



Global Conference on Sustainable Agricultural Mechanization (GAMC)

Call to Action (Draft)

29 September 2023

Introduction

The Global Conference on Sustainable Agricultural Mechanization (GAMC) with the theme “*Innovation, Efficiency and Resilience*” was convened at Food and Agriculture Organization of the United Nations (FAO) headquarters in Rome from 27 – 29 September 2023.

Participation

The GAMC had over 8500 online registrations and over 300 attendees in person. 50 FAO Members registered to the event. Most registrations came from Africa (39 percent); second largest group was Asia-Pacific (29 percent). The discussions highlight the contributions and benefits stemming from the sustainable development of agricultural mechanization, showcasing current and emerging technological developments and related business models, supply chain aspects, agricultural machinery standards and the overall enabling environment for sustainable agricultural mechanization. Deliberations were organized in seven thematic sessions across the three-day event. The below call to action points are in line with the implementation of the FAO Strategic Framework 2022-31 and contribute to the achievement of the Sustainable Development Goals.

FAO, we commit to continue to:

- Provide technical support at country, regional and global levels through our existing channels, but to also be in a position to work with all of you to explore new channels and working modalities;
- Encourage, lead and convene more of these policy dialogues;
- Support countries and national governments in developing and implementing national policies, regulations and laws that support sustainable development of agricultural mechanization; and
- Facilitate the establishment and operation of effective mechanisms including a multistakeholder global technical panel to oversee the implementation of the conference call to actions and address the evolving needs and issues related to SAM – and supported by FAO.

[FAO] Members are invited to consider the below call to action points.

Thematic Session 1: Mechanization for Crop Production

- Increase farm power access appropriate to the scales and circumstances of local conditions through a variety of business models (including service provider models) and financing schemes, to reduce drudgery and to increase food security without degrading natural resources.
- Invest and promote precision technologies for crop production including protected cultivation especially for smallholder farming systems.

Thematic Session 2: Post-Harvest and Agro-Processing

- Establish post-harvest supply chains joint ventures in affordable, high-tech, structural and mechanical designs, and logistic systems combined with quality monitoring, prediction, and control methods towards a zero-waste fresh food chain.
- Encourage sustainable quality control practices within agro-processing operations, with efficient energy, water and waste management to make affordable and consumer trusted healthy processed foods ensuring food security. Provide technology transfer and innovation to enhance circular bio-economy practices for a sustainable agrifood chain that reaches all populations, leaving no one behind.

Thematic Session 3: Climate Change and Resilience

- Incentivize climate smart, conservation and precision agriculture type mechanization and management systems, through comprehensive policies that are explicit and sensitive to climate change mitigation and adaptation and disincentivize soil and environment degrading practices. This should include increased training or/and support of extension agencies, financing incentives or/and targeted priority programs for institutions.
- Rate farming equipment and related systems (starting from manual and draught animal power systems) and its management options for goals of emission reduction and natural resource protection. Score agricultural practices relative to, e.g. Conservation Agriculture, quantitatively for GHG emissions and protection of natural resources and biodiversity.

Thematic Session 4: Digitalization and Automation

- Commit to development of technologies tailored to needs of small-holder farmers, enhancing their digital skills. Prioritize training and support for both farmers and service providers in making sustainable data-driven decisions. Establish a robust digital infrastructure that ensures open and equitable access, as a catalyst for sustainable increase of agricultural productivity.
- Pledge to amplify research and demonstration in automation and artificial intelligence, seamlessly integrating them into sustainable agri-food chains. Champion the growth of start-up ecosystems and innovative business models, particularly for small farmers and regions with lower incomes, to fast-track advancements in sustainable agricultural mechanization.

Thematic Session 5: Supply Chain and Standards

- Strengthen the supply chains for agricultural machinery, equipment and implements in developing countries by incentivizing/attracting suppliers and agribusiness to optimally utilize the capacity of local dealers and franchises as well as manufacturers to ensure competitive and continuous provision of services including capacity development of operators and after-sale services.
- Encourage the development and harmonization of standards, test protocols, certifications and data for agricultural machinery, to facilitate the trade of safe and well performing machinery. Facilitate the development and establishment of sub-regional and regional protocols for testing and certification of agricultural machinery, including gender inclusive design.

Thematic Session 6: Business Models and Multi-Stakeholder Engagement

- Enhance business opportunities through comprehensive policies, programmes and institutional collaboration to incentivize, educate and enable farmers and entrepreneurs to develop capacity for local and national levels, meeting the mechanization and service provider needs.
- Promote innovative and inclusive business models along the value chain with involvement of farmers, financing institutions, small and medium scale entrepreneurs (SME) business owners and others to foster entrepreneurship in providing access to mechanization services.

Side Event: Voices of Youth for Sustainable Mechanization and Digitalization

- Attract youth to work and innovate on mechanization and digitalization by creating entrepreneurship incubators, facilitating finance and subsidies, investing in mentorship programmes and enhancing their skills.

Thematic Session 7: Enabling Environment

- Strengthen national and international institutions to explicitly provide coordination and advice on Sustainable Agricultural Mechanization (SAM) and digitalization to the Government and other stakeholders ensuring representation by key public and private stakeholders.
- Create an enabling business environment to make mechanization services more accessible, available, affordable, and timely to all farmers through commercially viable enterprises.

Governments, development partners and all stakeholders are called upon to implement these call to action points, publicize them widely through appropriate electronic and print media, incorporate them into advocacy materials and provide feedback to FAO.

For further information and engagement, please contact the Director of FAO's Plant Production and Protection Division: NSP-Director@fao.org

Please send your comments on the call to action points to NSP-Director@fao.org before 31 October 2023.