City Region Food Systems to cope with COVID-19 and other pandemic emergencies

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Introduction

The COVID-19 pandemic is affecting daily lives around the world in unprecedented ways and presenting new challenges to social and economic systems, including the globalised, industrialised food system. A variety of responses, both short- and long-term, has been proposed and debated by the food policy and planning community.

The City Region Food System (CRFS) approach - developed by FAO and RUAF (in cooperation with the CGIAR Water Land and Ecosystems program led by IWMI and the Wilfrid Laurier University Centre for Sustainable Food Systems - provides a framework to: understand the vulnerability of urban food systems; enhance communication and cooperation; and coordinate immediate action to safeguard food security and nutrition.

In the long term, the CRFS approach provides a participatory platform to define policies, interventions and mechanisms of territorial governance for food system transformation, reinforcing cooperation and collaboration among different local governments and other actors, which is one of the key elements to build resilience of the local food system to shocks, including pandemics, epidemics, and climate events.

Failure of current food systems

Since the start of the COVID-19 crisis, accounts are emerging of challenges to food supply chains that have major implications for food security and nutrition. These include:

- limited agricultural labour (often supplied by seasonal migrants) due to restrictions on human mobility and physical distancing;
• limited access to agricultural inputs due to restrictions to inputs producers, transportation and import limitations;
• congestion and disruption in food logistics and delivery;
• closure of markets (formal and informal, wholesale and farmers') due to physical distancing and lack of preventative equipment;
• supermarket food shortages;

Some cities are particularly susceptible to supply problems, due to limited diversification of value chains and supply channels, high or exclusive dependence on food imports as well as long, complex supply chains that are perennially vulnerable to sudden shocks, whether due to social, political, economic or natural events. These problems are also exacerbated in cities that have limited linkages and cooperation with their surrounding rural hinterlands where production and processing of key food commodities consumed in the city may occur.

High population density in urban areas also presents an elevated risk of contagion during usual food provisioning or purchasing activities. Undoubtedly the urban poor -- and especially those living in informal settlements -- face an elevated risk both of infection and of food insecurity. Their ranks are set to swell as the economic crisis caused by global shut-down plunges millions into unemployment.

Need for a coordinated response

A rapid response is needed to shore up cities and city region food systems over the coming months, followed by actions to ensure increased resilience to the impact of pandemics and other shocks in the longer term.

Most local authorities, including city governments, are sufficiently equipped for the challenge, with limited resources and capacity, as well as delegation of authority and regulatory instruments. Despite increasing interest and action to improve their food systems and to develop food policies (within the bounds of devolved powers and competencies), food is not yet part of mainstream urban and territorial planning. Cities remain overwhelmingly subject to national level food policies; and a common response of national governments to COVID-19 has been to call on supermarkets to ensure shelves remained stocked with essentials, seemingly oblivious to the endemic supply chain issues and the impacts on actors, especially those whose livelihoods are tied to the informal food sector.

At the community level, meanwhile, citizens, NGOs and informal networks have swung into action and are exploring alternatives ways of keeping food on the table. There has been an unprecedented surge in interest in fruits and vegetable boxes from short food supply chains, and in home vegetable growing, in food solidarity and neighbourly assistance.

Helpful though this may be, there is a notable lack of coordination between actors and institutions involved in the food supply as well as insufficient financial support to promote such initiatives. Moreover, they are opportunistic -- finding markets for available produce, rather than building infrastructure, capacity and connections for peri-urban and regional food provisioning in the long term. There are no assurances that such ad hoc schemes will endure or be able to ensure urban food security and nutrition for all over an extended period.
City regions as part of a multi-level response

The disruption to food systems from COVID-19 highlights the need to reconnect local production and consumption. The proposition is not self-sufficiency or protectionism but to ensure urban areas are not solely reliant on distant sources, with no recourse in case of failure.

Cities and city regions that actively plan for resilient food systems will help ensure that (a) the food supply chain is diversified and resilient to future shocks; that (b) food access remains at, or swiftly returns to, pre-disaster levels, and (c) the impact on vulnerable food systems actors is mitigated, including small-holder producers, informal traders, and low-income and marginalised groups.

This will require coordination and support, between governments and organisations at all levels. It cannot be achieved either by national government decree or isolated local government intentions.

Rather, government officials, NGOs, and food system stakeholders must connect and collaborate across urban, peri-urban and near rural areas, creating cross-jurisdictional and territorial food planning, coordination and governance.

To facilitate this, the City Region Food System (CRFS) approach and toolkit has been developed based on a participatory multi-stakeholder process. It provides a method and tools to: (a) assess linkages and resource flows between rural and urban areas, key actors, policies and legislation, sustainability, risks and current and future vulnerabilities; and (b) plan policy actions to build resilience and sustainability.

In particular, the approach can help organize food systems in a more effective and sustainable manner to meet producer and consumer demands, by promoting local food production (especially family farmers & small-holders) and shorter supply chains, strengthening urban-rural linkages, and maintaining (or creating) diversity in the food supply chain and channels of distribution (from farm to fork). In the long term, the CRFS approach helps define policies, interventions and mechanisms of territorial governance for food system transformation, reinforcing cooperation and collaboration among different local governments and other actors, which is one of the key elements to build resilience of the local food system to shocks, including pandemics, epidemics, and climate events.

The on-going work to strengthen capacity to build resilience to climate shocks and stresses in the City Region Food System has allowed broadening the approach and assessment toolkit by integrating a dimension on risk and vulnerability. This, in close collaboration with local governments, can also be applied to understanding the impact of COVID-19, and can serve as a basis for planning and monitoring.

The CRFS approach in COVID-19 responses

Cities and their surrounding regions that have implemented the CRFS assessment and planning process, or that are currently doing so, have reported on how the COVID-19 pandemic is affecting the food system -- and on ways in which their CRFS knowledge, resources and capacity can aid their immediate response to the unprecedented threat to food security.

In Antananarivo, Madagascar, the CRFS approach can contribute to the design and implementation of a 'post-COVID-19' strategy, which may serve as an effective tool to reinforce food system resilience in general. Particularly helpful elements are food flow mapping, determining product quantities, and tracing
the role of each actor involved in the food chain. Actors engaged in transportation and distribution will provide solutions to ensure food distribution in periods of crisis.


In recent years, the city of **Medellín, Colombia** has led public policy processes focusing on food security and nutrition (FSN) as pillar of territorial development where the regional and territorial agri-food system is key to supply the population with sufficient food. In the midst of the COVID-19 crisis, the territorial perspective and the concept of city region food systems, recently included in the city's food and nutrition security programs, are significantly contributing to developing an approach and strategies to respond to the crises. These aim at connecting actors in the food supply system of Medellin and at identifying and creating alternative supply chains that complement government action and allow territorial integration.


In the city of **Quito, Ecuador**, public places are locked down, which has affected access to food, as the local markets, the “bioferias”, could not continue. On the other hand, more scale-based and family-scale forms of distribution have been activated that now supply the food needs at that level, which is very important because of people's level of vulnerability. As part of the CRFS project and the related work on indicators, Quito conducted mapping of these markets as well as of vulnerable communities in the city. This has proven invaluable for identifying vulnerable groups to target for emergency food distribution. It appears that the Quito special operations committee, does not consider the elderly/disabled people who cannot go out. The development and facilitation of the food policy council, allowed to coordinate special operations of issuing of directives and communication, including asking attention for vulnerable households and mediate for informal sector (markets). However, it was also found that quick and more centralized responses are needed.


**Longer contributions from the cities below are forthcoming.**

In **Colombo, Sri Lanka**, there is a strong alignment between the CRFS approach and the measures introduced by a government taskforce to ensure sufficient availability of staple foods (and fruit and vegetable since there has been no shortage of this). The taskforce is taking a systemic approach to ensure communities have access to food using alternative supply chain linkages by coordinating with multi-stakeholders across administrative boundaries. It addresses issues such as farmers’ access to inputs, food affordability, waste management and establishing hubs for the distribution of farm products.

In **Kitwe, Zambia**, despite the limited spread of the virus, fear, restricted transportation and/or physical distancing has affected the supply and distribution of fresh food, mainly fruits, vegetables, meat and dairy products. There is a risk of significantly lower farm gate product prices and increased farm level losses particularly for perishable products. The challenges faced regarding food supply are mainly being dealt by the central government and as response, the government is encouraging smallholders producers and SMEs to form cooperatives to coordinate and target more effectively the government. In addition, supermarkets and other grocers have been encouraged to source their products locally instead of importing products, particularly fruits and vegetables that are mostly produced by smallholders producers. Despite the limited power of the local government, the multi-stakeholder platform created under CRFS programme is becoming instrumental in fostering coordination between central and local governments, and among actors in the supply chain in defining strategies and coordinated actions to mitigate COVID-19 impacts and dealing with post pandemic scenarios.
Despite this increased food awareness in Toronto, Canada, the biggest impact of COVID-19 has been on the increased demand on emergency food provisions for low income, homeless and unemployed. This means more pressure on food banks, the Red Cross, and other providers. This has also led to many food organizations pivoting their services to emergency food. The Toronto Food Policy Council has focused advocacy efforts on re-opening or creating alternative access to farmers markets using online resources. Community gardens have just been designated an essential service by the provincial government so are ramping up to use physical distancing during the coming season. An additional key concern centers on the health of migrant workers. In 2019, 69,000 temporary migrant workers came to Canada to work in the agricultural sector. Employers were given discretion over the March 2020 health and safety guidelines for migrant workers leading to increased concerns for worker well-being. A more robust City Region Food System approach could reinforce the importance of a more integrated strategy for the adaptive capacity to shocks by regional food system feeding Toronto.


Food banks and community organizations in Melbourne, Australia report a significant increase in demand for food relief due to the economic crisis and rising unemployment. The Victorian state government is providing emergency food boxes to vulnerable people, but government response has been patchy. Some farmers markets in Melbourne have been closed down by local governments, reducing opportunities to buy fresh local food and leaving farmers without their usual sales outlets. There have also been significant price increases for some fruits and vegetables (also because of recent drought and bushfires). An alliance of social enterprises, the Moving Feast collective, provide food relief to low income households by delivering produce boxes, emergency meals and backyard gardening kits. There has been a huge increase in farmers and farmers markets going online on the Open Food Network to overcome physical distancing restrictions. A city region food system approach could help Melbourne to strengthen the resilience of its food system to these multiple shocks. Local production and distribution of food within the city region could increase fresh food supply and reduce dependence on more distant sources of food.