

# 13

## Organising for Change

### *Empowerment for Farmers, Women, Youth, and Communities*

SOPHIA HUYER, RENEE BULLOCK, JACKSON BUZINGO, NITYA CHANANA, ILARIA FIRMIAN, SOPHIE HEALY-THOW, DARA KARAKOLIS, VICTOR MUGO, CATHERINE MUNGAI, MAREN RADENY, JOHN RECHA, AZEEZ SALAWU, STEPHANIE SARGEANT, AND DORIS M. VERTEGAAL

#### Highlights

- Organisational empowerment is a critical pathway to support the sustainable transformation of food systems, mediated through different types of organisations.
- Collective action can be an effective strategy to include marginalised groups who may otherwise be excluded from agricultural development, extension, financing, or other aspects of climate-resilient food security.
- Key empowerment actions by farmer and producer organisations include building capacity, supporting greater access to inputs and information, facilitating the formation of agricultural enterprises, connecting to policy and markets, and encouraging youth membership and leadership.
- A focus on livelihoods, production, and poverty reduction can be a basis for increased agency and influence in decision-making.
- Women's collective action is a platform to access information, technology, and a share of finances, which can lead to agency and leadership in local decision-making.
- For youth organisations, it is important to mobilise finance, provide support to post-production activities, support rural youth networks and recognise the role of young women in food systems.

#### 13.1 Introduction

Working with women, youth, and marginalised people both in collective organisations and individually is a critical pathway to support the sustainable transformation of food systems and can empower at individual, community, and national levels. Collective action can be an effective strategy to include marginalised groups who may otherwise be excluded from agricultural development, extension, financing, or other aspects of climate-resilient food security.

Organisational empowerment considers the collective creation of opportunities for members to achieve individual and collective goals. Agriculture-related organisations address farmers' priorities of resources and knowledge for increased production, providing a platform for their voice and representing them in both policy and public contexts. They promote group agency in the process and results of collective action. In this chapter, we focus on the interrelationships between individuals and community organisations, as well as between organisations and the larger environments in which they exist (Kabeer, 1999; Rothman et al., 2019).

Organisational empowerment in agriculture and food security is mediated through four types of organisations: farmer or producer organisations/cooperatives, women's organisations, youth movements, and community-based organisations (CBOs). These organisations can be active at local, national, or global levels, such as the National Women's Union in Vietnam, the Asian Farmers' Association for Sustainable Rural Development, or the World Farmers' Organisation. The models for organisational empowerment discussed here all move towards empowerment from a base of economic support and access to resources. This base is then combined with empowerment aspects such as participation in household or community decision-making, increased voice and agency, or the ability to influence decisions in local or national contexts (Huyer et al., 2021). It is crucial to engage young people for food-system transformation in the face of climate change, their vulnerability to both current and future impacts of climate change, and given they may also offer ways forward as potential agents of change (HLPE, 2021).

### **13.2 Empowerment for Climate Resilience: Farmer and Producer Organisations and Cooperatives**

These organisations can consist either of mixed-gender groups or have a majority of women or men, while some are also youth cooperatives. In many regions, they are driven by poverty alleviation and advancement of farmers and the rural poor, as well as by access to markets and inputs. Farmer and producer organisations and cooperatives also express voices at different levels, strengthening members' political power so that their concerns and opinions are heard by both policymakers and the public. These organisations mediate access to production information and add production value, as well as developing links with financial service providers. Marketing-oriented organisations facilitate the purchase of inputs and equipment by members, helping them meet quality standards and manage product drying, storage, grading, cleaning, processing, packing, branding, collection, marketing, and transportation. The organisations enable economies of scale, ensuring a more reliable supply to buyers in larger quantities. Importantly, organised farmers have

greater bargaining power and can negotiate with powerful market players, increasing profits to farmers rather than to intermediaries or buyers (Penunia, 2011). Actions to empower such organisations include building capacity, supporting greater access to inputs, and facilitating the formation of agricultural enterprises.

Membership in mixed-gender farmer or producer organisations or cooperatives can empower women (Mwambi et al., 2021). Frequent and notable outcomes of cooperative membership for women include increased participation in decision-making, either at household or local levels, a greater ability to express their voice and act on their own behalf, that is, self-agency, and increased income and production, which improve women's household and community status (Ferguson & Kepe, 2011).

Cooperatives have been an effective mechanism for engaging young people in agriculture and increasing both on- and off-farm employment. Youth can also be encouraged to join existing farmers' organisations or cooperatives, in order to gain access to inputs, services, finance, and markets. In Lesotho and Uganda, Hartley (2014) found that cooperatives encourage youth members to learn 'from' and 'with' each other, leading to new ways of thinking and action. In existing cooperatives, generation-based power relations sometimes constrain young people's potential to assume leadership opportunities, as was found in Kenya dairy cooperatives (Bullock & Crane, 2021). These findings reinforce the need for a legal framework in cooperatives that supports youth engagement.

A notable example of organisational capacity building comes from the Adaptation to Climate Change in the Mekong Delta (AMD)<sup>1</sup> project in Vietnam, supported by the International Fund for Agricultural Development (IFAD). It focused on capacity building for farmers, producers, women, and youth organisations by combining knowledge about climate-smart practices with access to finance for implementation through Climate Change Action Funds (CCAF). AMD's commodity-producer groups, linked with businesses in value chains, constituted new institutions that benefited rural poor households, particularly through 'group funds', a strategy that informed national policy on collaborative groups. The AMD project also created new financial institutions in rural areas, such as the Women's Development Fund and Saving & Credit Groups, improving poor households' access to credit. The project also increased the representation of women in leadership roles: nearly 40 percent of common-interest group leaders in the two provinces were women, and the AMD project was acknowledged by district authorities as a catalyst of empowerment.

The Asian Farmers' Forum supports national farmers' organisations by providing capacity and economic development support. Capacity development support from IFAD strengthened the organisation and its operations, such as

engagement in policy processes and member services. Actions and achievements included access to mobile applications for information and communication in Laos; establishment of a national platform, the Laos Farmers' Network (LFN), that provided visibility and networking with donors and the public sector;<sup>2</sup> partnerships and cooperation with other agencies and countries in Vietnam; information for accessing government and local service providers, and for advertising farmers' products in Bangladesh. It also took concrete steps to increase women's participation and leadership: between 2014 and 2019, female membership more than quadrupled from 4.5 million to 21 million. Women's representation in leadership also increased from 24 percent in 2014 to 63 percent in 2019. One important step has been to set up women's committees and desks in farmers' organisations (FOs) (Firmian et al., 2020).

In Uganda, membership in the Manyakabi Area Cooperative Enterprise generated increased income and expanded production for women farmers (Ferguson & Kepe, 2011), including through sales of maize and beans to the World Food Program (WFP), empowering household and community members. Other benefits of cooperative membership included improved connections with traders from local and external regional markets for maize and beans, pre-market production planning, quality-control training, training on post-harvest handling of specialised crops, plus inputs including seeds and seedlings for maize and bean gardens. Farm productivity increased, improving food security. The social benefits included information dissemination and community development in education, health and hygiene, and financial savings. There were significant empowerment results, including women members reporting greater independence and status, new leadership and business skills, and improved coping strategies.

In summary, key actions to empower farmer and producer organisations include building capacity, improving access to inputs and information, facilitating the formation of agricultural enterprises, connecting to policy and markets, and encouraging youth membership and leadership.

### **13.3 Enabling Agency: Women-Focused Organisations**

Women-focused organisations can be enabling platforms for capacity development that go beyond agriculture to increase resilience as well as empowerment. Women's organisations enable the sharing of experiences, supporting each other in revolving credit, improving production or processing, entrepreneurship, and/or information provision. In this way, collective action can alter women's self-perception by increasing their confidence, improving their negotiating skills, encouraging the transfer of skills to non-members in their networks, and by better influencing household decisions (Ferguson & Kepe, 2011).

Membership in a women's cooperative for sunflower production in Uganda led to concrete economic and empowerment results; membership significantly reduced food insecurity and supported livelihood diversification through the production of other staple crops as well as poultry; members' knowledge of innovative farming techniques and improved seeds increased. Membership in the cooperative significantly enlarged women's influence on decisions in households, local groups, and the wider community (Lecoutere, 2017).

Self-help groups are another widespread form of collective action. A project in Madhya Pradesh, India, funded by the United States Agency for International Development (USAID), worked with women farmers on the development of women-led groups, building their capacity and involving them in the provision of climate-smart agriculture (CSA) technologies, practices, and services. Participation in committees to manage and implement CSA practices and technologies empowered women, integrating them into a prestigious and successful village activity. Their knowledge of climate-resilient practices increased and their access to information improved, resulting in increased community visibility and leadership. Two types of women's groups played a prominent role in the project: one to coordinate management and implementation of climate-smart interventions in Village Climate Management Committees, and the other through custom-hiring centres (CHC), which rented out climate-smart technologies to farmers at affordable rates. Meetings with technical experts, practical demonstrations, experience-sharing, and demonstrations built technical knowledge and adaptive capacity. Entrepreneurship and business management training was provided to run the CHCs, with more than 3 700 women involved (Huyer et al., 2021).

An initial challenge for the CHC in Madhya Pradesh was to convince farmers, particularly men, to use the services provided by their centres. Inability to travel outside their villages limited interaction with farmers from neighbouring villages, affecting the start-up of the CHC. Assistance from NGO partners and participation in multiple-stakeholder forums convinced farmers in and around their village to take advantage of the technologies available at CHCs. Other challenges might include an increase in women's work, given that work in the organisation added to women's other tasks, creating a 'triple burden'. Commercialisation of production in producers' organisations may reduce women's control of farm production; disadvantaged groups, especially older women, may not be able to participate fully in cooperative activities, and low literacy levels may limit people's ability to access market information (Lyon et al., 2017; Mwambi et al., 2021; Ngomane & Sebola, 2019).

Key actions for women's collective efforts include the provision of resources, inputs, technology, and information while increasing their profile and interaction in public community life. This example demonstrates how women's community

organisations increase women's recognition and leadership, improve participation in household decision-making, and afford access to climate information and CSA technologies.

### **13.4 Youth Agency through Movements**

Young people are vulnerable to the current and future impacts of climate change but are also agents of change for sustainable food systems (HLPE, 2021). Youth agency, or the ability to set goals and act upon them, is often influenced by intersecting power relations and social factors, such as gender, age, ethnicity, and education level (Glover & Sumberg, 2020). Effectively harnessing youth skills and energies for sustainable food systems will require significant efforts to redistribute power and transform existing social, political, and economic relationships and conditions within and across countries. Barriers such as access to resources, education, and dignified work within complex political and socio-economic landscapes are often the results of inadequate legal frameworks, insufficient domestic and international resource mobilisation, and political commitment. Engaging young people, particularly those living under the poverty line, in nature-based, cost-effective solutions such as regenerative agroforestry is a sustainable response strategy. Loans specifically targeted at youth for land acquisition are also needed; however, some youth-specific funds such as the Youth Enterprise Development Fund in Kenya have complicated application procedures and low amounts of available capital (Amsler et al., 2017).

Accessibility to resources is highly gendered (HLPE, 2021). In many developing countries, young women's participation in policymaking at household and community levels is particularly challenging owing to gender norms about women's role in decision-making, as well as persistent gender inequalities regarding household assets, information, and access to technology, etc. (Amsler et al., 2017; Huyer, 2016).

Youth movements are one avenue for young people to become agents of change, raise awareness about the need for a food-system transformation, and demand climate-change action (HLPE, 2021). These types of social movements are often self-organised and led by young activists and campaigners from around the globe. One example of a youth movement is the initiative Act4Food Act4Change, launched in May 2021. It is led by young people aiming to create a long-term, global youth movement. With roughly 30 core youth leaders, 105 145 pledges as of November 2021, and more than 200 youth advocates around the world, the initiative encourages young people to pledge and contribute to creating systemic change. It also encourages youth to vote on the actions they would like businesses and governments to take to transform food systems.

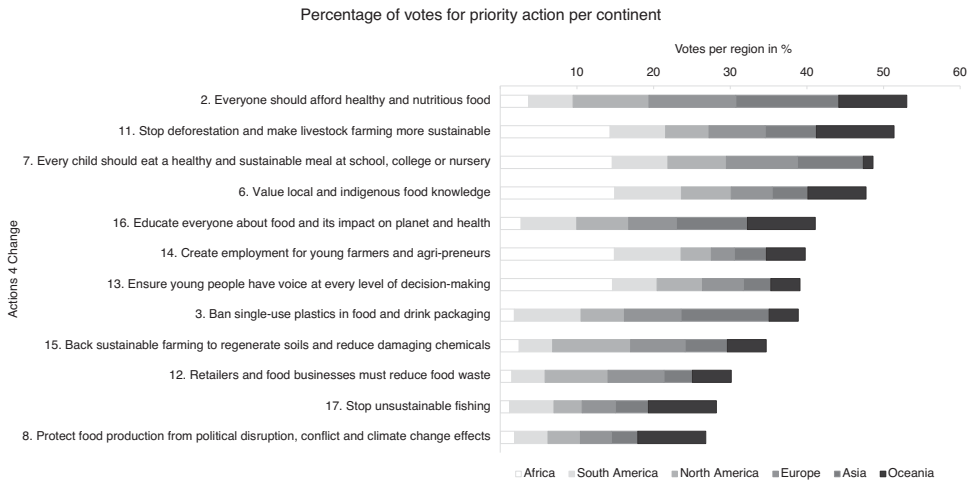


Figure 13.1 Ranking of the top three priorities from each region (four in place of a tie). Preliminary results from online voting on food system actions (n = 20 220)

By November 2021, 17 priority actions were identified through online voting (Figure 13.1). Preferences vary by region. For example, African youth prioritised participation in decision-making, employment, and local knowledge, while in Europe respondents focused on healthy diets, packaging, and education. Actions 2, 6, and 14 are ranked highly across all regions and should be prioritised by policymakers and other key players. These are:

- Everyone should be able to afford healthy and nutritious food,
- Actions should value local and indigenous food knowledge, and
- Create employment for young farmers and agri-preneurs.

Another example is the Climate Smart Agriculture Youth Network (CSAYN), which works with an adaptive mindset, a desire to transform food systems, and an interest in technology. With a passion for sustainable approaches, CSAYN creates awareness and builds the capacity to adopt and benefit from CSA. This network catalyses youth engagement in CSA to unlock decent employment opportunities in the agricultural sector and to transform young people into active agents who cultivate a food-secure world. CSAYN equips students in agricultural sciences and CSA with the knowledge to optimise major agribusiness opportunities. To this end, CSAYN convened a CSA Campus Forum that acted as a showcase for agriculture professionals and successful young farmers who offered peer-to-peer learning and mentoring to students. Research trends reveal a steady decrease in students motivated to become the next generation of agricultural professionals and agri-preneurs. Degree enrolment in agricultural courses is on the decline as

students at the Forum reported a lack of motivation and a negative perception of future career prospects in agriculture (Mugo et al., 2019). Through a novel approach of practical on-farm technological demonstrations, innovations and management practices, CSAYN has established Climate Smart Agriculture Excellence Centres (CSAECs). These act as centres of knowledge transfer for locally appropriate and environmentally sound farming approaches and technologies. Run and led by the youth, they support peer-to-peer learning opportunities and facilitate the scaling of CSA practices among young farmers.

Act4Food Act4Change, CSAYN, and other youth movements demonstrate how youth can make an impact through different pathways. These includes: (1) raising awareness about the urgency of taking immediate climate action; (2) supporting older generations through an intergenerational partnership, where youth can reach out and facilitate discussions within food-system organisations; (3) supporting and aiding the development and adoption of digital technologies in agriculture; and (4) ‘cutting through the baggage’ and bringing crucial networks to the table.

Digital tools and social platforms can be used to create and support youth networks that share advice about climate-adaptation strategies, such as drought-tolerant varieties, as well as agri-climatic and marketing information. Social platforms activated by young people can promote sustainable change.

Young people alone cannot transform food systems, and empowering youth as agents of change will require governments, businesses, and organisations that include both young women and men in decision-making forums across sectors. Governments need to listen to, empower, and engage youth, to ensure that new policies fit the realities of youth. Increased investment and network building is needed to help youth advance their agenda and achieve impacts (Bullock et al., 2020; HLPE, 2021), particularly since ‘young people are disproportionately left out of the financial system’ (ibid., p. 63). For example, climate funds targeted specifically for youth initiatives can support youth agency and capacity. Intergenerational alliances enable youth empowerment for food-system transformation. In the field, generated knowledge and experience from older community members can be used in CSA training and adoption by young farmers (HLPE, 2021).

Generating evidence to support the understanding of young women and men’s opportunities and constraints in food systems is key in climate mitigation and adaptation. Aside from generating knowledge, sharing knowledge can also build youth capacity and support efforts to increase climate-change resilience (Bullock et al., 2020). Through activities such as farmers’ field days and capacity enhancement for teachers, agricultural communities have a better chance of meeting their livelihood needs. Further, youth themselves have emphasised the importance of education and knowledge dissemination. This can improve youth



agency to achieve food-system transformation by (1) emphasising environmental values to raise environmental consciousness; (2) teaching youth to observe problems from a transdisciplinary perspective; and (3) enhancing self-confidence in forums, to convince youth they have the power to shape their own future (Singh, 2021).

Key actions to support youth organisations include:

- **Mobilising finance:** Large amounts of capital are required to invest in improved seeds, fertilisers, and other agricultural inputs, that are not easily accessible to people in rural areas. This is particularly true for youth who may have limited knowledge and experience of financial systems.
- **Supporting post-production activities:** Young farmers need support in their entrepreneurship and post-production value-addition activities. Policies should be put in place to support innovative ideas and solutions across the agricultural value chain.
- **Supporting rural youth networks:** Only a small number of organisations represent rural youth, and those that do often lack financial resources, are small, informal, operate at the local level, and have little bargaining power in policy processes. Rural community networks should be established and strengthened by various stakeholders including government and businesses, to provide better access to loans from financial institutions (Jepson et al., 2014).
- **Recognising the role of young women in food systems:** Access to resources and participation in decision-making is gendered, while other gender norms such as division of labour affect young women's potential to participate and benefit from organising.

### **13.5 Innovation for Resilience: Community-Based Organisations**

Women's organisations and community-based organisations (CBOs) can carry forward social or environmental objectives and enable access to credit through revolving credit or village savings and loan associations (Pamuk et al., 2021), and support other collective action goals that lead to empowerment. They can stimulate inclusive economic growth and poverty reduction in poor rural communities by improving access to productive infrastructure and the services that lead to sustainable agricultural production. They often tackle the lack of access to modern farming technologies of smallholder farmers in remote villages and support private-sector mechanised service providers and maintenance services. They can be an effective platform for introducing new agricultural practices and technologies, generating and sharing resources, and community-building.

From 2011, CCAFS has collaborated with CBOs in Kenya, Tanzania, and Uganda to develop platforms for agricultural learning, farmer advisory services, delivery of agricultural inputs, accessing loans and mobilising farm labour for the construction of soil and water conservation structures. They were also used to promote demonstration farms and act as agricultural knowledge hubs on CSA technologies and innovations, such as resilient crop varieties (Radeny et al., 2018). These groups enable men, women, and young farmers to build social capital and an asset base that increases resilience. For example, in Nyando, ten youth groups have begun horticultural farming using smart farms that consist of greenhouses and solar irrigation, generating produce for local markets all year round. In Nyando, umbrella CBOs consisting of more than 50 mixed farmer and youth groups served 106 villages. About 80 percent of the membership is women or youth below the age of 25. In Lushoto, Tanzania, three CBOs, established in 2012 and in 2014, were transformed into village-savings and credit-cooperative societies; these cover 29 villages and have a direct membership of 1 980 households, with 55 percent being women. In Hoima district of western Uganda, two CBOs organised a membership of 2 700 households in 2018, with 60 percent being women.

Collective action in community organisations in CSA has increased sustainability in rural areas through natural-resource management and conservation structures, tree nurseries, promoting innovation and knowledge in the community, enhancing the bargaining power of rural farmers, paying school fees, and promoting small-scale trade. Challenges for the success of CBOs include lack of organisational experience of volunteer leaders, lack of access to formal finance as members are perceived as financially risky, and inexperience in strategic planning.

### **13.6 Way Forward**

Organising at the community and national levels increases access to resources, promotes social and environmental action, acts as a platform for agricultural innovation and resilience, and promotes agency and voice for groups who may otherwise be left out of climate policy and action.

Farmer organisations, producer organisations, cooperatives, women's organisations, youth-based movements, and CBOs encourage producers, business owners, researchers, investors, and policymakers to innovate in ways that are socially inclusive, reduce poverty, and encourage resilience. They can address major barriers and constraints by increasing access to financial resources, making available technologies that suit women's and youth preferences and tasks, supporting access to markets, and backing their decision-making power at different levels. While youth engagement is crucial in food-system transformation, it should be a multi-generational effort. Youth challenges – fewer resources, knowledge, and

influence in politics – limit their ability to be agents of change (Glover & Sumberg, 2020). Thus, considerable attention to youth issues is needed by many actors in the food system.

Strengthening organisations and their networking at all levels is key to transformation. However, to empower actors it is necessary to move beyond a focus on livelihoods, production, and poverty reduction and also promote voice, agency, and influence on decision-making in households, communities, and nations. Organisations provide the base of economic stability necessary for food security and livelihood development and act as a stepping stone to agency, resilience, and empowerment.

### Notes

- 1 [www.ifad.org/en/web/operations/-/project/1100001664](http://www.ifad.org/en/web/operations/-/project/1100001664).
- 2 [www.ifad.org/documents/38714170/39148759/MTCP2\\_apr.pdf/d9ca7f99-1c5e-4925-8962-d02646b66934](http://www.ifad.org/documents/38714170/39148759/MTCP2_apr.pdf/d9ca7f99-1c5e-4925-8962-d02646b66934).

### References

- Amsler, K., Hein, C. & Klasek, G. (2017). Youth decision making in agricultural climate change adaptations: Research findings from East Africa. CCAFS Info Note. Copenhagen, Denmark: CGIAR Research Program on Climate Change, Agriculture and Food Security (CCAFS). <http://hdl.handle.net/10568/80891>.
- Bullock, R. & Crane, T. (2021). Young women's and men's opportunity spaces in dairy intensification in Kenya. *Rural Sociology*, 86(4), 777–808. <https://doi.org/10.1111/ruso.12385>.
- Bullock, R., Huyer, S., Shai, T. et al. (2020). The CCAFS Youth and Climate-Smart Agriculture (CSA) Strategy. CCAFS Working Paper no. 332. Wageningen, The Netherlands: CGIAR Research Program on Climate Change, Agriculture and Food Security (CCAFS). <https://cgspace.cgiar.org/handle/10568/110552>.
- Ferguson, H. & Kepe, T. (2011). Agricultural cooperatives and social empowerment of women: A Ugandan case study. *Development in Practice*, 21(3), 421–429. <https://doi.org/10.1080/09614524.2011.558069>.
- Firmian, I., Huyer, S. & Mulema, A. (2020). Driving social change for sustainable decisions: Gender-inclusive agricultural transformation. CCAFS Transformation Initiative, 22 June. <https://ccafs.cgiar.org/news/driving-social-change-sustainable-decisions-gender-inclusive-agricultural-transformation>.
- Glover, D. & Sumberg, J. (2020). Youth and food systems transformation. *Frontiers in Sustainable Food Systems*, 4. <https://doi.org/10.3389/fsufs.2020.00101>.
- Hartley, S. (2014). Collective learning in youth-focused co-operatives in Lesotho and Uganda. *Journal of International Development*, 26(5), 713–730. <https://doi.org/10.1002/jid.3000>.
- Huyer, S. (2016). Closing the gender gap in agriculture. *Gender, Technology and Development*, 20(6), 105–116. <https://doi.org/10.1177/0971852416643872>.
- Huyer, S., Gumucio, T., Tavenner, K. et al. (2021). From vulnerability to agency: Gender equality in climate adaptation and mitigation. In *Advancing gender equality through agricultural and environmental research: Past, present and future*, eds. Pyburn, R. &

- van Eerdewijk, A. IFPRI. [www.ifpri.org/publication/vulnerability-agency-climate-adaptation-and-mitigation](http://www.ifpri.org/publication/vulnerability-agency-climate-adaptation-and-mitigation).
- Jepson, P. C., Guzy, M., Blaustein, K. et al. (2014). Measuring pesticide ecological and health risks in West African agriculture to establish an enabling environment for sustainable intensification. *Philosophical Transactions of the Royal Society B: Biological Sciences*, 369(1639), 20130491. <https://doi.org/10.1098/rstb.2013.0491>.
- Kabeer, N. (1999). Resources, agency, achievements: Reflections on the measurement of women's empowerment. *Development and Change*, 30(3), 435–464. <https://onlinelibrary.wiley.com/doi/abs/10.1111/1467-7660.00125>.
- Lecoutere, E. (2017). The impact of agricultural co-operatives on women's empowerment: Evidence from Uganda. *Journal of Co-Operative Organization and Management*, 5 (1), 14–27. <https://doi.org/10.1016/j.jcom.2017.03.001>.
- Lyon, S., Mutersbaugh, T. & Worthen, H. (2017). The triple burden: The impact of time poverty on women's participation in coffee producer organizational governance in Mexico. *Agriculture and Human Values*, 34(2), 317–331.
- Mugo, V., Kamau, H. & Sameul, S. (2019). <https://doi.org/10.1007/s10460-016-9716-1>.
- Mugo, V., Kamau, H. & Samuel, S. (2019). Is climate-smart agriculture the silver bullet to attract youth to agriculture? CCASFS, Nouvelles, 28 June. <https://ccafs.cgiar.org>.
- Mwambi, M., Bijman, J. & Galie, A. (2021). The effect of membership in producer organizations on women's empowerment: Evidence from Kenya. *Women's Studies International Forum*, 87, 102492. <https://doi.org/https://doi.org/10.1016/j.wsif.2021.102492>.
- Ngomane, T. S. & Sebola, M. P. (2019). Women in agricultural co-operatives for poverty alleviation in Mpumalanga Province: Challenges, strategies and opportunities. 4th Annual International Conference on Public Administration and Development Alternatives, 3–5 July 2019. *Southern Sun Hotel*, OR Tambo International Airport, Johannesburg, South Africa.
- Pamuk, H., van Asseldonk, M., Wattel, C. et al. (2021). Farmer field business schools and village savings and loan associations for promoting climate-smart agriculture practices: Evidence from rural Tanzania. CCAFS Working Paper no. 361. Wageningen, The Netherlands: CGIAR Research Program on Climate Change, Agriculture and Food Security (CAAFS).
- Penunia, E. A. (2011). The role of farmers' organizations in empowering and promoting the leadership of rural women. Expert Group Meeting CSW 56, September, 1–8. <https://asianfarmers.org/the-role-of-farmers'-organizations-in-empowering-and-promoting-the-leadership-of-rural-women/>.
- Radeny, M., Ogada, M., Recha, J. et al. (2018). Uptake and impact of climate-smart agriculture technologies and innovations in East Africa. Wageningen, The Netherlands: CGIAR Research Program on Climate Change, Agriculture and Food Security (CAAFS).
- Rothman, L., de Vijlder, F., Schalk, R. et al. (2019). A systematic review on organizational empowerment. *International Journal of Organizational Analysis*, 27(5), 1336–1361. <https://doi.org/10.1108/IJOA-02-2019-1657>.