

# FRC Food Policy Discussion Paper

## Food Hubs in the UK: Where are we and what next?

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## Introduction

There is growing interest in, and proliferation of, what have come to be known as ‘food hubs’. Broadly speaking, these are entities that sit between people who produce food and people who use it, gathering food from growers and distributing it either to commercial customers or directly to consumers – often working with an explicit set of ethical priorities. But food hubs come in various forms and serve different purposes (often multiple purposes), depending on local needs and resources, which is why they are sometimes called ‘multifunctional food hubs’. Their diversity means that it is difficult to attach a precise definition, and one of the purposes of this report is to explain some of the pros and cons of different approaches. Food hubs can offer many valuable local food system services, from supporting new forms of food retail and distribution to providing incubation units for new food entrepreneurs, or creating a space for community education and action. They can fill a gap in local food infrastructure, enabling small-scale producers to find markets more easily and helping consumers to find locally produced foods; they can boost access to healthy diets and support local businesses. However, they may not be appropriate – or feasible – in every situation.

This report is a discussion document. It has been written for people working in the food system who want to understand the role of multifunctional food hubs in the UK, or to determine whether the food hub model (or what type of food hub) is appropriate for their locality and purposes. We hope the report will feed and spark debate, and provide pointers for people who are already busy in what seems to be an expanding and energised sector. We also hope it will help policymakers, investors and funders to better understand, and potentially support, the role of food hubs in sustainable food systems.

The next section presents the findings of a survey of UK food hubs, which provides some bare-bones information on what is happening

around the country. The report then summarises some research on the situation in the US, where food hubs have been established for longer and have been extensively studied. It explores whether there are practicable forms that could not only serve a wide range of local needs in this country, but also provide income streams to help local food initiatives become viable long-term operations. The final section includes some of the reflections and questions that arose when a draft of this document was shared at a workshop for practitioners and academics.

The report is based on research conducted by the authors, and on the findings from collaborative workshops with stakeholders, all conducted between 2017 and 2019 (details on page 17).

## What is a food hub?

There are many answers to this question, and in some ways it may not matter whether we all agree on a single definition. If an enterprise finds it useful to describe itself as a food hub, why argue?

On the other hand, food hubs are different from – and in many cases are deliberately set up as alternatives to – entities that perform similar functions in the mainstream, industrial food system. So what is it that distinguishes them?

Based on our research so far, we would say that a key characteristic of food hubs is that they involve food aggregation and distribution – in other words, they gather food from growers and other suppliers, and distribute it, by some means, to customers.

But this, in a manner of speaking, is what Tesco does, and it is certainly what wholesale markets do. So what makes a food hub different? Perhaps the key thing here is their underpinning ethos or ‘mission’. Many food hubs explicitly adhere to specified ethical principles in the way in which they obtain and distribute food. Suppliers

or customers may be ‘local’ (possibly within a specified geographic region). Or the producers or manufacturers the hubs work with may operate at a scale that does not individually produce large or consistent enough quantities to satisfy, for example, institutional customers such as school or hospital groups. The main purpose of the food hub in these situations is to enable small and medium-scale producers to reach large and stable markets, thus ensuring the producers’ financial security. Alternatively (or additionally), the hubs may wish to collect and distribute food for charitable purposes (for example via food banks); or they may add services such as food packing or training to their basic function. A crucial question in all this is – money. How is the operation funded? There is a strong argument that the aggregation-distribution function of local or regional food hubs should cover its own costs; if profit is made it can be used to subsidise additional activities.

In practice, we have found food hubs, both here and in the US, to be very varied in composition and purpose. Some are focused solely on building an alternative local and/or more sustainable food supply chain, while others also aim to deliver wider social, economic and environmental benefits.

Activities can include:

- Social supermarkets
- Business training, business development support and facilities for new independent food entrepreneurs
- Child and adult food education and skills development, such as cooking and growing
- Food aid collection and distribution services
- Spaces and opportunities for community food engagement, from food growing to community cafés and shared meals.

There may be other forms that we haven’t encountered yet. It’s also notable that a particularity of self-identified UK food hubs, in comparison to US ones, is that the ones that function as social supermarkets or run food aid collection and distribution services call themselves food hubs. This is not found in the US.

## UK food hubs: what the survey found

From November 2017 to January 2018, a survey was carried out to map the forms of food hub currently in existence or being planned in the UK. It collected information from food hub operators, exploring the commonalities and differences in terms of structure, function, usefulness and challenges encountered. In all, 29 food hub operators answered the survey, located in England and Scotland.

The food hubs surveyed were:

### 1. Proliferating

In all, 29 UK-based food hub operators answered the survey. The majority (19) were established after 2013, with five established before this date. In addition, five hubs responded which planned to commence operations in 2018 or beyond. These responses suggest a growth of food hubs in the UK, which reflects the global spread of alternative, local, sustainable and community food movements.

### 2. Typically local in scale

The food hubs typically sourced and / or distributed within a 30-mile radius, although two operated at the county and three at a regional scale. Fifteen worked from a single site and 12 from multiple sites, while four were ‘virtual’ hubs, with their own distinct operating structure, typically using the Open Food Network’s services (see box).

### **The Open Food Network (OFN)**

The Open Food Network UK is the UK platform of a global, non-profit organisation that enables independent producers, retailers and distributors to trade online. Its stated aim is to build a stronger, fairer food system. Using the platform, food producers can create an online shop, collect payments, sell through other shops and access reduced-rate courier services. Wholesalers can integrate with existing systems, manage buying groups and link with a national network of food hubs and shops. Communities can bring together producers to create virtual farmers' markets.

Source: <https://openfoodnetwork.org.uk/>

### **3. Unique to their settings**

A wide variety of organisations identify themselves as food hubs. Although there are resemblances, due to the similarity of challenges faced and operational ethos, each hub was also unique in terms of the parts of the food system it engaged with, the reasons why it had been set up, and the services, supply chain functions and food types offered.

### **4. Opportunistic in choice of venue**

Two of the most common were community centres and independent retail spaces, but industrial units, kitchens, churches, food banks, train stations and purpose-built sites also featured.

### **5. Often ethically motivated**

The operators typically had multiple criteria when selecting and offering food. 'Local' was the most popular (mentioned by 23 respondents). However, ethical considerations, such as fair trade (18) sustainability (17), health (16) and minimal processing (11) were all mentioned by many operators. Food waste reduction or redistribution was mentioned by five operators. These ethical criteria, which can be summed up as a commitment to building fairer and more sustainable food supply chains, are often what set food hubs apart from the mainstream food system.

### **6. Involved with multiple organisations**

The food hubs were established, developed, supported and instigated by different types of organisation, including voluntary sector organisations (the most common type), food partnerships, wider strategic food initiatives, food businesses, a co-operative, a community event and even a research project.

### **7. Strongly collaborative**

Collaboration was found to lie at the heart of the UK food hub model, with many hubs continuing to work with multiple organisations after establishment. They included voluntary sector organisations, other food businesses, food partnerships, wider food initiatives, producer co-operatives, local authorities, and universities and colleges.

## What the food hubs did

The survey confirmed that food distribution was a core service for many food hubs, as was primary production or close engagement with primary producers. But these functions were performed in a variety of ways, on both a commercial and a non-commercial basis.

The food hubs:

### 1. Distributed food

Food distribution (including redistribution of surplus and food waste) was the most common function reported in the survey, with 17 hubs currently offering food distribution services and 11 more planning to offer this service. But there were many different ways of distributing food.

Eleven of the hubs had a fixed retail space (with four hubs planning to provide this in the future), while 12 had the capacity for online retail (with six hubs planning to provide this in the future). Other methods included via telephone orders and farmers' market stalls, community pick-up points, and direct pick-up from-the-supplier. Fifteen of the hubs had some form of delivery service, and online and email orders for hub-based pick up or delivery were available from just under a third of operators. Some food hubs were found that did not directly sell any food or other products, instead using cafés or other services as their main operation, while others accepted donations of food for redistribution.

### 2. Engaged in or with primary production

This was the second most popular supply chain function, with 14 hubs offering primary production services (i.e., a farm was attached or growing food was incorporated into the food hub) and nine planning to offer them in the future. All but seven of the hubs engaged directly with farms to some extent – some with just a few, but five hubs engaged with between 10 and 20 farms and six with more than 20.

### 3. Supplied more than fruit and veg

A wide range of food was offered by all the hubs. Twenty-six offered fresh fruit and vegetables, with 17 offering tinned or frozen fruit and vegetables. Bread was the other most popular item, offered by 26 hubs. Dairy and eggs were also available from most hubs. Meat, fish, dry staples and non-food items (such as cleaning products) were all offered by more than half the hubs. Ready meals and food boxes (varying from random assortments to boxes tailored to specific recipes) were offered by 14 hubs. Other options, offered by small numbers of hubs, included beverages (coffee, beer, etc.) and prepared (hot) meals and snacks. These latter two options may be potential higher profit (and labour) options.

### 4. Operated on a commercial basis to some extent

Only three hubs indicated that they were non-commercial. Most hub operators undertook a range of commercial activities to generate income. Beyond the selling of food, the most popular additional activity was the provision of training or support services. Nine hubs were able to hire out kitchens (for commercial use or training), while eight could hire out other types of space, or had an onsite café. Several hubs were also planning income-generating activities for the future. Here, the most popular were to expand capacity in order to supply training or support services, run a wider catering service, make other spaces available to rent out, etc.

### 5. Also provided services on a non-commercial basis

Many of the hubs had (or aspired to have) non-commercial functions. These included food-based skill development, food aid (such as food rescue or community fridges), and spaces for community food engagement (such as gardening and composting, film nights, community cafés or community clubs). These services might also be offered at the food hub through other organisations sharing the same premises; these other organisations also offered music and/or cookery workshops, financial advice, energy advice, and Citizens Advice support.

## How the hubs were funded

Funding and income could broadly be split into five categories:

- A commercial loan (investment or mortgage)
- Trading income
- A grant
- Crowdfunding
- 'Other' funding

Grants and trading income were the most popular types of income. For the 24 hubs that had grant income, the average amount of grant income was 56% of total income, while for the 20 hubs that had trading income, the average amount of trading income was 49% of total income. Eight hubs reported that trading income accounted for 70% - 100% of their income.

The source of grant income varied between operators, with grants from lottery funding (17), private trusts (15), local authority (3) or Scottish government (2). Some hubs had multiple grants from different funding organisations, while others relied on one funding organisation for 100% of their funds – which was noted as being an unsustainable position. Commercial loans made up an average of 28% of income for five operators, while Crowdfunding made up on average 12% of income for seven operators. 'Other' income sources were used by five operators, though the funding amount varied widely.

The results indicate that a diverse mix of income streams is available to food hubs. The reliance on grant-based income may be risk for scale-ability, but the fact that eight operators were running on 70% trading income illustrates that the reliance on grant income may be due to the relative youth of some operations, and that more established operations become more self-sustaining. From the survey it appears that food hub operations that have been established for more than five years tend to have higher levels of income from trading, although this requires further investigation.

## Time and labour

The majority of commercial operations were not dependent on volunteer time and labour, although 11 were. The majority of hubs were dependent on volunteer time for non-commercial functions. There was no association between the age of the hub and the need for volunteers for commercial and non-commercial functions: the more established operations (5 years+) had the same split as younger operations.

## Lessons from the UK survey

The survey results demonstrate that establishing short, light and fast supply chains as an alternative to long, mass supply chains is not a challenge to be underestimated. The findings contain some useful pointers for practitioners who might be starting out with, or planning, a food hub. The key points concern capacity and funding.

### Capacity

- First of all, buy-in from the local community is crucial, due to the need for a customer and volunteer support base.
- You will need various sorts of knowledge and expertise. There will be large amounts of admin, so volunteers who can do this are essential. Expertise in writing funding applications is also extremely useful.
- You will need a physical space suitable for your needs: the smaller the space, the fewer producers and products you will be able to handle.
- Hubs will need to consider how to support internal capacity building, especially to empower people who have a lot of skill and ambition but poor access to opportunities.
- Staff hours will need to be increased if demand is higher than expected.
- Volunteers – especially where you are relying on them to perform certain functions – may need more support than you anticipate.

## Funding

- Running a food hub is a high-cost endeavour. Profit margins are very slim and unlikely to sustain an operation alone.
- Grant funding is a difficult landscape to navigate and much time can be spent attracting sustainable funding streams rather than improving service provision.
- You should budget for higher legal/professional advice costs than you think you will need.
- If the price you are charging is not in line with customer expectations and/or ordering and delivery are too complicated, versus other methods of shopping, most customers will not choose to shop loyally.
- Deposits & advance payments are important to the operation of a food hub.

## The US experience of food hubs

Food hubs have sprung up in different parts of the world in response to similar challenges concerning market access for small and medium-scale producers and access to sustainable food for consumers. We focus here on the US experience partly because food hubs have a relatively long history in the US, so there is a wealth of experience, and also because in the US there has been a significant effort to document, analyse and publish this experience, to make it available to other practitioners.

The US government under the Obama administration endeavoured to develop local and regional food systems. This effort originated from the United States Department of Agriculture (USDA) in 2009. The USDA created a task force which determined that in order to develop further, local and regional producers needed distribution infrastructure and services that would allow them to take advantage of the growing demand for local food.

Food hubs were identified as a solution to this challenge.<sup>1</sup> In the US food hubs were operating as early as 1995.<sup>2</sup> This experience allowed the USDA to call on stakeholders who were already experts in food hubs, one of which was the Wallace Center. This non-profit organisation works towards a sustainable food system by bringing together practitioners to learn from each other through ‘communities of practice’, bringing lessons to bigger audiences, identifying and piloting emerging models, linking funders with practitioners, and providing technical assistance. The USDA partnered with the Wallace Center to create the National Food Hub Collaboration in 2010 and to incorporate it into the already established National Good Food Network (NGFN). The Collaboration and NGFN build the capacity of food hubs by connecting practitioners, conducting research, providing

technical assistance and investing in study hubs.<sup>3</sup> The Collaboration's research, conducted in partnership with several universities, has produced a wealth of reports and academic publications. Important work includes three National Food Hub Surveys, conducted every two years since 2013, three Food Hub Financial Benchmarking studies and the 'financial fundamentals for food hubs' webinar series.

This section of the report reviews the US experience of food hubs, and suggests ways in which UK food hubs could apply some of what has been learned, to strengthen their commercial operations and reduce grant dependency.

## Differing interpretations of the term 'food hub'

As noted at the start of this report and illustrated by the UK survey findings, the term 'food hub' can mean different things in different places. Research on US food hubs has discussed the issue of definition. There is agreement that the basic function of a food hub is to aggregate and distribute. But limiting the definition to this function makes it hard to distinguish between food hubs and other food aggregation and distribution businesses, such as wholesalers, or companies that supply supermarkets. Moreover, as is the case in the UK, food hubs do more than this, because they emerge and adapt according to their context and the values they aim to fulfil. A key issue – again illustrated in the UK survey results – is the extent to which food hubs see themselves as primarily commercial organisations, or as organisations that may perform commercial functions but see themselves as also (or primarily) having wider social or environmental objectives.

In the US, the activities food hubs perform on top of aggregating and distributing are called 'plus services'. Research has identified three common plus services: to help grow regional food systems, commit to buy from small and medium-sized farmers and increase healthy food access. There are examples of food hubs that achieve these

plus services and more. But this is the exception rather than the rule because they tend to be more mature and successful at securing funding. (Although there are food hubs in the US that have been operating for over 24 years, most are new businesses that are a long way away from fulfilling their aims.) The US national food hub survey of 2013 revealed that in general food hubs that offer plus services tend to be more reliant on grant funding. Thus, a food hub that aims to cover the costs of aggregation and distribution activities from sales income finds plus services a competing force. Therefore, expectations of what food hubs can achieve in terms of plus services need to consider the realities of running a viable business.<sup>4</sup>

Commentators agree that the definition should be general enough to encompass the richness of activities, but distinctive enough to differentiate food hubs from other food-related businesses. For UK practitioners, the lesson is that it is important for everyone involved in developing a food hub (including businesses and funders) to share the same understanding of the primary aim of the hub in order to prevent unrealistic expectations. A working definition is that:

*'Food hubs are, or intend to be, financially viable businesses that demonstrate a significant commitment to place through aggregation and marketing of regional food.'*<sup>5</sup>

The words 'are or intend to be' recognise that many food hubs are still young businesses aiming to achieve financial viability. 'Demonstrate a significant commitment to place' encompasses the plus services, which are usually connected to the community within a specified locality. 'Marketing' is used instead of distribution because food hubs sell wholesale, retail or both. But 'aggregation' is kept because hubs aggregate from small and medium-scale farmers, which is one of the defining features of food hubs.

## Four key ingredients of a commercially successful food hub

Four practical elements are essential for the successful operation of a food hub: customers, services, products and suppliers. Decisions made in these areas determine whether the food hub can achieve financial viability in its operations. This section provides examples of how US food hubs deal with these issues and explores opportunities in the UK to implement similar practices.

### 1. Customers

NGFN recommends that to achieve resilience food hubs should avoid ‘customer concentration’, which occurs when an enterprise focuses on serving only a few customers. The lesson here is that to thrive, food hubs should have a range of customers of different types. The latest US food hub survey found 12 types of food hub customers: caterers, direct-to-consumer schemes, colleges and universities, shops, schools, distributors, supermarkets (local and national), hospitals, food processors, senior care and children’s nurseries.<sup>6</sup> This does not mean that every food hub is serving all these types of customers, but it shows that there is potential for food hubs to develop markets in these customer categories. The survey also found that the two most important types of customers are direct-to-consumer schemes and institutions. Direct-to-consumer schemes include food coops, buying clubs, online shops, own retail stores, Community Supported Agriculture (CSA)<sup>a</sup> farmers’ markets and mobile retail units. The survey showed that 68% of US food hubs have these types of customers. These schemes are either run within the food hub or are independent. Institutional customers include colleges and universities (43% have this type of customer), schools (37%), pre-school (10%), hospitals (22%) and senior care (10%).

Potential for the UK: The UK also has a range of direct-to-consumer schemes like those in the US. These schemes vary in size and therefore buying

power. In the case of box schemes and CSAs, most of them supply themselves from farmers and wholesalers. But sometimes the supplies available from wholesalers are inadequate. This may be due to location, buying power or a poor-quality offer.<sup>7</sup> Food hubs could fill this gap. This is especially true of hubs developed by people with strong experience in the box scheme and CSA sector.

There is also the potential for food hubs in the UK to supply institutional customers through public procurement programmes. There are examples of sustainable public procurement projects in schools, hospitals, nurseries and care homes. The Soil Association’s Food for Life Programme aims to guide public institutions towards sustainable (local and organic) food procurement by means of an award scheme and standards. Food hubs have the potential to work with Food for Life by becoming part of the supplier scheme, the accreditation programme for suppliers that meet the Food for Life standards. Indeed, some organic wholesalers are already part of it. There is also the potential for the Food for Life programme to raise award standards across the different institutions to include more local and organic food procurement.

### 2. Services

As mentioned, the basic function of a food hub is to aggregate and distribute food. This service requires infrastructure such as a warehouse and vehicles. A challenge here is to cover the costs of the infrastructure from the revenue generated from aggregating and distributing food. This is difficult, especially in the initial years, because there may not be enough demand from businesses seeking to buy the food or enough supply from local businesses producing food.

Two solutions to this problem have been identified. The first is to coordinate rather than operate the supply chain. This means that instead of running the warehouse and vehicles, the food hub coordinates the logistics of aggregating and distributing food. Other parties with more

<sup>a</sup> Community Supported Agriculture (CSA) is a partnership between farmers and consumers in which the responsibilities, risks and rewards of farming are shared.

expertise and adequate infrastructure actually operate the supply chain. This is the case with the Red Tomato food hub in Massachusetts. The food hub coordinates the logistics of gathering food from small and medium-size growers and delivering it to its customers. The people operating this supply chain are farmers and a haulier company who work in partnership with Red Tomato. Farmers and the haulier company have the expertise and own the infrastructure necessary to operate the supply chain. Consequently, Red Tomato does not have infrastructure costs; instead it has highly skilled staff who concentrate on logistics whilst ensuring the operation is financially viable for all partners.<sup>8</sup>

The second solution is to subsidize infrastructure costs with other activities. This is the case of La Montañita food hub in New Mexico. To cover infrastructure costs, La Montañita runs a commercial distribution service – for example, it has a contract with Organic Valley, a national organic brand, to distribute all kinds of products to national and regional supermarkets in the state.

Potential for the UK: UK food hubs have the potential to develop similar services that help cover the costs of infrastructure. Although some of the services implemented in the US may seem contrary to the ethical values UK food hubs may wish to practice – for example working with supermarkets or processing food – practitioners in the US recommend that food hub managers think beyond local and become pragmatic in their approach to ensure the survival of the food hub.<sup>9</sup>

### 3. Products

The 2017 US food hub survey shows that whereas some food hubs carry a wide range of products, including fresh produce, processed and value-added products, baked goods, coffee and tea, and even non-food items, others choose to specialise. La Montañita, for example, provides a range of products. This enterprise began in 1976 as a cooperative owned by consumers, which retailed food through its own stores. In 2002 cooperative members began to demand more

local food. To satisfy this need, the cooperative financed the food hub initiative. As such it was important for the food hub to have a range of products. On the other hand, the New North Florida Cooperative focuses on supplying spring greens, sweet potatoes and green beans to school districts and shops in the Florida Panhandle. The New North Florida Cooperative identified a range of products that are culturally appropriate for the region, can be grown all year round, and can be processed in a way that is attractive to school food buyers and consumers.<sup>10</sup>

Potential for the UK: These examples show that there are different ways in which food hubs can meet the needs of growers, processors and customers. Whilst the interest in food hubs in the UK has arisen mainly from the fresh produce sector, there is potential to involve other stakeholders with other products, such as bakers, brewers, livestock farmers, cheese makers and food processors. Food hubs should identify local stakeholders, networks and programs, offering a range of services and products, and work in partnership. Research has found that the key to the success of food hubs is the strength of the relationships they build with their suppliers and customers.<sup>11,12</sup> UK food hubs have the potential to bring together local food stakeholders to develop stronger local food systems.

### 4. Suppliers

According to the 2017 US food hub survey, the average food hub in the US has a revenue of \$2.3 million.<sup>13</sup> This means they trade a significant amount of food. To trade in volume, food hubs in the US have built supply chains using ‘values-based supply chain principles’, where actors work in partnership to create supply chains that benefit suppliers, buyers and customers and meet their ethical principles. The strategy for food hubs is to develop markets for new suppliers and to buy from small and mid-size farmers and ranchers (defined in the US as having gross sales of less than \$500,000). The 2017 survey found that on average 46% of food hub suppliers had started their business in the last 10 years. In total, the food

hubs participating in the survey worked with 3,658 small and mid-size farmers and ranchers.

Potential for the UK: UK food hubs have the potential to do the same. Research has found that box schemes are already implementing the strategy of buying from small and mid-size farmers.<sup>14</sup> However, there is a problem with the supply of some basic items (organic potatoes, carrots and onions). In the UK these are mostly grown by farmers serving supermarkets, organic wholesalers and national box schemes. But relationships with these, especially supermarkets, have forced them to specialise further or close. A strong food hub movement requiring volume could create a real alternative market for these farmers, therefore ensuring their survival.

The thing that differentiates food hubs from other aggregation and distribution businesses is that they aim to trade within a set of ethical values, one of which is often the aspiration to help grow regional food systems. One of the main ways in which hubs do this is through the support they provide to their suppliers: small and mid-size farmers, growers and food processors.

The latest US survey found that food hubs offer a range of services to suppliers. These include product storage for farmers; collection of produce from the farm and distribution to the food hub and suppliers' clients; packaging and repackaging of produce at the food hub; bulk purchasing on behalf of producers for such things as packaging, seeds or plants; providing services such as freezing or certified kitchen space for food processing; processing activities such as cutting and canning of produce; certification, business incubation, business advice, crop planning, support work with minority farmers, educational programmes to train new farmers, nutrition, cooking education and demonstration or incubator farming.<sup>15,16,17</sup>

It is important to remember that the hub must be financially viable. But, as mentioned earlier, the latest US survey found that food hubs providing a

wide range of plus services tend to be dependent on grant funding. Therefore, food hub researchers in the US recommend that food hub managers should focus on making their aggregation and distribution activities financially viable from sales revenue. Plus services should be funded either from the profit of the operations or through grants that do not distort or aid the finances of the operations.<sup>18</sup>

## Challenges

The previous sections looked at opportunities for food hubs in the UK to develop, based on the US experience. This section draws on US experience to look at two of the main challenges UK operators face. They concern skills and knowledge development; and public procurement.

### Skills and knowledge development

The three food hub surveys carried out in the US have identified that the level and type of skills and knowledge possessed by food hub managers is an important factor in the hubs' success. Results show that there is more experience in strategic management and planning and less in food supply chain operations such as retail, processing, warehousing, marketing and production.<sup>19</sup> Key to the success of La Montañita's food hub was the right combination of skills. For example, the general manager had worked for over 30 years in conventional food retail, which gave him good knowledge of warehouse management and operations. Another member of the team had 20 years' experience in managing food cooperatives, and another had worked as a farmer, direct marketer and local food advocate for 25 years. Similarly, a food hub in Minnesota hired a produce buyer and a warehouse manager with over 20 years of experience each. They helped professionalise an operation that had previously been fairly informal. Their experience in the sector not only helped the development of the food hub but also brought in more business, as the new staff had developed good relationships with buyers and farmers over the years.<sup>20</sup>

Similar challenges face food hubs in the UK. Research suggests that box scheme and CSA managers acquire their skills on the job.<sup>21</sup> A similar strategy for food hubs could be high risk, especially when there is no community of practice food that hub managers can rely on. Farmers' skills may also be a challenge. Research has found that small-scale farmers in the UK do not always have the right skills to supply wholesale markets, which require farmers to invest in packaging and systems that ensure that produce is delivered with the correct weight and quality.<sup>22</sup> Wholesale supply also requires farmers to communicate timely and accurately the availability of their products and fulfil orders correctly. Wholesalers interviewed in the UK reported problems in these areas which had led to the breakdown of relationships. Experience from the US shows that food hubs, at least in the early years, should work with farmers experienced in wholesale supply.<sup>23</sup> This is because mistakes in orders, weights and quality can take a significant toll on food hubs' finances.

### Public Procurement

Public procurement has contributed to the success of food hubs in the US. Farm to School (FTS) programmes are flagships of US public procurement. They promote the development of local agricultural systems by including local food products in school meals, helping schools set up gardens, coordinating school trips to farms, communicating the local food products included in school meals and organising community events. The Healthy, Hunger-Free Kids Act of 2010 included FTS legislation at the federal level and gave the USDA responsibility to implement FTS programmes. The USDA promotes the uptake of FTS in school districts through a \$5 million programme.<sup>24</sup> By 2018 FTS legislation was proposed in 46 US states and enacted in 40.

In the UK, public procurement is in a very different situation. Despite efforts of Food for Life, the Soil Association, the food campaigning alliance Sustain and other organisations to show the advantages of sustainable food procurement, the UK Government is still a long way away from adopting it on the scale of the US. There are three

reasons for this. The first is the Government's perception of value for money. Although the UK's Department for the Environment, Food and Rural Affairs (Defra) recognises that there is value in offering nutritious and sustainable food through public procurement, austerity measures are pressuring local authorities to prioritise cost over more complex criteria such as health and wellbeing, sustainability and quality of service. Second, the way in which the Government functions promotes 'silos' which prevent the sharing of knowledge and leadership across departments. Collaboration across government departments is essential to find integrated approaches to implement sustainable public food procurement. Third, there is a lack of technical knowledge to implement sustainable procurement and sustainable food provision.<sup>25</sup>

### Implications for the UK from the US experience

We have noted that food hubs in the UK perform many functions, and not all may wish to scale up or prioritise financial viability. But if food hubs in the UK are to develop as widely as they have done in the US, actions will be needed by a range of stakeholders.

An important factor in the development of food hubs in the US has been the recognition by government, third sector, funders and universities of the need to move alternative food networks beyond direct marketing and into larger-volume markets such as grocery stores, restaurants schools, hospitals and universities. Academics have observed that US agriculture is divided in two. On one side there are large farms operated by corporations that produce for commodity markets and feed most of the population. On the other, there are small-scale farmers trading through direct marketing.<sup>26</sup> This dichotomy hinders the development of regional food systems because small-scale farmers, who could potentially supply them, lack the capacity to meet the growing demand.<sup>27,28</sup> Indeed, the Wallace Center's vision is to advance 'regional, collaborative efforts to move good food ... beyond the direct marketing realm

into larger scale markets so that more producers benefit, more communities have viable economies and greater access to good food, and a greater number of acres are managed through sustainable practices'.<sup>29</sup>

By aggregating food from small and mid-size farmers and distributing it to a range of customers, food hubs are best placed to move the local food sector into larger-volume markets. The evidence and experience of the US suggests that governments, third sector, funders and universities in the UK must also recognise that whilst direct marketing has social, economic and environmental benefits, it is not enough to bring about the transition to a sustainable food system. Policies, programs, funding and research should focus on communities and enterprises that want to trade, or are already trading, in volume.

Government has played a key role in developing regional food systems and food hubs in the US. This has been achieved by collaborating with third-sector organisations, funders, universities and practitioners. These robust collaborations amongst key stakeholders will be necessary if regional food systems and hubs are to develop in

the UK. The collaborations should focus on finding practical solutions to increase the trading of local and organic food. The research on food hubs in the UK presented in this paper could be a starting point, helping to identify both challenges and opportunities for the development of food hubs in the UK.

This report has shown evidence of a lack of relevant skills both among local food practitioners and procurement organisations and lack of will to implement sustainable public food procurement regulations. Further research should be done on mechanisms that encourage financial sustainability and policies at the local and national level that prioritise regional food systems and food hubs. Political will is also necessary to embed regional food systems and especially local and organic trading into the Department for Environment, Food and Rural Affairs in the UK, as has been done in the USDA. Practitioners and academics should also mobilise to learn how to run food hubs from a financial, operational and ethical point of view by creating communities of practice and using the lessons learned from the US.

# Reflections and questions from the workshop

The foregoing document was shared at a workshop for practitioners and academics in June 2019.<sup>b</sup> This section summarises the wide-ranging discussion that took place – some of which confirmed what the report said, while some added new insight or grounded the report’s findings in practical experience.

Many benefits and challenges associated with food hubs were discussed. Summarised very briefly, these included:

## Benefits:

- Food hubs can provide a ‘missing link’ in food and farming systems.
- They can provide a ‘habitat’ for local businesses.
- They can help new or small-scale producers to scale up their enterprises.
- They can provide models for replication in other localities.
- They can bring the producer and the consumer very close together, with potential to build trust and reduce externalities.
- They can help build local communities and social capital.
- They are innovative and solution-oriented.
- They embody large amounts of food system ‘know-how’ and energy.
- Partnerships are key and are a strength.

## Challenges:

- The margins on fresh produce are slim.
- A minority of UK hubs are self-financing from commercial activities.
- Grant money brings constraints as well as benefits.
- There are tensions around definition and function, e.g. for-profit v not-for-profit, growth v preserving ethics, niche v accessibility; facilitating distribution v addressing food poverty; Business-to-Business v Business-to-Consumer.
- Hubs can be very complex, involving different sort of entities (farms, wholesaling platforms or places, box schemes, markets).
- They do not necessarily self-identify as hubs, so developing a common language for policy ‘asks’ or structural support is difficult.
- Balancing supply against demand, while being fair to suppliers and satisfying customers, is complicated, and requires knowledge and judgement (though IT can help, it is a major cost) Strategies to balance supply and demand include developing prepared foods to use up gluts, or initiating ‘donate-your-box’ schemes to compensate for periods of low demand.
- ‘Mission’ / ethical framework is very important.
- Online access raises issues of digital inclusion.
- It is important to safeguard assets as the hub expands and changes, so e.g. not dependent on one person or one type of market.
- Tackling poor diet / inequitable food access is an important driver, possibly cross-funded by other activities.

<sup>b</sup> The workshop was organised by the Food Research Collaboration and Sustainable Food Cities and hosted by the Centre for Food Policy at City, University of London.

- It was clear from discussion that the logistical challenges and responses are complex and varied – and hub operators found it useful to compare notes.
- Food hubs may pose a threat to local shops but can mitigate this by working with them rather than competing.
- Tech / IT is an ongoing challenge (consumers have high demands of online platforms, and complex software needed to administer flow of foods through hubs).
- Personal engagement with suppliers and community is crucial, and details like paying on time, as well as paying a fair price, are important.
- Hubs are an important way of supporting and expanding sustainable forms of agro-ecological farming, such as (but not exclusively) organic; the goal is for this not to be niche or elite, but to become mainstream without losing values.
- Public procurement is important, but requires a certain amount of scale and stability, as well as expertise and employee focus.

## Information gaps and insights

Participants considered some of the lessons and questions thrown up by the discussion:

- There is a need to unpack the idea of what in the US are called ‘plus’ services: the things hubs do in addition to commercial aggregation and distribution. In some UK examples, the core and ‘plus’ elements may be more integrated, with cross-subsidy of both activities and employment.
- Should there be another Hubs survey?
- How does or could this work feed into the National Food Strategy?
- A common definition – though not necessarily useful to practitioners – would be useful in asking Government for policies to enable hubs; or encapsulating the idea of what they do to funders.
- ‘Value Chain Coordination’ : is this what food hubs do? Should there be an opportunity in the UK for people to train (each other) in Value Chain Coordination?
- Expertise in supply chain or value chain coordination from the industrial food sector could be useful to hubs.
- Hubs are not just about aggregating & distributing any old food: who the producer is and how the food was produced (and distributed) are defining characteristics.

- Hubs can be seen as nodes within larger systems; they create novel value chains and are highly context-specific (therefore there is a risk in cherry-picking models or elements from models used elsewhere).
- Food hubs entail chains of trust, as well as chains of food.

## What would help?

Participants were asked: What would help you in your work, or help food hubs to do what they do (even) more effectively? Suggestions included:

- A way to measure how policies and grants are contributing to an un-level playing field – e.g. by masking externalities and unfairness.
- Money: grants, longer-term funding, advice on where to find funding / finance.
- Better understanding and more transparency around Local Enterprise Partnerships (LEPS).
- Broadening the dialogue in terms of who we are talking about; hubs shouldn’t just be serving middle-class, affluent customers.
- Agreement around a clear policy ‘ask’, to be put to governments for action in national or local food strategies.
- Explanation of what value chain coordinators do.

- More, and more connected, knowledge about how food hubs deliver wider social change, education, health.
- Help with communicating what hubs do: even finding a name (e.g. ‘online farmers market’) that people understand and relate to.
- A glossary of terms.
- Support to balance the economics.
- Support with how to balance supply demand, through supply chain innovation and business incubation.
- Digital support or collaboration.
- More communication between food hubs: a network, mapping, a community of practice
- Quantification of the value of what hubs do, possibly as ‘social capital’ – academics & policy makers need to agree a definition and an ‘exchange rate’, as has been done for ‘natural capital’. This has off-putting, mechanistic connotations for some, but could be an effective way to convince policy makers of the worth of food hubs, help ‘make the case’, and lever policy support and funding.
- An expanded definition of public goods, and a refocus of funding systems towards ecological value/social value.

## Concluding comments

The material in this report, and the debate it triggered at the workshop, encompass a wide range of observations and questions, and raise numerous challenges for policy makers, funders and academic researchers. The Food Research Collaboration and Sustainable Food Cities hope to take forward some of the issues raised here. But we also hope that others will use the material to inform their own activities. We welcome comments and suggestions.

## Report context

This report draws upon findings and feedback from a Sustainable Food Cities/Food Research Collaboration joint workshop in June, 2019; a session entitled ‘Food Hubs: An Introduction’ at the Oxford Real Farming Conference, January, 2019 (where the speakers were Dr Christian Reynolds, Julie Brown, and Duncan Catchpole, chaired by Paola Guzman); doctoral research carried out by Paola Guzman and funded by Coventry University; user and operator surveys of UK food hubs carried out in 2017 to 2018; and a session called ‘Bringing it all together - exploring models of multi-functional food hubs’ at the Sustainable Food Cities Conference in June 2017 (where the speakers were Clara Widdison, Duncan Catchpole, Clara Walker, Gareth Roberts and Dr Liz Charles, chaired by Tom Andrews of Sustainable Food Cities).

The user and operator surveys of UK food hubs, carried out in 2017 to 2018; were run by researchers from Lancaster University (Dr Katerina Psarikidou and Harris Kaloudis), the University of Sheffield (Dr Christian Reynolds, Dr Megan Blake and Dr Peter Jackson) and the University of Newcastle (Dr Amy Fielden and Dr Wendy Wriden). They were supported financially through funding from N8Agrifood.

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