ADOPTING HEALTHY, SUSTAINABLE DIETS:
KEY OPPORTUNITIES AND BARRIERS
Report
**Acknowledgements**

Many thanks to Sue Dibb who prepared this paper, members of the Network of European Food Stakeholders that took the time to answer our many questions – particularly those interviewed to proof the findings of the literature review – and the WWF colleagues in France, Spain and Sweden for their support with finding stakeholders and setting up interviews.

WWF is at the heart of global efforts to address the world’s most important environmental challenges. We work with communities, businesses and governments to help people and nature thrive. Together, we’re safeguarding the natural world, tackling climate change and enabling people to use only their fair share of natural resources.

Food consumption patterns in Europe are currently unsustainable: European food consumption is responsible for a large part of the EU’s greenhouse gas emissions. It is accepted that there needs to be a reduction in global greenhouse gas emission which are contributing to climate change. The EU’s Climate and Energy policy sets a target of cutting greenhouse gas emissions by at least 20% of 1990 levels by 2020.

LiveWell for LIFE is a pioneering project which aims to contribute towards the reduction of greenhouse gas emissions from the EU food supply chain, and demonstrate what sustainable diets could look like for different European countries.

livewellforlife.eu

wwf.org.uk; wwf.eu

The project is funded with the contribution of the EU’s LIFE+ Programme for the Environment.

**Healthy people, healthy planet.**
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INTRODUCTION

Climate change and poor nutrition remain two of the biggest structural and interlinked challenges facing the EU today. The way we grow, produce and import food contributes substantially to climate change, and lifestyle related diseases are increasing. There’s a growing body of evidence that shows how current consumption patterns impact on health, the planet, society and the economy. Amid this, the concept of a sustainable diet – a diet that’s healthy, affordable, environmentally sustainable and culturally acceptable\(^1\) – has stimulated debate about how changes in diet may go some way towards easing these trends.

Just over a year ago, the LiveWell for Low Impact Food in Europe project – or LiveWell for LIFE – started a fact-finding mission. Our aim was to put the sustainable diets debate on the EU’s policy agenda. We wanted to explore the role diets can play in reducing greenhouse gas emissions and show what healthy low-carbon diets could look like in the project’s pilot countries: Spain, France and Sweden.

The results were presented at the first LiveWell for LIFE stakeholder workshop – ‘An Appetite for change’ – in September 2012. Here, we showed that it’s possible to develop dietary recommendations that meet national dietary guidelines and deliver a 25% reduction in greenhouse gas emissions from the EU food supply chain\(^2\). More important, we showed that following the LiveWell diet\(^1\) would not require a radical overhaul of current diets. It’s easy to follow and costs no more than current food consumption.

We invited workshop participants to share their views on the project and the LiveWell Plate\(^2\) as a suitable tool to define and communicate sustainable diets in the EU. Both

\(^1\) The LiveWell diet is a healthy, low-carbon diet that takes account of cultural preferences. Its focus is on mitigating greenhouse gas emissions, but it incorporates health, socio-cultural, economic and qualitative elements as well.

\(^2\) The LiveWell Plate is a visual presentation of a healthy and sustainable diet. It illustrates the types and portions of food an average adult needs to have for a low-carbon diet that’s nutritionally viable. LiveWell Plates have been developed for France, Spain and Sweden – three pilot countries chosen for their differing dietary contexts and levels of policy readiness to adopt the LiveWell diet.

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the research conducted, and the feedback we received, showed us that it’s technically possible to adapt the LiveWell Plate to the three pilot countries. We need to do more work to refine the tools that accompany and help communicate the LiveWell Plate in each country, but the report remains scientifically sound and the results support the current stage of the project: to identify key social and economic challenges and opportunities for the adoption of sustainable diets across the EU.

In order to have a fruitful discussion on sustainable food consumption and production it’s important to define a sustainable diet. However, it’s equally important to find common ground on how these diets can become the norm in different European socio-economic contexts.

So at the second LiveWell for LIFE stakeholder workshop – in Brussels in March 2013 – participants tried to identify the key opportunities for and barriers to adopting the LiveWell Plates in Spain, France and Sweden as well as the wider European Union. This information will help us build a foundation for change and develop EU public policy options and pathways for practical implementation of sustainable diets in Spain, France and Sweden. The policy options and pathways will be the core of LiveWell for LIFE’s final recommendations in 2014.

Even though the economic downturn has put several initiatives on ice, governments across Europe are prioritising food sustainability, not least because of the recent reform of the EU’s Common Agricultural Policy (CAP). In *Europe 2020 – A European strategy for smart, sustainable and inclusive growth* the European Commission identified the food sector as one of three priority sectors able to increase the European economy’s resource efficiency by 2020. And, to set out a framework for action, the European Commission is currently preparing a report on sustainable food, on which public consultation is ongoing.

The outcomes of this consultation will be assessed with great interest. It comes at a time when the EU is revising its sustainable production and consumption strategy and action plan, is discussing the 7th Environment Action Programme, and has started

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discussing its climate policy beyond 2020. Agriculture and food will have to play a bigger role in climate policy if the EU takes its 2050 low-carbon ambitions seriously.

As we found at the LiveWell for LIFE launch, the success of sustainable diets won’t depend on whether they deliver environmental objectives, as this still has a minor place on most consumer and political agendas. It’s about supporting a broader range of current societal challenges, of which public health and nutrition, animal welfare and allowing breathing space for more sustainable agriculture are some of the clearest examples.

As this paper shows, several international organisations, member states, civil society organisations and businesses from various fields are already actively exploring sustainable food consumption. We believe the outcome of Adopting healthy sustainable diets – key opportunities and barriers will be of great value in the joint search for effective and durable action in the near future.

The LiveWell for LIFE team

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BACKGROUND AND SUMMARY

This report is a summary of the efforts of LiveWell for LIFE and the Network of European Food Stakeholders to find the most important social and economic barriers and opportunities for sustainable diets in Spain, France and Sweden and in the wider EU. The basis of the report was prepared by Sue Dibb, an independent food and sustainability consultant based in the UK. In December 2012 and January 2013 she carried out a literature review, drawing on our knowledge of existing sources and independent literature search to find recent and relevant academic papers. This work was supplemented by internet searches for the latest information published by relevant government and international bodies, business organisations and civil society groups. As the main purpose of this research was to inform the second LiveWell for LIFE stakeholder workshop, we would like to stress that this was never intended to be a complete literature review.

The review was supplemented by input from the Network of European Food Stakeholders obtained at the two LiveWell for LIFE stakeholder workshops. At the first workshop in September 2012, a small working group kicked off the process by identifying a number of key barriers and opportunities for adopting sustainable diets in the three pilot countries. The LiveWell for LIFE team followed up on this, and with the help of WWF offices in Spain, France, and Sweden, conducted a stakeholder analysis of key organisations to work with on these issues. We decided to consult with 15-20 organisations from across the three pilot countries to find their perceived barriers and opportunities for a future in which European consumers eat a sustainable diet. Face-to-face stakeholder interviews were conducted in November and December 2012 in Spain and Sweden. Questionnaires were sent to French stakeholders in January 2013.

The report identifies a list of 24 key opportunities and barriers for sustainable diets in Europe. It distinguishes opportunities and barriers as they relate to three key interest groups:

- people
- policy makers and

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This approach recognises that these broad groups of stakeholders will experience opportunities and face barriers in ways that reflect their respective roles. It draws on the Triangle of Change model of behaviour change towards sustainable consumption\(^1\) – the importance of policy makers, businesses and people or civil society working together towards sustainable consumption. The Triangle of Change approach recognises that all have a role to play – dependent on what each is best able and best placed to deliver. Policymakers can deliver regulatory frameworks and incentives while removing barriers. Businesses can develop and market more sustainable products and services. And while people can enact their personal responsibility, both policy makers and businesses have an important role in making sustainable choices available.

This approach doesn’t suggest the categories are mutually exclusive. Many barriers and opportunities for the people stakeholder group are also relevant for businesses and policy makers. Examples are limited knowledge and confusion about what sustainability means, and the growing interest for sustainable food and health.

At the second LiveWell for LIFE stakeholder workshop, the barriers and opportunities long-list (see table 1) was discussed. We tried to prioritise the most important ones for the project as it progresses, and will focus on these key barriers and opportunities (see table 2) in the next phase as we develop practical pathways for sustainable diets, and EU public policy options to support them.

Workshop participants prioritised the (perceived) cost of sustainable diets, the synergies with healthy diets and smart ways to overcome the ‘knowing–doing’ gap as key areas for further work. They also highlighted the need to break institutional barriers by sharing gains. Businesses – particularly the retail sector – were identified as the key stakeholder group.
Table 1:
Long-list of key social and economic opportunities and barriers for sustainable diets in Europe

<table>
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<th>Opportunities</th>
<th>Barriers</th>
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<tr>
<td>People</td>
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<tr>
<td>Growing interest in sustainable food</td>
<td>Limited knowledge/confusion</td>
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<tr>
<td>Models of sustainable diets already exist</td>
<td>Habits</td>
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<tr>
<td>Interest in health</td>
<td>Perceived costs</td>
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<tr>
<td>Saving money</td>
<td>Cultural/gender issues</td>
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<td></td>
<td>Time/lifestyle</td>
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<td></td>
<td>Access</td>
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<td>Policy makers</td>
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<tr>
<td>Policy wins (including public health, climate change, food security and environmental goals)</td>
<td>Focus on food production not consumption</td>
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<td>Empowering food stakeholders to support policy</td>
<td>Economic climate</td>
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<td></td>
<td>Institutional culture</td>
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<td></td>
<td>Reluctance to get involved with behaviour change policies</td>
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<td>Government sensitivity to industry pressure</td>
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<td>Business</td>
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<td>Meeting societal expectations</td>
<td>Influencing consumers</td>
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<td>European policy</td>
<td>Supply-side challenges</td>
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<td>Consumer choices</td>
<td>Policy framework challenge</td>
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<td>Lack of authoritative definition of sustainable diets</td>
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Table 2: Key opportunities and barriers as identified by members of the Network of European Food Stakeholders at the stakeholder workshop

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<th>Opportunities</th>
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<td>Saving money</td>
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<td>Meeting societal expectations</td>
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<th>Barriers</th>
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<td>Costs</td>
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PEOPLE: OPPORTUNITIES

This section shows the key opportunities for behaviour change. We argue that individual consumers can modify their food choices towards healthy, sustainable diets, yet question to what extent consumers acting individually can transform food consumption patterns generally. The role businesses and policymakers have in making sustainable choices easier for people is discussed in the following sections.

GROWING INTEREST IN SUSTAINABLE FOOD

Many consumers are positive towards sustainable food. We have found a growing trend to reconnect farmers and consumers, and support local food and national production – particularly for meat. Interest in organic and fair trade food has increased among a group of concerned consumers.

European consumers have a range of ethical and sustainability concerns, most commonly the use of hormones and antibiotics in meat production, other animal welfare issues, the carbon cost of transporting food, the impact of food production on the landscape, other environmental effects of food production, and the fair treatment of farmers.

The Italian Barilla Centre for Food and Nutrition has identified the rise of the responsible consumer and what it terms consumActors – sustainability-savvy consumers who want to be involved in the food production process. According to its research, people’s dietary habits will have to radically transform in order to meet the dietary and nutritional needs of a growing population in a world that is more affluent and more urbanised. And they’ll have to take responsibility for their choices too – something that may come as a shock to the average post-modern consumer.

FOR THE LAST 10 YEARS THE QUALITY OF FOOD HAS DECREASED SO MUCH THAT PEOPLE ARE DEMANDING BETTER PRODUCTS, EVEN IF THEY ARE MORE EXPENSIVE.

Spanish member of the Network of European Food Stakeholders

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A growing number of consumers are open to the idea of changing their diets. For example in the UK, government research found that 62% of respondents were ‘very or fairly willing’ to give up red meat, while 36% were ‘very or fairly willing’ to give up dairy products\textsuperscript{16}. Dutch research has identified a growing interest in flexitarian eating: a vegetarian diet that occasionally includes meat\textsuperscript{17}.

“There is increasing societal awareness of the opportunities to improve quality of life through healthy eating and of the contribution that sustainable production can make to the improvement of the environment. The preferences of consumers for quality, convenience, diversity and health and their expectations of safety, ethics and sustainable food production serve to highlight the opportunities for innovation.”

\textbf{Italian Food for Life\textsuperscript{18}}

As we know, positive attitudes – in this case towards healthy, sustainable diets – do not always translate into behaviour change! There is a gap between what people think, feel and say, and what they do\textsuperscript{19}. This is explored further below.

Nonetheless, diets have changed considerably over the last 50 years – consumers’ food habits are open to change. The challenge is to encourage that change towards healthy, sustainable diets rather than unhealthy diets and wasteful over-consumption.

\textbf{MODELS OF SUSTAINABLE DIETS ALREADY EXIST}

There are many different diets consumed throughout Europe; some of them are already healthy and sustainable. For example, German research\textsuperscript{20} shows that there can be many diets within one society each with markedly different environmental impacts. While the vegan and vegetarian diets studied had the least impacts, diets based on nutritional guidelines still provided significant environmental benefits.
The public’s knowledge about and interest in health and good nutrition provides a further opportunity for sustainable diets. Better health awareness, healthy lifestyles and overall well-being are societal and economic megatrends\textsuperscript{21}.

Health is a motivator for behaviour change – more than any concern about the environment. UK government research into attitudes and behaviour around sustainable food\textsuperscript{22} found that health is the most important factor for consumers (81%). Environmental sustainability was the least important (26%). A study of consumers in the 27 EU member states also showed that health was more important than environmental concerns for consumer food choices. Some 32\% of people said they would like to buy meat or meat products less often. The main reason given was for health (54\%) compared to 16\% for environmental reasons\textsuperscript{23}.

There are win-win opportunities in this transition\textsuperscript{24}: a diet with less animal protein is healthier and puts less pressure on the environment. However, a focus on health benefits will appeal to a wider range of people – this was also one of the strongest messages from stakeholders at the second LiveWell workshop.

Cost is an important factor when consumers choose food, particularly due to the current financial downturn in many European countries. People can eat a healthier, more sustainable diet and save money by eating less meat, wasting less food and eating smaller portions.

Many people think eating healthily and more sustainably costs more, but German research\textsuperscript{25} shows that changing diets can reduce environmental impacts at a low cost. And research led by Dr Jennie Macdiarmid – senior research fellow at the University of Aberdeen, Scotland\textsuperscript{26} – found it’s possible to have an acceptable healthy diet and reduce greenhouse gas impacts (36\%) without cutting out meat at a cost that compares to average UK spending on food.

Research for the LiveWell diet shows that a healthy sustainable diet doesn’t
necessarily cost more\textsuperscript{27}. Indeed, it was recommended at the second LiveWell stakeholder workshop to make the potential cost savings of sustainable diets one of the key messages in the future, as cost is seen by many as a barrier.

**PEOPLE: BARRIERS**

The literature reviewed for this report gave lots of evidence of barriers to behaviour change towards healthy, sustainable diets. Drawing on a wide range of research on consumers attitudes towards eating sustainably, the UK government Foresight project on Global Food and Farming Futures concluded, “There is a growing literature on the attitudes of consumers to moving towards a more sustainable lifestyle, of which eating is only one aspect. It is noticeable that many of the papers identify more barriers than opportunities.”\textsuperscript{28}

These barriers can be distinguished between *individual* (internal) barriers, for example socio-psychological factors, physiological characteristics and demographic barriers and *societal* (external) barriers such as infrastructure, cultural, economic and institutional barriers.\textsuperscript{29} At the second LiveWell for LIFE stakeholder workshop, several individual barriers were discussed. Many participants identified unsustainable habits – for example in shopping – as something that needs closer attention.

**KNOWLEDGE AND CONFUSION**

Our research shows that limited knowledge and some confusion over what is and what is not sustainable is a significant barrier to choosing a sustainable diet.

There are many discrepancies in people’s understanding of what constitutes a sustainable diet. Consumer research shows that people think reduced food packaging is the most important aspect of environmentally-friendly food consumption. Lower meat consumption is seen to help the least.\textsuperscript{30} Also, the negative effects of unhealthy

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**MOST PEOPLE ARENT AWARE OF HOW THEIR PERSONAL ACTIONS INFLUENCE THE ENVIRONMENT AND THEY DONT KNOW EXACTLY WHAT TO DO, COMPARED TO HEALTHY EATING. CLIMATE IS NOT ON THE MIND OF CONSUMERS.**

Swedish member of the Network of European Food Stakeholders

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diets are well understood in the West, at least in general terms, though consumers still have difficulties working out which specific products are healthy and which are not.

While climate change remains a key concern for Europeans there is also widespread public confusion over what it actually is. Most people have only a vague understanding of the science, and believe it to be inconsistent. Others believe it to be just a fad. There is a specific lack of awareness and information on the carbon footprint of a product.

As knowledge and awareness increases, there is a downside – many consumers are more unsure about food information, and sometimes don’t believe what they are told. In her review of the literature for the UK Foresight project, Lynn Stockley – senior researcher with the British Heart Foundation Health Promotion Research Group – identifies “little or confusing or contradictory information” as a barrier. Many consumers are uncertain and sceptical of green claims from industry, and don’t know who to trust. Government, the media and celebrities are not particularly trusted either.

So, people are confused about terms such as organic, natural, and environmentally friendly. European wide research shows that only a minority of EU citizens recognise EU food quality assurance logos. Just over one-third of EU citizens (36%) are aware of the non-EU Fairtrade logo, a quarter (24%) are aware of the EU’s organic farming logo and only a small minority are aware of logos symbolising the three elements of the EU’s Protected Geographical Status scheme. Knowledge of these logos varies widely between member states. In the UK, a large majority (86%) recognise at least one of the logos, compared with only one-third (34%) of respondents in Bulgaria and Poland.

Research by the UK consumer group Which? on sustainable food labelling concluded that many labels are unknown, poorly understood and don’t really help consumers understand how different aspects of sustainability have been tackled.

As food and diets increasingly become objects of media attention, Claude Fischler of the Barilla Centre believes “there is information, but there’s too much of it. And it’s incoherent, cacophonous, and continuously changing”. He thinks information is

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contradictory because it comes from so many different sources, with advertising, internet blogs, and the innumerable television shows, books and magazines providing advice on diet.

Some lack of knowledge and confusion may be justified. As Jennie Macdiarmid points out: “The concept of a sustainable diet is not new, but it is a complex issue, and there are still many gaps in our understanding of what a sustainable diet might comprise.”

However, the European Commission has recognised the challenge of communicating the environmental performance of products. At a 2012 conference, the Directorate-General (DG) for Health and Consumers acknowledged that sustainable food is a new and complex area for consumers who suffer from information and label overload. He raised the issue of reliability of information and the lack of a meta-label that would cover all sustainability aspects. The DG also emphasised that information alone is not enough to change consumers’ behaviour – green choices need to be easy and affordable.

This is particularly relevant for the many people for whom sustainability is not a priority. Which? found that even people who say they are motivated to think about ethical and environmental issues when choosing food, still put it as a relatively low priority compared to other issues such as price, safety, taste, quality and healthy eating.

Environmental and ethical issues are rarely top priority when shopping for food. Nearly half the people in the Which? research said that there are too many things to think about already without having to worry about the environmental impact of the food they buy. The Barilla Centre has identified these ‘indifferent’ consumers as a symptom of a post-modern society – they take individual choices without much sense of responsibility.

Certainly many consumers feel alienated from the food chain, though ‘a large minority’ say they want to have more of a voice on how food is produced. Particularly in relation to climate change issues, many people report a lack of motivation and empowerment, feeling hopeless in relation to the massive size of the problem, and
feeling that individual contributions are very small compared to the extent of, for example, carbon emissions by industry.\(^{42}\)

### HABITS AND BEHAVIOUR CHANGE

Habits are a major barrier for behaviour change and were pin-pointed at the second LiveWell workshop as one of the key challenges for sustainable diets.\(^{43}\) Even with knowledge and motivation it’s difficult to change existing habits. Research has shown that when habits are strong, behaviour is largely automatic; so intentions are poor predictors of actual behaviour.\(^{44}\) UK government research found ‘not chosen out of habit’ and ‘too expensive’ were the two most cited barriers to sustainable food consumption.

Having automatic, habitual daily patterns of eating helps to explain the disconnection between people’s values and attitudes and their behaviour. There’s a gap between what people say they value in relation to healthy, sustainable choices and the reality of what they buy and consume.

Consumers have many issues other than sustainability on their minds when they make trade-offs between the advantages and disadvantages of lifestyle and product choices.\(^{46}\) This gap between what people think, feel and say – their attitudes and values – and what they actually do – their behaviour – can be explained by the fact that eating is a daily routine and people make mental shortcuts. A change in attitude is not usually sufficient to change behaviour, but needs to be reinforced by other factors, such as a new debate about food prices.

The Barilla Centre\(^{47}\) says that the challenge over the next few decades is to reduce the disparity between wanting to achieve a healthy diet and lifestyle, overcoming existing social and cultural systems, and actually managing to do so.

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**IT’S VERY HARD TO GO FROM KNOWING TO DOING; IT’S A BIG STEP.**

Swedish member of the Network of European Food Stakeholders

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However, habitual behaviour is an evolutionary advantage – we don’t need to invest mental effort in routine decisions that have served us well in the past. Our physical and mental preferences have not always been in sync with the rapid development of the food chain around us. This is something the food industry has made use of in the past⁴. So it’s important to consider the significant influence that food processors, retailers and mass media have on consumer choices⁴⁸.

“Overcoming problems of consumer lock-in, unfreezing old habits and forming new ones, understanding the complexity of the social logic in which individual behaviours are embedded: all these are pre-requisites for successful behaviour change initiatives.”

Sustainable Development Research Network⁴⁹

Habit is one factor among many that reinforce the so-called lock-in to current lifestyle patterns. Economic constraints, institutional barriers, inequalities in access and social expectations can all be influential factors⁵⁰.

Where sustainable food choices are not the norm, the success of behaviour change initiatives will depend on those options being the easy default choice. Changing habits takes an integrated approach in which downstream interventions – like education – are combined with upstream interventions – such as a change in context and immediate behaviour consequences.

COST

Socio-economic status is an important factor in sustainable food choices⁵¹. Research shows that price (91%) is the second most important consideration after quality (96%) for European consumers when shopping for food. Unsurprisingly, it’s especially important for those who struggle to pay bills.

UK government research⁵² found that the most common barrier to sustainable food consumption was that it was ‘too expensive’. This was specifically mentioned in the

⁴ See for example the work of Michael Moss: www.nytimes.com/2013/02/24/magazine/the-extraordinary-science-of-junk-food.html?pagewanted=all&_r=3&
context of choosing healthy diets, as healthy, sustainable products are typically seen as more expensive. This can act as a perceived barrier even when healthy, sustainable diets are cheaper or no more expensive than regular diets.

Research reliably shows that the low-income diets are less healthy than the diets of those with higher socio-economic status. It is reasonable to assume that cost is a stronger barrier for people on lower incomes who spend less on food than the average household. They may well find it harder to make healthy choices as some foods such as fruit and vegetables are more expensive than energy dense foods. Not only are these foods cheaper, the prices are less likely to rise as a result of inflation. This means higher calorie, energy dense foods are a better bargain for cash-strapped shoppers\(^5^3\).

The cost determines what food gets bought in the current economic crisis. The Mediterranean diet, recognised as one of the healthiest in the world, is said to be under threat from the economic crisis facing much of southern Europe\(^5^4\). Research shows that people on the lowest incomes are least likely to be following a Mediterranean diet and are more likely to be obese compared to those on higher incomes.

The Barilla Centre\(^5^5\) highlights the importance of educating people so that they can understand that it is possible to eat in a healthy way without spending a lot of money. There are currently no economic barriers to vegetarian and reduced animal protein diets as substitution products such as grains, vegetables and legumes are generally less expensive than meat\(^5^6\).

CULTURAL AND GENDER ISSUES

Cultural and gender issues may be important barriers especially when it comes to eating meat. Dutch researchers point out that meat is a vital part of culinary cultures in western Europe and many people see meat as an essential part of a meal\(^5^7\). Authors of the 2011 study *The Protein Puzzle* note that eating less meat and dairy products has environmental and health benefits and is an easy and robust option, but changing consumption patterns is a slow cultural process\(^5^8\).
Gender is an important demographic factor associated with sustainable food choices\textsuperscript{59}. German research shows that women follow nutritional recommendations more closely than men\textsuperscript{60}. Meat eating is traditionally associated with masculinity, though Dutch researchers indicate that there may be a shift taking place in the cultural image and appreciation of meat\textsuperscript{61}. The authors have noted the increase in so-called flexitarian eating in the Netherlands – people who are consciously trying to limit their intake of meat\textsuperscript{62}.

TIME AND LIFESTYLE BARRIERS

Research shows that people think a sustainable diet takes longer to think about, prepare and cook\textsuperscript{63}. The mega-trend of convenience food is driven by busy lifestyles, more women working outside the home, changes in household composition, increases in disposable income and revolutions in food processing\textsuperscript{64}. Demographic trends including an ageing population, single-member nuclear families, immigration, and the role of women all influence how we prepare and eat food\textsuperscript{65}.

As a result there has been a change in consumption patterns – we eat more ready meals and fast food in and out of the home, which means consumers are increasingly estranged from the production of their foodstuffs. Despite better knowledge of nutrition, people aren’t preparing and cooking food from scratch\textsuperscript{66}. We’ve seen an overall increase in food waste, coupled with raising overweight and obesity. And because most food products are available and affordable all year round, food seasonality has lost its meaning\textsuperscript{67}.

ACCESS

Ease of access to healthy, sustainable diets doesn’t appear to be as important as the factors above – it’s mentioned in UK research in relation to sustainable options, but in terms of cost rather than availability\textsuperscript{68}. Also, access doesn’t seem to be important where shops offer healthy, sustainable choices – the abundant availability of unhealthy, unsustainable foods, which are attractively marketed and priced is a stronger barrier to making better choices.
Access can however be a problem in the food service sector (restaurants, cafes, canteens, street vendors, etc.) where the availability of healthy, sustainable choices tends to be limited.

POLICY MAKERS: OPPORTUNITIES

Policy makers at all levels are vital in providing the right framework for people and businesses to act more sustainably. In recent decades, the overriding goal of feeding a hungry world meant that the sustainable diets concept was neglected by policy makers. Now, links between improving nutrition through better balanced diets and reducing the ecological impact of dietary choices is being recognised. A shift to more sustainable diets would trigger knock-on effects on food production, the processing chain and food consumption.

POLICY WINS

For European policy makers, tackling sustainable consumption by encouraging healthy sustainable diets would also help many other policies. These include obesity and nutritional health, reducing climate change impacts, increasing food security and achieving resource use and environmental goals. Eating is one of the areas of consumption that has the largest impact on the environment. Within the EU, approximately one third of households’ total environmental impact (including energy use, land use, water, soil pollution and emissions of greenhouse gases) is related to food and drink consumption.

In a world of growing affluence and a predicted population of nine billion by 2050, sustainable diets are increasingly recognised as a way to tackle global food security and climate change. The UN Food and Agriculture Organisation (FAO) and Bioversity International have highlighted the importance of consuming foods with lower water and carbon footprints, as well as promoting food biodiversity through nutritionally rich traditional and local foods. Through this work, FAO has reached a consensus definition of sustainable diets and its Millennium Development Goals.

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Within the EU, a number of policies promote healthy, sustainable diets. CAP and the Common Fisheries Policy (CFP) provide major EU policy frameworks and are currently under reform. Other areas, such as environmental policies and economically-oriented policies on trade regulation and cohesion, also have an important effect on food consumption and production.

EU climate change policy includes trying to cut EU emissions by 80-95% below 1990 levels by 2050. In March 2011 the European Commission set out to achieve this goal with its *Roadmap for moving to a competitive low carbon economy in 2050*.

Europe 2020 was launched by the European Commission in 2010 as a successor to the Lisbon Strategy. It’s a 10-year plan which aims to achieve smart, inclusive and sustainable growth, and highlights the need to decouple economic growth from the use of natural resources. A *resource-efficient Europe – Flagship Initiative under the Europe 2020 Strategy* serves as the umbrella of the European Sustainable Consumption and Production Policies. Of relevance to sustainable diets, the resource-efficiency Roadmap (2011) says: “by 2020, incentives to healthier and more sustainable food production and consumption will be widespread and will have driven a 20% reduction in the food chain’s resource inputs. Disposal of edible food waste should have been halved in the EU.”

Other European-level initiatives are being prepared. There will be an updated version of the EU Sustainable Consumption and Production Action Plan to include the introduction of a Product Environmental Footprint Methodology, and a Sustainable Food Communication (2013) is being developed. There’s ongoing work looking at the

FAO defines sustainable diets as:

“Those diets with low environmental impacts which contribute to food and nutrition security and to healthy life for present and future generations. Sustainable diets are protective and respectful of biodiversity and ecosystems, culturally acceptable, accessible, economically fair and affordable; nutritionally adequate, safe and healthy; while optimizing natural and human resources.”
feasibility of extending the EU Ecolabel to food, and the Commission has established the European Food Sustainable Consumption and Production Round Table with European food supply chain partners – discussed under Business: opportunities. Public procurement has also been earmarked to support healthy, sustainable food.78

At a national level, several European countries and institutions now give advice on healthy sustainable diets. The Health Council of the Netherlands produced Guidelines for a Healthy Diet: the Ecological Perspective in 2011. Its pointers include a less animal-based and more plant-based diet. France’s Environment and Energy Management Agency and the German Council for Sustainable Development also give similar advice.

In Italy, the Barilla Centre created the Double Pyramid to show the connections between dietary health and environmental goals. This is based on the well-known Food Pyramid showing a balanced healthy diet together with an inverted Environmental Pyramid. WWF’s Livewell Plate developed by the Rowett Research Institute, outlines guidance for a varied and nutritionally balanced diet that would meet the UK’s greenhouse gas emission targets.

Commentators believe there are ways to help the development of healthy, sustainable diets in other policy measures. These include stopping the current subsidy of cheap meat products, promoting major investments in health diets, greener public procurement, and taxation of unhealthy foods. The Barilla Centre argues policymakers can help consumers make healthy and sustainable choices by giving clear messages. It also sees opportunities in other initiatives, such as using price to encourage healthier choices and making those choices more accessible.

EMPOWERING FOOD STAKEHOLDERS TO SUPPORT POLICY DESIGN, IMPLEMENTATION AND EVALUATION

There’s lots of grass-roots energy to engage on more healthy and sustainable food consumption and production. Many stakeholders expect governments to take a more leading role and develop multi-sector approaches, but, this is currently done by civil society organisations. Good advice is overlooked or a lack of legislative pressure

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stops opposing stakeholder groups from finding common ground. The existing enthusiasm is an opportunity for governments to build on and create better support and ownership for new policies.

POLICY MAKERS: BARRIERS

Despite growing interest in healthy and sustainable food and the fairly obvious policy opportunities to bring about public health, environmental and agricultural improvements (and herewith strained public budgets) policy makers seem to be lagging behind.

Policy cycles usually take some time, but it is clear that – particularly from an environmental point of view – government policy on sustainable lifestyles has not had a very warm welcome. In this chapter we outline some of the main reasons for this.

FOCUS ON FOOD PRODUCTION – NOT CONSUMPTION

Policies to tackle food security and sustainability largely focus on agricultural production and technological efficiency – there is a reluctance to recognise the importance of food consumption. The EU Standing Committee on Agriculture Research (SCAR) report\(^6\) concludes there has been an emphasis on technological innovations on the supply side. However, social innovations are just as important. Changing the supply chains – for example, towards more local purchasing – may have a huge impact on cost and also create closer links and confidence between producers and consumers. The report also stresses that it is equally important to reduce unsustainable food consumption levels. Therefore, research on behavioural or structural changes in food systems and supply chains should be given a higher priority.

FROM ALL ACTORS IN THE FOOD CHAIN, MY FAITH IN POLICY MAKERS IS LOWEST. IT TAKES 10-15 YEARS UNTIL THEY ARE MATURE ENOUGH TO MAKE DECISIONS.

Member of the Network of European Food Stakeholders at the LiveWell for LIFE workshop – March 2013

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Technical solutions probably won’t solve the sustainability challenge; behavioural change and altered lifestyles will have to play major roles. The current policy focus on efficiency mainly drives farmers and others in the food chain towards cost-price reduction. Policies aimed at reducing consumption hardly exist and those on production with fewer local impacts are usually secondary to economic and trade policies.

FAO highlights the need for policies that address consumption as well as production:

“We need to look not only at the production side, but also at consumption. It’s especially important when we consider the environmental implications of increasing food production. To answer the 9 billion people question, we can’t look only at the production side; we also need to look at consumption. That ranges from access at one end to reducing waste at the other.”

Jose Graziano da Silva, Director-General of FAO

ECONOMIC CLIMATE

The current economic climate has put great political emphasis on boosting growth, jobs and the economy and ensuring cheap food for consumers. Sustainability and environmental goals are not a big priority for many politicians, which show the conflict between short term political priorities and longer term goals. Researchers identify the need for policy makers to take planetary boundaries more seriously and to provide more public research funding.

The agriculture, food and drink manufacturing industries, and food retailers are very powerful lobby groups – they are often more influential than companies and organisations with consumer, health and environmental interests. As a result, voluntary initiatives – rather than governments – push most of the policy changing buttons. The Danish Environmental Protection Agency has developed a guidance note for policy makers who want to promote sustainable consumption and production in the food retailing sector. It says that “government has an important enabling role to...”
play in using policy levers to support the development of a business case for manufacturers and retailers to produce and deliver more sustainable products. It calls for a more integrated and coherent policy framework, and recommends the development of eco-tax reforms, shifting tax from labour to material consumption.

INSTITUTIONAL BARRIERS

The complexity of decision-making bodies at international, EU, national, regional and local levels creates lots of barriers. Policies to support healthy, sustainable diets require the integration of many other areas, including health, environment, agriculture, climate change and social justice. This means it’s difficult for governments to work in a joined-up way.

The overlap between healthy and sustainable diets seems like an obvious starting point for proactive joint policy work. However in practice, health and environment agencies seem to find it difficult to link up. The Dutch example highlighted above is rare – where the analysis of environmentally friendly diet recommendations was owned by a public health agency. In other member states, such as France, it isn’t common for environmental ministries and agencies to develop public policy on dietary issues. It’s the same story at the European Commission – proposing joint action on healthy and sustainable diets seems to be particularly hard for the Directorate-General for Health and Consumers.

There’s also a tension between healthy and sustainable diet recommendations and creating a single market in the EU. Sweden was the first country to produce guidelines for a sustainable diet. However, its proposal to the EU to adopt them was withdrawn when the Swedish government found that advice to eat more locally produced food contravened free trade rules. This issue needs closer attention in the future.

Writing in the medical journal The Lancet, Sharon Friel et al say: “Coordinated intersectoral action is needed across agricultural, nutritional, public health, and climate change communities worldwide to provide affordable, healthy, low-emission diets for all societies.” Developing overarching food strategies and policies would help collaboration across different sectors. At European level there are many relevant

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policies and strategies but no overall EU sustainable food strategy. The UK’s Food 2030 plan is rare in recognising the need for cross-sector engagement at policy level. A strong barrier at political level is a reluctance to “interfere with personal choice”. There’s also the fear of backlash from producers at a time of austerity; and the public, particularly regarding meat consumption. Behaviour change policies can seem too difficult or unpredictable – or both – and as with the public, the concept and benefits of healthy, sustainable diets can be poorly understood by policy makers. As EU experts point out, policy makers face real challenges in finding the right roles for governments. How far can governments go? How far can they act themselves through campaigns, standards, regulations, and payments? How much power can governments give civil society NGOs, or for-profit organisations like health insurance companies? The authors of the SCAR report think the answers lie in empowering consumers instead of telling them what to or not to eat. However, they recognise that their understanding of consumers’ attitudes is far from complete. These questions are particularly pertinent right now when short term political goals promote food production and exports, including that of agriculture. At a time when consumers are already cutting back on food expenditure, there is little political appetite for policies that seek to cut consumption further. We don’t know how a change towards healthier, values-based consumption – such as high quality, regional and environmentally friendly – will evolve. As experts note, such a shift seems to be slow, and very volatile and sensitive to the economic situation. What we need from policy makers is “clear and consistent political leadership, which models the behaviour and the development of policies and environments which do not inhibit but actively support change”. The Foresight report notes that in a European survey there was strong support for a taxation system to promote eco-friendly products.
WWF-UK has put forward policy recommendations for government\textsuperscript{100} to:

- Lead the development of a clear definition of a sustainable diet as a priority, in conjunction with other stakeholders, and convert this definition into specific dietary guidance.
- Evaluate the full suite of policy tools available to facilitate changes in consumption patterns and use this insight to outline specific policy objectives that implicate the business sector (including retail and food service).
- Identify policy measures to buffer negative industry impacts that might arise from wholesale changes in diets as a result of action by retailers and food service businesses.

**GOVERNMENT SENSITIVITY TO INDUSTRY PRESSURE**

Our stakeholders say that organised industry lobby is a barrier for governments to work harder on healthy and sustainable diets. Those in public health note the success with which the food industry has fought legislative measures on food labelling and information, marketing to children and fiscal measures. This has troubled NGO-industry relations. Moreover, if governments don’t support public health measures it begs the question whether they would support similar measures from a sustainable diet perspective. Businesses seem to fulfil unjustifiable roles in policy formation and create their own conditions for self-regulatory approaches\textsuperscript{101}. Among many stakeholders there is scepticism if these are sufficient measures to deal with the scale of the non-communicable disease challenge.

**FOOD CHAIN: OPPORTUNITIES**

Businesses in the food chain – including farmers, food manufacturers, retailers and the food service sector – have a crucial role in changing consumption and production patterns. The SCAR report urges companies to take their responsibilities seriously and to develop business models for sustainable food production, processing and retail activities sensitive to consumer concerns\textsuperscript{102}. The second LiveWell for LIFE stakeholder workshop also gave a clear message that business, particularly the retail sector, should make the first move.

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MEETING SOCIETAL EXPECTATIONS

As discussed earlier in this report, there is increasing societal awareness of the benefits of healthy eating and the positive effects of sustainable production on the environment. Consumers want quality, convenience, diversity and healthy foods, and expect safe, ethical and sustainable food production. There are big opportunities for business innovation.

The World Business Council for Sustainable Development (WBCSD) points out that consumers are aware of environmental and social problems, and want companies to solve them. They will reward brands which meet their aspirations, including the need to ‘tread lightly’ and avoid brands which seem unsustainable or irresponsible.

WBCSD draws attention to the benefits for businesses:

“It is in its own interest to find new solutions for more sustainable consumption patterns. Otherwise business will face significant consequences including rising costs (…) uncertainty (…) increased regulation [and] friction: the debate over sustainable consumption could become polarized and deadlocked. Innovation, productivity, brand value and sales would all suffer from the tensions between corporate objectives, consumer behaviour and sustainability.”

EUROPEAN POLICY

European policy activity – such as the European Food Sustainable Consumption and Production (SCP) Round Table – can also presents opportunities for businesses engagement. Co-chaired by the European Commission and food supply chain partners, it was set up in 2009 with 24 member organisations representing the European food supply chain. Its aim is to establish the food chain as a major contributor towards sustainable consumption and production in Europe, with a view to strengthen competitiveness and support EU policy objectives. Its primary focus is to work out how to communicate environmental performance to consumers and help them make an informed choice. The Round Table wants to adopt its final methodology.
and recommendations on how to voluntarily communicate environmental information by the end of 2013.

BUSINESS OPPORTUNITIES TO SHAPE CONSUMER CHOICES

Food businesses are crucial in bringing sustainable behaviour into the mainstream among consumers: they must offer attractive, accessible and affordable products. Businesses can 'choice edit', for example by setting minimum sustainability standards and avoiding the production and consumption of unsustainable products. They can also take full account of the resource lifecycle.

Retailers in particular, can play a crucial role as globalisation and the ongoing concentration of players in the food chain continue. WWF-UK research into the retail business case for sustainable diets found that retailers are in a unique position to shape the consumer experience, to control what is and what isn’t made available, and sell not just products but lifestyles. They have a very considerable responsibility.

Individual consumers may want an environmentally friendly option, governments and NGOs may hope for the same; but it is ultimately retailers who are at the heart of the food system. Our research showed that there may not yet be a business case for sustainable diets that meets retailer requirements; but unless and until retailers make it straightforward for consumers to buy a sustainable diet, the prospects for radical change are limited. We think retailers’ activities to promote sustainable diets are piecemeal at present – it only happens in the presence of strong evidence of a commercial imperative to act.

Retailers also have a key role influencing supply chains, and can enter into agreements with farmers and other food suppliers to improve processes, such as production techniques. UK-based retailer Marks & Spencer has developed an ambitious sustainability strategy, called Plan A. It includes commitments on climate change, waste, sustainable sourcing, ethical trading and helping customers and employees to live healthier lifestyles. The company aspires to become the world's most sustainable major retailer by 2015.
At producer level, farmers and primary producers could provide higher value products, for example in environmental and animal welfare terms. Currently farmers and other producers are driven towards cost price reductions, and primarily support the prevailing efficiency strategy. Seasonal foods cultivated and processed at local and regional scale may also offer opportunities, though this is generally at odds with productivity\textsuperscript{112}.

Saving money and resources comes first for food manufacturers. Leading European manufacturers are also supporting sustainable consumption. In 2012, FoodDrinkEurope, which represents the European food manufacturing sector, launched its environmental sustainability vision for 2030\textsuperscript{113}. It wants the industry to engage with retailers and other stakeholders and tell consumers about the impact of their diet on sustainability and how it relates to their lifestyles. FoodDrinkEurope will also look beyond consumer information to stimulate increased awareness and public debate on sustainable consumption.

Unilever wants to show leadership and demonstrate responsible business practices in sustainable consumption. Its Sustainable Living Plan\textsuperscript{114} includes global commitments to source 100\% of agricultural raw materials sustainably and increase the nutritional profile of its products by 2020. In the UK, Unilever has a campaign to address the perception that sustainable lifestyles can be more expensive. The Sustainability Challenge aims to help UK families cut food waste and reduce household bills. Unilever is providing tools, advice and inspiration to help reduce monthly food bills by 15\% and household rubbish by 25\%\textsuperscript{115}.

There are also opportunities for the food service sector, particularly public procurement. Some 40\% of calories are consumed out of home. Within food service, public food service in Europe represents 21 billion meals served every year for an annual turnover of €77 billion. The economic clout of public procurement could give a strong signal of change and innovation by promoting more sustainable food production and consumption patterns\textsuperscript{116}.
FOOD CHAIN: BARRIERS

Despite the opportunities, responsibilities and good efforts, the food chain faces challenges. Although these differ between sectors, the following four barriers stood out.

INFLUENCING CONSUMERS

It can be hard for food businesses, particularly retailers, to influence consumers\textsuperscript{117}. According to research conducted for WWF-UK, in broad policy terms consumer sovereignty remains paramount – at national and international level. Retailers are acutely conscious of the fact that, unless they keep their customers happy, their market share, profits and reputation can all suffer. The best we can hope for is an incremental change.

A major challenge is taking sustainability beyond a niche market. As the World Business Council for Sustainable Development (WBCSD) points out, for many reasons – including price, performance and false perceptions – sustainable products and services tend to appeal only to niche markets, with limited impacts\textsuperscript{118}. Price still seems to play a major role: WWF-UK notes the absence of market opportunities for more sustainable product lines because of limited consumer demand\textsuperscript{119}.

SUPPLY-SIDE CHALLENGES

WBCSD\textsuperscript{120} highlights supply-side challenges for sustainability. Most businesses have spent years refining their process and business models and are – according to the signals they get from the marketplace – working efficiently and profitably. As production efficiencies have helped drive down the cost of some products and services, more sustainable offerings can be more expensive than their traditional versions. A switch to more sustainable products and business models can mean more investment, plus changes in corporate culture and

\begin{quote}
WE CAN'T MAKE HEALTHY SUSTAINABLE FOOD TOO COSTLY – IT HAS TO BE AFFORDABLE.

Swedish member of the Network of European Food Stakeholders
\end{quote}
practices, different skill sets, and better integration throughout the value chain. It’s easy to see how new, more sustainable products, processes and services can struggle to get to scale and compete with established offerings.

The need to understand, manage and report impacts throughout the value chain is also a challenge, since supply chains can be opaque and highly complicated. Their increasing complexity makes it difficult and expensive to assess and manage the impacts of a specific product, process or service. Changing these supply chains can be time consuming, and require new types and levels of collaboration. Existing regulatory frameworks can interfere with this – for example, with relation to anti-competitive behaviour.

**POLICY FRAMEWORK CHALLENGE**

Without clear political and policy signals and incentives, many businesses feel they have limited ability to progress sustainability. WWF-UK’s *Selling Sustainability* (2012) report highlights the commercial disbenefits for retailers when, in the absence of policy requirements to act, they shift consumption patterns against the grain of consumer demand. Even when regulations and fiscal incentives do exist they are inconsistent from one country to another, and there is a lack of a globally binding agreement on climate change. The inconsistencies in national frameworks can provoke capital flight from tightly regulated countries to countries with more laissez-faire regimes, often with no net financial, environmental or social benefit.

Furthermore, the lack of an effective international framework allows importer countries to avoid responsibility for the impacts of production abroad. While laws, regulations and incentives are sometimes inconsistent in these respects, WBCSD points out that they’re often consistent in other ways: in giving existing business models competitive advantage over more sustainable ones. More sustainable businesses often face higher costs, even if they stand to gain more in the long run: they have to invest more, earlier, and with longer pay-off periods.
LACK OF AN AUTHORITATIVE DEFINITION OF SUSTAINABLE DIETS

There is no authoritative definition of a sustainable diet, and this is a barrier for the food industry. In Selling Sustainability, WWF-UK examined the retail business case for sustainable diets in the UK. They found that retailers are concerned about the reputational risks which could come with giving consumers advice and information about sustainable diets in the absence of a universally agreed definition among stakeholders.

Retailers say there is a risk of confusing or alienating consumers by engaging with them on the issue of sustainable diets too soon, in case there’s a need to reframe the issue at a later date in the face of emerging scientific evidence or political position on the issue.

Currently retailer activities to promote sustainable diets are piecemeal. The report concludes that there is an urgent need for all stakeholders involved to work quickly to establish a consensus-based definition of a sustainable diet.

CONCLUSION

People today are motivated by health concerns when they choose what to eat and are aware of the benefits of healthy eating. They are increasingly savvy; demanding high quality ethically sourced and produced food. They are also eager to save money. But, although research shows a healthy sustainable diet doesn’t have to cost more, there’s a perception that living a healthy sustainable lifestyle comes with a premium. While the cost is a perceived barrier to some, it is a real obstacle for people on low incomes who tend to have a below average household budget.

People are also confused about what sustainability actually means in terms of food production and consumption. Habits are hard to change but are the main obstacle for achieving behaviour change. Whereas consumers want a healthy diet and lifestyle, their good intentions are thwarted by automatic buying patterns.

Going forward, LiveWell for LIFE will explore these opportunities and barriers as we find ways to adopt sustainable diets in the pilot countries, and the policy changes needed for a move towards sustainable diets across the EU.

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