

FOOD AND AGRICULTURE ORGANIZATION (FAO)

Topic: “ Strengthening Global Food Security Through Sustainable Agriculture and Climate-Resilient Food Systems”.

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I. COMMITTEE BACKGROUND

The FAO is a specialized agency of the United Nations. Its main goal is to help eliminate hunger, improve nutrition, and promote sustainable agrifood systems. The work of FAO covers many topics such as agriculture, food security, nutrition, fisheries, forests, natural resources, climate change, and rural development. Its Strategic Framework 2022-2031 focuses on transforming agrifood systems to make them more efficient, inclusive, resilient, and sustainable.

II. HISTORY OF THE TOPIC

a. Introduction of the topic

Having enough food does not mean that everyone can access safe and nutritious food. According to FAO, hunger is still affected by problems such as poverty, conflicts, climate change, and high food prices. Food production also depends on important natural resources like water, soil, forests, and biodiversity. Agriculture uses about 72% of global freshwater withdrawals, and around 1.2 billion people live in agricultural areas with serious water problems. Because of this, countries need to produce enough food while protecting the resources needed for the future.

b. Evolution of the topic

In the past, food security was mainly about producing more food. Today, it also focuses on making the whole food system more sustainable and resilient. Climate change makes this challenge harder because droughts, floods, wildfires, and extreme temperatures can affect farmers and food production. Small farmers are especially vulnerable because they usually have fewer resources. Agrifood systems also contribute to climate change, producing about one-third of human-caused greenhouse gas emissions. Therefore, countries need to produce enough food while using resources more efficiently and protecting the environment.

c. Relevant Events

FAO Global Conference on Smart Farming (September 2026):

FAO is organizing the Global Conference on Smart Farming: Leveraging data and technology for sustainable agrifood systems from 1 to 3 July 2026 at its headquarters in Rome, Italy, and online. The three-day conference will explore ways of scaling smart farming systems while showcasing practical innovations that promote youth and women's entrepreneurship, and digital skills. It will also identify priorities for policy, collaboration, and investment to support context-adapted, scalable solutions, particularly for small-scale farmers.

EU Agri-Food Innovation Strategy

The agri-food sector, critical for Europe's economy and society, faces rapid change driven by climate change, technological and market shifts, and rising geopolitical uncertainty. To thrive, Europe must accelerate innovation and turn research results into gains in terms of productivity, resilience, and competitiveness.

Europe is a world leader in research. But much more can be done to strengthen the path from scientific knowledge to delivering tangible benefits for all stakeholders, including farmers, foresters, rural communities, businesses as well as citizens in general.

Post-COP Declarations & Climate Action

At the United Nations Climate Change conference in Paris, COP 21, governments agreed that mobilizing stronger and more ambitious climate action is urgently required to achieve the goals of the Paris Agreement. Action must come from governments, cities, regions, businesses and investors. Everyone has a role to play in effectively implementing the Paris Agreement.

The Paris Agreement formally acknowledges the urgent need to scale up our global response to climate change, which supports even greater ambition from governments. The commitments from all actors are recognized in the decision text of the Paris Agreement, including those launched through the Lima–Paris Action Agenda.

III. CURRENT ISSUES

a. Panorama

Food security remains a major global challenge. Millions of people continue to face hunger, while high food prices make healthy diets difficult to afford, especially for low-income populations. Climate change is also affecting agriculture through droughts, floods, extreme heat, and changing rainfall patterns. These events can damage crops, reduce farmers' incomes, and increase food prices.

Another important issue is the lack of funding for food security and climate resilience. Many developing countries need financial and technological support to improve their agricultural systems and prepare for future crises.

b. Points of View

United States of America

The United States strengthens global food security through coordinated diplomatic, agricultural, and humanitarian programs. The U.S. government's flagship global hunger and food security initiative, which targets poverty reduction, sustainable farming practices, and child nutrition in partner countries. Congress authorized substantial bipartisan funding, including \$960 million in FY2025 and \$720 million in FY2026.

China

China strengthens global food security by boosting domestic self-sufficiency, advancing agricultural technology, and leading international cooperation programs. China enforces a strict policy to maintain at least 1.8 billion mu (120 million hectares) of arable land to safeguard domestic production. China relies on independent breeding for over 95% of its crop varieties and preserves wide-ranging germplasm collections to ensure resilient harvests.

Brazil

Brazil strengthens global food security by combining large-scale sustainable agricultural production with international technical cooperation. Brazil expands food and animal protein output through efficiency and advanced technology rather than increasing land use. As a major global breadbasket, Brazil exports meat, grain, and agricultural products to roughly 150 countries under strict biosecurity standards.

Ireland

Ireland focuses heavily on ending chronic hunger, treating acute child malnutrition, and supporting maternal health. It pledged hundreds of millions in overseas assistance for nutrition initiatives. Ireland channels vital funding into agencies like the World Food Programme (WFP) and the Food and Agriculture Organization (FAO) to build resilient local food systems and respond to global food crises.

United Arab Emirates

The UAE is strengthening food security through the National Food Security Strategy 2051 and global partnerships focused on sustainable farming and technology. The National Food Security Strategy 2051 aims to make the UAE the world's leading country in the Global Food Security Index by 2051. Groups like The Food Innovation Hub UAE bring local farmers and experts together to build better, stronger food systems.

IV. UN & EXTERNAL ACTIONS

a. UN

The United Nations plays an important role in addressing global food insecurity and supporting sustainable agriculture. Through organizations such as the Food and Agriculture Organization (FAO) and the World Food Programme (WFP), the UN provides technical assistance, emergency support, early-warning systems, and agricultural resources to vulnerable countries and communities. In addition, the UN supports international cooperation during food crises caused by conflicts, natural disasters, and extreme weather events. It also encourages countries to invest in climate-resilient agriculture, water management, biodiversity protection, and technologies that can improve food production. The UN recognizes that long-term solutions are necessary. Therefore, its actions focus not only on providing emergency food assistance, but also on building stronger and more sustainable food systems that can withstand future crises.

b. External actions

From the FAO's point of view, food security should be addressed through the transformation of agrifood systems. Countries should not focus only on producing more food, but also on making food systems more sustainable, resilient, inclusive, and accessible. FAO supports solutions such as sustainable agriculture, better water management, climate-resilient farming, biodiversity protection, reducing food loss and waste, and supporting small-scale farmers. FAO also believes that international cooperation is essential. Developed countries, developing countries, international organizations, and the private sector should work together to provide financing, technology, knowledge, and training.

V. CONCLUSION

Security is not just about producing more food. It is about making sure that everyone has access to enough healthy food while also protecting the environment and the resources we will need in the future. Climate change, water shortages, conflicts, high food prices, and the loss of biodiversity make this challenge even more difficult. The FAO has an important role in helping countries face these problems by promoting sustainable agriculture, supporting farmers, protecting natural resources, and improving food systems. However, the FAO cannot solve these problems alone. Countries need to work together and share resources, knowledge, and technology. For this reason, delegates should focus on realistic solutions that fit the needs and resources of their countries. Supporting small-scale farmers, improving water management, reducing food waste, and using new technologies can help build stronger food systems. By working together,

countries can move closer to achieving 2 Zero Hunger while protecting the planet for future generations.

VI. QUESTIONS TO CONSIDER

1. How can countries guarantee food security without damaging the environment?
2. How can developing countries obtain the technology necessary for sustainable agriculture?
3. How can the international community help small-scale farmers?
4. How can countries reduce food loss and waste?
5. How should water resources be distributed between agriculture, households and industry?
6. What role should FAO play in helping countries respond to climate-related food crisis?
7. How can countries protect biodiversity while increasing agricultural production?
8. Should developed countries provide financial or technological assistance to developing countries transitioning toward sustainable agriculture?
9. How can international trade contribute to global food security?
10. What technologies should be prioritized to make agriculture more resilient to climate change?

VII. REFERENCES

Food and Agriculture Organization of the United Nations (FAO). (2021). FAO Strategic Framework 2022–2031. <https://www.fao.org/strategic-framework/en/>

Food and Agriculture Organization of the United Nations (FAO). (2025). The State of Food Security and Nutrition in the World 2025. <https://www.fao.org/publications/fao-flagship-publications/>

Food and Agriculture Organization of the United Nations (FAO). Agricultural Water Management. <https://www.fao.org/land-water/water/agricultural-water-management/water-accounting/>

Food and Agriculture Organization of the United Nations (FAO). Climate Change — Key Messages. <https://www.fao.org/climate-change/fao-at-cop-28/key-messages/en>

5. Food and Agriculture Organization of the United Nations (FAO). Biodiversity.
<https://www.fao.org/biodiversity/es>

6. Food and Agriculture Organization of the United Nations (FAO). Agrifood Systems.
<https://www.fao.org/food-systems/en/>

