

WHAT ARE FOOD SYSTEMS ?



Introduction

Food Systems are the people, places, and activities that bring us food. They make food available in diverse ways that influence and shape the choices we make about what to eat, when, and how.

They are complicated and constantly changing – comprising a host of moving and interconnected pieces. They support many people’s livelihoods.

Food systems encompass food supply chains, food environments, and consumer behaviour. They are driven by factors like economics, culture, technology,

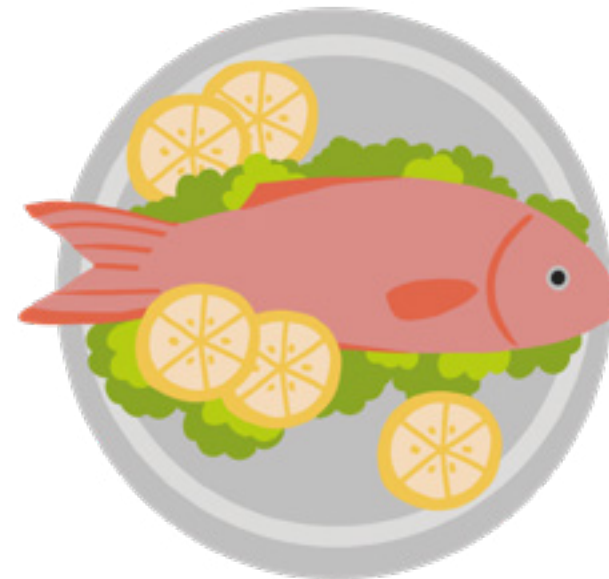
and demography, as well as by institutional and other actions.

Our food systems – what and how we eat and where it comes from – profoundly impact our ability to achieve universal goals of human and planetary wellbeing. Sustainable Development Goals including No Poverty, Zero Hunger, Good Health and Well-being, and Responsible Consumption and Production are directly linked to food.

Food systems are at the heart of some of the most

significant challenges we face today, including diet-driven ill health and environmental damage. A third of the world is hungry or malnourished, more than half of global ill health is determined by poor diets, and food systems account for a quarter of CO2 emissions.

They are also at the heart of many solutions. Food systems feed hundreds of millions more than ever before. They can now be a provider of better diets, better livelihoods for food workers, and nourish the planet safely.





Overview

This pamphlet describes food systems in nine major parts:

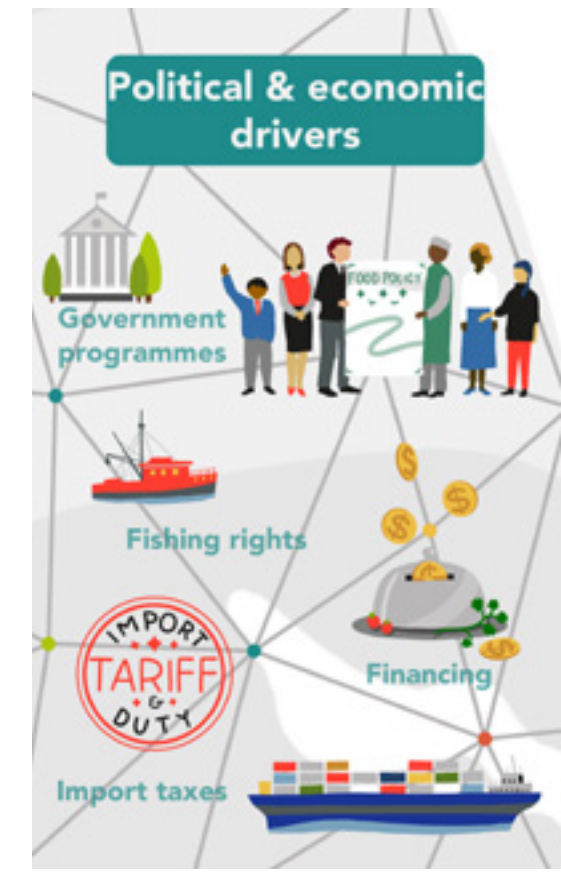
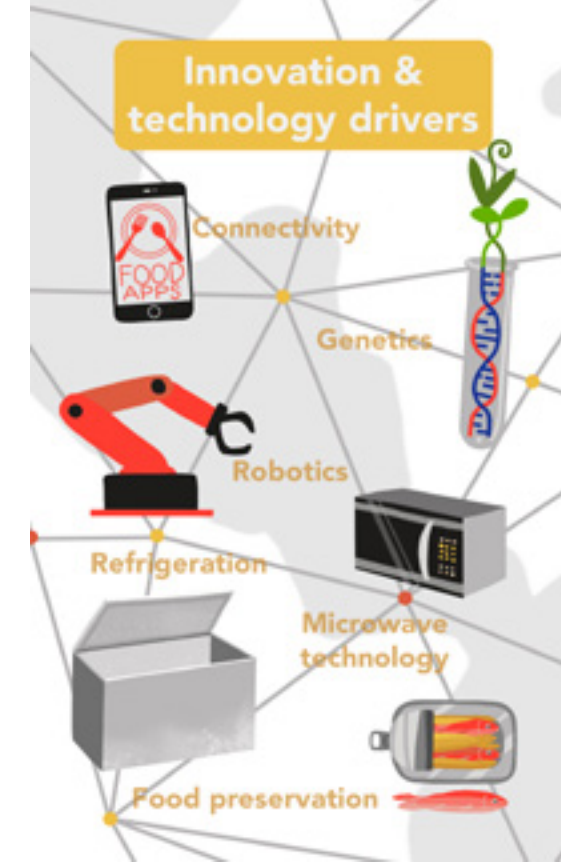
- Food systems drivers
- Supply chains
- Food environments
- Individual factors
- Consumer behaviours
- Diets
- Political, programme, & institutional actions
- Nutritional & health outcomes
- Impacts: social, economic, environmental

FOOD SYSTEMS DRIVERS

Drivers of food systems include the factors, processes, and conditions that shape the availability, accessibility, affordability, and desirability of foods in a particular location.

They include:

- **environmental and biophysical factors** like climate, biodiversity, and soil health;
- **cultural factors** like what people consider to be desirable food or gender norms related to who buys and cooks food;
- presence of **infrastructure** to transport food;
- **research and development** related to food;
- **demographic factors** like changing urban populations or average family sizes;
- the **financing** available to support food and agriculture businesses; and
- **political and economic factors** like income growth.





SUPPLY CHAINS

Food supply chains encompass everything from the seeds needed to grow crops to food being produced on farms, captured or fished, to food reaching the people who eat it.

For some foods, this journey includes multiple stages of processing – for instance, milling grain to flour, fortifying flour with essential vitamins and minerals, then baking flour into bread. This bread is often then sold in a bakery or shop.

Supply chains include input supply, production, storage, handling, transportation, processing, packaging, distribution, and retail.

Food can also be lost at many points along the supply chain – especially highly perishable, fresh foods that undergo minimal processing. Up to a third of all food produced is lost or wasted.

FOOD ENVIRONMENTS

The food environment refers to the places and spaces in which people obtain, prepare, and consume their foods. This includes physical and economic access to food – is it available, and what does it cost, relative to other foods? What types of vendors are selling it, and are products appealing and convenient?

Food environments also encompass the promotion, labelling, advertising, and information provided to consumers about food – for instance via billboards, in supermarkets, on packaging, on television, on the internet, etc. Food quality and safety aspects are also reflected in food environments.

The food environment can strongly influence food purchasing and consumption. Society has a particular duty to protect children from being exposed to unhealthy foods.





INDIVIDUAL FACTORS

Individual factors include things like income, education, and access to knowledge and information. They also include cultural issues like aspirations, values, and preferences – which shape what people might consider when buying food.

They also encompass people's situations in terms of the environment where they live, where they go to school, and where they work or socialise. Other important individual factors are mobility (e.g. access to public transport, or a car) and time availability, for example, to shop for food or to cook it.

For families, these factors include how food is distributed within a household. For children, especially young children, caregiver behaviour is very important.

CONSUMER BEHAVIOUR

This includes food acquisition, food preparation, meal practices, storage (for instance, putting food in a refrigerator), and waste.

Most households source most of their food from markets. For instance, an adult will go to a market and return home with food purchased for themselves and other household members. Some people also grow, raise, forage, or capture some or all of their own food.

While children and adolescents have increasing agency as they grow, most of the consumption decisions of young children are shaped by their caregivers.

Food that reaches the consumer but isn't eaten is described as waste. Excessive food waste is a major environmental and social concern.





DIETS

Diets are the foods and beverages that a person habitually eats and drinks. Nutritious diets include a diverse variety of foods—such as fruits and vegetables, animal-source foods or alternatives, legumes, nuts, seeds and whole grains – in appropriate quantities.

Quality diets meet nutrient requirements and so promote good health and protect against disease. They include energy; beneficial nutrients such as vitamins and minerals, proteins, and essential fatty acids; fibres; and low amounts of trans-fat, refined sugar, and substances that limit the absorption and use of nutrients.

In addition to being nutritious, a high-quality diet must be safe: free from harmful contaminants, like harmful bacteria.



NUTRITIONAL AND HEALTH OUTCOMES

Diets have a direct impact on nutrition and health outcomes.

Good nutrition is essential for health and wellbeing – to maintain life, growth, and normal functioning. Biological nutrition processes include ingestion, digestion, absorption, transport, storage, metabolism, utilisation, and elimination of food from the body. These, alongside other factors such as infection or stress, impact a person's nutritional status and health.

Poorly nourished people can suffer from malnutrition in many forms. These include poor growth and development in children (stunting), wasting (thinness), overweight, obesity, and deficiencies of vitamins and minerals, such as iron deficiency anaemia.

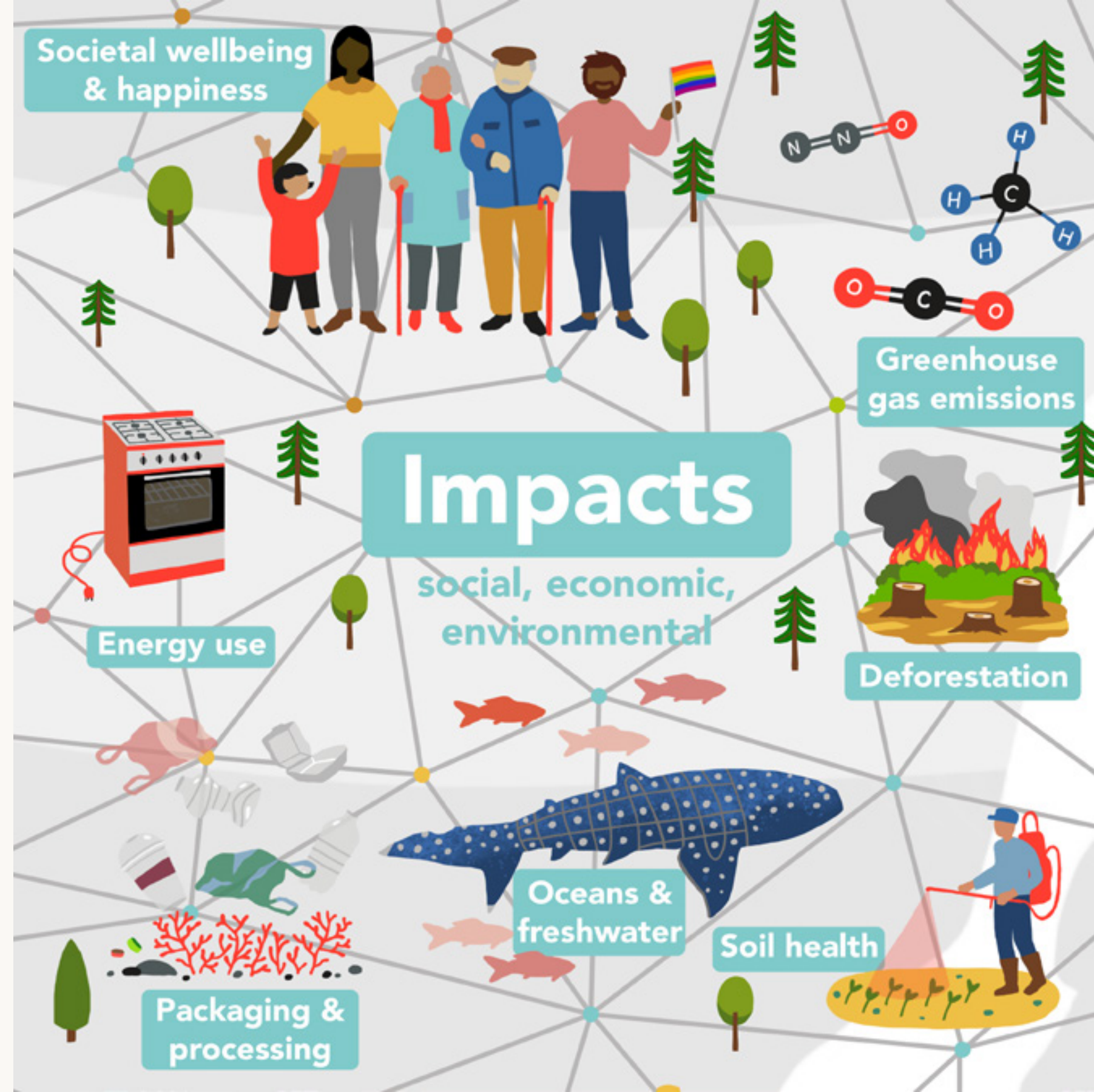
Poor quality diets can also lead to foodborne illness and diet-related non-communicable diseases, such as type 2 diabetes, heart disease, and some forms of cancer.

IMPACTS: SOCIAL, ECONOMIC, ENVIRONMENTAL

People's diets affect their health and wellbeing, their social and personal lives, their ability to learn at school, or to work at home or in a workplace. People's nutritional status thus influences their development, their relationships, their happiness, and their potential to earn.

What people eat also impacts the environment – through the energy, land, soil, water, and other resources used to produce, process, package, transport, prepare, and dispose of food. Food systems contribute to greenhouse gas emissions, to changes in land use, to drawing down on freshwater, to pollution, and to biodiversity loss – but they can be better-shaped to avoid these.

Finally, food systems support countless livelihoods worldwide – from fishers to grocers. In many countries, food systems continue to employ the majority of people, through both self and wage employment. They will continue to do so for the foreseeable future. The working conditions and wages or profits of food system workers thus have a broad impact on poverty, equality, and quality of life.



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