



GEAVET TRAINING PROGRAMME FOR CSA

LIVESTOCK SMART SKILLS AND CLIMATE-SMART POST-HARVEST PROCESSING:

UGANDA

UNIT 3.3 NETWORKING AND COLLABORATION

ENGLISH VERSION

GEAVET Project n° 101129027



Open Educational Resources



Disclaimer: Co-Funded by the European Union. Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Union or the European Education and Culture Executive Agency (EACEA). Neither the European Union nor EACEA can be held responsible for them.

3.3.A. TEAMWORK & MULTISTAKEHOLDER COLLABORATION

PART I – LEARNING MATERIAL

1. Introduction

Teamwork and multi-stakeholder collaboration are essential in agricultural businesses because many challenges in the sector are complex, interconnected, and cannot be solved by one actor alone (Challies et al., 2017). Issues such as climate change adaptation, access to markets, food safety, sustainable production, land use, and value-chain development require the combined efforts of farmers, government institutions, private companies, NGOs, researchers, financial institutions, and community organizations.

In this context, teamwork refers to people working together toward a shared goal by coordinating tasks, sharing responsibilities, and supporting one another (Berger, 2010). Multi-stakeholder collaboration goes a step further by bringing together actors from different sectors, backgrounds, and levels of influence to jointly plan, decide, and act (Baranova, 2022). Effective collaboration is not automatic; it requires deliberate effort, clear roles, trust, and good communication.

2. Teamwork and Group Dynamics in Agricultural Work

In agricultural businesses, teamwork happens every day, even when it is not formally recognized. Farmers work with family members, neighbors, cooperatives, extension officers, traders, transporters, and buyers. These interactions form teams, whether they are informal or organized. Teamwork simply means people working together toward a shared goal, while group dynamics describe how those people interact, communicate, and behave when working together (Berger, 2010).

Group dynamics strongly influence whether a team succeeds or fails (Baranova, 2022). For example, two farmer groups may have the same resources and technical knowledge, but one performs better because members communicate openly, trust one another, and share responsibilities fairly. In the weaker group, misunderstandings, silence, or dominance by one individual may reduce cooperation and motivation. This shows that teamwork is not only about skills, but also about attitudes and relationships.

In practical terms, good teamwork in agriculture can be achieved by creating space for regular communication, agreeing on shared objectives, and making sure that each person understands their role. When people feel actively listened to and respected, they are more willing to contribute ideas, solve problems, and support others (see Unit 3.1-A; Baranova, 2022). Poor teamwork often appears when information is not shared,

decisions are made by only a few people, or conflicts are ignored. Over time, this weakens trust and reduces performance (Berger, 2010).

The graphic below illustrates the main elements of effective teamwork. At the center is the team goal, surrounded by communication, trust, shared responsibility, leadership, and cooperation. If one element is weak, the whole team is affected.

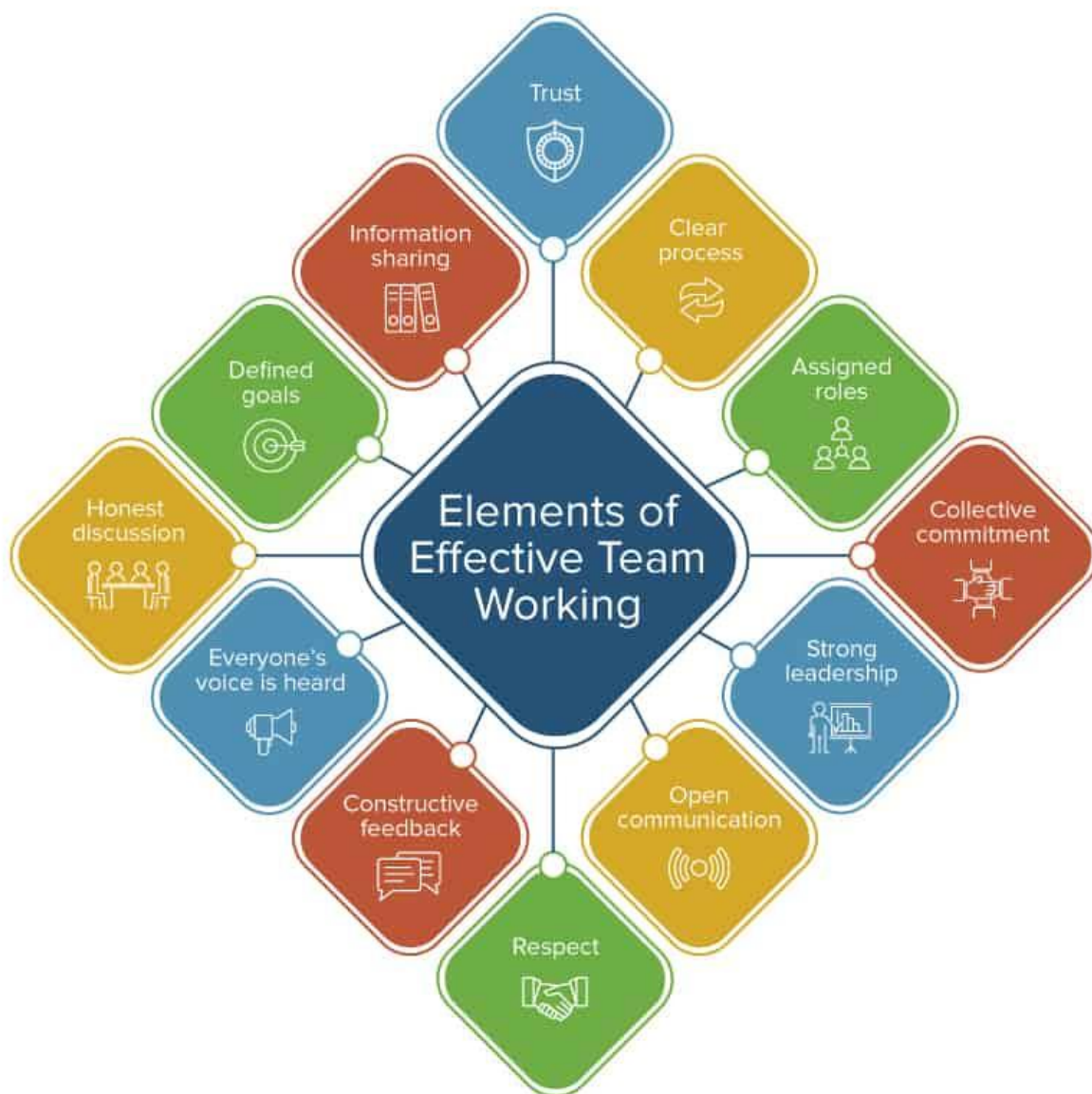


Figure 3. Elements of Effective Teamwork (Simon, 2023)

3. Multi-Stakeholder Collaboration and Understanding Roles

Many agricultural challenges cannot be solved by one group alone. Issues such as market access, climate adaptation, sustainable land use, and value chain development require the involvement of different actors. Multi-stakeholder

collaboration brings together people and organizations from different sectors to work toward a common goal (Aalton & Kujala, 2016).

In agriculture, stakeholders often include farmers, government institutions, NGOs, private companies, financial institutions, researchers, and community organizations. Each stakeholder has different interests, responsibilities, and levels of influence. For example, farmers focus on production and income, companies focus on supply and markets, NGOs focus on capacity building, and governments focus on policy and regulation. Collaboration becomes difficult when these differences are not openly discussed (Aalton & Kujala, 2016).

One of the most common reasons collaboration fails is unclear roles. When stakeholders are not sure who is responsible for what, tasks are duplicated or neglected, and frustration grows (Aalton & Kujala, 2016; Challies et al., 2017). Effective collaboration requires early discussion about expectations, responsibilities, and contributions. This does not mean everyone must do the same thing; rather, each stakeholder should contribute according to their strengths (Challies et al., 2017).

4. Shared Goals, Joint Decision-Making, and Working Together in Practice

Successful multi-stakeholder collaboration depends on agreement around shared goals. While stakeholders may have different interests, collaboration works when they find common ground. For example, farmers want better prices, buyers want quality products, and governments want food security. A shared goal such as improving product quality can benefit all parties.

Once shared goals are agreed upon, stakeholders must make decisions together. Joint decision-making can be challenging, especially when power differences exist. Smallholder farmers, women, or youth may feel less confident to speak in meetings dominated by institutions or companies. For this reason, inclusive communication and facilitation are important. Simple language, clear explanations, and respectful discussion help ensure that all voices are heard (Baranova, 2022).

Pooling resources is another major advantage of collaboration. When stakeholders combine knowledge, skills, equipment, and networks, they can achieve more than working alone. However, resource sharing requires trust and transparency. Clear agreements and regular communication help prevent misunderstandings and build long-term cooperation.

The graphic below illustrates a value chain, showing how different actors contribute at different stages, from production to processing and marketing. It explains how collaboration links these actors together and, thereby, demonstrates why coordination is necessary for success.



Figure 4. A Typical Value Chain in Agriculture (Team, 2025)

5. Problem-Solving and Conflict Resolution in Multi-Stakeholder Teams

Conflict is a natural part of teamwork, especially in multi-stakeholder settings where interests, resources, and power levels differ. In agriculture, conflicts may arise over land, finances, decision-making authority, or unmet expectations. Conflict itself is not the problem; the way it is handled determines whether collaboration improves or breaks down (Wassihun et al., 2019).

Constructive conflict resolution focuses on understanding the root cause of a problem rather than assigning blame. This involves active listening, respectful communication, and willingness to find solutions that benefit the group. When conflicts are addressed early and openly, they can strengthen trust and improve collaboration. When ignored, they often grow and damage relationships (Wassihun et al., 2019).

Learning how to solve problems together helps teams remain focused on their shared goals. This requires practice, reflection, and openness to different perspectives. These skills are essential for effective teamwork in agricultural businesses.

Figure 5 shows a simple conflict resolution process, moving from disagreement to dialogue, negotiation, and agreement. As seen in the graphic, conflict resolution requires a step-by-step process, involving self-reflection, clear goals, and effective communication - as learned in the previous units.



Figure 5. Process Flow for Conflict Resolution (SlideTeam, 2024)

6. Case Study: Multi-Stakeholder Collaboration in Ghana's Cocoa Sector

Ghana is one of the world's leading cocoa-producing countries, and cocoa farming provides livelihoods for millions of smallholder farmers. Despite its importance, the sector has faced major challenges, including low productivity, unstable farmer incomes, environmental degradation, and social issues such as child labor. These problems are complex and interconnected, meaning that no single actor could address them alone (Barrientos et al., 2016).

To respond to these challenges, a multi-stakeholder collaboration was established involving cocoa farmers, government institutions, private cocoa-buying companies, non-governmental organizations (NGOs), and research institutions (Barrientos et al., 2016). The aim was to improve farmer livelihoods while promoting sustainable cocoa production.

Farmers played a central role by organizing themselves into cooperatives and adopting improved farming practices such as better pruning, soil management, and responsible input use (Aidoo et al., 2020). Government institutions supported the collaboration by providing policy guidance, quality control, and extension services. Private companies contributed through training programs, access to markets, and support for sustainability standards. NGOs worked on farmer training, environmental protection, and social issues, while research institutions provided improved seedlings and climate-smart farming knowledge.

Collaboration was supported through regular meetings at community and district levels, where stakeholders shared information, discussed challenges, and made joint

decisions. Farmer cooperatives acted as coordination points, helping farmers communicate with other stakeholders and strengthening their bargaining power.

The collaboration was not without challenges. Some farmers initially distrusted private companies, and disagreements arose over prices, expectations, and the time required to adopt new practices. Power differences between stakeholders also created tension. These challenges were addressed through open dialogue, facilitation by NGOs and cooperative leaders, and early discussion of conflicts to prevent escalation.

As a result of the collaboration, many farmers improved productivity and cocoa quality, while companies benefited from more reliable and sustainable supply chains (Aidoo et al., 2020). Trust between stakeholders gradually increased, making it easier to address new challenges such as climate change.

This case demonstrates that effective teamwork and multi-stakeholder collaboration depend on clear roles, shared goals, regular communication, and constructive conflict resolution. It highlights the importance of working together to achieve sustainable outcomes in agricultural businesses.

7. References

Aaltonen, K., & Kujala, J. (2016). Towards an improved understanding of stakeholder dynamics in project management. *International Journal of Project Management*, 34(8), 1537–1549.

Aidoo, R., Mensah, J. O., & Tuffour, T. (2020). Cocoa farmer participation in sustainability programmes in Ghana. *Journal of Rural Studies*, 76, 127–137.

Baranova, P. (2022). Environmental capability development in a multi-stakeholder network setting: Dynamic learning through multi-stakeholder interactions. *Business Strategy and the Environment*, 31(7), 3406–3420.

Barrientos, S., Asenso-Okyere, K., Asuming-Brempong, S., Sarpong, D. B., & Anyidoho, N. A. (2016). Mapping sustainable production in Ghanaian cocoa. *IDS Bulletin*, 47(3), 71–88.

Challies, E., Newig, J., Thaler, T., Kochskämper, E., & Levin-Keitel, M. (2017). Participatory and collaborative governance for sustainable development: A meta-review. *Sustainability*, 9(8), 701. <https://doi.org/10.3390/su9080701>

Simon, B. (2023, June 29). *Ultimate toolkit for teamworking success*. Smartsheet. <https://www.smartsheet.com/team-working>

SlideTeam. (2024). *5-stage process flow for conflict resolution*. <https://www.slideteam.net/5-stage-process-flow-for-conflict-resolution.html>

Team, E. (2025, October 22). *Agricultural value chain*. EdrawMax.
<https://edrawmax.wondershare.com/value-chain/agricultural-value-chain-analysis.html>

PART 2 – CURRICULUM

Learning Objectives

KNOWLEDGE	SKILLS	ATTITUDES
<p><i>Students will know:</i></p> <ul style="list-style-type: none"> ● The principles of effective teamwork and group dynamics. ● Roles and responsibilities within a collaborative, multi-stakeholder environment. ● Communication strategies for engaging diverse stakeholders. ● The importance of shared goals, trust-building, and accountability in teamwork. ● Techniques for conflict resolution and consensus building. 	<p><i>Student will be able to:</i></p> <ul style="list-style-type: none"> ● Demonstrate effective communication and active listening at all engagements. ● Collaborate with stakeholders from different sectors or backgrounds. ● Facilitate team discussions and support inclusive decision-making ● Apply problem-solving techniques within a team context. ● Manage and resolve conflicts constructively. ● Plan and coordinate joint activities with multiple partners. 	<p><i>Student will develop the following mindset:</i></p> <ul style="list-style-type: none"> ● Appreciation for diversity and inclusion in teamwork. ● Openness to collaboration and learning from others. ● A sense of responsibility toward shared goals. ● Willingness to compromise and contribute positively to group success. ● Respect for the perspectives and contributions of all stakeholders.
<p>TRANSVERSAL SKILLS INTEGRATED:</p> <ul style="list-style-type: none"> ● Critical thinking and problem-solving ● Communication and interpersonal skills ● Leadership and initiative ● Collaboration and team management 		

DIGITAL SKILLS INTEGRATED:

- **Using digital communication tools:** Email, messaging apps, video conferencing for teamwork
- **Collaborative online platforms:** Google Workspace, Microsoft Teams, Trello, etc.
- **Basic digital literacy:** For preparing joint reports or presentations.

GREEN SKILLS INTEGRATED:

- **Promoting sustainable practices during team projects.**
- **Considering environmental impacts in collaborative decision-making.**
- **Supporting eco-friendly approaches when planning multistakeholder activities.**

Implementation plan of pedagogical activities - Scheme of work

Duration: 2.5 hours				
Target: Farmers, Trainers of trainees (ToTs), VET instructors, Women in entrepreneurship				
No. of Activity	Duration	Training Methods / Activity	What the trainers do	What the participants do
1.	50 min	Understanding Teamwork Multi-stakeholder collaboration & Group Dynamics	<ul style="list-style-type: none"> ● Introduce the key concepts of teamwork Multi-stakeholder collaboration ● Facilitate group discussion ● Guide brainstorming on good team characteristics 	<ul style="list-style-type: none"> ● Share experiences ● Participate in discussion and question answer sessions. ● Identify elements of effective teamwork Multi-stakeholder collaboration. ● Ask relevant questions for clarity, take notes for future reference.

2.	40 min	Stakeholder Mapping & Roles in Collaboration	<ul style="list-style-type: none"> ● Provide a multistakeholder scenario and how to ensure there is togetherness. ● Explain different stakeholder roles and how they effectively achieve set targets. ● Support groups/participants as they develop stakeholder maps. 	<ul style="list-style-type: none"> ● Work in groups to identify stakeholders ● Analyse roles, interests, and expectations. ● Present stakeholder maps ● Ask questions related to the topic, take notes for reference, give their feedback regarding the topic.
3.	60 min	Team Problem-Solving & Conflict Resolution Simulation	<ul style="list-style-type: none"> ● Provide conflict/challenge scenario in teams multistakeholder collaboration. ● Task open discussion about it and facilitate role-play and observation ● Lead feedback and debriefing session 	<ul style="list-style-type: none"> ● Take roles/engage in role-play in the given conflict/challenge ● Negotiate and propose solutions ● Reflect on conflict resolution experiences. ● Give suggestions on what possible solutions would be and elaborate how best they will use gained knowledge in their day to day

				engagements with others.
Materials (what trainers need to have prepared):				
<ul style="list-style-type: none"> ● Flip charts ● Markers ● Sticky notes ● Projector/laptop/internet ● Case study handouts ● Stakeholder mapping templates ● Role-play scenario sheets 				
Other notes:				
<ul style="list-style-type: none"> ● Encourage inclusion and equal participation. ● Adapt examples to participants' real-life work. ● Monitor group dynamics closely. ● Integrate digital tools where possible. 				

PART 3 – ACTIVITY GUIDE

DESCRIPTION OF THE ACTIVITIES

1. Understanding Teamwork Multi-Stakeholder Collaboration & Group Dynamics

This activity introduces participants to the foundational principles and behaviors that shape effective teamwork collaboration. It involves an interactive presentation between the trainer and the participants, the trainer explains key concepts such as communication, trust, shared purpose, leadership, accountability, and diversity. Participants are encouraged to reflect on their previous experiences working in teams, recalling situations that went well and those that were challenging and this helps them relate theoretical concepts to practical realities.

The trainer then facilitates a guided discussion on teamwork, multi-stakeholder collaboration and group dynamics, exploring how individual attitudes, roles, and interpersonal relationships influence the functioning of a team. Participants examine the characteristics of a collaborative team and a non- collaborative one, highlighting behaviors like active listening, constructive feedback, cooperation, problem-solving, and respect for differing viewpoints.

1. **Aim of the activity:** To build participants' understanding of effective teamwork, multi-stakeholder collaboration and the factors that influence group dynamics.

2. Duration: 50 minutes

3. Material required:

- Flip charts and markers
- Projector/laptop
- Sticky notes
- Notebooks and pens
- Internet

4. Step-by-step instruction of the task/practical exercise/case study:

- Trainer provides a presentation on the key concepts of teamwork multi-stakeholder collaboration and group dynamics, facilitates open discussion on effective team characteristics.
- Participants brainstorm on the presentation and reflect on their past teamwork collaboration experiences.
- Participants work in small groups to brainstorm enabling and hindering factors on teamwork multi-stakeholder collaboration.
- Each group presents their findings from their small group work/discussion.
- Then the conclusion/summary key insights and links to real-world teamwork multi-stakeholder collaboration situations is done by the trainer.
- The trainer allows question and answer sessions to ensure clarity and full understanding of the activity.

References/Sources/Further materials:

Baranova, P. (2022). Environmental capability development in a multi-stakeholder network setting: Dynamic learning through multi-stakeholder interactions. *Business Strategy and the Environment*, 31(7), 3406-3420.

Berger, H. (2010). Stakeholder Involvement and Team Working in Systems Development Practice. In *Reframing Humans in Information Systems Development* (pp. 263-281). London: Springer London.

Eskerod & Larsen (2018) Eskerod, P., & Larsen, T. (2018). Advances in stakeholder management: A review of contemporary project stakeholder research. *International Journal of Project Management*, 36(6), 1–14.

Straka, D. A. (2017). Collaboration in multi-stakeholder, multi-cultural organizational environments. *Issues in Informing Science and Information Technology*, 14, 163-175.

2. Stakeholder Mapping & Roles in Collaboration

This activity helps participants understand the complexity of teamwork multi-stakeholder collaboration by analyzing the roles, interests, and influence of various actors involved in a shared intervention. This helps to analyze the importance of each stakeholder on board for proper planning, decision-making, problem-solving, and conflict prevention throughout the collaboration. In this session also, participants learn examples of stakeholders for example government institutions, NGOs, private sector actors, community leaders, religious groups, youth and women's associations, and beneficiaries who may come together for a common cause. This can also be done using realistic case study scenarios where collaboration is required to address a community or organizational challenge. By working in small groups, they identify all relevant stakeholders, categorizing them by their capacity, level of influence, interest, expected contribution, potential challenges, and type of relationship they typically and ideally should have with the project.

1. **Aim of the activity:** To develop participants' ability to identify effective stakeholders and understand their roles in collaborative processes.
2. **Duration:** 40 minutes
3. **Material required:**
 - Handouts
 - Stakeholder mapping templates
 - Flip charts and markers, notebooks, pens
 - Projector, internet, laptop
4. **Step-by-step instruction of the task/practical exercise/case study:**
 - The trainer explains stakeholder mapping and provides relevant examples.
 - Assigns groups a case study scenario or asks participants to provide a relevant scenario to discuss about.
 - Participants (this can be done in groups or individuals) identify all possible stakeholders needed.
 - They analyze each stakeholder's interests, roles and responsibilities, and influence/capacity/authority/power.
 - Then they design/draw a stakeholder map.
 - They finally each group/individual present to the main group or plenary.
 - The trainer gives a summary of their presentations, gives key lessons, makes clarifications and addresses any pending questions.

References/Sources/Further materials:

Aaltonen, K., & Kujala, J. (2016). Towards an improved understanding of stakeholder dynamics in project management. *International Journal of Project Management*, 34(8), 1537–1549.

Challies, E., Newig, J., Thaler, T., Kochskämper, E., & Levin-Keitel, M. (2017). Participatory and collaborative governance for sustainable development: A meta-review. *Sustainability*, 9(8), 701–718.

Mabrouk, M., Sperandio, S., & Girard, P. (2014). Stakeholder mapping in a collaborative project for sustainable development. In *IFIP International Conference on Advances in Production Management Systems* (pp. 518-525). Berlin, Heidelberg: Springer Berlin Heidelberg.

Mok, K. Y., Shen, G. Q., & Yang, J. (2015). Stakeholder management studies in mega construction projects: A review and future directions. *International journal of project management*, 33(2), 446-457.

3. Team Problem-Solving & Conflict Resolution Simulation

This activity provides a practical, hands-on opportunity for participants to apply teamwork, negotiation, and conflict-management skills in a simulated real-life situation. The trainer introduces a scenario involving a conflict that requires collaboration for example, allocation of limited resources, disagreement between partners, misunderstandings among stakeholders, or conflicting project priorities. Each participant is assigned a specific role that represents a stakeholder with unique interests and expectations. Participants engage in discussions, negotiations, and decision-making as they attempt to find a mutually acceptable solution and it is done with clear communication, managing emotions, listening actively, and demonstrating empathy and respect for differing perspectives under the observation and guidance of the trainer. After the role-play, the trainer summarizes the whole session, with necessary corrections, while participants reflect on what happened during the role plays, what strategies helped to resolve conflict, what hindered progress, and what teamwork behaviors contributed to or weakened the outcome.

- 1. Aim of the activity:** To enable participants to practice conflict resolution, negotiation, and collaborative problem-solving in simulated teamwork settings.
- 2. Duration:** 60 minutes
- 3. Material required:**
 - Role-play scenario sheets
 - Handouts of the presentation
 - Flip charts
 - Projector/laptop/data (internet)
 - Notebooks and pens

4. Step-by-step instruction of the task/practical exercise/case study:

- The trainer introduces the session, the conflict/problem scenario the participants will base their discussions on.
- Participants tasked to take on roles as partners towards a common goal, they conduct the role-play and negotiate solutions under the observation of the trainer.
- Finally, participants reflect on teamwork and conflict resolution lessons.

References/Sources/Further materials:

Adham, T. K. I. (2023). Conflict resolution in team: Analyzing the conflicts and best skills for resolution. *Scholars Journal of Engineering and Technology*, 11(08), 152-162.

Nguyen, T. N., Ricci, F., Delic, A., & Bridge, D. (2019). Conflict resolution in group decision making: insights from a simulation study. *User Modeling and User-Adapted Interaction*, 29(5), 895-941.

3.3.B. PARTNERSHIP BUILDING AND KNOWLEDGE EXCHANGE

PART I – LEARNING MATERIAL

1. Introduction

Partnership building and knowledge exchange are core competencies for farmers, TVET learners, trainers, and development actors operating in complex, multi-stakeholder agricultural systems increasingly affected by climate change. Climate-Smart Agriculture (CSA) depends not only on technical solutions, but on effective collaboration, shared learning, and coordinated action across institutions, communities, and sectors.

Partnership building is a collaborative, equity-driven approach to forming relationships between organisations, institutions, communities or individuals with a shared commitment to advancing the agreed upon common goal or commitment with an intention of making sure that all stakeholders involved equitably benefit from joint particular cause or initiative.

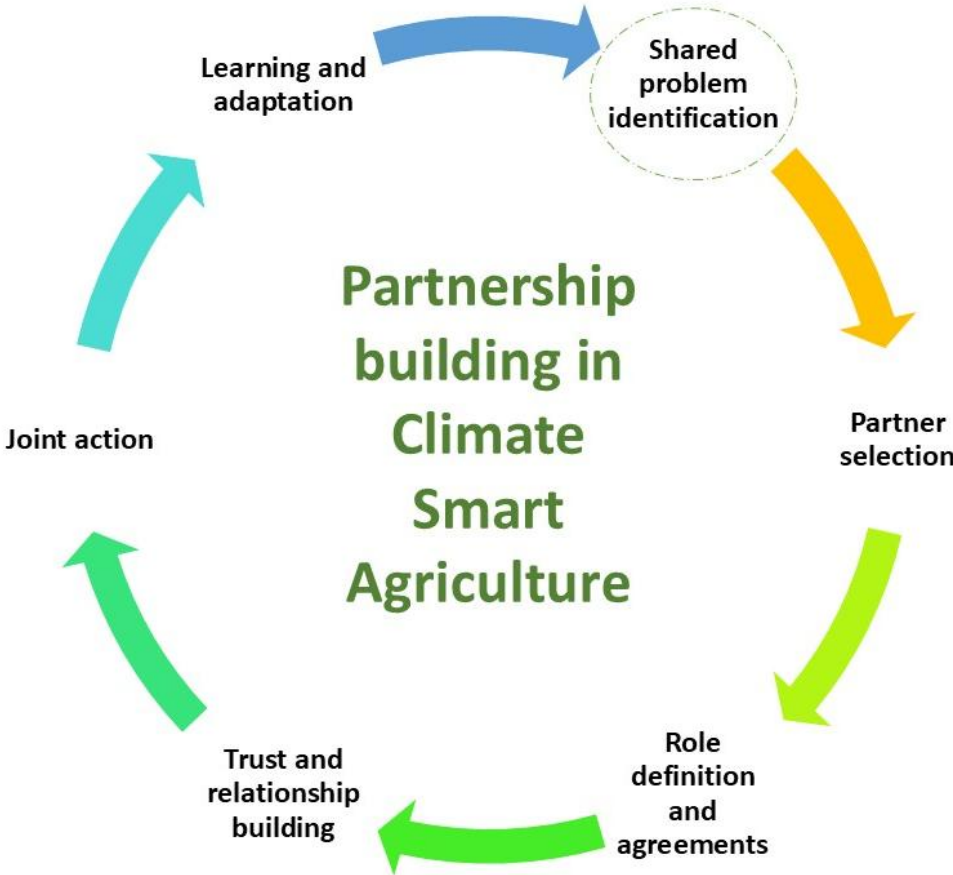


Figure 6. Partnership building as an ongoing and adaptive process in climate-smart agriculture (adapted from Acosta et al., 2019).

The development of effective partnerships is often described as a lifelong process. Partnerships evolve over time and must be reviewed, strengthened, and adapted (Figure 6). Effective partnerships are not transactional, but relational and adaptive, meaning they are built on cooperation, dialogue, and continuous engagement.

Knowledge exchange is the process through which information, skills, and expertise are shared between individuals, organizations, or communities to foster mutual learning and collaboration. It can be understood as a dynamic and fluid process which incorporates distinct forms of knowledge from multiple sources. No single actor (farmer, training institution, extension service, private enterprise, or development agency) holds sufficient resources or knowledge to respond alone to climate variability, market uncertainty, and sustainability challenges (FAO, 2013; CGIAR-CCAFS, 2019).

Across Sub-Saharan Africa, agricultural development initiatives frequently involve partnerships among farmers, TVET institutions, women entrepreneurs, youth groups, research organisations, NGOs, and international partners. These partnerships operate in environments characterised by unequal power relations, diverse knowledge systems, cultural differences, and changing priorities. In such contexts, partnership effectiveness is not automatic and knowledge does not flow naturally unless deliberate structures, behaviours, and processes are established (Mitton et al., 2007; Ward et al., 2012).

In today's competitive working trends, markets, meeting sustainable development goals, especially goal number 17 (partnership for goals) strategic partnership building is more important than ever. Whether it's entering a new market, accessing new technologies, combining resources for innovation or meeting any common goal, well and effectively built partnerships and knowledge exchange facilitate organizations to leverage each other's strengths to meet their common goal's objectives. And it is those in leadership roles and ability to identify, cultivate and nurture the partnerships. Well reciprocal build partnerships and effective knowledge exchange manifest higher levels of achievements.

When building a successful partnership, those in leadership (managers) must develop and refine several advanced skills such as:

- negotiation skills,
- relationship management,
- trust building,
- goal alignment culture and organizational compatibility,
- organisational and leadership skills,
- communication and social skills,
- leadership skills.

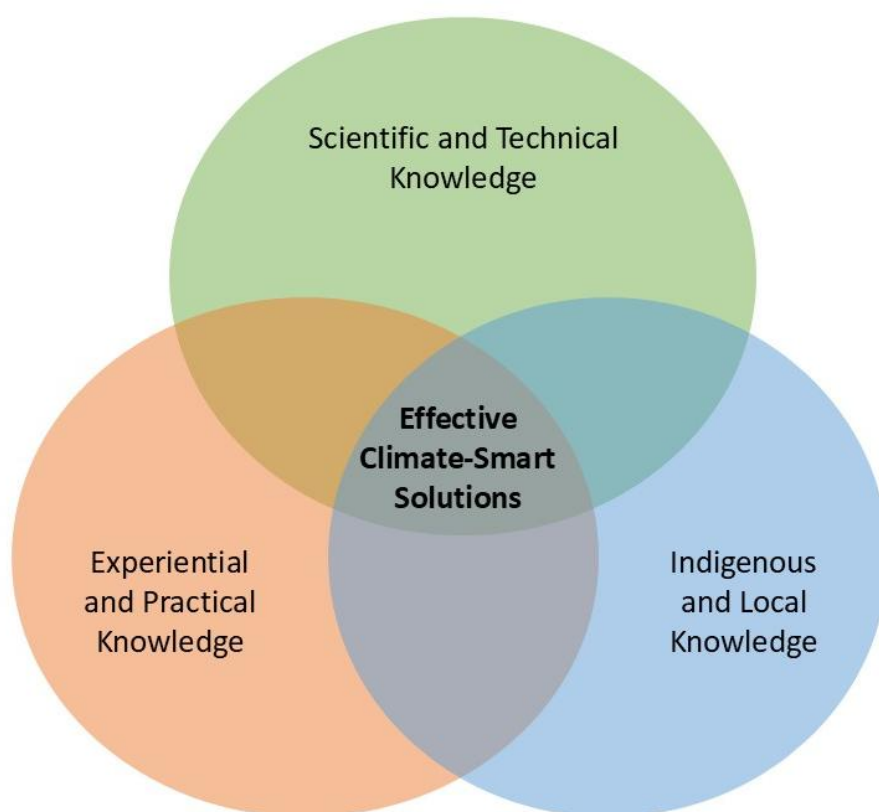


Figure 7. Integration of multiple knowledge types for effective climate-smart agriculture (adapted from FAO, 2020).

Knowledge exchange in CSA contexts is particularly complex. Farmers possess rich indigenous and experiential knowledge of soils, crops, and local climates; TVET institutions contribute technical and scientific expertise; development agencies offer policy, financial, and organisational knowledge. When these knowledge systems are not intentionally integrated, valuable insights are lost, solutions remain fragmented, and adoption of climate-smart practices is weakened (Hope, 2016). Effective CSA requires the integration of scientific/technical, indigenous/local, and experiential knowledge through knowledge networks that enhance collaboration, innovation, and adaptive decision-making (Figure 7; FAO, 2020).

2. Foundations: Partnership Building and Knowledge Exchange in Dynamic Development Contexts

2.1. Classical Approaches to Partnership Building and Knowledge Transfer

Traditional partnership models often assume:

- clearly defined roles,
- stable objectives,

- hierarchical coordination structures, and
- linear flows of information (Mitchell et al., 2009).

In these models, partnerships are established through formal agreements, with knowledge transferred from “experts” to “beneficiaries.” Such approaches can function in stable environments with clearly bounded tasks but are limited when applied to CSA contexts where conditions, actors, and priorities change over time. Similarly, early models of knowledge transfer focused on dissemination rather than exchange, treating knowledge as a static product rather than a socially embedded process (Mitton et al., 2007).

2.2. Limitations in CSA and Multi-Stakeholder Contexts

CSA-related partnerships operate under conditions of:

- climate uncertainty and environmental variability,
- diverse and sometimes conflicting stakeholder interests,
- unequal access to resources and decision-making power,
- multiple knowledge systems with different forms of legitimacy.

Under these conditions, rigid partnership structures and one-way knowledge transfer are insufficient. Research shows that effective CSA initiatives rely on iterative collaboration, mutual learning, and adaptive governance, rather than fixed plans or top-down coordination (Ward et al., 2012; Hope, 2016). Managing expectations, balancing mutual benefits and overcoming communication barriers are the main pathways of addressing challenges in partnership and knowledge exchange.

2.3. A Quick Refresher on Transactional and Adaptive Partnerships in CSA

Partnerships can take different forms depending on how they are designed and managed. **Transactional partnerships** are typically short-term and focused on delivering specific outputs. In such partnerships, roles are usually fixed, and knowledge tends to flow in one direction, often from experts to beneficiaries. Decision-making is hierarchical, with authority concentrated in a leading organisation, and success is measured mainly by immediate results or outputs (Austin & Seitanidi, 2012).

In contrast, **adaptive partnerships**, which are more suitable for climate-smart agriculture (CSA) contexts, are long-term and continuously evolving. Roles within these partnerships are flexible and negotiated over time as conditions and needs change. Knowledge exchange is two-way or multi-directional, allowing farmers, trainers, institutions, and other stakeholders to learn from one another. Decision-making is shared and inclusive, promoting participation

and equity. Rather than focusing only on short-term outputs, adaptive partnerships prioritise learning, resilience, and long-term sustainability.

In an ideal adaptive partnership, problem-solving happens through practical collaboration and shared learning. For example, when farmers begin to experience declining yields due to irregular rainfall, the issue is not solved by simply delivering fixed recommendations. Instead, farmers, extension officers, and trainers come together to discuss observations from the field, review available climate information, and draw on both local experience and technical knowledge. Together, they test options such as adjusting planting dates, changing crop varieties, or improving soil moisture management. As results emerge, the group reflects on what works and what does not, and adapts their actions accordingly. In this way, problem-solving becomes a continuous process of learning, experimentation, and adjustment, supported by open knowledge exchange and shared decision-making.

3. References

Acosta, M., Ampaire, E. L., Muchunguzi, P., Okiror, J. F., Rutting, L., Mwongera, C., ... & Jassogne, L. T. (2019). The role of multi-stakeholder platforms for creating an enabling climate change policy environment in East Africa. In: Rosenstock, T., Nowak, A., Girvetz, E. (eds) *The Climate-Smart Agriculture Papers*. Springer, Cham. https://doi.org/10.1007/978-3-319-92798-5_23

Austin, J. E., & Seitanidi, M. M. (2012). Collaborative value creation: A review of partnering between nonprofits and businesses: Part I & Part II. *Nonprofit and Voluntary Sector Quarterly*, 41(6), 929-968.

CGIAR-CCAFS. (2019). *Climate Smart Agriculture in Sub-Saharan Africa: Practices, Policies, and Financing for Food Security, Adaptation, and Mitigation*. CGIAR Research Program on Climate Change, Agriculture and Food Security.

Food and Agriculture Organization of the United Nations (FAO). (2013). *Climate-Smart Agriculture Sourcebook*. Food and Agriculture Organization of the United Nations.

FAO. (2020). *Climate-Smart Agriculture Sourcebook: Enabling frameworks* (Module C1-3). FAO.

Fowler Davis, S. (2009). Knowledge exchange: capacity building in a small university. *Education+ Training*, 51(8/9), 682-695.

Hope, A. (2016). Creating sustainable cities through knowledge exchange: A case study of knowledge transfers partnerships. *International Journal of Sustainability in Higher Education*, 17(6), 796-811.

Mitchell, P., Pirkis, J., Hall, J., & Haas, M. (2009). Partnerships for knowledge exchange in health services research, policy and practice. *Journal of Health Services Research & Policy, 14*(2), 104-111.

Mitton, C., Adair, C. E., McKenzie, E., Patten, S. B., & Perry, B. W. (2007). Knowledge transfer and exchange: review and synthesis of the literature. *The Milbank Quarterly, 85*(4), 729-768.

Ward, V., Smith, S., House, A., & Hamer, S. (2012). Exploring knowledge exchange: a useful framework for practice and policy. *Social science & medicine, 74*(3), 297-304.

PART 2 – CURRICULUM

Learning Objectives:

KNOWLEDGE	SKILLS	ATTITUDES
<p><i>Students will know:</i></p> <ul style="list-style-type: none"> ● How to understand stakeholders. ● Building trust and relationships. ● Negotiation and alignment. ● Sustainability of partnerships. ● Effective communication. ● Knowledge sharing practices. ● Cross cultural learning and capacity building. ● Inclusivity, participatory and action ability. 	<p><i>Student will be able to:</i></p> <ul style="list-style-type: none"> ● Effective communicate ● Adapt and be flexible. ● Think strategically and solve problems ● Integrity, transparency and professionalism. 	<p><i>Student will develop the following mind set:</i></p> <ul style="list-style-type: none"> ● Collaboration. ● Trust. ● Transparency. ● Continuous learning and practical application
<p>TRANSVERSAL SKILLS INTEGRATED:</p> <ul style="list-style-type: none"> ● Collaboration skills ● Knowledge transfer ● Problem solving ● Negotiation skills ● Time Management. 		
<p>DIGITAL SKILLS INTEGRATED:</p> <ul style="list-style-type: none"> ● Digital collaboration and networking ● Resource mobilization through digitalisation ● Virtual communication and negotiation ● Data and analytics for partnerships ● Digital activity management. 		

GREEN SKILLS INTEGRATED:

- Eco-innovation and technology
- Climate resilient project management
- Green collaboration and networking
- Resource efficiency and circular economy skills
- Environmental justice
- Equity and sustainability literacy.

Implementation plan of pedagogical activities - Scheme of work

Duration: 1.5 hours				
Target: farmers, TOTs, women entrepreneurs, TVET instructors, Youths, Women				
No. of Activity	Duration	Training Methods / Activity	What the trainers do	What the participants do
1.	30 min	Mapping Partnerships in CSA	<ul style="list-style-type: none"> ● Introduce partnership building in CSA using a simple, practical example ● Guide learners in identifying stakeholders, obstacles, and partnership strengthening strategies ● Summarise key lessons and link them to adaptive partnerships 	<ul style="list-style-type: none"> ● Share experiences of working with different agricultural partners ● Identify stakeholders involved in a CSA-related challenge and create a simple partnership map in small groups ● Brainstorm potential obstacles and how to prevent them

2.	30 min	Knowledge Exchange in Action: Combining Local and Technical Knowledge	<ul style="list-style-type: none"> ● Explain knowledge exchange and why multiple knowledge types matter in CSA ● Provide CSA challenge scenarios and support group discussions ● Highlight key learning points and practical applications 	<ul style="list-style-type: none"> ● Identify different types of knowledge held by farmers and other actors ● Analyse a CSA challenge from multiple knowledge perspectives ● Discuss how combining knowledge improves CSA solutions
3.	30 min	Strengthening Partnerships: From Transactional to Adaptive Collaboration	<ul style="list-style-type: none"> ● Explain transactional versus adaptive partnerships using simple examples ● Facilitate reflection and connect lessons to real CSA contexts 	<ul style="list-style-type: none"> ● Analyse a partnership scenario in small groups ● Identify gaps in roles, trust, and knowledge exchange ● Propose adaptive improvements to strengthen collaboration

Materials (what trainers need to have prepared):

- Flip charts and markers
- Sticky notes
- Projector or printed visual of a simple partnership map
- Notebooks and pens
- Flip charts and markers
- Prepared CSA challenge cards or scenarios

- | |
|--|
| <ul style="list-style-type: none">● Projector or printed diagram showing multiple knowledge types● Printed partnership scenario handouts● Projector or printed framework summary |
| Other notes: <ul style="list-style-type: none">● Encourage inclusion and equal participation. |

PART 3 – ACTIVITY GUIDE

DESCRIPTION OF THE ACTIVITIES

1. Mapping Partnerships in Climate-Smart Agriculture

This activity introduces learners to partnership building as a practical and ongoing process in CSA. It helps participants recognise that agricultural challenges such as climate change, market access, and sustainability cannot be addressed by one actor alone. Through guided discussion and group work, learners explore who they currently work with, who they should work with, and why partnerships matter. The activity builds directly on the learning material by translating abstract ideas about partnerships, power relations, and shared goals into concrete examples drawn from participants' own experiences. The activity starts with a short explanation by the trainer on what partnerships are and why they are essential in CSA contexts. Learners then work in small groups to identify stakeholders involved in a real or familiar CSA challenge, such as water scarcity or low productivity - as already learned previously in Unit 3.3-A. By mapping these stakeholders, participants begin to understand differences in roles, influence, and interests. Afterwards, they also brainstorm potential conflict reasons and partnership strengthening suggestions. The activity encourages reflection on inclusion, equity, and coordination, which are critical for effective partnership building. The discussion at the end links group findings back to the concept of adaptive partnerships that evolve over time.

- 1. Aim of the activity:** To help learners understand partnership building in CSA and identify key stakeholders, roles, and power relationships.
- 2. Duration:** 30 min
- 3. Material required:**
 - Flip charts and markers
 - Sticky notes
 - Projector or printed visual of a simple partnership map
 - Notebooks and pens

4. Step-by-step instruction of the task/practical exercise/case study:

- Trainer explains partnership building in CSA using a simple example
- Participants form small groups (4–6 people)
- Each group selects a CSA-related challenge
- Groups identify and list all relevant partners
- Groups draw a simple partnership map
- Short plenary discussion and trainer summary

References/Sources/Further materials:

Challies, E., Newig, J., Thaler, T., Kochskämper, E., & Levin-Keitel, M. (2017). *Participatory and collaborative governance for sustainable development: A meta-review*. *Sustainability*, 9(8), 701.

Nelson, J. (2017). *Partnering for sustainable development*. Harvard Kennedy School.

2. Knowledge Exchange in Action: Combining Local and Technical Knowledge

This activity focuses on knowledge exchange as a two-way and multi-directional process rather than one-way knowledge transfer. It helps learners recognise that farmers, TVET institutions, NGOs, and other actors each hold valuable knowledge that is essential for successful CSA. The activity builds on the learning material by showing how CSA outcomes improve when local, experiential knowledge is combined with scientific and technical expertise. The trainer begins by explaining different types of knowledge found in agricultural systems, such as indigenous knowledge, technical knowledge, and organisational knowledge. Participants then work in small groups to analyse a CSA challenge and identify what each stakeholder knows and contributes. Through discussion, learners see how ignoring certain knowledge sources can weaken solutions and how integration strengthens adoption and sustainability. The activity reinforces respect, listening, and dialogue as core skills for effective knowledge exchange.

1. Aim of the activity: To strengthen learners' understanding of knowledge exchange and the value of integrating different knowledge systems in CSA.

2. Duration: 30 min

3. Material required:

- Flip charts and markers
- Prepared CSA challenge cards or scenarios
- Projector or printed diagram showing multiple knowledge types
- Notebooks and pens

4. Step-by-step instruction of the task/practical exercise/case study:

- Trainer explains knowledge exchange and gives a CSA example
- Participants form small groups
- Each group receives a CSA challenge scenario
- Groups identify knowledge held by farmers, trainers, NGOs, and others
- Groups discuss how knowledge can be combined
- Trainer summarises and links to adaptive knowledge exchange

References/Sources/Further materials:

FAO. (2013). *Climate-smart agriculture sourcebook*. Food and Agriculture Organization of the United Nations.

Mitton, C., Adair, C. E., McKenzie, E., Patten, S. B., & Perry, B. W. (2007). *Knowledge transfer and exchange: Review and synthesis of the literature*. *The Milbank Quarterly*, 85(4), 729–768.

Ward, V., Smith, S., House, A., & Hamer, S. (2012). *Exploring knowledge exchange*. *Social Science & Medicine*, 74(3), 297–304.

3. Strengthening Partnerships: From Transactional to Adaptive Collaboration

This activity helps learners understand the difference between transactional and adaptive partnerships and why adaptive partnerships are more suitable for CSA contexts. Using a simple scenario, participants analyse a weak or short-term partnership and redesign it. The trainer begins by briefly explaining transactional partnerships (short-term, top-down, fixed roles) and adaptive partnerships (long-term, flexible, inclusive). Learners then work in groups to assess a partnership scenario and identify weaknesses related to trust, roles, decision-making, and learning. They propose practical improvements that make the partnership more equitable and sustainable. This activity encourages critical thinking and prepares learners for real-world collaboration challenges.

1. **Aim of the activity:** To enable learners to analyse partnerships and apply adaptive strategies for improved collaboration and learning in CSA.
2. **Duration:** 30 min
3. **Material required:**
 - Printed partnership scenario handouts
 - Flip charts and markers
 - Projector or printed framework summary

4. Step-by-step instruction of the task/practical exercise/case study:

- Trainer explains transactional vs adaptive partnerships
- Participants form small groups
- Each group reviews a partnership scenario
- Groups identify gaps using the framework
- Groups suggest adaptive improvements
- Plenary discussion and trainer reflection

References/Sources/Further materials:

Baranova, P. (2022). *Environmental capability development in a multi-stakeholder network setting*. *Business Strategy and the Environment*, 31(7), 3406–3420.

Hope, A. (2016). *Creating sustainable cities through knowledge exchange*. *International Journal of Sustainability in Higher Education*, 17(6), 796–811.

Mitchell, P., Pirkis, J., Hall, J., & Haas, M. (2009). *Partnerships for knowledge exchange*. *Journal of Health Services Research & Policy*, 14(2), 104–111.