

Key messages

Uptake and implementation of innovations in urban food systems requires active involvement of SMEs. Development of various types of commercial to social enterprises offers new opportunities for job and revenue creation for different actors in the food chain. Most SMEs also have a clear social aim to change the food system for the benefit of producers and consumers alike.

SMEs should further explore business opportunities in short food supply chains, multifunctional land use and agriculture and resource recycling in urban and peri-urban areas. They can learn from other experiences and peer-to-peer exchange.

SMEs also need to adopt diversified and new business strategies for innovation. Successfully applied in combination, these strategies make urban food enterprises and projects economically competitive under conditions where "agribusiness as usual" would not be profitable or sustainable.

Governmental entities need to adopt policies that help facilitate growth, development, and support for this sector. With active support from city administrators, SMEs can more effectively improve their innovations and secure the benefits of their initiatives.

Entrepreneurial innovations for urban provisioning and security

Many Small and Medium Enterprises (SMEs) from around the world, both for-profit and non-profit, are pioneering innovative entrepreneurial efforts to address urban food provisioning and security.

"We work with the food industry to minimise fit-for-purpose fresh, frozen and long-life food going to waste. Thousands of tonnes of perfectly good in-date food are wasted each year. At the same time, there are over 4 million people in the United Kingdom who cannot afford a healthy diet. FareShare aims to address this imbalance by redistributing quality surplus food to groups working with vulnerable individuals" FareShare South West

Their efforts will only be successful if they apply a combination of business strategies that are adapted to an urban context.

At city level, a multiplicity of SMEs should be promoted, for the urban food sector to benefit from scale effects. These could range from charitable, social or community enterprises to family businesses and share issuing companies.

Policy makers should aim to encourage such entrepreneurs through financial and public policy support.

This brief features recommendations and practices resulting from the SUPURBFOOD- Sustainable Urban and Peri Urban Food provisioning and COST Action Urban Agriculture programme. It constitutes a call for existing and new enterprises to further develop this emerging market.



Innovations along the food chain

There are key opportunities for SMEs to explore innovative entrepreneurial strategies along the entire food chain. These include development of short supply chains; closing urban 'waste' loops and multifunctional use of urban and peri-urban land and food production.

Business opportunities can evolve around experimentation with and development of innovative technologies in sorting and processing of organic and green urban waste such as biogas units or improved composting facilities.

Rotterzwam is a business growing oyster mushrooms and shiitake on coffee waste in an abandoned indoor tropical waterpark close to the centre of Rotterdam (The Netherlands). The coffee grounds (which would otherwise be incinerated) are collected from local cafes by cargo bike.

DeCo! Sustainable Farming in Tamale (Ghana) is a social enterprise that produces organic fertiliser and sells it to small farmers to generate revenue. The composting firm recycles inputs such as fruit and vegetable waste, neem tree leaves, processing waste, and animal manures.

Businesses can be developed aiming to optimise residual food waste streams. FareShare in Bristol (United Kingdom) delivers food leftovers to over 70 organisations. The food they supply contributes to thousands of meals weekly for vulnerable people. This also enables recipient organisations to reinvest funds into improving other services such as housing advice, medical services and training. FareShare only has a few employees. Many of their volunteers are, or have been, vulnerable for whom training opportunities and support is provided.

Large numbers of businesses delivering multifunctionality through food production are being developed. *Uit je Eigen Stad* (From Your Own Town) in Rotterdam is a 2.3 hectare commercially operated farm at an abandoned rail yard in the port area. It includes open field and greenhouse vegetable growing, fish farming (aquaponics), mushroom growing, a farm shop and restaurant with conference facilities. Revenues are generated through the sale of produce and services and rental payments from the restaurant.

Mercato di Campagna Amio
Circo Massimo
CAMPAGNA
AMICA
Campagna Amica at Circo Massimo-orodelledonne.provider.it

Short food supply chains offer many opportunities to realise economic and ecological benefits in the city. In Rome (Italy) and Zurich (Switzerland) different short food chains are being developed, including *Agricultura Nuova*, a Roman multifunctional peri-urban farm that offers on-farm sales as well as organic box schemes to customers. A specialised retailer *Pico Bio* in Zurich functions as an intermediary packing and delivering fresh and processed food from organic farmers to customers. An Italian farmers' group *Campagna Amica* is organising farmers' markets in several locations in the capital, while *Zolle* enterprise develops connections between rural farmers and urban citizens with the aim of supporting rural development through urban food provisioning.

The Harvest of Hope (HoH) initiative is a vegetable box scheme in Cape Town (South Africa) set up by local NGO "Abalimi Bezekhaya" as a social enterprise. Food produced in community gardens is sold in weekly boxes to schools and individuals.

All of these examples are realising economic benefits such as jobs and revenue flows, often from resources not currently used. This brings ecological and quality of life benefits to residents whilst improving the cities' environment.



New business models for urban food provisioning based on differentiation, diversification, lowering costs, sharing resources, participation, experience and new technologies

The specific nature and diversity of business strategies in urban food production need to be more flexible from business strategies in "rural" agriculture due to the particular features of urban and peri-urban contexts. These include land not being easily available and expensive, being close to the customers, and the need to develop news networks of suppliers, customers, business partners and facilitators.

Urban short supply chains can offer distinctive services compared to conventional supply chains, including transparent and visible production locations and conditions. Willem&Drees, a Dutch grocery wholesaler offers shoppers in supermarkets, catering companies and via the Internet the opportunity to buy seasonal products from their own region. All products bear information on origin, the name and personal story of the farmer. Their differentiation approach is also about offering special (local) varieties.

Through diversification, urban farmers can offer particular multifunctional services beside food production, such as recreation, landscape enhancement and conservation, fertiliser or energy production. Some urban SMEs, such as *Kalnciema Quarter* in Riga (Latvia) use their food focus to provide popular cultural, education and culinary activities that enliven the whole neighbourhood, attract tourists and generate income opportunities for producers and artisans.

The model for *lowering costs* involves the use of underutilised urban resources, such as; temporarily vacant land and buildings, urban waste and wastewater; a new work force including volunteers and the socially excluded. *RoomeR* in Ghent (Belgium) produces an alcoholic beverage using elderflowers gathered from trees located in public and private areas in and around the city, reducing costs for land and tree production. Another strategy is use of Participatory Guarantee Schemes, as applied in Quito

(Ecuador) to reduce costs of certification. **Zolle** company in Rome distributes products from small and medium-sized organic farms to consumers with cycle couriers carrying out the final delivery.

Another cost-reduction strategy is sharing of resources and/or ownership. In Vigo (Spain), around 30% of the land area is in communal ownership. Organised in neighbourhood associations, citizens share land ownership and decide collectively on the use of land and on reinvestment of returns. The Associations of Commons of Vincios and Val Miñor experimented with the composting of green waste, that can be used to improve soil fertility of the commons as well private gardens in the neighbourhoods.

Urban farmers are capable of offering unique experiences and participation, because of proximity to their target audience. This model focuses on providing authentic and 'memorable' experiences by being part of the story/experience as well as buying a product. These include gastronomic experiences such as lunch on a rooftop farm. HotspotHutspot in Rotterdam offers low-cost healthy meals sourced from urban production and surplus from an organic wholesale market. At the same time they train children and young people how to cook and serve such meals.

A final business model is experimental urban food production based on initiatives that explicitly explore new technological innovation processes such as aquaponic systems or recycling of urban waste products. Experimenting with new technologies or products can be included in marketing. *Maschinen-Ring* in Zurich is experimenting with the production of biogas from farm manure and city waste. Operated by farmers, it offers them an additional income source.





Need for new support measures

The specific nature of business strategies in urban food systems has implications for effective support measures for entrepreneurship. Scaling up of these initiatives is often hampered by over strict implementation of regulations developed for larger scale processes that stifle local bottom-up initiatives.

Support should focus on enabling affordable access to land, infrastructure, training and technical assistance, incubation funding and policy support, innovative project design and network creation to establish appropriate linkages with relevant public, private and civic societal actors. This should involve an investigation into how funding and support provided under the EC and National Common Agricultural Policies can be re-tasked to also support urban agriculture.

City governments can enable access to or temporary use of public or private land and actively protect agricultural and open land for food production. In order for example to take advantage of the potential of a productive city landscape and to allow commercialisation of foraged products as done in Ghent, current land use regulations will need to be adapted and potential pollution will need to be investigated and controlled. Public tenders to manage such resources could be developed. New zoning regulations can change destination of industrial or business areas in multifunctional agricultural zones as done in *Polder Schieveen* in Rotterdam.

Food growing areas, such as rooftop growing, community gardens, allotment gardens, can be made mandatory in new or renovated housing settlements and building projects.

Networking can increase collective influence on local legislation through a dialogue with policy makers and other involved stakeholders (including consumers). The development of network agreements or contracts (as supported in Italy under Law 33/2209) would facilitate farms engaged in short supply chains to achieve more efficient coordination and aggregation of supply, as well as to share their workforce according to changing production and distribution needs.

Initiatives may also benefit from improved credit access and financial incentives as speciality produce and experimental technologies have a higher risk profile in finance. Financial compensation can be provided for provision of social or landscape services as done by *Grün Stadt Zürich*. Nine city-owned farms are rented out, while one is run under the management of the city department. Organic farming practices and environmental conservation measures aiming at fostering biodiversity need to be carried out. The department supports the farms with investment funds for i.e. stable constructions or farm shops, as well as with technical advice.

Public investment in food transport and storage, marketing, waste management and provision will stimulate urban food system enterprises development. Technical and business training, such as customer relations and marketing need to be provided for existing and new entrepreneurs. Providing multi-year public grants for innovative businesses, such as currently being discussed in Riga, will allow SMEs grow and explore opportunities for further innovation.

SMEs & sustainable urban food provisioning

This practitioner brief was prepared by the RUAF Foundation, International network of Resource Centres on Urban Agriculture and Food security in partnership with the SUPURBFOOD programme (www.supurbfood.eu). SUPURBFOOD has received funding from the European Union's Seventh Framework Programme for research, technological development and demonstration. This document, which has been financially supported by this grant agreement, reflects only the views of the authors. The European Commission cannot be held liable for any use that may be made of the information contained herein.

SUPURBFOOD project partners:

Wageningen Universiteit, Associazione Italiana per l' Agricoltura Biologica, Universiteit Gent, Universidade de Vigo, University of Gloucestershire, University of the West of England, Landbouw Economisch Instituut,

Research Institute of Organic Agriculture,
Nodibinajums Baltic Studies Centre, RUAF
Foundation, F3 Consultants Co-operative CIC,
Stichting Uit Je Eigen Stad, Maschinenring Plus
AG, Comunidade de Montes Veciñais en Man
Común de Vincios, Willem & Drees BV, Pico
Bio AG, Agricoltura Nuova Societa Cooperativa
Sociale Agricola Integrata, RoomeR BVBA, The
Community Farm Limited, Sabiedriba Ar Ierobezotu
Atbildibukalnciema Iela KQ

Elaboration: Marielle Dubbeling (RUAF Foundation) m.dubbeling@ruaf.org, Jan Willem van der Schans (LEI Wageningen UR) and Henk Renting (RUAF Foundation)

Design: Femke Hoekstra (RUAF Foundation) **Language editing:** Matthew Reed and Daniel Keech

This practitioner brief is part of a series of such briefs on urban agriculture and urban food systems. The series is available on the <u>RUAF website</u>.





