## POLICY BRIEF BALANCING THE PLATE AND THE PLANET: A POLICY BRIEF FOR ACHIEVING FOOD SECURITY AND CLIMATE NEUTRALITY





Ensuring food security while advancing climate neutrality is a critical challenge for city and regional governments. On the one hand, food systems contribute significantly to total greenhouse gas emissions. On the other hand, urban populations are growing and climate change is threatening food systems. National and EU policymakers must address this dichotomy and implement coherent policy strategies that promote sustainable food production, equitable access to food, low-carbon food supply chains, and adequate waste management infrastructure. This policy brief examines the link between the objectives of achieving climate neutrality and food security across six dimensions - availability, accessibility, adequacy, stability, agency, and sustainability - and provides key recommendations for developing climate-neutral, sustainable food systems including examples from two European cities, Aarhus and Budapest.

This policy brief highlights key recommendations for how national governments and the EU can encourage further sustainable food systems transformation, considering the vital role of local and regional governments in strengthening food security and ensuring climate neutrality.

## WHY THIS BRIEF? WHY NOW?

Ensuring a high quality of life for all residents in Europe requires having a secure, affordable and equitably distributed supply of sustainable food. Our food systems are increasingly under pressure - from the impact of climate change to unfair global competition, higher energy costs and changing demographics. Building resilient food systems that can withstand and recover from crises is essential. Local and regional governments are increasingly required to respond to disruptions in the food system such as fluctuations in harvest due to increasing severe weather events, supply chain disruptions (like those experienced as a result of the COVID-19 pandemic) and rising food prices due to geo-political tensions and conflicts (like the war in Ukraine).<sup>1</sup>

We need local and regional authorities to continue to take an active role to ensure food security and to reduce the impact of food systems on climate, and they in turn need active support from their national governments and the EU. Just as climate neutrality is a multi-scale responsibility, food security also needs dedicated policy, research, and funding support. This brief provides recommendations to national and EU level policy makers to take a food systems approach and holistically address climate neutrality and food security.

## **BACKGROUND AND CONTEXT**

EU food policy has often been uncoordinated, with different rules and policies not working well together. The <u>Common Agricultural</u> <u>Policy</u><sup>2</sup> (CAP) and other regulations have not created a clear plan to make food systems more sustainable. In 2020, the EU introduced the <u>Farm to Fork Strategy</u><sup>3</sup> as part of the <u>European Green Deal</u><sup>4</sup> to bring a more unified approach. However, its progress slowed due to major challenges like the war in Ukraine, higher living costs, the COVID-19 pandemic, and changing politics. As a result, important actions, such as reducing pesticide use and improving animal welfare, both of which would mitigate agriculture's impact on climate change, have been delayed.

Food systems are both a major contributor to climate change and a key part of the solution. Climate change is projected to negatively impact four of the six dimensions of food security – availability, access, utilisation and stability – and their interactions<sup>5</sup>. Transforming food systems can significantly reduce greenhouse gas (GHG) emissions while delivering social, health, economic, and environmental benefits. For example, managing land-use in a manner that reduces the negative impacts of urbanisation and prevents land degradation from intensive agriculture could reduce global emissions by 18% while enhancing soil fertility, ecosystem



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protection, and climate resilience. Reducing industrial meat production and consumption by half, alongside adopting sustainable diets, could cut emissions by 8% and improve public health.<sup>6</sup> Halving food loss and waste across supply chains could mitigate another 8% of emissions<sup>6</sup>.

There is an increasing acknowledgement for the need of a shift in food systems towards sustainability. This is evident through the growing body of research and activities from the 92 projects, partnerships, networks and living labs participating in the <u>FOOD2030 Online Platform</u><sup>7</sup>, the recently launched <u>FutureFoodS</u> Partnership<sup>8</sup> and prototyping project, FOODPathS.<sup>9</sup> Food systems transformation is the pursuit of comprehensive and interconnected changes for sustainability.<sup>6</sup> It entails transforming production, processing, distribution, consumption, and waste management systems together. It also requires integrated food policies holistic policies that address different sectors and the complex

interplay of social, political, and economic factors that drive food systems - a food systems approach.6

The EU, national and local governments should take a food systems approach and ensure institutional and financial support for Food Policy Councils (FPCs)\* as multi-level governance platforms for collaboration between local and regional governments, food growers, NGOs, businesses, universities, and civil society. They should strengthen the role of FPCs in shaping food policy, integrating sectors like climate, health, security, and trade, and addressing food insecurity through inclusive, placebased approaches. Additionally, city-regions should be represented in the European Board for Agriculture and Food10, and the FutureFoodS Partnership<sup>8</sup> to advise on the needs and challenges faced by local stakeholders and provide recommendations and examples of successful implementation of food system initiatives.

## **POLICY RECOMMENDATIONS**

#### **1. Integrate Food Security and Climate Goals into National and EU Policy Agendas**

### **EU POLICY SHOULD:**

- Strengthen the link between the European Climate Law and food security, ensuring food system priorities are a central component of climate action plans.
- Support cities in implementing food system transformation by funding innovative actions and scaling up best practices across Europe.
- ► Establish clearer guidelines for national governments to integrate food system transformation into climate neutrality goals.

### **NATIONAL GOVERNMENTS SHOULD:**

- ► Mandate stronger compliance with dietary guidelines that promote climate-friendly eating habits and align them with public procurement minimum standards.
- Develop national strategies for food security that balance climate mitigation and adaptation, biodiversity conservation, and long-term food system resilience.
- ► Foster public-private partnerships that support innovation in sustainable food production, including land-use strategies that prioritize ecological sustainability.
- ► Establish multi-level governance structures that institutionalise targeted cooperation between national and local governments.

### 2. Enable Flexible and Supportive Food Procurement Policies

### **EU POLICY SHOULD:**

- ▶ Reform procurement rules to allow prioritization of climate-friendly, and sustainable food in public sector institutions (e.g., schools, hospitals, municipal services).
- ► Introduce EU-wide incentives for cities that integrate sustainable food sourcing into their public procurement strategies.
- ► Revise the EU Procurement Directives enabling local procurers to prioritise local, seasonal products with high environmental and social standards.

### 3. Direct the Public's Money towards Supporting Sustainable and alternative Food Production

## **EU POLICY SHOULD:**

- ► Direct the public's money (e.g., in the framework of the Common Agricultural Policy (CAP)) to incentivize plant-based and regenerative agricultural practices rather than large-scale, intensive and industrial livestock farming.
- ► Introduce financial mechanisms to support farmers transitioning to food crops for human consumption and sustainable land use practices.
- ▶ Ensure fair market conditions for sustainable producers by integrating environmental and social impact criteria into subsidy allocation.

## **BOTH EU POLICY AND NATIONAL GOVERNMENTS SHOULD:**

- ▶ Provide dedicated funding streams for urban food security and sustainability projects, particularly in cities that may not qualify for rural development funds. These funds should support urban farming, food rescue programs, food processing businesses, and community-based food initiatives that contribute to both food security and the achievement of climate goals. Local food strategies ultimately benefit national food security targets.
- ▶ Reduce value added tax (VAT) on fruits and vegetables and create clearer definitions and certifications for local and sustainable food products to support small farmers and promote healthier diets.

\* Food Policy Councils (FPCs) are innovative governance tools that support food system transformation. They connect citizens and stakeholders to identify issues, support initiatives, promote sustainable, healthy, and just food systems, and link civil society with government to influence policy. Most FPCs operate locally, though some exist at regional or national levels. For more, see: den Boer et al. (2023)



## **NATIONAL GOVERNMENTS SHOULD:**

- Establish national frameworks that empower municipalities to procure local, sustainable food without restrictive competition rules.
- Provide financial and logistical support for local Food Policy Councils (FPCs) to bridge gaps between producers, researchers, policymakers, and consumers.
- ▶ Integrate national and local food system priorities into national climate plans, considering climatefriendly procurement and short supply chains.

## **NATIONAL GOVERNMENTS SHOULD:**

- ▶ Implement national-level funding programs that complement EU subsidies to encourage alternative food production models.
- Provide technical and financial support to farmers, especially small-scale farmers, when adopting regenerative agriculture, sustainable land management practices, and alternative protein crops.
- Align national dietary guidelines with subsidy structures to promote climate-friendly diets through incentives for plant-based food production.



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## **CLIMATE NEUTRALITY IN AARHUS REQUIRES FOOD SYSTEMS SUSTAINABILITY**

By harnessing its strong municipal governance and partnerships, Aarhus is demonstrating how local actions can contribute to broader climate neutrality and food security objectives.

As one of the Mission Cities,<sup>12</sup> Aarhus recognizes that food systems are central to achieving climate neutrality by 2030 and has included food as a priority in their work in the Net Zero Cities<sup>13</sup> EU-funded project. With food consumption contributing 26% of household GHG emissions in Denmark, shifting towards sustainable food production and consumption is crucial<sup>14</sup>. The city integrates food security into its climate agenda, acknowledging that sustainable diets, alternative agricultural methods, and local food systems enhance resilience, biodiversity, and public health while reducing carbon footprints.

"Denmark's agriculture-intensive economy puts pressure on land-use and poses a significant threat to biodiversity and soil health. We need to move beyond a narrow focus on efficiency and yield, and begin to operate in a way that is conscious of biodiversity and food system resilience."

Dan Kristian Kristensen, Project Leader for Food Systems in Climate Plan at Technical Dept., Aarhus Municipality



The photo shows the farm <u>Høsteriet</u>, which is located near Aarhus and is run by a community according to regenerative and ecological principles to achieve healthy soil healthy plants and healthy people.

## **SIX DIMENSIONS OF FOOD SECURITY**

The Six Dimensions of Food Security explain the factors that ensure people have enough food now and in the future.

- 1. Availability: Having enough high quality and culturally appropriate food to sufficiently satisfy dietary needs of individuals supplied through domestic production or imports.
- 2. Access (economic, social, physical): Having personal or household financial means to acquire food, whilst ensuring that other basic needs are not threatened or compromised; and that adequate food is accessible to everyone including vulnerable individuals and groups.
- 3. Utilisation: Having an adequate diet, clean water, sanitation and healthcare to reach a state of nutritional well-being where all physiological needs are met.
- 4. Stability: Having the ability to ensure food security in the event of sudden shocks/crises (health, conflict, climate) or cyclical events (seasonal food availability).
- 5. Agency: Individuals or groups have the capacity to act individually to make choices about what they eat; what foods they produce; how food is produced, processed and distributed; and to engage in policy processes that shape food systems. This necessitates socio-political systems that uphold appropriate governance structures.
- 6. Sustainability: Food system practices that contribute to long-term regeneration of natural. social, and economic systems, ensuring the food needs of present generations are met without compromising the food needs of future generations.

Source: HLPE, 2020. Food security and nutrition: building a global narrative towards 2030. A report by the High Level Panel of Experts on Food Security and Nutrition of the Committee on World Food Security, Rome.

The Danish Government focuses on the food security dimensions of utilisation, stability, agency, and sustainability rather than food access and availability, as the country's strong welfare system ensures a robust social safety net. Through national commitments such as Denmark's Agriculture and Climate Policy and the Official Dietary Guidelines, there is a strong commitment to shifting landuse and consumption patterns. Aarhus supports this shift through a localized approach to food system transformation, aligning with broader national goals. For example:

"By serving thousands of meals daily, public canteens and kitchens play a crucial role in shaping more sustainable eating habits. In the City of Aarhus, the Danish official dietary guidelines serve as a valuable tool, highlighting the potential to reduce food-related emissions and improve public health. Through widespread engagement and inspiration, the municipality aims to drive lasting changes in consumption patterns, supporting a more sustainable food system.'

Louise Kaad-Hansen, Development Consultant at Aarhus Municipality

## **ONGOING CHALLENGES RELATED TO FOOD SECURITY IN AARHUS**

Aarhus faces several challenges to ensuring the six key dimensions of food security are met. Changes to national and EU policy can help address these issues.

Availability is constrained by a production system that prioritizes efficiency over resilience, making it vulnerable to external disruptions. Access is influenced by trade policies that restrict local sourcing and procurement, limiting opportunities for a more regionally based food supply. **Utilisation** depends on the willingness of consumers to adopt climate-friendly diets, requiring shifts in habits and awareness. Stability is threatened by the fragility of industrial agriculture and its dependence on subsidised inputs. Agency remains limited due to weak policy support for alternative farming methods and local food initiatives, making it difficult for small-scale producers to thrive. Finally, sustainability is compromised by a lack of sufficient investment in regenerative agricultural practices, slowing the transition to more environmentally friendly food systems.



## **AARHUS' INITIATIVES FOR CLIMATE NEUTRALITY AND FOOD SECURITY**

Recognising the important role of food production and consumption in reducing climate emissions, food systems are now included in Aarhus' Climate **Strategy**<sup>15</sup> with the dimensions of food security embedded through five key initiatives:

- Partnerships with Food System Actors: Collaborating on projects and initiatives with agriculture and food businesses in Aarhus to drive innovation in sustainable food production.
- ► **Promoting Climate-Friendly Diets:** Encouraging plant-based consumption and food literacy, aligned with Denmark's official dietary guidelines.<sup>16</sup>
- Transforming Food Production: Supporting protein transition and plant-based food industries to reduce GHG emissions and improve public health by increasing adherence to official dietary guidelines by 10%.
- Municipal Food Procurement Strategy: Leading by example in public institutions by sourcing sustainable, local food, with a 25% CO2 reduction target and a stronger focus on food waste and climate-friendly purchasing of products, such as legumes, fruit and vegetables.<sup>15</sup>
- **Land-Use Change:** Developing scalable solutions for sustainable agriculture, including regenerative farming models like Aarhus' Food Network and <u>Market for Regenerative Farmers</u><sup>17</sup>, which connects farmers with markets for local, sustainable produce.





## **FOOD SECURITY IN BUDAPEST: A MULTI-DIMENSIONAL APPROACH**

Budapest is taking significant steps to address food security as part of its broader climate and urban resilience strategies, with the Sustainable Energy and Climate Action Plan (SECAP)<sup>18</sup> playing a key role in guiding these efforts. As a city with direct influence over its food systems-through the management of market halls, public catering, and logistics-Budapest is uniquely positioned to drive the transformation of local food systems.

"The City of Budapest has a good basis for transforming the food system and a lot of the needed infrastructure. However, national and EU support in policy reform and funding is essential to better use what we have to transform food systems: city gardens and greening initiatives, market halls, public catering, social institutions addressing hunger, poverty, and housing."

Kinga Lőcsei-Tóth, Deputy Head of Department for Climate and Environmental Affairs at Municipality of Budapest

Rising inflation and food prices, geopolitical crises and the effect of extreme weather events on agriculture have heightened the urgency of food security. In response, Budapest is planning to integrate food-related interventions in the upcoming Short-, Medium-, and Long-term Urban Development Concept, set to be published by the end of 2025. These interventions mainly revolve around the decarbonisation of freight transport, including food logistics, reducing food loss and waste in public catering, and promoting behavioral change through awareness campaigns on local food production. These activities reduce GHG emissions from the transportation and waste sectors.

"Food security is a critical issue in Budapest, impacting everyone's lives and presenting a significant challenge for the city. To achieve true sustainability, the city is committed to addressing both food production and consumption, ensuring the best options are available to its residents.

Kinga Lőcsei-Tóth, Deputy Head of Department for Climate and Environmental Affairs at Municipality of Budapest

# **BUDAPEST'S INITIATIVES FOR CLIMATE NEUTRALITY AND FOOD SECURITY**

- ► Local Food Production and Distribution: Directly managing market halls to ensure stable and equitable food availability, while supporting local production from peri-urban areas and short supply chains.
- Improving Food Access for Vulnerable Groups: Enhancing coordination of food donations by facilitating connections between donors and recipients through a dedicated platform.<sup>19</sup>
- Sustainable Public Catering and Food Waste **Reduction:** Promoting sustainable catering policies for institutions and programs for producers, trainers, and residents that contribute to both nutritional well-being and sustainability. This includes plans and ambitions to source imperfect, locally grown vegetables from municipal market halls for public catering.
- Raising Awareness for Food Security and Crisis Resilience: Educating inhabitants on the importance of urban food production through awareness campaigns, promoting local food growth in public and private gardens to enhance crisis preparedness.
- Empowering Residents through Community Initiatives: Supporting community-led initiatives, to show how to make informed and sustainable food choices among children and families.<sup>19</sup>
- Sustainable Food Logistics: Reducing the carbon footprint of food logistics, improving existent market infrastructure.

## **ONGOING CHALLENGES RELATED TO FOOD SECURITY IN BUDAPEST**

Budapest faces several challenges to ensuring the six key dimensions of food security are met. Changes to National and EU policy can help address these issues.

Utilisation and sustainability are particularly challenged by national public procurement rules, which restrict flexibility in sourcing food for public catering. High VAT rates on fruits and vegetables, coupled with strict mandates on how meals must be composed, limit the ability of procurers to offer diverse, healthy, and sustainable food options. These constraints are compounded by rising food prices and the impacts of climate change on food production, which threaten availability, stability, access and agency for the population.

## POLICY SUPPORT FOR LONG-TERM **FOOD SECURITY**

In order to address the challenges like the ones Aarhus and Budapest are experiencing, the FoodCLIC project is calling for a comprehensive transformation of local, regional, and EU food systems. This involves shifting from an efficiency-driven production model to a more resilient and diversified agricultural system that can better withstand external disruptions. Procurement policies must support local sourcing and strengthen regional food supply chains, while climate-friendly diets should be encouraged through education, financial incentives, and public food programs that promote sustainable consumption. Additionally, reducing dependence on subsidies and enhancing the resilience of food production through diversified farming systems and risk management strategies is crucial. Stronger policy support for alternative farming methods and local food initiatives will also empower small-scale producers and community-driven food solutions. By fostering a more resilient food system at both national and local levels, these measures will contribute to long-term food security and a healthier EU.<sup>20</sup>

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Image: Julius Janssen / Unsplash







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#### **AUTHORS**

- Anna Bruen (ICLEI Europe)
- Beatrice Ruggiero (ICLEI Europe)
- CONTRIBUTORS
- Dan Kristian Kristensen (Aarhus Municipality)
- Louise Kaad-Hansen (Aarhus Municipality)
- Kinga Lőcsei-Tóth (Municipality of Budapest)
- Éva Kinorányi (Municipality of Budapest)
- Dóra Diófási (Municipality of Budapest)

#### REVIEWERS

- ► Jacqueline Broerse (Vrije Universiteit Amsterdam/Athena Institute)
- Eva Maria Vos (Vrije Universiteit Amsterdam)
- Guilherme De Sa Pavarini Raj (University of Surrey)
- Peter Defranceschi (ICLEI Europe)
- **Dorina Meyer** (ICLEI Europe)

This policy brief is the result of desk research, in-depth interviews, policy analysis<sup>20</sup> and grounded in the experiences of city-regions participating in the EU-funded FoodCLIC project. This brief highlights the **interconnectedness of food security and climate neutrality**; and is backed by the strategic CLIC framework to guide effective policy and promote sustainable practices for the benefit of people and the planet. The CLIC supports the just transition to sustainable and resilient food systems by prompting, reminding, and checking that policy and action provide **C**o-benefits, **L**inkages (urban/rural), **I**nclusion, and **C**onnectivities (across topics, departments, geographic)<sup>21</sup>.



