

## **Elements of context**

According to [Action Against Hunger](#), nearly two billion people suffer from micronutrient deficiencies, 159 million children under the age of five are chronically malnourished, 50 million are acutely malnourished, while two billion people are obese. Chronic malnutrition has been decreasing since the 2000s, unevenly across the world, but climate change could reverse the trend and push more than 25 million additional children into undernourishment by 2050, compared to a business-as-usual scenario.

A primary cause of malnutrition is the gap between nutritional needs and actual intake. These nutrients are naturally provided by food, whether freshly harvested or processed. According to IPES Food, the industrialized food system promotes the availability of cheap, energy-rich but nutritionally poor processed foods (also known as "empty calories") and tends to sustain malnutrition.

Most options proposed to ensure adequate nutrient intake in low-income countries ignore the fundamental need for dietary diversification. These short-term solutions may be relevant in some specific contexts, especially during crises, and for certain categories of populations, but they cannot meet the challenge of good nutrition in the long term, they may be costly, they are not accessible to all, and they reinforce dependence on food industries.

Solutions that sustainably build the capacity of the most vulnerable to achieve good nutrition should be promoted, according to Action Against Hunger. The most comprehensive and integrated approach to ensuring adequate micronutrient intake is to diversify food production and consumption. By improving the diversity of production and the nutritional content of foods, agroecology increases the availability of nutritious foods at the household and market levels, thereby enhancing food and nutrition security.

With its positive impacts on income, employment, food production, the value and processing chain, consumption and diversification, agroecology meets the requirements of nutrition-sensitive agriculture.

## **Combating desertification and food security**

For the UNCCD, land restoration can be an important driver in the transition to healthy and sustainable food systems. Sustainable and organic farming practices have the potential to produce enough food to feed the world's population while preserving natural resources for future generations. Globally, food systems are responsible for 80% of deforestation and 70% of freshwater use and are the leading cause of terrestrial biodiversity loss. They account for between 21% and 37% of total greenhouse gas emissions. Nearly 80% of agricultural land is devoted to feed and livestock production, yet these activities provide less than 20% of the world's food calories. The carbon footprint of diets varies widely, with many developing countries having less than 20% of that of North American or European countries.

Smallholder farmers produce 80% of the food in developing countries. They are, according to the UNCCD, the essential source of the diversity of diets that ensure food and nutritional security for local communities. Agro-ecological and regenerative methods are particularly well suited to small-scale food producers, who rely on low-tech, labor-intensive practices.

Reducing reliance on external inputs (e.g., agrochemicals and heavy machinery) saves money and reduces negative environmental impacts, such as groundwater pollution, soil compaction, or erosion. In many cases, regenerative practices are effective if farmers can finance the start-up costs associated with revitalizing soil health.

## Working on food security at a national workshop Désertif'actions 2022

**Question to be addressed:** in what ways can agroecology respond to food crises and contribute to the sovereignty of communities in terms of food?

Learn more about food safety:

- [The FAO website](#)
- [The CSM website](#)