



**COTTON EXPERT
HOUSE AFRICA**

Cotton Expert House Africa gGmbH · Eulenkrogstraße 82 · 22359 Hamburg · Germany



2nd Pan-African Cotton Conference Report

**1-2 November 2018
Kampala, Uganda**

Tel. +49 (0) 40 6 03 06 761

info@cotton-house-africa.org
www.cotton-house-africa.org

The 2nd Pan-African Cotton Conference, 1-2 November 2018 at The Sheraton Hotel, Kampala, Uganda

Synopsis

The second Pan-African Cotton Conference organised by the Cotton Expert House Africa (CHA) in cooperation with the Cotton Development Organisation (CDO) of Uganda was held in Kampala, Uganda at the Sheraton Hotel from the 1st to the 2nd of November 2018. The field-to-fashion producer Fine Spinners Uganda Ltd. and the Western Uganda Cotton Company (WUCC) also played an important role in the successful organisation of the conference. The two-day conference was preceded by a welcome gala dinner on the 31st of October 2018 and complemented by an excursion to Fine Spinners Uganda Ltd. on the 3rd of November 2018.

The objectives of the conference were to provide a platform for stakeholders in the African cotton sector to network, share information and experience with sustainable cotton production, and identify collaboration opportunities via the Cotton Expert House Africa. The conference facilitated classical expertise presentations, panel discussions and thematic group work sessions. Contributions covered current approaches and on-going developments in the regions of East and Southern Africa and West and Central Africa more generally, with specific insights provided by the host country of Uganda.

The conference attracted a total of 155 delegates drawn from 20 different countries. International entities present at the conference included: German Development Cooperation (the German Federal Ministry for Economic Cooperation and Development (BMZ) and Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ)) and Tanzania Gatsby Trust (TGT). Standard-setting organisations played an active role at the conference and were represented by the Better Cotton Initiative (BCI), Cotton made in Africa (CmiA) and Fairtrade Africa. Pan-African organisations, including the African Cotton and Textile Industry Federation (ACTIF) and the Africa Cotton Association (ACA) were represented. Delegates comprised representatives from cotton farmers organisations, cotton companies, ginners and cotton exporters associations, cotton research institutions and government agencies.

The welcome dinner on the 31st of October 2018 was graced by Dr. Eng. Joshua Mutambi, Commissioner of Small and Medium Scale Industries at the Ministry of Trade and Industry in Uganda, who represented Ambassador Julius Onen, Permanent Secretary, Ministry of Trade, Tourism & Cooperatives and Mrs Julia Kronberg, German Head of Cooperation of the German Embassy Kampala. The Pan-African Cotton Conference was officially opened on the 1st of November 2018 by Honourable Christopher Kibanzanga, Minister of State for Agriculture at the Ministry of Agriculture, Animal Industry and Fisheries of Uganda. CHA would like to extend a special thanks to Mrs Jolly Sabune, Managing Director of CDO and Mr Ben Anyama, Chairman of the Board of Directors of CDO, for their contributions towards organising and participating in the conference.

Next year's conference is scheduled to take place in the region of West and Central Africa. Information about the date and venue will be conveyed soon. The Cotton Expert House Africa looks forward to welcoming everyone at this time.

The detailed conference report and presentations are available on [CHA's Website](#).

Opening Remarks

Mr Corin Wood-Jones, Managing Director of the Cotton Expert House Africa, expressed his sincere thanks to the Cotton Development Organisation (CDO) of Uganda without whose collaboration the 2nd Pan-African Cotton Conference would not have been possible. He extended his cordial welcome to the Honourable Christopher Kibanzanga, Minister of State for Agriculture in the Ministry for Agriculture, Animal Industry and Fisheries in Uganda. He thanked Mr Tony Caelers, CEO of Fine Spinners Ltd. and Mr Bruce Robertson, Chairman of the Uganda Cotton Ginners and Exporters Association (UCGEA) for their various inputs towards the preparations of the conference. He stressed that the Cotton Expert House Africa was looking forward to capturing the views and comments made by participants during the conference in order to develop CHA's future strategies and programmes and thereby meet current and future needs of the sector.

Mr Ben Anyama, Chairman of the Board of Directors of CDO, welcomed the delegates in their respective capacities. He thanked CHA for having chosen Uganda as the conference location. He welcomed the request from CHA to hold the conference in Uganda as the conference can make a contribution to the development of Uganda's cotton and textile sector. He explained that CDO, as a government agency and authority for the regulation and promotion of the cotton sector in Uganda, had welcomed the request from CHA to host the conference in Uganda. He hoped that the conference would set in motion collaboration between CHA and the stakeholders of Uganda's cotton sector. Such partnership, he said, could address sectoral challenges such as increasing production and productivity of cotton and the low level of mechanisation at the farm level in Uganda and thereby make a contribution to the development of Uganda's cotton and textile sector.

Mr Bruce Robertson, Chairman of Uganda Ginners and Cotton Exporters Association (UGCEA), thanked CHA for being a diverse and expert body of people. He set the stage for an honest and self-critical discussion about the challenges faced by the African cotton sector and the key features of Uganda's experience that helped the country revive the growth of Uganda's cotton sector. Tracing the development of the cotton sector in Uganda relative to other regional producer countries, he highlighted that the decrease in productivity in the past had occurred because of the structure of the industry, not because of politics. He highlighted that Uganda's marked increase in cotton productivity was rooted in cooperation between ginners, farmers and government representatives, self-funding of the cotton sector without government assistance, public private partnerships and an honest, open and non-confrontational relationship with a president that supports the development of the cotton sector. He reminded the participants that, where stakeholders had a genuine economic interest in working together, the cotton sector could thrive.

Mr Andreas Pletziger, Senior Policy Adviser for Agriculture, Innovation and Agricultural Research of the German Federal Ministry for Economic Cooperation and Development (BMZ) addressed the importance of cooperation by referring to the Sustainable Development Goal 17 and expressed that he was glad to see so many cotton experts discuss opportunities and challenges in the cotton sector. He explained that the Ministry's interest in supporting the cotton sector was rooted in the sector's ability to include people in the global value chains. This is reflected in the establishment of the Partnership for Sustainable Textiles, initiated by Dr. Gerd Müller, German Federal Minister for Economic Cooperation and Development. Members of the Partnership commonly agreed that the share of sustainable cotton should rise to 70% by 2025. He further stressed that certification and continuous improvement were important fields of action for the German government.

Honourable Christopher Kibanzanga, Guest of Honour, Minister of State for Agriculture at the Ministry of Agriculture, Animal Industry and Fisheries of Uganda, officially opened the conference. He vividly illustrated the importance of cotton to Uganda's existence and the role of farmers as constituting the heart of the sector without whose satisfaction the development of the sector was impossible. Hon. Kibanzanga emphasised the need for partnership and the creation of mutual benefits for stakeholders in the cotton sector and the importance of further increasing domestic value addition and the consideration of the impact on the cotton sector across other sectors of the national economy.

Presentations

Keynote presentation “The Path towards Transforming the Cotton and Textile Sector”

Mrs Jolly Sabune, Managing Director of the Cotton Development Organisation (CDO) of Uganda, provided a detailed overview of the development of Uganda’s cotton sector. She touched upon key achievements, challenges, medium-term development plans and opportunities in Uganda’s cotton and textile sector. Describing the cotton sector as a family, she stressed the mutual dependencies that characterise the sector, noting that the cotton sector cannot survive without farmers and ginners. To advocate for the needs and to contribute to the development of the sector, stakeholders have formed associations such as the Uganda Ginners and Cotton Exporters Association (UGCEA) which majorly funds the Cotton Production Support Programme, a joint effort of CDO and UGCEA. She pointed out the benefits that can arise from cotton production considering that cotton has the longest value chain amongst agricultural commodities. She similarly addressed the benefits of promoting domestic value addition which has the potential of creating employment, of increasing farmers’ incomes, of maximising foreign exchange earnings and of creating import substitution.

Keynote presentation “From Field to Fashion”

Mr Tony Caelers, CEO of Fine Spinners Uganda Ltd., illustrated how Fine Spinners created a win-win situation for all stakeholders by enforcing sustainability throughout an entire production chain, that is, from field to fashion, utilising cotton certified by CmiA. He explained that Fine Spinners was gaining a large footprint in the European market because of the unique value proposition they offer. Maintaining a close relationship with the Ugandan government, staff of Fine Spinners are supported in the field by a technical team made available by CDO to develop good agricultural practices. He pointed out that one of the biggest challenges facing the cotton sector was the provision of skills to farmers, such as in relation to the right usage and disposal of pesticides and lint contamination. He further mentioned that inconsistency of supply and quality was a challenge faced by many countries. However, this was not the case in Uganda. Mr Caelers emphasised that cotton was the forerunner of industrialisation and that the cotton value chain had the potential of improving the living conditions of more than half a million cotton families as well as expanding employment opportunities in Africa.

Presentation of CHA: “Current Status and Outlook for Sustainable Cotton Production”

Paving the way for the panel discussion, **Mr Corin Wood-Jones** began his presentation by sketching the characteristics of the African cotton sector. Subsequently, he characterised the global shift towards sustainability that required a significant increase in the production and sale of sustainably grown cotton. He outlined the benefits of sustainable cotton production for African smallholder farmers and African cotton companies and introduced leading sustainable cotton standards, that is, Cotton made in Africa (CmiA), the Better Cotton Initiative (BCI), Organic Cotton and Fairtrade. He made reference to their objectives, their scope, their certification/ verification processes and the challenges of implementation perceived by ginners, producers and the sustainable cotton standards themselves. He noted that collaboration between stakeholders in Uganda had led to tangible improvements in the Ugandan cotton sector. He pointed out the need for such collaborations to reduce the weaknesses, and consolidate the strengths, among the stakeholders in the cotton sector. He subsequently invited the panellists Ms Alexandra Perschau from CmiA, Ms Alia Malik from BCI and Mr Agapeters Kubasu from Fairtrade Africa to make their respective presentations ahead of a panel discussion.

Presentations and Panel discussion on Sustainability Management and the Future of Certification in Sustainable Cotton Production

Ms Alexandra Perschau introduced the participants to the Aid by Trade Foundation (AbTF) which established the CmiA standard and elaborated on the certification process as well as the importance of extension services of ginners that ensure the continuous provision of trainings to farmers. Echoing the Hon. Christopher Kibanzanga, she emphasised that the farmers were at the heart of the CmiA standard. Without the recognition of their value, the production and certification of sustainable cotton would be impossible. She further stressed that financial investments into the “hardware” of cotton would be futile if the “software”, that is, knowledge and training for farmers, was ignored. The ability to fulfill the CmiA requirements is thus importantly influenced by the implementation of trainings.

Ms Alia Malik introduced participants to the mission, aim and people behind BCI, and outlined the holistic approach of BCI, covering environmental, social and economic sustainability. She mentioned the challenges pertaining to cotton production and the reasons why capacity building for farmers was BCI's key approach. She further elaborated on the BCI assurance programme and outlined how BCI was financed and what BCI had achieved. Brands are starting to commit to sustainable cotton up to 100% which brings great opportunities for sustainable cotton production. BCI fundamentally recognises that one organisation by itself cannot achieve a global transformation. For that reason, BCI works with implementing partners around the globe, such as the AbTF in Africa. Cooperation with other standards holds considerably more benefits than focusing on BCI as a stand-alone standard.

Mr Agapeters Kubasu provided an overview of Fairtrade's fields of activity in four African Fairtrade networks as well as the role so far played by cotton through Fairtrade's engagement in the regions. He introduced the cotton plans of Fairtrade in relation to the market, to producers and to governments, and elaborated upon the sourcing coalition for organic Fairtrade cotton from West Africa - a multi-stakeholder initiative that initially focuses on the countries Mali, Burkina Faso, Benin and Senegal. He explained that strong producer organisations, clear accountability mechanisms, benefits to members as well as strong cotton networks that could address and advocate the needs of producers were key to the cotton plans' implementation on the producers' level. Whilst the Fairtrade network's key products are wine, nuts, oils, coffee, banana, flowers, tea and sugar, Mr Kubasu noted that it was Fairtrade's plan to expand cotton sales internationally and thereby overcome the current decline in Fairtrade cotton sales.

CHA "Milestones and recent Developments"

Dr. Gudrun Krause, Operations Manager at CHA, introduced the Cotton Expert House Africa team, located in the headquarters in Hamburg, Germany, as well as in two regional offices in Nairobi, Kenya, and Ouagadougou, Burkina Faso. She provided an overview of the focal areas and support measures of CHA as well as of the outputs of CHA so far and the co-funding opportunities made possible by BMZ/GIZ funds. An overview of current projects as well as of training measures, two pilot projects and the prospective project pipeline for 2019 followed. The beneficiaries of the measures are cotton farmers who are reached through CHA's cooperation with cotton associations, cotton companies and cotton cooperatives. Qualification measures are extended to smallholder farmers as well as cotton companies, whereby the focus is set on capacity building training measures. She listed the criteria for eligibility for co-financing which stipulate that a share of 30% of training and capacity development measures should benefit women and that a co-financing share of approximately 50% must be generated by the supported company. In the spirit of cooperation, CHA administers a free-of-charge Knowledge Management Platform which allows users to access training materials on sustainable cotton production and recent studies and to engage in knowledge exchange with CHA.

SAP Kazinga Channel Pilot Project

Mr Henry Gichohi, Country Manager for Uganda and Rwanda at SAP, gave an introduction to SAP's activities to support the digitalisation of smallholder agricultural businesses singling out the collaboration with the Cotton Expert House Africa and the strategic alliance with GIZ and other private sector partners. He said that the project was centred around a Rural Sourcing Management (RSM) solution being piloted in a joint co-innovation project with Nyakatonzi Growers Co-operative Union Ltd, Western Uganda Cotton Company Ltd and the Uganda Cotton Development Organisation in the Kazinga channel targeting 40,000 smallholder farmers. The RSM solution is a supply chain management software that helps to connect smallholder farmers in developing countries with other value chain actors and is intended to improve the transparency, accountability and access to financial services along the value chain. The RSM solution is a mobile-based (phone or tablet) application that enables (1) the capturing of transaction data like farmer registration, training attendance, price information, input supply, quality grading, sustainability certification, purchases, (pre-)payment and transport logistics electronically and in real time, and (2) the analysis of collected information using off-the-shelf SAP data analysis tools. Mr Henry Gichohi further elaborated on the activities which had been completed in the period up to the end-September 2018. These included an initial partner workshop in Kasese, scoping meetings with cotton companies, finalisation of contracts and onboarding of an associated project being run by GIZ. This will pave the way for a rollout in the first quarter of 2019 with the project ending in 2020.

CIRAD Cotton Seed Improvement Programme

Dr Bruno Bachelier, expert for Zambia at the French Agricultural Research Centre for International Development (CIRAD), provided a description of the cotton sector in Africa citing the low volumes of lint amounting to 7% of global production, and noting some of the major constraints in the sector. This, he said, necessitated the need to support cotton research and development in the reestablishment of local varieties of cotton and setting up a seed multiplication programme to increase the productivity of cotton yield. The seed improvement programme led by CHA is funded by BMZ through GIZ with CIRAD providing the technical expertise. The objective of the programme is to evaluate and improve cotton seed multiplication schemes, up-grade cotton breeding programmes and recover the integrity of the local cotton varieties. The programme targets four pilot countries, namely Zambia, Tanzania, Côte d'Ivoire and Burkina Faso. It entails data collection, SWOT analysis, development of a cotton seed multiplication programme, plus establishment and maintenance of seed plots. The activities are undertaken in two phases. Phase one is concerned with the implementation of a cotton seed study while phase two is intended for sharing the results of the cotton seed study with stakeholders and developing a work plan. Work has already begun in Zambia and Tanzania with initial findings and preliminary recommendations for each country. The next steps will be implementing the cotton seed study in Burkina Faso and Côte d'Ivoire followed by validation and the development of a work plan for the two countries.

Joint and Common Cotton Training of Trainer Approach for Zambia

Addressing the challenges pertaining to the training of extension workers, Consultant **Mr Michael Jenrich** pointed out that extension required that workers' theoretical knowledge was complemented by technical and soft skills in order to communicate their message effectively to the farmers. He further noted that training must be streamlined and coordinated between different organisations and that quality control must be enforced in extension. He emphasised that the promotion of efficient, harmonised and reliable extension services constituted one of the core measures to boost cotton production. Against this background, the Joint and Common Cotton Training of Trainer (ToT) Approach for Zambia was initiated. The assignment was to enhance, coordinate and synchronise ToT approaches and develop options of extension monitoring and evaluation (M&E) in order to improve the quality of extension services. Mr Jenrich introduced the concept of a joint ToT training plan which should include training needs assessment, trainer selection and requirements, a training roster and a budget overview. The organisational structure of the new proposed extension system included a steering committee and master trainers as well as two M&E levels. He explained that a seasonal as well as off-season calendar would be foreseen which would customise training measures to seasonal needs. A National Joint Training Programme would complement and support ToT measures. Reflecting on the effectiveness of ToT approaches, Mr Jenrich further noted the importance of identifying whether farmers actually put into practice the recommendations provided by extension services. If it is found that the farmer fails to follow recommendations, extension workers should consider not to work with the respective farmer. This would send out a strong signal incentivising and rewarding compliance.

Regional Analysis and Synthesis of the Cotton, Textile & Apparel (CTA) Sector in East and Southern Africa - Zambia, Kenya and Uganda

Mr Varun Vaid, Associate Director of Wazir Advisors, set the stage for the discussion of sectoral developments in the region of East and Southern Africa. His presentation was based on a study carried out by SustaiNet Group Ltd. and Wazir Advisors, commissioned by CHA. Analysing the cotton, textile and apparel (CTA) sector in East and Southern Africa, Mr Varun Vaid provided an overview of the research methodology and team structure adopted for the preparation of the study and provided an overview of the importance of the CTA value chain, CTA policies in major producing countries, the change of the global manufacturing base, the characteristics of the CTA sector in Kenya, Zambia and Uganda, the regional SWOT analysis and the recommendations that followed the analysis of the CTA sector. Mr. Vaid emphasised that the region was currently exporting most of the produced cotton, thus also exporting the value additions of the production chain, and stressed that the focus should be set on the production of the end product as it provided the maximum potential for value addition. Different aspects contribute to the development of tangible opportunities in Africa: the availability of cotton, the young population providing the needed workforce, the duty-free market

access in the region (AGOA / EBA / COMESA / EAC / GSP) and finally the increased domestic consumption which is being anticipated.

Overview of the Cotton Industry in Tanzania

Mr Marco C. Mtunga, Director General of the Tanzania Cotton Board (TCB), subsequently provided a detailed overview of the cotton industry in Tanzania. He touched upon the structure of the industry, cotton production, measures to raise productivity through cotton research and collaboration with CHA, ginning, cotton classification and quality control, including measures to control contamination, plus exports and local consumption, investment opportunities in Eastern and Southern Africa and the competitive position of Tanzania. He pointed out that the work with ginners would not be sustainable unless the local community was properly integrated in the support systems so that lessons learned would be carried on after the intervention. Furthermore, he highlighted that the question of how to disseminate knowledge, that is, how to link the government extension services with lead farmers, was critical: if extension is not addressed, the implementation of other measures such as provision of fertilisers and chemicals will not transform the cotton sector.

State of Textile and Garments Sector in Malawi

Speaking about the state of the textile and garments sector in Malawi, **Mr Madaika C. Luwanda**, Executive Director at Cotton Council of Malawi, provided background information on the sector in Malawi, subsequently elaborating on the constraints and opportunities with regard to its development. He further outlined partnership opportunities with CHA. Subsequently, he noted that Malawi was facing similar challenges to other producer countries when it comes to the decline in production and stressed that the issue of seed quality would remain the most critical factor in the quest of increasing the productivity of the cotton sector across the whole value chain.

Biopesticide Adoption in Sustainable Cotton Production: Progress, Constraints and Way Forward – Experiences from Ethiopia, Zambia and Tanzania

Ms Alexandra Perschau delivered a presentation jointly prepared with Mr Hesbon Olweny, Regional M&E Expert at Cotton Expert House Africa in Kenya, on biopesticide adoption in sustainable cotton production, documenting experiences in Ethiopia, Zambia and Tanzania. Ms Perschau explained that the effective management of cotton pests was a major challenge in sustainability programmes and that the minimisation of the adverse effects of pesticides was a top priority for sustainability standards. She introduced success stories in the application of mass trapping of bollworm moths via the mola trap, and the use of plant-based biopesticides such as Solanum. Both methods have received increasing acceptance. Ms Perschau mentioned that the strengthening of collaboration between cotton companies and cotton research institutes was a key recommendation for the way forward, noting that Ginners may not have the answers to questions surrounding the type of biopesticides, the efficacy, target pests, storability and shelf-life of biopesticides. However, free training material on biopesticides is available through CHA's knowledge platform.

Research on Biopesticides in West Africa: CIDT/ COIC/ UPGC and CHA partnership

Dr Vama Etienne Tia, Professor Researcher at the Faculty of Biological Sciences at the Université Péléforo Gon Coulibaly Korhogo (UPGC) provided an overview of the research on biopesticides in West Africa conducted by a partnership amongst CIDT, COIC, UPGC and CHA. He highlighted the problem of cotton crop protection in West Africa and pointed at the dangers of pesticides in respect to soil, biodiversity and human health, deducing that it is imperative to find organic solutions to pest control. Against this background, it is the objective of the project to identify effective plant extracts (biopesticides) for possible integration into cotton plant protection at the national level in Côte d'Ivoire and the sub-region and introduced the beneficiaries, that is, farmers and women's clubs, as well as the study material and study methodology. He explained that the project is making use of a well-equipped laboratory to extract essential oils from plants and that tests have been made combining extracts to find out whether there could be helpful synergies. While he cautioned the participants, stating that tests had so far been carried out at very few test sites and that the study had to be repeated over at least two seasons in order to confirm/refute the potential of the examined plant extracts, he pointed out that the plant extracts could influence the control of the population of certain sucking insects and caterpillars.

Co Financing Partnership CHA – CIDT

Ms Haissata Kaba, Project Assistant at CIDT, delivered a presentation on the co-financing partnership “Improving the Productivity and Income for Producers of Sustainable Cotton” between CHA and CIDT, jointly prepared with Ahissi Kouao, Focal Point and Project Manager at CIDT. She outlined the project objectives as being the consolidation of extension agents on good agricultural practices (GAP), farmers’ capacity building on GAP, gender promotion and the improvement of women cotton farmers’ income, sensitisation against child labour and the improvement of working conditions as well as the consideration of environmental issues at the ginnery level. She pointed out that the project team decided that researchers would visit the farmers to make sure that the farmers really understood the project’s implementation structure and objectives. She presented the target population of staff, farmers and resident women, implementation results and the CmiA certification process with CIDT. Finally Ms Kaba shared the lessons learned and challenges faced during the implementation of the project and pointed at the need to maintain the impact of the project beyond the implementation period as well as the need to integrate all the farmers connected to CIDT into the project.

Thematic group discussions

Following the lunch break and B2B networking on the first day of the conference, participants had the opportunity to join one of three thematic group sessions on certification and verification approaches (experiences, lessons learned, pros and cons, the way forward), continuous improvement and sustainability management (current trends, challenges and the way forward) and biopesticides (further developments, trial results and the way forward). After the coffee break, findings of the group discussions were presented and participants were invited to discuss and share their own experiences in the plenary.

Thematic working group 1 on certification and verification approaches, moderated and presented in the plenary by Mr Tom Apina, Regional Director of Cotton Expert House Africa in Nairobi, discussed the need for standard harmonisation, the question of how the standards address issues of productivity and of how sustainability efforts at ginner level contribute to sustainability efforts at other levels of the value chain. Other subject areas touched upon by participants in the group discussion included the conformity assessment with a particular standard’s requirements undertaken by Afrisat Ltd., the advantages of certification, the speed of service provision under a given standard, standards’ position on GMO cotton, the rationale behind a ginner’s choice of a particular standard and the reasons underlying standards’ decision to operate in one but not in another country. In response to the question of who sets the criteria that govern the standards, Romain Deveze, Global Programme Manager at Better Cotton Initiative, responded that the criteria were the result of a consultative process that took into consideration the expectations of different stakeholders from private sector and civil society. Romain further mentioned that one must not consider standards as the final objective but more as an incentive to progress as standards evolve over time.

Thematic working group 2 on continuous improvement and sustainability management, moderated and presented in the plenary by Romain Deveze, focused on four main issues. Beginning with the definition of continuous improvement, Mr. Deveze stressed that continuous improvement was different from compliance equating to certification. as the end goal was to ensure that the producer continues to reflect on and improve his practices in a progressive manner. To incite farmers to raise their performance in the field, they need to be encouraged by tangible improvements and by initiatives available to a wide spectrum of farmers. In this context, cash-based rewards must be handled with caution. In addition, lead farmers should be identified to serve as examples to other farmers. In relation to the question of how to build successful partnerships, the idea of collaborating with government extension services was highlighted, taking into consideration that the government, as a coordinator, sets the ground rules and ensures that all stakeholders agree on a joint agenda. It was further stressed that the farmer should be understood as a collaborator whose needs a partner must respond to. Finally, the importance of a practically useful M&E framework for the assessment of the gap between farmers’ field performance and the targets was also considered as important.

Thematic working group 3 on biopesticides, moderated and presented in the plenary by Mr Boureima Sanon, Regional Director of Cotton Expert House Africa in Ouagadougou, explored the topic of biopesticides with respect to types and application through the exchange of participants’

country-specific experiences. Participants' main concern was centred around the need to acquire scientific information on the ingredients of biopesticides and the specific impact of biopesticides. Furthermore, the development of biopesticide production raises the question of how to increase the production of the ingredients, such as the cultivation of trees or plants, serving as source for biopesticides. In the thematic group discussions, concern was expressed towards the possibility of farmers abandoning cotton production to instead produce the plants needed for the production of biopesticides. Participants further raised the issues of modes of action, expiry dates for biopesticides, the commercialisation of biopesticide production as well as the marketing and standardisation of biopesticides.