score, consult table 0 in Annex I for more information.

Conversely, the **Empowered Persons Headcount (1-H)** was obtained by subtracting the *Disempowered Persons Headcount (H)* from 100%. This calculation resulted in (1-H) in part 1 of Table 2, signifying the *Percent Achieving Empowerment*."

5. Calculating the **Mean Disempowerment Score (referred to as "A") and the Mean Empowerment Score (referred to as "1-A" in the instructional guide)**:

In this step, the **mean value Inadequacy Achievement Score** for *Disempowered Persons* was calculated and represented in Table 2 as the **Mean Disempowerment Score**. It is essential to emphasize that the mean value was determined with respect to the total number of Disempowered Persons. The **Mean Empowerment Score** was derived by subtracting the *Mean Disempowerment Score* from 100%.

6. Computing the **Disempowerment Index (referred to as "M0") and the Empowerment Index 5DE (referred to as "1- M0")**:

The **Disempowerment Index (M0)** was computed as the multiplication of the *Disempowered Persons Headcount (H)* by the **Mean Disempowerment Score (A)**. This score reflected the intensity of their inadequacies, specifically, the average proportion of (weighted) inadequacies experienced by Disempowered Persons.

This computation process is rooted in technical complexities and was based on the discussion paper by Alkire et al. in 2012. Essentially, it involved calculating the **mean Inadequacy Achievement Score for Disempowered Persons** while considering the entire population, which encompassed both empowered and disempowered individuals.

The overall **Empowerment Index (referred to as 5DE)** was finally obtained by subtracting the Disempowerment Index (M0) from 100%. In essence, the 5DE score could be enhanced by either increasing the percentage of empowered women or, for those women who had not yet achieved empowerment, by elevating their adequacy scores.

Part 1 of Table 2 hence represents the steps of calculating the first Subindex of the A-WEAI (Empowerment Index 5DE) and the corresponding results.

Part 2: Subindex calculating the Gender Parity Index:

The GPI aimed to encapsulate two essential pieces of information: First, the Percentage of **Women with no Gender Parity** compared to men within a specific population referred to as **H_gpi**. Second, the extent of inequality among these women compared to their male counterparts in the same households, **Average Empowerment Gap**, referred to as **I_gpi**.

The process for calculating the Gender Parity Index (GPI) involved several steps: (1) selecting only dual households, (2) identifying households where the woman's inadequacy score exceeded that of the man, (3) calculating the weighted sum of mixed-gender households with higher deprivation scores among women, referred to as (*h*), (4) calculating the weighted total number of dual households, referred to as (*m*), (5) computing **H_gpi** by dividing *h* by *m*, (6) determining the **I_gpi** as the average percentage gap between the inadequacy scores of women and men in households lacking gender parity, and finally, (7) calculating the GPI as $1 - H_gpi * I_gpi$.

Thus, improving the GPI score requires increasing the percentage of women with gender parity (reducing **H_gpi**) or, for less empowered women compared to men, diminishing the empowerment gap between genders within the same household (reducing **I_gpi**).

Computing the A-WEAI score:

The A-WEAI was subsequently calculated by the weighted sum of GPI and 5DE. The weights of the 5DE and GPI subindexes are 0.9 and 0.1, respectively.

TABLE 4: RESULTS OF CALCULATING THE SUBINDICES OF THE A-WEAI IN THE FIVE DOMAINS OF EMPOWERMENT INDEX (5DE) AND THE GENDER PARITY INDEX (GPI) AS WELL AS THE FINAL A-WEAI SCORE

Country	Mozambique		Benin	
	Men	Women	Men	Women
Part 1: Subindex 1 - Five domains of empowerment 5DE				
n (Number of Observations)	86	161	108	167
Empowerment Index (5DE)	0.89	0.94	0.92	0.83
Disempowerment Index (M0: 1- 5DE)	0.11	0.06	0.08	0.17
Percent Not Achieving Empowerment (H)	37%	23%	29%	55%
Percent Achieving Empowerment (1-H)	63%	77%	71%	45%
Mean Disempowerment Score (A)	30%	28%	27%	33%
Mean Empowerment Score (1 -A)	70%	72%	73%	67%
Part 2: Subindex 2 - Gender Parity Index (GPI)				
n (Number of Observation) ²⁴		49		75
Percentage of Women with no Gender Parity (H_gpi)		5%		45%
Average Empowerment Gap (I_gpi)		0.17		0.15
Gender Parity Index		0.99		0.93
A-WEAI score (0.9 x 5DE + 0.1 x GPI)		0.94		0.84

□

²⁴ The number of observations here refer to the number of women who were interviewed together with their husbands in dual households. The reason of the deviation from the total number of observations used to calculate the 5DE, is that many of the women who lived in dual households were interviewed alone without their spouse. Hence cannot be used to calculate the GPI, check the Annex for further technical clarifications.



Annex II: Farmer Survey Questionnaire

Background Information

01. Country

- (1) Benin
- (2) Mozambique
- (-7) No answer

02. Name of the market

03. Name of the Managing Entity

- (1) SAN JFS
- (2) OBEPAB
- (3) SODECO
- (4) Other, please specify:
- (-7) No answer

Please specify "Other" here.

04. Name of the enumerator

05. Household identification

Introduction

Welcome to the online survey aimed at researching farmers' empowerment in the initiative "Cotton made in Africa" (CmiA). Cotton made in Africa (CmiA) is an Aid by Trade Foundation (AbTF) initiative and an internationally recognized standard for sustainable cotton from Africa. Its main aim since 2005 is to support small-scale farmers in improving their living conditions. This survey is part of a study that has a special focus on the improvement of the situation of cotton farmers. Its aim is to provide insights into the situation of farmers in CmiA cotton farming communities and to estimate the impact of CmiA Training on their situation within the household.

On the one hand, the survey covers different domains to estimate the overall situation of farmers: agriculture production decisions, decision-making on productive resources, control over income, leadership in the community, and influence on the allocation of time. On the other hand, it analyses



barriers to participation in CmiA's activities and the potential contribution of the CmiA trainings within the community.

The survey will be asked to a primary adult male and female in your household if applicable. In total, the survey will take approximately 1 hour to complete per person, and your participation is entirely voluntary.

Data Privacy

In order to collect and analyse the data mentioned above, you need to make sure that the participant has given her/his consent. We therefore have prepared a short text you may share with the participant prior to the survey. Please let them sign the form in the paper version and enter their response in the App accordingly.

Farmer survey starts here. To start, please read the declaration of consent to the farmer and get their signature and make sure they understand the context and their rights.

Declaration of consent

[Please provide the printed document of this - the consent form]

We're reaching out to you as part of a survey we're conducting to better understand the experiences of cotton farmers who are part of the CmiA Initiative as described previously. Before we kick off, we'd just like to get your approval to use the information you share with us.

We, along with Syspons GmbH, have teamed up with the Aid by Trade Foundation (AbTF) to gather insights from farmers like you who are supported by the CmiA initiative. We take your privacy seriously, which means we'll be the ones safeguarding your personal data as per the rules laid out by the EU's General Data Protection Regulation (GDPR).

If you decide to join us in this survey, here's what will happen with your data:

We'll collect and analyse your responses, but we'll make sure to remove any details that could identify you before we share the results with the AbTF. The AbTF won't be able to know who you are from the data and won't ask us to share any info that isn't anonymized.

The information you provide will only be used for this study and might help in comparing results with future studies.

Participating in this survey is totally up to you. If you're keen, we'll need your approval to use your data as described above, as per EU privacy laws. Feel free to withdraw at any moment — you can do this by calling or emailing us. If you do withdraw, any info you've shared until that point remains legally handled.

(1) Yes, I've read the info and I'm okay with my data being used in this survey.

1 Demographic Information

06. Name of respondent:



07. Person ID:

Please give an ID as a number 1 or 2. To identify the person interviewed with thin the household,

—

08. Relation to the Person on the list of contact:

- (1) Same farmer on the list
- (2) Spouse of the farmer on the list
- (3) Someone else from the household, please specify:
- (-7) No answer

Please specify "Someone else" here:

—

09. Sex of respondent:

- (1) Male
- (2) Female
- (-7) No answer

10. Type of household:

- (1) Male and female adult
- (2) Female adult only
- (3) Male adult only
- (4) Male and female(s) adult
- (-7) No answer

11. Number of Children:

—

12. Who else is present at the time of the survey?

- (1) Alone
- (2) With adult females present
- (3) With adult males present
- (4) With adults males and females present



- (5) With children of the household present
- (6) With adult males and females and children present
- (-7) No answer

2 General situation of cotton farmers

2.1 Challenges when directly selling to the Managing Entity or intermediary

13. Please rate to which extent do you agree with the following statement on a scale from 1 (Strongly disagree) to 5 (Strongly agree), indicating your involvement in cotton farming?

When selling to the Managing Entity or intermediary, I face challenges related to...

	Strongly disagree	Disagree	Neutral	Agree	Strongly agree	No answer
... transportation of cotton.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... pricing of cotton, price negotiations, and payments.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... harvest and delivery time.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... my gender/the fact that I am a woman/a man such as: sexual harassment, discrimination, or violence.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... the lack of information regarding the process.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>



... confidence in my abilities to seal the deal.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... the baling of cotton seed and their weighing on the scale	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>

2.2 Involvement in the cotton farming

14. Please indicate if those statements apply to you, in relation to your involvement in cotton farming.

[This is an important question as it is a base for the calculation of the final index]

	Yes	No	No answer
I have my own contract with the cotton ginning companies/ Managing Entities / intermediaries.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I work in at least one field that is explicitly attributed to me.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I dedicate significant time and workload to my household's cotton plot.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I dedicate significant time and workload to my spouse's cotton plot.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I am engaged in <u>land preparation</u> related to cotton farming.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I am engaged in <u>planting</u> related to cotton farming.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>



I am engaged in <u>harvesting</u> related to cotton farming.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I am engaged in <u>pest control</u> related to cotton farming.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I am engaged in <u>fertilization purchase</u> related to cotton farming.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>
I get the same share of revenues as any other family member when we do the same amount of work.	(1) <input type="radio"/>	(2) <input type="radio"/>	(-7) <input type="radio"/>

2.3 Ownership of Assets

Now I'd like to ask you about your household's access to, and ownership of a number of items that could be used to generate income.

15. Who owns most of the item?

Self	Part	Self	Othe	Self	Part	Som	Self	Part	Self,	No	No
	ner/	and	r	and	ner/	eone	and	ner/	part	one	answ
	Spou	part	hous	othe	Spou	(or	othe	Spou	ner/s	in	er / I
	se	ner/s	ehol	r	se	grou	r	se	pous	my	don'
		pous	d	hous	and	p of	outs	and	e	hous	t
		e	mem	ehol	othe	peop	de	othe	and	ehol	kno
		jointl	ber	d	r	le)	peop	r	othe	d	w
		y		mem	hous	outs	le	outs	r	owns	
				ber(s	ehol	de		de	outs	the	
)	d	the		peop	de	item	
					mem	hous		le	peop		
					ber(s	ehol			le		
)	d					

Agricultural land (pieces/plots)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
----------------------------------	---------------------------	---------------------------	---------------------------	---------------------------	---------------------------	---------------------------	---------------------------	---------------------------	---------------------------	----------------------------	----------------------------	----------------------------



Large livestock (oxen, cattle)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Small livestock (goats, pigs, sheep)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Chickens, Ducks, Turkeys, Pigeons	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Farm equipment for cotton farming (non-mechanized : Hoe, Sickle, etc.)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Farm equipment for cotton farming (mechanized)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Nonfarm business equipment (any other equipment used for	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>



other businesses)												
House (and other structures)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Large consumer durables (fridge, TV, sofa)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Small consumer durables (radio)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Cell phone	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Other land not used for agricultural purposes (pieces, residential or commercial land)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>
Means of transportation (tricycle, bicycle, motorcycle, car)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(11) <input type="radio"/>	(-7) <input type="radio"/>



2.4 Access to and decisions on credit

Next, I'd like to ask about your household's experience with borrowing money or other items in the past 12 months.

16. From which source has anyone in your household taken any loans or borrowed cash/in-kind? Please select all that apply. If nothing applies, then click "next"

- (1) Non-governmental organization (NGO)
- (2) Informal lender
- (3) Formal lender (bank/financial institution)
- (4) Friends or relatives
- (5) Group-based micro-finance or lending including: Village Savings and Loans Associations (VSLAs) / Savings and Credit Cooperative Organizations (SACCOs)

2.4 Access to and decisions on credit

17. Who in your household made the decision to borrow from ...?

Self	Partn	Self	Other	Self	Partn	Some	Self	Partn	Self,	No
	er/Sp	and	hous	and	er/Sp	one	and	er/Sp	partn	answ
	ouse	partn	ehold	other	ouse	(or	other	ouse	er/sp	er / I
		er/sp	mem	hous	and	grou	outsi	and	ouse	don't
		ouse	ber	ehold	other	p of	de	other	and	know
		jointl		mem	hous	peopl	peopl	outsi	other	
		y		ber(s)	ehold	e)	e	de	outsi	
					mem	outsi		peopl	de	
					ber(s)	de		e	peopl	
						the			e	
						hous				
						ehold				

Non-governmental organization (NGO)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
Informal lender	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
Formal lender	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>



(bank/financial institution)											
Friends or relatives	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
Group-based micro-finance or lending including: Village Savings and Loans Associations (VSLAs) / Savings and Credit Cooperatives Organizations (SACCOs)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>

18. Who in your household makes the decision about what to do with the money/ item borrowed from ...?

Self	Partner/Spouse	Self and partner/spouse jointly	Other household member	Self and other household member(s)	Partner/Spouse and other household member(s)	Some one (or group of people) outside the household	Self and other outside people	Partner/Spouse and other outside people	Self, partner/spouse and other outside people	No answer / I don't know
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Non-governmental	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
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organization (NGO)												
Informal lender	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>	
Formal lender (bank/financial institution)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>	
Friends or relatives	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>	
Group-based micro-finance or lending including: Village Savings and Loans Associations (VSLAs) / Savings and Credit Cooperatives (SACCOs)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>	

2.5 Influence on agricultural production decisions of the household

Now, I'd like to ask you some questions about your participation in certain types of work activities for all types of crops, not only cotton.

19. Did you yourself participate in [ACTIVITY] in the past 12 months (that is, during the last one/ two cropping seasons)? Please select all that apply. If nothing applies, click "next".

- (1) buy farming inputs (seeds, fertilizers, etc.)
- (2) choose types of crops to grow for agricultural production



- (3) take crops to the market and selling crops
- (4) engage in livestock raising
- (5) use Integrated Pest Management
- (6) Proper use of storage and pesticides
- (7) Post-harvest handling and grading

2.5 Influence on agricultural production decisions of the household

20. When decisions are made regarding these activities, who normally makes the decision?

Self	Partn er/Sp ouse	Self and partn er/sp ouse jointl y	Other hous ehold mem ber	Self and other hous ehold mem ber(s)	Partn er/Sp ouse and other hous ehold mem ber(s)	Some one (or grou p of peopl e) outs ide the hous ehold	Self and other outs ide peopl e	Partn er/Sp ouse and other outs ide peopl e	Self, partn er/sp ouse and other outs ide peopl e	No answ er / I don't know
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buy farming input (seeds, fertilizers, etc.)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
choose types of crops to grow for agricultural production	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
take crops to the market and sell crops	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>



engage in livestock raising	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
use Integrated Pest Management	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
Proper use of storage and pesticides	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
Post-harvest handling and grading	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>

21. Did you have a say in making decisions about these activities?

	No input or input in few decisions	Input into some decisions	Input in most or all decisions	No answer / I don't know
buy farming input (seeds, fertilizers, etc.)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>
choose types of crops to grow for agricultural production	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>
take crops to the market and sell crops	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>
engage in livestock raising	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>



use Integrated Pest Management	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>
Proper use of storage and pesticides	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>
Post-harvest handling and grading	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(-7) <input type="radio"/>

22. To what extent do you feel you can make your own personal decisions regarding these activities if you want(ed) to:

	Not at all	Small extent	Medium extent	To a high extent	No answer / I don't know
buy farming input (seeds, fertilizers, etc.)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
choose types of crops to grow for agricultural production	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
take crops to the market and sell crops	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
engage in livestock raising	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
use Integrated Pest Management	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
Proper use of storage and pesticides	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>



Post-harvest handling and grading (1) (2) (3) (4) (-7)

2.6 Control over the use of income

23. Did you have a say in decisions on the use of income generated from the following activities on the household level?

No input or input in a few decisions Input into some decisions Input in most or all decisions No answer / I don't know

Food crop farming: These are crops that are grown primarily for household food consumption. (1) (2) (3) (-7)

Cash cotton farming: These are crops that are grown primarily for sale in the market. (1) (2) (3) (-7)

Cash other crop farming: These are crops that are grown primarily for sale in the market. (1) (2) (3) (-7)

Non-farm economic activities: Small business, self-employment, buy-and-sell. (1) (2) (3) (-7)

Wage and salary employment: in-kind or monetary work both agriculture and other wage work. (1) (2) (3) (-7)

24. When decisions are made regarding the following aspects of household life, who normally takes the decision?



Self	Partn er/Sp ouse	Self and partn er/sp ouse jointl y	Other hous ehold mem ber	Self and other hous ehold mem ber(s)	Partn er/Sp ouse and other hous ehold mem ber(s)	Some one (or grou p of peopl e) outsi de the hous ehold	Self and other outsi de peopl e	Partn er/Sp ouse and other outsi de peopl e	Self, partn er/sp ouse and other outsi de peopl e	No answ er / I don't know
------	------------------------	--	--------------------------------------	--	--	--	---	---	--	---------------------------------------

your (singular) wage or salary employment, expenditures	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
major household expenditures (such as a large appliance for the house like refrigerator)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
minor household expenditures (such as food for daily consumption or other household needs)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>
for family (e.g.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>



children's schooling)												
For the community (e.g. like small wells, roads, water supplies)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>	
professional spending (buying farming equipment or seeds)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(6) <input type="radio"/>	(7) <input type="radio"/>	(8) <input type="radio"/>	(9) <input type="radio"/>	(10) <input type="radio"/>	(-7) <input type="radio"/>	

25. To what extent do you feel you can make your own personal decisions regarding these aspects of household life if you want(ed) to?

	Not at all	Small extent	Medium extent	To a high extent	No answer / I don't know
your (singular) wage or salary employment, expenditures	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
major household expenditures (such as a large appliance for the house like a refrigerator)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
minor household expenditures (such as food for daily consumption or other household needs)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>



for family (e.g., children's schooling)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
community (e.g., like small wells, roads, water supplies)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>
professional spending (buying farming equipment or seeds)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(-7) <input type="radio"/>

2.7 Group membership

26. In which of these groups are you an active member?

- (1) Agricultural / livestock/ fisheries producer's group (including marketing groups)
- (2) Water user's group
- (3) Forest user's group
- (4) Credit or microfinance group (including SACCOs/merry-go-rounds/ VSLAs)
- (5) Mutual help or insurance group (including burial societies)
- (6) Trade and business association
- (7) Civic groups (improving community) or charitable group (helping others)
- (8) Local government
- (9) Religious group
- (10) Other, please specify:
- (11) Other women's group (only if it does not fit into one of the other categories)

Please specify "Other":

2.8 Speaking in public

27. Do you feel comfortable speaking up in public to help decide on infrastructure (like small wells, roads, and water supplies) to be built in your community?

- (1) No, not at all comfortable
- (2) Yes, but with a great deal of difficulty



- (3) Yes, but with a little difficulty
- (4) Yes, fairly comfortable
- (5) Yes, very comfortable
- (-7) No answer

28. Do you feel comfortable speaking up in public to protest the misbehaviour of authorities or elected officials or of persons in professional environment?

- (1) No, not at all comfortable
- (2) Yes, but with a great deal of difficulty
- (3) Yes, but with a little difficulty
- (4) Yes, fairly comfortable
- (5) Yes, very comfortable
- (-7) No answer

2.9 Influence on the allocation of time to productive and domestic tasks

29. Please give us your best estimate on how much time you would spend on the following aspects in a typical day (starting yesterday morning at 4 am, finishing at 3:59 am of the current day).

*Please administer using the protocol in the enumeration manual:
let the participant narrate their day. Then do the calculations yourself per activity. Then enter the number of minutes in total accordingly.*

Night/ Morning/ Day - 4:00 am-3:59 am

Sleeping and rest	_____
Eating and drinking	_____
Personal care	_____
School (also homework)	_____
Work as employed	_____



Own business work	—
Farming/livestock/fishing	—
Shopping/getting service (incl health services)	—
Weaving, sewing, textile care	—
Cooking	—
Domestic work (incl. fetching wood and water)	—
Care for children/adults/elderly	—
Travelling and commuting	—
Watching TV/listening to radio/reading	—
Exercising	—
Social activities and hobbies	—
Religious activities	—
Other, specify below.	—

Please specify "Other" here.



2.9 Influence on the allocation of time to productive and domestic tasks

30. How satisfied are you with your available time for leisure activities like visiting neighbours, listening to the radio, seeing movies, or doing sports or other hobbies?

- (1) Not satisfied

- (2) ---
- (3) --
- (4) -
- (5) -+
- (6) ++
- (7) +++
- (8) ++++
- (9) Very satisfied
++++
- (10) No answer

3 Contribution of CmiA on Women Empowerment

[This is an important question for a later group comparison]

31. How many separate training sessions given by the Managing Entity or intermediary have you attended in the last season?

- (1) 0
- (2) 1-3
- (3) 4-6
- (4) 7-10
- (5) more than 10, please specify:
- (-7) No answer

Please state the number here if you selected "more than 10":

3 Contribution of CmiA on Women Empowerment

32. What is the main reason you did not attend any training sessions related to cotton given by the cotton company and/or lead farmer?



- (1) No training sessions available in my village.
- (2) Too busy to attend.
- (3) Did not know about the trainings in time to attend.
- (4) No interest in training due to the subject/methods.
- (5) I sent someone else to attend the training for me.
- (6) I have limited resources to dedicate to transportation.
- (7) I have other responsibilities related to housework and childcare
- (8) Someone else does not allow me to.
- (9) As a mother, there is no possibility to take care of my child while attending the training. *[ask for mothers]*
- (10) It is very difficult to commute to the training location due to unpredictable weather conditions.
- (11) The way to the training location from my village is dangerous.
- (12) Other, please specify:

Please specify "Other" here:

33. On which of the following topics have you received training from the managing entity or intermediary *[Name of Managing Entity or intermediary]*?

- (1) Crop rotation
- (2) Soil fertility techniques
- (3) Early planting
- (4) Correct plant population (plant spacing, gap filling, thinning)
- (5) Weed control (Timely weeding, weed control methods, herbicide use)
- (6) Integrated pest management (Identification of pests and beneficial insects; Scouting with pegboard; Decision to spray/Not to spray)
- (7) Proper use and storage of pesticides



- (8) Harvest techniques
- (9) Business skills
- (10) Problems with child labour
- (11) Women famer in the agricultural sector
- (12) HIV prevention
- (99) No answer

34. To what extent do you agree with the following statements on a scale from 1 (strongly disagree) to 5 (Strongly agree):

The trainings provided by the managing entity or intermediary I have a contract with have ...

	Strongly disagree	Disagree	Neutral	Agree	Strongly agree	No answer
... enabled me to make more decisions related to crop farming (input, selling. etc)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... increased my access to resources (seeds, tools. Etc.) for cotton farming.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... given me more technical knowledge on cotton farming or cotton sales.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... helped me increase my farming-related income.	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
... helped me dedicate more time to working	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>



on the farm as opposed to housework.

... enabled me to have a stronger voice in advocating for my rights and needs. (1) (2) (3) (4) (5) (-7)

... enabled me to learn more about the role of women in cotton farming. (1) (2) (3) (4) (5) (-7)

... enabled me to learn more about specific needs and challenges for women in farming. (1) (2) (3) (4) (5) (-7)

... given me information on my contractual rights as a farmer (1) (2) (3) (4) (5) (-7)

3 Contribution of CmiA on Women Empowerment

35. To which extent do you agree with the following statements on a scale from 1 (strongly disagree) to 5 (Strongly agree)?

	Strongly disagree	Disagree	Neutral	Agree	Strongly agree	No answer
Only women should do domestic chores (housework).	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Only women are responsible for care	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>



work (taking care of elders and children).

Women are also entitled to time for themselves on an equal basis. (1) (2) (3) (4) (5) (-7)

36. For each of the following trainings, please rate how much you agree with the following statement on a scale from 1 (strongly disagree) to 5 (Strongly agree):

I have applied the skills and knowledge acquired in the training on:

	Strongly disagree	Disagree	Neutral	Agree	Strongly agree	No answer
Basic agricultural techniques	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Conservation techniques to improve soil fertility/health (water management)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Integrated Pest Management (IPM)	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Proper use and storage of pesticides	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Post-harvest handling and grading	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Business skills	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>



CmiA Child Labour standards	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
Gender	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>
HIV	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>

3 Contribution of CmiA on Women Empowerment

37. Are you familiar with the mechanism to report inappropriate sexual behaviour implemented by staff of [name of managing entity or intermediary]?

- (1) Yes
- (2) No
- (-7) No answer

38. Do you feel safe in your work?

- (1) Yes
- (2) No
- (-7) No answer

39. For each statement below, please rate your level of agreement on a scale from on a scale from 1 (strongly disagree) to 5 (Strongly agree):

	Strongly disagree	Disagree	Neutral	Agree	Strongly agree	No answer
I feel I can receive sufficient help from <i>[name of Managing Entity or intermediary]</i> when (if) I am confronted with sexual harassment or assaulted in any way	(1) <input type="radio"/>	(2) <input type="radio"/>	(3) <input type="radio"/>	(4) <input type="radio"/>	(5) <input type="radio"/>	(-7) <input type="radio"/>



that makes me feel unsafe as a woman/ as a man.

I feel that my complaints in those regards will be taken seriously, and the proper procedures will be put into place. (1) (2) (3) (4) (5) (-7)

40. How do you normally receive payment for your work with the Managing Entity or intermediary?

- (1) I receive my income personally on a regular basis.
- (2) A member of my family usually receives my income and is responsible for income management in the household.
- (3) Both a & b
- (-7) No answer / does not apply

3 Contribution of CmiA on Women Empowerment

41. For each statement about your working conditions in cotton farming below, please rate your level of agreement on a scale from 1 (strongly disagree) to 5 (Strongly agree):

For enumerators: please check if the pregnancy and nursing question apply

Strongly disagree Disagree Neutral Agree Strongly agree No answer

I am receiving fair pay for my work in cotton farming regardless of my male gender. (1) (2) (3) (4) (5) (-7)

I am receiving fair pay for my work in cotton farming regardless of my female gender. (1) (2) (3) (4) (5) (-7)



I am receiving fair pay for my work in cotton farming regardless of my gender. (1) (2) (3) (4) (5) (-7)

In case of pregnancy, I am able to avoid work that could endanger my health (1) (2) (3) (4) (5) (-7)

I feel comfortable nursing my child, while working on the farm or in the ginneries. (1) (2) (3) (4) (5) (-7)

I get the same opportunities to learn / develop (new) skills as much as anyone else regardless of my gender. (1) (2) (3) (4) (5) (-7)

I have the same opportunities to become a lead farmer as the men in my community. (1) (2) (3) (4) (5) (-7)

42. Are you a lead farmer?

- (1) Yes
- (2) No
- (-7) No answer

43. Are you a member of any women group or women cooperative?

- (1) Yes
- (2) No



(-7) No answer

4 Wrap-Up

Thank the farmer for doing the survey.

Explain to the farmer that we will treat her/his information carefully.

Press "Finish"-Button.



ABOUT THE AID BY TRADE FOUNDATION

The Aid by Trade Foundation (AbTF) was founded in 2005 and is now an internationally renowned and active nonprofit organization for sustainable raw materials. Through its work, it makes a decisive and measurable contribution to improving the living conditions of people and animals and to protecting the environment. With its certified raw materials Cotton made in Africa (CmiA), Cotton made in Africa Organic (CmiA Organic), Regenerative Cotton Standard (RCS) and The Good Cashmere Standard (GCS), the foundation puts its goals into practice. A globally active alliance of textile companies and brands requests the certified raw materials and pays a license fee to the foundation's marketing company, ATAKORA Fördergesellschaft GmbH. This entitles the partners to market their goods with the labels of the standards. In view of the increasing challenges small-scale farmers and textile companies are facing, the standards are of fundamental importance for their resilience and future viability. The AbTF works in close cooperation with industry experts, animal welfare and nature conservation specialists.

With the Cotton made in Africa (CmiA) initiative, AbTF is putting its principles into practice. The trade partners of the CmiA Demand Alliance source African cotton produced according to the CmiA standard and pay the foundation a volume-based license fee that is reinvested in the cultivation areas. Consumers recognise products by the CmiA label and make a valuable contribution to protecting the environment and supporting smallholder farmers and their families in Africa.

Aid by Trade Foundation

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