THE FRUITS AND VEGETABLES INDUSTRY SERIES

COLEACP

INTERNATIONAL YEAR OF FRUITS AND VEGETABLES 2021

OECD

FRUIT AND VEGETABLES SCHEME

THE FRUITS AND VEGETABLES INDUSTRY: market trends and prospects of a dynamic sector

Session N°1

14 September 2021, 10h00-12h00 CET

1. Background

Fruits and vegetables (F&V) are a key economic sector in terms of **employment and revenues.** It is a **well-organised supply chain**, even though the outbreak of the COVID-19 pandemic in 2020 disrupted its organisation and some of the existing consumption trends in the fresh fruit and vegetables sector.[1]

Trade in F&V generates important **foreign exchange for many low and middle-income countries.** Favourable climatic conditions, as well as the significant **improvements and innovations in technology and logistics, storage techniques, shortening delivery times and reducing transport costs** allow to produce many F&V varieties on a large scale year-round.

Technology could provide some of the answers to these new logistical challenges, with more sustainable and more traceable supply chains likely to be at a clear advantage in the new post-pandemic global market. [2]

Production, processing and marketing of horticultural crops create employment and generate income for growers and workers in the sector, and therefore improve access to food, including fruits and vegetables. Increased production and availability of fresh horticultural products contributes to improving **the consumers' health and nutrition status**.[3] The growing importance of healthy eating to consumers has emerged as one of the stand-

1 OECD Scheme for the Application of International Standards for Fruit and Vegetables. Preliminary Report: Evaluation of the Impact of the Coronavirus (COVID-19) on Fruit and Vegetables Trade. May 2020.

2 Fruit Logistica. A FRESH START? A special report on the long-term effects of the Covid-19 pandemic on the global fresh produce business. June 2021.

3 Low fruit and vegetable consumption is itself a major nutritional problem and linked to poor health and increased risk of noncommunicable diseases (NCDs). An estimated 3.9 million deaths worldwide were attributable to inadequate fruit and vegetable consumption in 2017. Fruits and vegetables are important components of healthy diets as they are rich sources of vitamins and minerals, dietary fibre and a host of beneficial non-nutrient substances. As part of a healthy diet low in fat, sugars and sodium, WHO suggests consuming more than 400 grams of fruits and vegetables per day to improve overall health and reduce the risk of certain NCDs. WHO. Increasing fruit and vegetable consumption to reduce the risk of noncommunicable diseases https://www.who.int/elena/titles/fruit_vegetables_ncds/en/

out trends during the pandemic.

The F&V sector has a significant impact on the **livelihoods of millions of smallholders** and their families and contributes to (their) **food and nutrition security.**[4] The F&V sector can help agriculture industries in developing nations to **stimulate economic growth and reduce poverty unlocking opportunities for youth and women.**

Worldwide, over 50 percent of F&V are grown on farms smaller than 20 hectares and over 80 percent in developing countries, across China, Asia and Sub-Saharan Africa. From 2000 to 2017, the availability of fruits and vegetables in Africa increased from 167 to 191 g/capita/day. In low-income countries it grew from 121 to 142 g/capita/day. Central Africa nearly tripled the fruits production volumes and doubled the vegetables production volumes, though from a very low base. The production of vegetables also doubled in East and West Africa. Simultaneously, exports of fresh and processed F&V from Sub-Saharan Africa to the world have increased between 2002 and 2017.[5]

However, the world consumes only two-thirds of the recommended minimum amounts of F&V and in some regions much less (in Sub-Saharan Africa about one-third).[6] Affordability, equitable access, as well as food waste remain obstacles.

Therefore, increasing F&V consumption is an important component of a shift towards healthier and more sustainable diets, as well as a driver towards economic, social and environmental sustainability. There is a need to build a food system based on health, social inclusion and a resilient ecosystem in light of European policy developments, notably the European Green Deal, Farm to Fork Strategy and the recently adopted. The sector has a responsibility to continue positioning itself in the **circular economy** debate and to stress the importance of both local and European production and international supply to secure year-round, diverse and sustainable fresh produce availability for European consumers.[7]

Food safety and certifications have become leading aspects in the fresh produce trade and social standards and certifications are added for better information sharing and transparency.

The harmonisation of implementation and interpretation **of marketing standards** remains a necessity to facilitate trade and reducing technical barriers, enhancing market openness. The **OECD Fruit and Vegetables Scheme**[8] promotes international trade through the harmonisation of implementation and interpretation of marketing standards.

Health, flavour and convenience together with increased transparency in labeling, sustainable packaging and attractive presentation are all factors that drive the consumption of fresh fruit and vegetables in many parts of the world.

4 Joosten, F., Y. Dijkxhoorn, Y. Sertse and R. Ruben, 2015. How does the Fruit and Vegetable Sector contribute to Food and Nutrition Security? Wageningen, LEI Wageningen UR (University & Research centre)

5 From COLEACP, Market Study of Fruit and Vegetables from Sub-Saharan Africa, Brussels 2020; the data is based on data from IFPRI, EUROSTAT and authors' calculations.

6 FAO-WHO. Fruit and vegetables for health initiative. 2017. Worldwide production of F&V rose by about half between 2000 and 2018. The biggest absolute increase was in Asia, especially East Asia (where China is by far the largest producer). In relative terms, the biggest increases were in Central Asia (where production of both fruit and vegetables more than tripled) and Central Africa (nearly triple the amount of fruit and double the volume of vegetables, though from a very low base). Production of vegetables also doubled in East and West Africa. In Asia and in upper-middle-income countries, there are enough fruits and vegetables available to meet the FAO/WHO recommendation of consuming a minimum of 400 g per day. However, the total amounts available in Africa and low-income countries fall far short of the 400 g/capita/day consumption target. Low-income countries rely more on staple foods and less on fruits and vegetables and animal source foods than high-income countries.

7 Freshfel Europe Annual Trade Meeting online. May 2021.

8 For more information see: http://www.oecd.org/agriculture/fruit-vegetables/

2. Trade in fresh fruits and vegetables: trends and prospects[9]

2.1. Global trade

The international trade in fresh fruits increased by an average of 2 million tonnes per year to about 80 million tonnes in the past 10 years (40 million tonnes for fresh vegetables). In percentage terms, the global trade in fresh fruits grew by more than a third in the 2006/16 period and continued to grow in 2017. The global trade in fresh fruits has a value of 75 billion dollar nowadays, whereas that figure for fresh vegetables is of 40 billion dollars.

International trade of fresh F&V represents only around 7–8 percent of total global production (FAOSTAT), but it still ranks among the most valuable crops. The growth in exports has significantly outpaced the increase in production: global trade more than doubled between 2000 and 2018.[10]

The analysis of global produce trends showed a positive development for both European and international trade of fresh produce with global fresh produce trade reaching €100 billion in 2020. In turn, global volumes of fruit and vegetable trade have followed a downward trend since the peak was reached in 2018, down to 87 million tonnes of global trade in 2020, a tendency explained as an overall deceleration in growth of booming categories, which has now been accentuated by COVID-19 pandemic disruptions in the past season.

Looking at the European Union (EU), fresh fruit and vegetables intra-EU trade volumes decreased by 11% compared to 2019 to 29.2 million tonnes, with prices reaching a peak of €1.29 per kilo as a result of strong consumer demand during the crisis. In turn, EU exports outside of the Single Market went down to record low levels to 3.9 million tonnes, although value continued increasing up to €4.6 billion. In terms of imports into the EU27, volumes showed a reduction of 5 percent compared to the previous year down to 12.8 million tonnes, with value continuously growing to €14.8 billion (+6%).[11]

The five most important trade flows in fresh fruits are: EU to EU, Latin America to EU, Latin America to North America, Southeast Asia to Southeast Asia, and North America to North America. By far, the most important trade flow in fresh fruits is that among EU countries mutually. Although the mutual trade between EU countries grew by more than 20 percent in the past ten years, importance in global trade dropped from 27 to 24 percent.

A number of countries within the EU, particularly the Netherlands and Belgium, are transit countries to other EU countries. This is mostly the case for imports in the EU from Latin American countries, and to a lesser extent for EU imporst from African countries. The EU countries are the most important importers worldwide with a share including internal trade of 40 percent.

The export from Latin American countries (excluding Mexico) to the EU had a size of 8.76 million tonnes in 2016. Two-thirds of this (5.76 million tonnes) concerned bananas, followed at a distance by pineapples (0.95 million tonnes), and at even more distance by lemons (0.33 million tonnes), melons (0.33 million tonnes), avocados (0.27 million tonnes) and mangoes (0.23 million tonnes). Of products that were traditionally often shipped to the EU from Latin America, such as apples, pears, grapes and oranges, the amounts stayed below

9 www.fruitandvegetablefacts.com
https://www.freshplaza.com/article/2189566/global-trade-in-fresh-fruit-increased-by-2-million-tonnes-per-year-in-the-past-10-years/
https://www.cbi.eu/market-information/fresh-fruit-vegetables/what-demand#:~:text=Belgium%20accounted%20for%20a%26.5,quarter%20of%20Belgium's%20fresh%20export

10 FAO 2021. FRUIT AND VEGETABLES – YOUR DIETARY ESSENTIALS. The International Year of Fruits and Vegetables 2021 Background paper.

11 Freshfel

the level of 200,000 tonnes. As a region, Latin America is the most important exporter with a share of around 30 percent.

The trade in fresh fruits from Africa to the EU has remained fairly stable in the past ten years. From 2006 to 2016, it regarded approximately two million tonnes every year, excluding bananas. Historically, the EU has long been Sub-Saharan Africa's main trading partner for fresh and processed F&V. While continuing growing, the EU total export volumes from Sub-Saharan Africa have decreased from 51 to 24 percent between 2002 and 2017. The main fruits exported from Sub-Saharan Africa to the EU (in volume) in 2018 were largely bananas (609 400 tonnes), followed by mangoes (66 700 tonnes), avocadoes (53 000 tonnes), pineapples (45 500 tonnes) and oranges (43 700 tonnes). To a lesser extent than fruits, the main vegetables exported from Sub-Saharan Africa to the EU (in volume) in 2018 were green beans (50 500 tonnes), ethnic vegetables other than roots and tubers (38 100 tonnes), dry beans (34 800 tonnes), other than roots and tubers (30 200 tonnes) and sweet corn (26 500 tonnes).[12]

Trade in F&V from Sub-Saharan Africa within Sub-Saharan Africa is growing much more quickly than trade with and to the EU, with an average volume growth rate over the period 2002–2017 of 10.3 percent[13] compared to 1.1 percent for the EU.[14] In terms of volume, imports from Sub-Saharan Africa exceed those of the EU since 2017. East Asia remains the main importer from Sub-Saharan Africa fruits and vegetables, with an average volume growth rate for fresh and processed fruits and vegetables of 9.6 percent over the period 2002–2017. However, the total trade balance between Sub-Saharan Africa and Western Asia has been negative, mainly due to the predominance of imports of processed fruit and vegetable products from Western Asia.[15]

Bananas, with 20 million tonnes or 30 percent globally, is by far the most important fresh fruit product traded internationally. Even with mutual trade among EU countries, bananas are by far the largest product traded. The other major products are apples (8.6 million tonnes), oranges (6.7 million tonnes), tangerines (5.1 million tonnes), grapes (4.3 million tonnes), pineapples (3.6 million tonnes), watermelons (3.3 million tonnes), lemons (3.1 million tonnes), pears (2.7 million tonnes) and peaches / nectarines (2.1 million tonnes).

2.2. Domestic markets

In developed countries, domestic production is expanding allowing shorter value chains and direct linkages between producers and consumers, accentuated during the COVID crisis. Sustainability is an important aspect for consumers to buy locally grown F&V as well as for buyers and suppliers across the global fresh produce industry.[16] Freshness and quality are also arguments often cited to justify local and seasonal purchases.

Domestic and regional food markets are expanding in low- and middle-income countries on the back of population growth, urbanisation, rising incomes and a growing middle class leading to shifts in consumer preferences for food and creating a nutrition transition with higher consumption of fruits and vegetables.

Due to high perishability and competitiveness in export markets, most fresh fruits and vegetables are traded and consumed locally or nationally. In Africa up to 96 percent of

12 From COLEACP, Market Study of Fruit and Vegetables from Sub-Saharan Africa, Brussels 2020; the data is based on data from IFPRI, EUROSTAT and authors' calculations.
13 It should be noticed that the share of intra-Sub-Saharan Africa imports is probably underestimated because a large part of domestic trade is still informal.
14 From COLEACP, Market Study of Fruit and Vegetables from Sub-Saharan Africa, Brussels 2020.
15 *ibid*
16 Fruit Logistica. A FRESH START? A special report on the long-term effects of the Covid-19 pandemic on the global fresh produce business. June 2021.

marketed farm output (including F&V) is supplied through the domestic market.[17] Increased urban demand has fueled the emergence of peri-urban horticultural farming clusters serving expanding urban markets for fresh F&V.

In Latin America and Asia, most fruits and vegetables are sold through wholesale markets, fresh food markets, supermarkets and specialised grocery stores. Much of these products are grown by smallholders for sale, contrary to developed countries, through an often-complex system of traders and intermediaries, or sometimes directly to consumers.

3. Processed fruits and vegetables market

Processed fruits and vegetables market size exceeded USD 260 billion dollars, in 2019[18] and is estimated to grow at over 7 percent CAGR between 2020 and 2026. Increasing "Move to organic" trend along with increasing consumer awareness for frozen and processed products, a higher demand for organic F&V accompanied by a rise in organic farming practices is supporting the market growth.

Processing technology assists in evading the task of peeling and slicing, thereby offering convenience for the F&V processing manufacturers. The availability of semi-automatic and fully automatic equipment that can be used in the F&V processing market offers improved safety, increased efficiency of operations, faster packaging, and saving of time. The processing stage also helps reducting the risk of contamination at the time of processing operations along with enhancing the products shelf life.

Rapid innovations in freezing technologies along with improvements in cold storage facilities across emerging countries support the development of frozen F&V and their availability throughout the year. The increasing consumption of frozen berry fruits including raspberries, blackberries, blueberries, etc., owing to the growing need for the preparation of smoothies and snacks will further augment the processing F&V market share.

Growing consumer health consciousness regarding leading a healthy way of living will boost the demand for processed fruits and vegetables, including in organic.

The changing consumer lifestyle and dietary patterns led to a surge in the demand for convenience food and ready-to-eat fruits. In addition to these, demand for frozen products like fresh juice has wider acceptance amongst consumers owing to rising consumers inclination towards high nutrient, and antioxidants in fruits such as vitamin, fiber, and others.

17 AGRA. Africa Agriculture Status Report 2019
18 https://www.gminsights.com/industry-analysis/processed-fruits-and-vegetables-market

4. Towards increased sustainability of the sector

Changing consumer habits towards more personalised and healthier diets, and convenience food are expected to drive the demand for fruits and vegetables.[19] The expansion of online retailing stands out as the pandemic's most impactful change although we do not know how permanent it will be. Increased work from home as a post-COVID feature will also lead to big changes in the way people buy and consume F&V (i.e. less fresh-cut fruit as a result of less people at office).[20]

Sustainability has become the driver of food systems and a key topic on the European agenda.[21] The fresh and processed F&V market in Europe will have to be efficient and competitive while minimizing negative environmental impact, reducing waste and ensure safety and quality.

People at all levels in the value chain are gaining interest in F&V produced and traded under more sustainable and responsible practices. This trend relates to many aspects along the supply chain, including working conditions, water use, waste management, among other things. Also, food contact materials will be more sustainable (biodegradable materials).

Sustainable food consumption activities will stimulate consumers to make healthier food choices.

All these changes imply challenges for developing countries and their exporters. However, they also present opportunities.

Organic production is seen by many as an healthier choice. The organic market in the EU grew by 7.7 percent in 2018 to a retail turnover of 37.4 billion euros. The organic import of tropical fruits (fresh or dried), nuts and spices represented the single biggest category, with 794 thousand tonnes or 24.4 percent of total organic imports.[22] On the contrary, the increasing sustainability trend in consuming locally grown vegetables limits the growth of the organic vegetables export market in the EU.

19 EU agricultural outlook 2020-30. European Commission. December 2020.

20 Fruit Logistica. A FRESH START? A special report on the long-term effects of the Covid-19 pandemic on the global fresh produce business. June 2021.

21 The European Green Deal aims at making the European economy more sustainable and climate neutral by 2050 and the Farm to Fork Strategy aims at making food systems fair, healthy and environmentally-friendly. Policies include specific measures such as a 50 percent reduction of the use of pesticides and increasing the share of agricultural land used for organic farming to 25 percent in the EU by 2030. This means many pesticides will be banned, and residue levels will decrease gradually over the next years.

22 World of Organic Agriculture from the Research Institute of Organic Agriculture (FiBL). The world of Organic Agriculture 2020. Organic food consumption is developing exceptionally well in relatively wealthy countries. The market share for organic fruits and vegetables in Europe varies from around 1 percent to 3 percent in most eastern and southern European countries up to 11 percent to 25 percent in Denmark, Switzerland, Sweden and Austria. In terms of total value, Germany and France offer the largest market for organic food; with retail values of 10.9 and 9.1 billion euros respectively, representing almost half of the total EU market.

5. Promoting increased knowledge about the Fruits and Vegetables industry

The United Nations (UN) has declared 2021 as the International Year of Fruits and Vegetables[23] to raise awareness of the nutritional and health benefits of consuming more fruits and vegetables.

Adding its voice to the UN and many partners working in the sector, the COLEACP[24] and the OECD Fruit and Vegetables Scheme[25] of the Trade and Agriculture Directorate, will organize a series of online sessions with key partners highlighting the significance of the F&V sector and its various dimensions.

The main objectives of the series are:

- Sharing knowledge of markets and operators working in local and export F&V markets
- Understanding the F&V sector contribution to sustainable production and consumption
- Promoting F&V contribution to healthy and nutritious diets
- Showcasing successes and innovations of private sector operators across the EU and Southern countries and lessons learned

The first session to be held on 14th September 2021 will provide an overview of trends and foresights of the sector in trade, new markets, structure of the industry and have insights from policy, research and industry.

23 http://www.fao.org/fruits-vegetables-2021/en/

24 As a non-profit association of private sector operators, the COLEACP mission is to develop inclusive, sustainable trade in fruits, vegetables and food products, focusing on the ACP countries' trade with one another and with the EU. https://www.coleacp.org/

25 OECD Fruit and Vegetables Scheme promotes international trade through the harmonisation of implementation and interpretation of marketing standards. https://www.oecd.org/agriculture/fruit-vegetables/

Agenda

Moderator: Isolina Boto. Head of Networks and Alliances, COLEACP

10h00-10h10 Welcome and Introduction

- Jeremy Knops, General Delegate, COLEACP
- Lee Ann Jackson, Head of Division, Agro-food Trade and Markets, Trade and Agriculture Directorate, OECD

10h10-10h20 Overview of the fruits and vegetables markets and trade

This panel will give an overview of the trends in global and regional trade, the market dynamics and products traded.

- *Global trends in trade and consumption*

  Hubertus Gay, Senior Agricultural Policy Analyst, OECD
- *Focus on ACP-EU trade*

  Emmanuel Bourcelet, Engagement and Marketing Lead, COLEACP

10h20-10h40 Organisation of the F&V sector

In addition to the organization of markets, the organization of actors is important to facilitate trade, reduce technical barriers and increase efficiency towards quality-driven products. Examples will illustrate the advantages of applying common standards and or being organized as industry sector.

- José Brambila-Macías and Marie Russel, Fruit and vegetables Scheme (quality and marketing standards), OECD
- Philippe Binard, General Delegate, FRESHFEL

10h40-11h20 Prospects for growth in the industry: insights from operators

Various operators in the F&V retail industry and partners will bring their perspective into the recent trends and prospects of fresh and processed F&V in their sector.

This panel will feature perspectives from operators in the F&V retail industry on the trends and prospects of fresh and processed F&V highlighting opportunities for value chain actors.

- Frédéric Rosseneu, Corporate Business Development Manager, Greenyard Group
- Tahina Randriarilala, Manager Quality and Sustainable Development, LECOFRUIT, Madagascar
- Timothée Pélissier, Sales and Marketing Director, CFAO Retail-Carrefour Côte d'Ivoire
- Jeff Mahintach, Director Fruit & Vegetable, Flower & Plants sectors, U-Enseigne / FDC, France

11h30-11h50 Q&A session

11h50-12h00 Conclusion and way forward

- Insights from Yvonne Chileshe, Expert Commodities and Value Chain Development, OACPS